R35. Administrative Services, Records Committee.
R35-1. State Records Committee Appeal Hearing Procedures.
R35-1-1. Scheduling Committee Meetings.

(1) The Executive Secretary shall respond in writing to the notice of appeal within seven business days.

(2) Two weeks prior to the Committee meeting or appeal hearing, the Executive Secretary shall post a notice of the meeting on the Utah Public Notice Website.

(3) One week prior to the Committee meeting or appeal hearing, the Executive Secretary shall post a notice of the meeting, indicating the agenda, date, time, and place of the meeting at the building where the meeting is to be held and at the Utah State Archives.

R35-1-2. Procedures for Appeal Hearings.

(1) The meeting shall be called to order by the Committee Chair.

(2) Testimony shall be presented by the petitioner and the governmental entity. Each party shall be allowed twenty minutes to present testimony and evidence, to call witnesses, and to respond to questions from Committee members.

(3) Witnesses providing testimony shall be sworn in by the Committee Chair.

(4) Questioning of the witnesses and parties by Committee members is permitted.

(5) The governmental entity must bring the disputed records to the hearing to allow the Committee to view records in camera if it deems an in camera inspection necessary. If the records withheld are voluminous or the governmental entity contends they have not been identified with reasonable specificity, the governmental entity shall notify the Committee and the adverse party at least two days before the hearing and obtain approval from the Committee Chair to bring a representative sample of the potentially responsive records to the hearing, if it is possible to do so.

(6) Third party presentations may be permitted. Prior to the hearing, the third party shall notify the Executive Secretary of intent to present. Third party presentations shall be limited to five minutes.

(7) Closing arguments may be presented by the petitioner and the governmental entity. Each party shall be allowed five minutes to present a closing argument and make rebuttal statements.

(8) After presentation of the evidence, the Committee shall commence deliberations. A Committee Member shall make a motion to grant or to deny the petitioner's request in whole or in part. Following discussion of the motion, the Committee Chair shall call for the question. The motion shall serve as the basis for the Committee Decision and Order. The Committee shall vote and make public the decision of the Committee during the hearing.

(9) The Committee may adjourn, reschedule, continue, or reopen a hearing on the motion of a member.

(10) Except as expressly authorized by law, there shall be no communication between the parties and the members of the Committee concerning the subject matter of the appeal before the hearing or prior to the issuance of a final Decision And Order. Any other oral or written communication from the parties to the members of the Committee, or from the members of the Committee to the parties, shall be directed to the Executive Secretary for transmittal.

(11) The following provisions govern any meeting at which one or more members of the Committee or a party appears telephonically or electronically, pursuant to Utah Code Section 52-4-207.

(a) The anchor location is the physical location from which the electronic meeting originates or from which the participants are connected. The anchor location, unless otherwise designated in the notice, shall be at the offices of the Division of State Archives, Salt Lake City, Utah.

(b) If one or more Committee members or parties may be participating electronically or telephonically, public notices of the meeting shall so indicate. In addition, the notice shall specify the anchor location where the members of the Committee not participating electronically or telephonically will be meeting and where interested persons and the public may attend and monitor the open portions of the meeting.

(c) When notice is given of the possibility of a member of the Committee appearing electronically or telephonically, any member of the Committee may do so and shall be counted as present for purposes of a quorum and may fully participate and vote on any matter coming before the Committee. At the commencement of the meeting, or at such time as any member of the Committee initially appears electronically or telephonically, the Committee Chair shall identify for the record all those who are appearing telephonically or electronically. Votes by members of the Committee who are not at the physical location of the meeting shall be confirmed by the Committee Chair.

(12)(a) If the petitioner wishes to postpone the hearing or withdraw the appeal, the petitioner shall notify the Executive Secretary of the Committee and the governmental entity in writing no later than two days prior to the scheduled hearing date.

(b) The Committee Chair has the discretion to grant or deny a petitioner's request to postpone a hearing based upon: (i) the reasons given by the petitioner in his or her request, (ii) the timeliness of the request, (iii) whether petitioner has previously requested and received a postponement, (iv) any other factor determined to protect the equitable interests of the parties.

(c) The Committee will ordinarily deny a governmental entity's request to postpone the hearing, unless the governmental entity has obtained the petitioner's prior consent to reschedule the hearing date.

R35-1-3. Issuing the Committee Decision and Order.

(1) The Decision and Order shall be signed by the Committee Chair and distributed by the Executive Secretary within seven business days after the hearing. Copies of each Decision and Order shall be distributed to the petitioner, the governmental entity and all other interested parties. The original order shall be maintained by the Executive Secretary. A copy of the order shall be made available for public access at the Utah State Archives website.

R35-1-4. Committee Minutes.

(1) Purpose. Utah Code Section 52-4-203 requires any public body to establish and implement procedures for the public body's approval of the written minutes of each meeting. This rule establishes procedures for the State Records Committee to approve the written minutes of each meeting.

(2) Authority. This rule is enacted under the authority of Utah Code Sections 52-4-203, 63G-3-201, and 63A-12-101 et seq.

(3) All meetings of the Committee shall be recorded. The recording of the open meeting shall be made available to the public within three business days. Access to the audio recordings shall be provided by the Executive Secretary on the Utah Public Notice Website.

(4) Approved written minutes shall be the official record of the meetings and appeal hearings and shall be maintained by the Executive Secretary.

(a) Written minutes shall be read by members prior to the next scheduled meeting, including electronic meetings.

(b) Written minutes from meetings shall be made available no later than one week prior to the date of the next regularly scheduled Committee meeting.

(c) When minutes are complete but awaiting official approval, they are a public record and must be marked as "Draft."

(d) At the next meeting, at the direction of the Committee Chair, minutes shall be amended and/or approved with individual votes recorded in the minutes. The minutes shall be then marked as "Approved."

(e) When the minutes are "Approved" they will be so noted in the printed and online versions. A copy of the approved minutes shall be made available for public access on the Utah Public Notice Website.

KEY: government documents, state records committee, records appeal hearings
October 18, 2019 63G-2-502(2)(a)
Notice of Continuation June 3, 2019

R58. Agriculture and Food, Animal Industry.
R58-1. Admission, Identification, and Inspection of Livestock, Poultry, and Other Animals.
R58-1-1. Authority.

(1) Promulgated under the authority of Title 4, Chapter 31 and Subsections 4-2-103(c)(i), and 4-2-103(1)(i).

(2) It is the intent of these rules to eliminate or reduce the spread of diseases among animals by providing standards to be met in the movement of animals within the State of Utah (INTRASTATE) and the importation of animals into the state (INTERSTATE).

R58-1-2. Definitions.

(1) "Accredited Veterinarian" means a veterinarian approved by the Deputy Administrator of Veterinary Services (VS), Animal and Plant Health Inspection Services (APHIS), United States Department of Agriculture (USDA), in accordance with the provisions of 9 CFR 161 to perform functions required by cooperative State-Federal disease control and eradication programs.

(2) "Animal identification number (AIN)" means a numbering system for the official identification of individual animals in the United States that provides a nationally unique identification number for each animal. The AIN consists of 15 digits, with the first 3 being the country code (840 for the United States or a unique country code for any U.S. territory that has such a code and elects to use it in place of the 840 code).

(3) "Animals" means all vertebrates, except humans.

(4) "Approved livestock facility" means a stockyard, livestock market, buying station, concentration point, or any other premises under State or Federal veterinary inspection where livestock are assembled and that has been approved by the Department.

(5) "Approved Livestock Market" means a livestock market that is licensed by the Department under Title 4, Chapter 30, Livestock Markets.

(6) "Approved Slaughter Establishment" means a State or Federally inspected slaughter establishment at which ante-mortem and post-mortem inspection is conducted by State or Federal inspectors.

(7) "Approved tagging site" means a premises, authorized by Department, where livestock may be officially identified on behalf of their owner or the person in possession, care, or control of the animals when they are brought to the premises.

(8) "Brand Inspection Certificate" means an official form, issued by a government agency or other agency responsible for animal identification in the state of origin, used to transfer title of livestock; listing the identification marks of the animals(s) as well as the consignor and consignee contact information.

(9) "Camelidae" means a term referring to members of the family of animals which for the purposes of these rules includes camels (Camelus dromedarius and Camelus bactrianus), llamas (Lama glama), alpacas (Vicugna pacos) , guanacos (Lama guanicoe), and vicunas (Vicugna vicugna).

(10) "Captive Cervidae" means a term referring to members of the family of animals which for the purposes of these rules includes captive bred Caribou (Reindeer (Rangifer tarandus)), captive bred Elk (Cervus canadensis nelsoni), and captive bred Fallow deer (Dama dama) or any other captive bred cervidae allowed with permission from the State Veterinarian and the Utah Division of Wildlife Resources.

(11) "Certificate of Veterinary Inspection" means an official paper or electronic form completed by an accredited veterinarian that has examined the animal or animals listed on the certificate and has completed all disease testing or vaccinations as required.

(12) "Commuter herd" means a herd of cattle located in two or more states that is documented as a valid ranching operation by those states in which the herd is located and which requires movement of cattle interstate from a farm of origin or returned interstate to a farm of origin in the course of normal ranching operations, without change of ownership, directly to or from another premise owned, leased, or rented by the same individual.

(13) "Commuter herd agreement" means a written agreement between the owner(s) of a herd of cattle and the animal health officials for the States or Tribes of origin and destination specifying the conditions required for the interstate movement from one premises to another in the course of normal livestock management operations and specifying the time period, up to 1 year, that the agreement is effective. A commuter herd agreement may be renewed annually.

(14) "Dairy cattle" means all cattle, regardless of age or sex or current use, that are of a breed(s) used to produce milk or other dairy products for human consumption, including, but not limited to, Ayrshire, Brown Swiss, Holstein, Jersey, Guernsey, Milking Shorthorn, and Red and Whites.

(15) "Department" means the Utah Department of Agriculture and Food.

(16) "Designated brucellosis surveillance area" means an area within a state that has been designated by the animal health official of that state as an area of increased disease risk for bovine brucellosis.

(17) "Direct Movement" means the movement in which the animals are not unloaded enroute to their final destination, except for stops of less than 24 hours to feed, water, or rest the animals being moved, and not commingled with another producer's animals.

(18) "Exotic animal" means a rare or unusual animal pet or an animal, not commonly thought of as a pet, kept within a human household. For this chapter, rodents, reptiles, and amphibians are considered exotic animals.

(19) "Exposed Animal" means an animal that has been in contact with or on the same premises of or within a quarantine zone where animals with a contagious or communicable disease are present.

(20) "Farm of Origin" means the farm where the animal was born and remain prior to importation into the state.

(21) "Flock-based number system" means the flock-based number system that combines a flock identification number (FIN) with a producer's unique livestock production numbering system to provide a nationally unique identification number for an animal.

(22) "Flock identification number (FIN)" means a nationally unique number assigned by a State, Tribal, or Federal animal health authority to a group of animals that are managed as a unit on one or more premises and are under the same ownership.

(23) "Group/lot identification number (GIN)" means the identification number used to uniquely identify a "unit of animals" of the same species that is managed together as one group throughout the preharvest production chain.

(24) "Import Permit" means a number given by the Department to the issuing veterinarian that is recorded on the certificate of veterinary inspection and is required before movement of the animals into the state.

(25) "Interstate movement" means movement of animals from one State into or through any other State.

(26) "Livestock Market Veterinarian" means a Utah licensed and USDA accredited veterinarian appointed by the Utah Department of Agriculture and Food to work at approved livestock markets.

(27) "Location identification (LID) number" means a nationally unique number issued by a State, Tribal, and/or Federal animal health authority to a location as determined by the State or Tribe in which it is issued. The LID number may be used in conjunction with a producer's own unique livestock production numbering system to provide a nationally unique

and herd-unique identification number for an animal. It may also be used as a component of a group/lot identification number (GIN).

(28) "National Uniform Eartagging System (NUES)" means a numbering system for the official identification of individual animals in the United States that provides a nationally unique identification number for each animal.

(29) "Official Calfhood Vaccinate" means female bison or cattle vaccinated by a USDA Veterinary Services representative, State certified technician, or accredited veterinarian with an approved dose of RB51 vaccine or other USDA approved agent while from 4 to 12 months of age in accordance with its labeling. These cattle must be properly identified by official tattoos and ear tag or registration tattoo and be reported on an official vaccination certificate (VS Form 4-24) within 30 days to the State Veterinarian.

(30) "Official eartag" means an identification tag approved by the Department that bears an official identification number for individual animals. The official eartag must be tamper-resistant and have a high retention rate in the animal.

(31) "Official eartag shield" means the shield shaped graphic of the U.S. Route Shield with "U.S." or the State postal abbreviation or Tribal alpha code imprinted within the shield.

(32) "Official identification device or method" means a means approved by the Department of applying an official identification number to an animal of a specific species or associating an official identification number with an animal or group of animals of a specific species or otherwise officially identifying an animal or group of animals.

(33) "Official identification number" means a nationally unique number that is permanently associated with an animal or group of animals.

(34) "Officially identified" means identified by means of an official identification device or method approved by the Department.

(35) "Poultry" means domestic fowl (chickens, turkeys, ducks, geese, and guinea and pea fowl), pigeons and doves, pheasants and other gamebirds, and ratites.

(36) "Premises identification number (PIN)" means a nationally unique number assigned by a State, Tribal, and/or Federal animal health authority to a premises that is, in the judgment of the State, Tribal, and/or Federal animal health authority a geographically distinct location from other premises.

(37) "Qualified Feedlot" means a feedlot approved by the Utah Department of Agriculture and Food to handle heifers, cows or bulls which are either official calfhood vaccinated, or brucellosis unvaccinated animals confined to a drylot area which is used to upgrade or finish feeding animals going only to slaughter or another qualified feedlot. All such animals must be kept separate from other animals not destined for slaughter.

(38) "Quarantine" means a verbal or written restriction of movement of animals into or out of an area or premise, issued by a State Animal Health Official.

(39) "Reactor" means any animal that has been determined by a designated brucellosis epidemiologist to be infected with brucellosis based on test results, herd/flock history, and/or culture results.

(40) "Suspect" means any animal that may be infected with a contagious, infectious, or communicable disease based on test results and/or herd/flock history.

(41) "Test Eligible Cattle and Bison" means all cattle or bison six months of age or older, except:

1. Steers, spayed heifers;

2. Official calfhood vaccinates of any breed under 24 months of age which are not parturient, springers, or post parturient.

(42) "United States Department of Agriculture (USDA) approved backtag" means a backtag issued by APHIS that provides a temporary unique identification for each animal.

(43) "Zoological animal" means an animal kept at a zoological garden (zoo) or other exhibition that is inspected on a regular basis by the United States Department of Agriculture.

R58-1-3. Official Identification Devices and Methods.

(1) Any State, Tribe, accredited veterinarian, or other person or entity who distributes official identification devices must maintain for 5 years a record of the names and addresses of anyone to whom the devices were distributed.

(2) An official identification number is a nationally unique number that is permanently associated with an animal or group of animals and that adheres to one of the following systems:

(a) National Uniform Eartagging System (NUES).

(b) Animal identification number (AIN).

(c) Location-based number system.

(d) Flock-based number system.

(e) Any other numbering system approved by the animal health official of the state of origin for the official identification of animals.

(3) The Department has approved the following official identification devices or methods for the species listed.

(a) The Department may authorize the use of additional devices or methods for a specific species if the Department determines that such additional devices or methods will provide for adequate traceability.

(4) Cattle and bison that are required to be officially identified for interstate movement must be identified by means of:

(a) An official eartag; or

(b) Brands registered with a recognized brand inspection authority and accompanied by an official brand inspection certificate, when agreed to by the shipping and receiving State or Tribal animal health authorities; or

(c) Tattoos and other identification methods acceptable to a breed association for registration purposes, accompanied by a breed registration certificate, when agreed to by the shipping and receiving State or/Tribal animal health authorities; or

(d) Group/lot identification when a group/lot identification number (GIN) may be used.

(5) Horses and other equine species that are required to be officially identified for interstate movement must be identified by one of the following methods:

(a) A description sufficient to identify the individual equine including, but not limited to, name, age, breed, color, gender, distinctive markings, and unique and permanent forms of identification when present (e.g., brands, tattoos, scars, cowlicks, blemishes or biometric measurements); or

(b) Electronic identification that complies with ISO 11784/11785; or

(c) Non-ISO electronic identification injected to the equine on or before June 30, 2013; or

(d) Digital photographs sufficient to identify the individual equine.

(6) Poultry that are required to be officially identified for interstate movement must be identified by one of the following methods:

(a) Sealed and numbered leg bands; or

(b) Group/lot identification when a group/lot identification number (GIN) may be used.

(7) Sheep and goats that are required to be officially identified for interstate movement must be identified by one of the following methods:

(a) Electronic implants when accompanied by a certificate or owner statement that includes the electronic implant numbers and the name of the chip manufacturer; or

(b) Official eartags, including tags approved for use in the Scrapie Flock Certification Program or APHIS-approved premises identification number eartags when combined with a unique animal identification number; or

(c) United States Department of Agriculture backtags or official premises identification backtags that include a unique animal identification number, when used on sheep or goats moving directly to slaughter and when applied within 3 inches of the poll on the dorsal surface of the head or neck; or

(d) Legible official registry tattoos that have been recorded in the book of record of a sheep or goat registry association when the animal is accompanied by either a registration certificate or a certificate of veterinary inspection.

(i) These tattoos may also be used as premises identification if they contain a unique premises prefix that has been linked in the National Scrapie Database with the assigned premises identification number of the flock of origin; or

(e) Premises identification eartags or tattoos, if the premises identification method includes a unique animal number or is combined with a flock eartag that has a unique animal number and the animal is accompanied by an owner statement; or

(f) Premises identification when premises identification is allowed and the animal is accompanied by an owner statement; or

(g) Any other official identification method or device approved by the animal health official of the state of origin.

(8) Swine that are required to be officially identified for interstate movement must be identified by one of the following methods:

(a) Official eartags; or

(b) United States Department of Agriculture backtags, when used on swine moving to slaughter; or

(c) Official swine tattoos, when used on swine moving to slaughter; or

(d) Ear notching when used on any swine, if the ear notching has been recorded in the book of record of a purebred registry association; or

(e) Tattoos on the ear or inner flank of any swine, if the tattoos have been recorded in the book of record of a swine registry association;

(f) For slaughter swine and feeder swine, an eartag or tattoo bearing the premises identification number assigned by the State animal health official to the premises on which the swine originated; or

(g) Any other official identification device or method that is approved by the animal health official of the state of origin; or

(h) Group/lot identification when a group/lot identification number (GIN) may be used.

(9) Captive cervids that are required to be officially identified for interstate movement must be identified by one of the following methods:

(a) Official eartag; and

(b) A tattoo that is placed peri-anally or inside the right ear and consist of a number assigned by the animal health official of the state of origin; or

(c) A microchip that has been placed in the right ear.

R58-1-4. Intrastate Cattle Movement - Rules - Brucellosis.

(1) The State Veterinarian may require brucellosis testing of cattle, bison, and elk, moving intrastate as necessary to protect against potential disease threat or outbreak.

(2) Utah Department of Agriculture and Food Livestock Inspectors will help regulate intrastate movement of cattle according to Brucellosis rules at the time of change of ownership inspection.

R58-1-5. Interstate Importation Standards.

(1) No animal, poultry or bird of any species or other animal including wildlife, that is known to be affected with or has been exposed to a contagious, infectious or communicable disease, or that originates from a quarantined area, shall be shipped, transported or moved into the State of Utah until written permission for such entry is first obtained from the United States Department of Agriculture, Animal and Plant Health Inspection Service, Veterinary Services Division, and the Utah Department of Agriculture and Food, State Veterinarian or Commissioner of Agriculture.

(a) Failure to obtain written permission may result in a citation.

(2) An official Certificate of Veterinary Inspection issued by an accredited veterinarian is required for importation of all animals.

(3) A copy of the certificate shall be immediately forwarded to the Utah Department of Agriculture and Food by the issuing veterinarian or the animal health official of the state of origin within 7 calendar days from date on which the Certificate of Veterinary Inspection or other document is received or issued.

(4) Import permits for livestock, poultry and other animals may be obtained by telephone or via the internet to the accredited veterinarian responsible for issuing a Certificate of Veterinary Inspection.

(5) Certificates of Veterinary Inspection are considered valid for 30 days from the date of inspection.

R58-1-6. Cattle and Bison.

(1) A Certificate of Veterinary Inspection and an import permit must accompany all cattle and bison imported into the state.

(2) All cattle and bison must carry some form of individual identification as listed in R58-1-3(4).

(a) Individual identification must be listed on the Certificate of Veterinary Inspection.

(i) Official individual identification used for testing purposes must be shown on the Certificate of Veterinary Inspection; or

(ii) A copy of the official brucellosis or tuberculosis test sheets must be stapled to each copy of the Certificate of Veterinary Inspection.

(b) All cattle and bison imported into Utah from Canada, except those imported directly to slaughter, must be permanently branded with the letters CAN, not less than two (2) inches high nor more than three (3) inches high, placed high on the right hip.

(3) The import permit number must be listed on the Certificate of Veterinary Inspection.

(4) The following cattle are exempted from (1) above:

(a) Cattle consigned directly to slaughter at an approved slaughter establishment; or

(b) Cattle consigned directly to a State or Federal approved Auction Market.

(c) Movements under Subsections R58-1-5(4)(a), and R58-1-5(4)(b) must be in compliance with state and federal laws and regulations and must be accompanied by a weighbill, brand certificate, or similar document showing some form of positive identification, signed by the owner or shipper stating the origin, destination, number and description of animals and purpose of movement.

(d) Commuter cattle are exempt as outlined in Subsection R58-1-5(6).

(5) A brand inspection certificate or proof of ownership, which indicates the intended destination, is required for cattle entering the state.

(6) Commuter cattle may enter Utah or return to Utah after grazing if the following conditions are met.

(a) A commuter permit approved by the import state and the State of Utah must be obtained prior to movement into Utah. This will allow movements for grazing for the current season if the following conditions are met:

(i) All cattle shall meet testing requirements as to State

classification for interstate movements as outlined in 9 CFR 1-78, which is incorporated by reference; USDA, Animal and Plant Health Inspection Services, Brucellosis Eradication, Uniform Methods and Rules, October 1, 2003, and approved by cooperating States.

(ii) Commuter cattle shall not be mixed with quarantined, exposed, or suspect cattle nor change ownership during the grazing period.

(iii) All bulls used in the commuter herd must be tested annually for trichomoniasis as required by the State of Utah.

(b) No quarantined, exposed or reactor cattle shall enter Utah.

(7) Prior to importation of cattle or bison into Utah the following health restrictions must be met.

(a) Bison and cattle heifers of vaccination age between four and 12 months must be officially calfhood vaccinated for brucellosis prior to entering Utah, unless;

(i) going directly to slaughter, or

(ii) qualified feedlot to be sold for slaughter, or

(iii) to an approved livestock market to be sold for slaughter or for vaccination.

(iv) Bison and cattle heifers of vaccination age may be vaccinated upon arrival by special permit from the State Veterinarian.

(b) All female bison and cattle over 12 months of age imported to Utah must have evidence of a brucellosis calfhood vaccination tattoo to be imported or sold into the State of Utah, unless;

(i) going directly to slaughter, or

(ii) qualified feedlot to be sold for slaughter, or

(iii) to an approved livestock market to be sold for slaughter, or

(iv) tested negative for Brucella abortus within 30 days prior to entry.

(c) Test eligible cattle imported from states designated as brucellosis free, but are coming from a designated brucellosis surveillance area within that state, must be tested negative for brucellosis within 30 days prior to entry.

(i) Test eligible cattle may enter the state prior to testing with approval from the State Veterinarian but must be tested immediately upon arrival and the cattle must be kept isolated away from other cattle until tested negative.

(d) All test eligible cattle imported from states that have not been designated as brucellosis free must test negative for brucellosis within 30 days before movement into Utah.

(e) Exceptions to the above testing requirements include exhibition animals and test eligible cattle imported to Utah and moving directly to:

(i) an approved livestock market, or

(ii) to a "qualified feedlot", or

(iii) for immediate slaughter to an approved slaughter establishment.

(f) No reactor cattle, or cattle from herds under quarantine for brucellosis will be allowed to enter the state except when consigned to an approved slaughter establishment. An import permit and a Veterinary Services Form 1-27 prior to shipment are also required.

(g) Entry of cattle which have been retattooed is not permitted unless they are moved for immediate slaughter to an approved slaughter establishment or to not more than one state or federal approved market for sale to a qualified feedlot or slaughtering establishment.

(h) A negative tuberculosis test is required within 60 days prior to shipment for all dairy cattle 2 months of age and older and bison 6 months of age and older.

(i) Breeding cattle originating within a quarantined area or from reactor or exposed herds and all cattle from an area which is not classified as Tuberculosis Free are required to be tested for tuberculosis within 60 days prior to entry to Utah.

(j) Rodeo bulls and roping steers must be tested annually during the calendar year for tuberculosis prior to entry to Utah.

(k) No cattle infested with, or exposed to scabies shall be moved into Utah. Cattle from a county where scabies has been diagnosed during the past 12 months must be officially treated within 10 days prior to shipment into Utah. The date of treating and products used must be shown on the Certificate of Veterinary Inspection.

(l) No cattle infested with ticks that can transmit splenic or tick fever, or exposed to tick infestations shall be imported into the State of Utah for any purpose.

(m) All bulls imported to Utah shall be in compliance with R58-21-3(A), which requires testing of all bulls over twelve months of age for trichomoniasis prior to entry, with some exceptions which are for slaughter, rodeo, exhibition, and bulls kept in confinement.

R58-1-7. Horses, Mules, Asses, and Other Equidae.

(1) Equidae may be imported into the State of Utah when accompanied by an official Certificate of Veterinary Inspection or an electronic Extended Equine Certificate of Veterinary Inspection created by a platform approved by the department.

(2) The Certificate of Veterinary Inspection must show a negative Equine Infectious Anemia (EIA)(Coggins - AGID or ELISA) test within one year previous to the time the certificate was issued.

(a) Entry of equidae into Utah shall not be allowed until the EIA test has been completed and reported negative.

(b) Equidae which test positive to the EIA test shall not be permitted entry into Utah, except by special written permission from the State Veterinarian.

(c) A nursing foal less than six (6) months of age accompanied by its EIA negative dam and equidae moving directly to an approved livestock market are exempt from the test requirements.

(3) Utah horses returning to Utah as part of a commuter livestock shipment are exempted from the Certificate of Veterinary Inspection requirements; however, a valid Utah horse travel permit as outlined under Sections 4-24-405 or 4-24-406 and Section R58-9-4 is required for re-entering Utah.

(4) An import permit issued by the Department must accompany all stallions or semen.

(5) All stallions used for breeding that enter Utah or stallions whose semen will be shipped to Utah shall be tested for Equine Viral Arteritis (EVA) by an accredited veterinarian within 30 days prior to entry.

(a) Exceptions are stallions that have proof of negative EVA status prior to vaccination and proof of subsequent yearly vaccination.

(b) The EVA test or vaccination status must be recorded on the Certificate of Veterinary Inspection.

(c) Breeding stallions and semen infected with Equine Arteritis Virus must be handled only on an approved facility as required by R58-23.

R58-1-8. Swine.

(1) Swine may be shipped into the state if the following requirements are met:

(a) All swine must be accompanied by an approved Certificate of Veterinary Inspection stating they have not been fed raw garbage.

(i) The Certificate of Veterinary Inspection must show individual identification, ear tags, tattoos, registration numbers, microchips or other permanent means.

(b) An import permit issued by the Department must accompany all swine imported into the state.

(c) All breeding and exhibition swine over the age of three months shipped into Utah shall be tested negative for brucellosis within 30 days prior to movement into the state or originate

from a validated brucellosis free herd or brucellosis free state.

(i) A validated brucellosis free herd number and date of last test is required to be listed on the Certificate of Veterinary Inspection.

(ii) Swine from states with serious disease occurrences or known populations of feral or wild hogs may be required to be tested for Brucellosis prior to entry to Utah.

(d) All breeding, feeding and exhibition swine shall be tested negative for pseudorabies within thirty days unless they originate from a recognized qualified pseudorabies free herd or pseudorabies Stage V state.

(i) Swine that have been vaccinated with any pseudorabies vaccine shall not enter the state.

(ii) Swine which are infected or exposed to pseudorabies may not enter the state, except swine consigned to a slaughterhouse for immediate slaughter and must be moved in compliance with 9 CFR 71, which is incorporated by reference.

(iii) Swine from states with known populations of feral or wild hogs may be required to be tested for Pseudorabies prior to entry to Utah.

(2) Prohibition of Non-domestic and Non-native Suidae and Tayassuidae

(a) Javelina or Peccary, and feral or wild hogs such as Eurasian or Russian wild hogs (Sus scrofa) are considered invasive species in Utah, capable of establishing wild reservoirs of disease such as brucellosis and pseudorabies.

(b) These animals are prohibited from entry to Utah except when approved by special application only for purposes of exhibition and after meeting the above testing requirements.

(c) Any person who imports Javelina, Peccary or feral or wild hogs such as Eurasian or Russian wild hogs (Sus scrofa) into Utah without prior approval by the Department shall be subject to citation and fines as prescribed by the Department or may be called to appear before an administrative proceeding by the department.

R58-1-9. Sheep.

(1) All sheep imported must be accompanied by a Certificate of Veterinary Inspection and an import permit.

(a) No sheep exhibiting clinical signs of blue tongue may enter Utah.

(b) Sheep must be thoroughly examined for evidence of foot rot and verified that they are free from foot rot.

(c) Sheep entering Utah must comply with federal Scrapie identification requirements as listed in 9 CFR 79, which is incorporated by reference.

(d) Sheep from scrapie infected, exposed, quarantined or source flocks may not be permitted to enter the state unless an official post-exposure flock eradication and control plan has been implemented.

(e) Breeding rams six months of age or older shall test negative for Brucella ovis within 30 days of entry or originate from a certified brucellosis free flock.

(i) Rams entering Utah for exhibition purposes only and returning immediately to their home state are exempt from the testing requirement.

R58-1-10. Poultry.

(1) All poultry and hatching eggs being imported into Utah must meet the following requirements:

(a) All poultry and hatching eggs must have an import permit from the Department.

(b) All poultry and hatching eggs entering Utah must have a Certificate of Veterinary Inspection or a National Poultry Improvement Plan VS Form 9-3.

(c) All poultry and hatching eggs shall originate from flocks or hatcheries that have a Pullorum-Typhoid Clean rating given by the official state agency of the National Poultry Improvement Plan (NPIP) of the state, or

(d) All poultry entering Utah from a flock or hatchery which does not have a clean rating through NPIP certification must have been tested negative for Pullorum-Typhoid within the last 30 days.

R58-1-11. Goats and Camelids.

(1) Goats being imported into Utah must meet the following requirements:

(a) Dairy goats must have an import permit from the Department and an official Certificate of Veterinary Inspection showing a negative tuberculosis test within 60 days, and a negative brucellosis test within 30 days prior to entry or be from a certified brucellosis free herd and accredited tuberculosis free herd. Thereto; there must be no evidence of caseous lymphadenitis (abscesses).

(b) Meat type goats must have an import permit from the Department and an official Certificate of Veterinary Inspection indicating they are free from any communicable diseases or exposure and that there is no evidence of caseous lymphadenitis (abscesses).

(c) Goats entering Utah must comply with Federal Scrapie identification requirements as listed in 9 CFR 79, which is incorporated by reference.

(d) Goats for slaughter may be shipped into Utah directly to an approved slaughter establishment or to an approved auction market without an official Certificate of Veterinary Inspection and an import permit but must comply with Federal Scrapie identification requirements as listed in 9 CFR 79, which is incorporated by reference.

(2) Camelids being imported into Utah must have an import permit from the Department and an official Certificate of Veterinary Inspection showing a negative tuberculosis test within 60 days, and a negative brucellosis test within 30 days prior to entry or be from a certified brucellosis free herd and accredited tuberculosis free herd.

(3) Test eligible age for both brucellosis and tuberculosis shall be 6 months of age or older for both goats and camelids.

(4) Dairy goats and camelids entering Utah for exhibition purposes only and returning immediately to their home state are exempt from the testing requirement.

R58-1-12. Psittacine and Passerine Birds and Raptors.

(1) No psittacine or passerine birds or raptors shall be shipped into the State of Utah unless an official Certificate of Veterinary Inspection accompanies the birds.

(2) The number and kinds of birds to be shipped into Utah, their origin, date to be shipped and destination must be listed on the Certificate of Veterinary Inspection.

R58-1-13. Dogs, Cats, and Ferrets.

(1) All dogs, cats and ferrets shall be accompanied by an official Certificate of Veterinary Inspection.

(2) All dogs, cats and ferrets over three months of age must be currently vaccinated against rabies before entering Utah.

(a) The date of vaccination, name of product used, and expiration date must be written on the Certificate of Veterinary Inspection.

(3) No puppies or kittens less than 8 weeks of age shall be imported into the state unless accompanied by the mother.

R58-1-14. Exotic Animals.

(1) It is unlawful for any person to import into the State of Utah any species of exotic animal that is prohibited for importation or possession as listed in Utah Administrative Code R657-3.

(2) All exotic animals (birds, mammals, and reptiles) must be accompanied by an official Certificate of Veterinary Inspection.

(3) All aquatic animals (fish, mollusk, crustacean, or amphibians) must fulfill all requirements of Utah Administrative Code R58-17 prior to importation into the State of Utah.

R58-1-15. Game and Fur-Bearing Animals.

(1) No game or fur bearing animals will be imported into Utah without an import permit being obtained from the Department.

(2) Each shipment shall be accompanied by an official Certificate of Veterinary Inspection.

(3) All mink entering Utah shall have originated on ranches where mink viral enteritis has not been diagnosed or exposed to within the past three years.

R58-1-16. Captive Cervidae.

(1) All captive cervidae entering Utah must meet the following requirements:

(a) No captive elk will be imported into Utah unless the destination premises is licensed with the Utah Department of Agriculture and Food.

(b) No captive caribou or fallow deer will be imported into Utah unless a Certificate of Registration (COR) has been obtained from the Utah Division of Wildlife Resources.

(c) No captive cervidae will be allowed to be imported into Utah that have originated from or have ever been east of the 100 degree meridian.

(d) All captive elk imported into Utah must meet the genetic purity requirement as referenced in Title 4, Chapter 39, Section 301, Utah Code Unannotated.

(e) All captive elk must meet the following Chronic Wasting Disease (CWD) requirements:

(i) Elk must come from a state with a USDA approved herd certification program.

(ii) Elk must originate from a herd that is not affected with or is a trace back or forward herd for CWD.

(iii) Elk must originate from a herd that has had a CWD herd surveillance program for 5 years prior to movement.

(f) All captive cervidae must be permanently identified using either a microchip or tattoo.

(g) All captive cervidae must have an import permit from the Department.

(h) All captive cervidae must have an official Certificate of Veterinary Inspection showing the following:

(i) A negative tuberculosis test within 60 days of import.

(ii) Negative Brucella abortus test results from a single sample that has been tested by two USDA approved tests.

(iii) Two forms of individual animal identification.

(iv) A statement the that animals listed on the certificate are not known to be infected with Johne's Disease (Paratuberculosis)or Malignant Catarrhal Fever and have never been east of the 100 degree meridian.

R58-1-17. Zoological Animals.

(1) The entry of zoological animals to be kept in zoological gardens, or shown at exhibitions is authorized when an import permit, subject to requirements established by the State Veterinarian, has been obtained from the Department and the animals are accompanied by an official Certificate of Veterinary Inspection.

(2) Movement of these animals must also be in compliance with the Federal Animal Welfare Act, 7 USC 2131-2159.

R58-1-18. Wildlife.

(1) It is unlawful for any person to import into the State of Utah any species of live native or exotic wildlife except as provided in Title 23, Chapter 13 and Utah Administrative Code R657-3.

(2) All wildlife imports shall meet the same Department requirements as required for the importation of domestic animals.

R58-1-19. Duties of Carriers.

Owners and operators of railroads, trucks, airplanes, and other conveyances are forbidden to move any livestock, poultry, or other animals into or within the State of Utah or through the State except in compliance with the provisions set forth in these rules.

(1) Sanitation. All railway cars, trucks, airplanes, and other conveyances used in the transportation of livestock, poultry or other animals shall be maintained in a clean, sanitary condition.

(2) Movement of Infected Animals. Owners and operators of railway cars, trucks, airplanes, and other conveyances that have been used for movement of any livestock, poultry, or other animals infected with or exposed to any infectious, contagious, or communicable disease as determined by the Department, shall be required to have cars, trucks, airplanes, and other conveyances thoroughly cleaned and disinfected under official supervision before further use is permissible for the transportation of livestock, poultry or other animals.

(3) Compliance with Laws and Rules. Owners and operators of railroad, trucks, airplanes, or other conveyances used for the transportation of livestock, poultry, or other animals are responsible to see that each consignment is prepared for shipment in keeping with the State and Federal laws and regulations. Certificate of Veterinary Inspection, brand certificates, and permits should be attached to the waybill accompanying the attendant in charge of the animals.

KEY: disease control, import requirements
October 9, 2019 4-31
Notice of Continuation January 12, 2017 4-2-2(1)(I)

R68. Agriculture and Food, Plant Industry.
R68-3. Utah Fertilizer Act Governing Fertilizers and Soil Amendments.
R68-3-1. Authority.

Promulgated under authority of Section 4-2-2 and 4-13-4.

R68-3-2. Registration of Products.

A. All fertilizer or soil amendment products distributed in Utah shall be officially registered with the Utah Department of Agriculture and Food.

1. Application for registration shall be made to the Department upon forms prescribed and provided by the Department and shall include the following information for each product:

a. The net weight,

b. The brand and grade,

c. The guaranteed analysis,

d. The name and address and phone number of the registrant.

e. The label for each product registered.

f. Any waste-derived fertilizer distributed as a single ingredient product or blended with other fertilizer ingredients must be identified as "waste-derived fertilizer" by the registrant in the application for registration. "Waste-derived fertilizer" shall include any commercial fertilizer that is derived from an industrial byproduct, coproduct or other material that would otherwise be disposed of if a market for reuse were not an option, but does not include fertilizers derived from biosolids or biosolids products regulated under Environmental Protection Agency Code of Federal Regulation, Section 503.

g. The registrant of a waste-derived fertilizer shall state in the application for registration the levels of non-nutritive metals (including but not limited to arsenic, cadmium, mercury, lead and selenium). The registrant will provide a laboratory report or other documentation verifying the levels of the non-nutritive metals in the waste-derived fertilizer.

2. The Commissioner may require submission of the complete formula of any fertilizer or soil amendment if it shall be deemed necessary for administration of the Utah Fertilizer Act. If it appears to the Commissioner that the composition of the product is such as to warrant the proposed claims for it, and if the product and its labeling and any other information which may be required to be submitted comply with the requirements of the act, the products shall be registered.

a. Before registering any soil amendment the Commissioner shall require evidence to substantiate the claims made for the soil amendment and proof of the value and usefulness of the soil amendment. Such supportive data shall accompany the application for registration and shall be obtained from one or more State Experiment Stations. Cost for such research shall be the responsibility of the applicant. Final decision concerning registration of a soil amendment shall be made by the Commissioner following evaluation of all evidence presented.

3. The registrant is responsible for the accuracy and completeness of all information submitted concerning application for registration of a fertilizer or soil amendment product.

4. Once a fertilizer or soil amendment is registered under the act, no further registration is required, as long as the label does not differ in any respect.

5. Whenever the name of fertilizer or soil amendment product is changed or there are changes in the product ingredients or guaranteed analysis, a new registration shall be required. Other labeling changes shall not require re-registration, but the registrant shall submit copies of all changes to the Department as soon as they are effective. A reasonable time may be permitted to dispose of properly labeled stocks of the old product.

6. A registration fee determined by the department pursuant to Subsection 4-2-2(2), per product shall be paid by the applicant annually.

7. Each registration is renewable for a period of one year upon payment of the annual renewal fee determined by the department pursuant to Subsection 4-2-2(2), per product which shall be paid on or before December 31 of each year. If the renewal of a fertilizer or soil amendment registration is not filed prior to January 1 of any year, an additional fee determined by the department pursuant to Subsection 4-2-2(2), shall be assessed per product and added to the original registration fee and shall be paid by the applicant before the registration renewal for that fertilizer or soil amendment shall be issued.

8. A distributor is not required to register each grade of commercial fertilizer or soil amendment formulated by a consumer before mixing, but is required to register the name under which the business of blending or mixing is conducted and to pay an annual blender's license fee determined by the department pursuant to Subsection 4-2-2(2). A blender's license shall expire at midnight on December 31 of the year in which it is issued. A blender's license is renewable for a period of one year upon the payment of an annual license renewal fee. For Each renewal of a fertilizer or soil amendment blender's license not filed prior to January 1 of any one year, an additional fee determined by the department pursuant to Subsection 4-2-2(2), shall be assessed and added to the original license fee and shall be paid by the applicant before the license shall be issued.

9. Beginning January 1, 1991 and on a semi-annual basis, fertilizer and soil amendment products sold in the State of Utah will be assessed a fee determined by the department pursuant to Subsection 4-2-2(2). This assessment shall be paid by the manufacturer or distributor on or before February 1st each year for the sales period July 1 through December 31 and again on or before August 1st each year for the sales period January 1 through June 30. The amount of assessment will be determined by records of the previous six month's sales.

R68-3-3. Product Labeling.

A. Each container of packaged fertilizer distributed in Utah shall bear a label showing the following information:

1. net weight,
2. brand and grade,
3. guaranteed analysis,
4. name and address of the registrant,
5. lot number.

B. Each container of packaged soil amendment distributed in Utah shall bear a label showing the following:

1. net weight,
2. brand name,
3. name and percentages of the soil amending ingredients,
4. purpose of product,
5. directions for application of product,
6. name and address of the registrant,
7. lot number.

C. When any reference is made upon the label, labeling, or graphic material of a commercial fertilizer or soil amendment to "trace elements," "minor elements," "secondary elements," "plant foods" or similar generalized terms, each individual plant food to which such term refers must be listed upon the label.

D. No guarantee for a plant food element may be shown upon a label which is not listed upon the application for registration of the fertilizer or soil amendment material.

E. If guarantees for secondary plant foods and trace elements are listed upon the label of a fertilizer of soil amendment, they must be represented in terms of the element, and the minimum among of each which may be guaranteed in the labeling of any fertilizer or soil amendment product is as follows:

TABLE

Calcium (Ca)	1.00%	Copper (Cu)	0.05%
Magnesium (Mg)	0.50%	Iron (Fe)	0.10%
Sulfur (S)	1.00%	Manganese (Mn)	0.05%
Boron (B)	0.02%	Molybdenum (Mo)	0.0005%
Cobalt (Co)	0.0005%	Sodium (Na)	0.10%
Chlorine (Cl)	0.10%	Zinc (Zn)	0.05%

F. No specialty fertilizer label shall bear a statement that connotes or infers the presence of a slowly available plant nutrient unless the nutrient or nutrients are identified. When a fertilizer label infers or connotes that the nitrogen is slowly available through use of "organic," "organic nitrogen," "ureaform," "long lasting," or similar terms, the guaranteed analysis must indicate the percentage of water insoluble nitrogen in the material. When the water insoluble nitrogen is less than 15% of the total nitrogen, the label shall bear no reference to "long lasting," "organic," or similar terms.

G. Pesticides may be added to registered fertilizers or soil amendments provided:

1. The fertilizers and soil amendments and the pesticides are officially registered.

2. Each container or package containing a fertilizer or soil amendment pesticide mixture shall have attached a label showing the information stated in Subsection R68-3-2(2)(a) of these rules and in Section 4-14-4.

R68-3-4. Deficiencies of Ingredients.

A commercial fertilizer shall be deemed deficient if the analysis of nutrients is below the guarantee by an among exceeding the values in the following schedule or if the overall index value of the fertilizer is below 98%.

TABLE

ALLOWABLE DEFICIENCIES

Guarantee Percent	Nitrogen Percent	Available Phosphoric Acid	Potash Percent
04 or less	0.49	0.67	0.41
05	0.51	0.67	0.43
06	0.52	0.67	0.47
07	0.54	0.68	0.53
08	0.55	0.68	0.60
09	0.57	0.68	0.65
10	0.58	0.69	0.70
12	0.61	0.69	0.79
14	0.63	0.70	0.87
16	0.67	0.70	0.94
18	0.70	0.71	1.01
20	0.73	0.72	1.08
22	0.75	0.72	1.15
24	0.78	0.73	1.21
26	0.81	0.73	1.27
28	0.83	0.74	1.33
30	0.86	0.75	1.39
32 or more	0.88	0.76	1.44

R68-3-5. Values of Ingredients.

The Department shall annually publish the monetary values per unit of nitrogen, available phosphoric acid, and soluble potash in commercial fertilizer in this state, which may be used as a basis for assessing monetary penalties for ingredient deficiencies as provided under section 4-13-6.

R68-3-6. Unlawful Acts.

A. Any person who has committed any acts included but not limited to those listed below is in violation of the Utah Fertilizer Act or rules promulgated thereunder and is subject to penalties provided for in Section 4-2-14:

1. Made false or fraudulent claims through any media misrepresenting the effect of fertilizers or soil amendments offered for sale in Utah;

2. Neglected or, after notice, refused to comply with the provisions of the act, these rules, or any lawful order of the Commissioner;

3. Made false or fraudulent records, invoices, or reports;

4. Used fraud or misrepresentations in making application for, or renewal of a registration or license;

5. Distributed commercial fertilizer or soil amendments which contain seeds or other viable plant parts or noxious weeds.

6. Distributed any waste-derived fertilizer that has not been identified in the registration application.

KEY: fertilizers
July 25, 2008 **4-2-2**
Notice of Continuation October 15, 2019

R70. Agriculture and Food, Regulatory Services.
R70-101. Bedding, Upholstered Furniture and Quilted Clothing.
R70-101-1. Authority and Purpose.

Pursuant to Section 4-10-103, this rule establishes the standards, practices and procedures for the manufacture, repair, sale, and distribution of bedding, upholstered furniture, quilted clothing products, and filling materials.

R70-101-2. Definitions.

1) "Clean" means free from stains, dirt, trash, filth, pulp, sludge, oil, grease, fat, skin, epidermis, excreta, vermin, insects, insect eggs, insect carcasses, contamination, hazardous materials, residual or objectionable substances or odors.

2) "Department" means the Utah Department of Agriculture and Food.

3) "Law Label or Label" means a tag attached to a product that provides information about the product to the consumer.

4) "Manufacture" means the making, processing, or preparing of new or secondhand bedding, upholstered furniture, quilted clothing, or filling material.

5) "Manufacturer" means a person who makes or has employees make any bedding, upholstered furniture, quilted clothing, filling material, or any part thereof.

6) "Non-resident" means a person licensed under these rules who does not have premises in the State of Utah.

7) "Person" means an individual, partnership, association, firm, auctioneer, trust, limited liability company, or corporation, and agents, and employees of them.

8) "Premises" means all places where bedding, upholstered furniture, quilted clothing, or filling material is sold, offered for sale, exposed for sale, stored, renovated or manufactured and the delivery vehicles used in their transportation.

9) "Supply dealer" means a person who manufactures, processes, or sells at wholesale any felt, batting, pads, or other filling, loose in bags, in bales or in containers, concealed or not concealed, intended for use in bedding, upholstered furniture, or quilted clothing.

10) "Second Hand Law Tag or Tag" means a tag attached to a product or filling material that has previously been used.

11) "Sterilization Permit Number" means the number issued by a state to be used on filling materials or on the label for bedding, upholstered furniture, or quilted clothing to identify the sterilizing facility, person, or company.

12) "Sterilize" means a process used to make wool, feathers, down, shoddy, or hair free from bacteria or other living microorganisms.

13) "Sterilizer" means a person who sterilizes wool, feathers, down, shoddy, or hair.

14) "Uniform Registry Number or URN" means the number issued by a state to be used on the law label of bedding, furniture, or filling materials to identify the manufacturing facility, person, or company.

R70-101-3. Application of Rule.

1) This rule shall apply to all persons engaged in the business of manufacturing, retailing, wholesaling, processing, repairing, sterilizing, and selling items of bedding, upholstered furniture, quilted clothing and filling materials, regardless of their point of origin.

R70-101-4. Licensing Requirements for Manufacturers, Repairers, and Wholesalers.

1) Any person who advertises, solicits, or contracts to manufacture or repair bedding, upholstered furniture, quilted clothing, or filling materials shall secure a license from the department.

a) This license must be obtained before such products are offered for sale in Utah.

2) Any person seeking a license shall provide the following to the department:

a) a completed registration application form,

b) a sample of the identification label that will be used, and

c) a sample tag

i) wholesale bedding, upholstered furniture dealers, upholstery supply dealer, and quilted clothing manufacturers are exempted from providing a sample tag to the department.

3) A licensing fee will be assessed annually. This fee shall be paid before January 1 or a late fee will be assessed. All fees are listed in the department's fee schedule approved by the legislature.

R70-101-5. Sterilization Permit Requirements for Sterilizers.

1) Any person, who advertises, solicits, or contracts as a sterilizer shall secure a sterilization permit from the department.

a) This permit must be obtained before such products are offered for sale in Utah.

2) Any person seeking a sterilization permit shall provide to the department a sterilization permit application completed by a department authorized third party inspector.

3) A permit fee will be assessed annually. This fee shall be paid before January 1 or a late fee will be assessed. All fees are listed in the department's fee schedule approved by the legislature.

4) Inspections for sterilization permits shall be conducted every three years

a) Copies of the inspection reports shall be submitted to the department with the renewal form for that year.

R70-101-6. Revocation of License or Permit.

1) The department shall have the authority to suspend or revoke a license or permit for any violation of these provisions.

2) A suspension or revocation shall be in accordance with section 4-1-5.

R70-101-7. Sanitation Requirements.

1) The premises, delivery equipment, machinery, appliances, and devices shall at all times be kept free from refuse, dirt, contamination, or insects.

2) No person shall use in the making, repairing, or renovating of bedding, upholstered furniture, or quilted clothing any filling material that:

a) contains any bugs, vermin or filth,

b) is not clean, or

c) contains burlap or other material that has been used for baling.

3) Bedding, quilted clothing, and filling materials shall be stored four inches off the floor.

4) New and used products shall be stored separately.

R70-101-8. Sterilization Requirements for New Fill Material.

1) All wool, feathers, down, shoddy, and hair shall be cleaned and sterilized before being used as new filling material.

2) Methods for Sterilization

a. Pressure Steam: The material shall be subjected to treatment by steam at 15 PSI (.104 mPA) for 30 minutes or 20 PSI (.0138 mPA) for 20 minutes.

i. The gauge for registering steam pressure must be visible from the outside of the room or chamber.

b. Streaming Steam: Two applications of streaming steam maintained for a period of one hour each, applied at intervals of not less than six nor more than 24 hours, may be used.

i. Valved outlets shall be provided near the bottom and the top of the room or chamber when streaming steam is employed.

c. Heat: a temperature of 235 degrees F held for a period

of 2 hours, within a closed container is considered satisfactory for proper sterilization.

d. Other methods as may be approved by the department upon petition.

R70-101-9. Manufacturing, Wholesale, Sterilizers, and Supply Dealer Labeling Requirements for Quilted Clothing.

1) The department adopts by reference the Rules and Regulations under the Textile Fiber Products Identification Act, Fur Products Labeling Act, and Wool Products Labeling Act found in 16 CFR parts 300, 301, and 303.

2) Articles of plumage-filled clothing shall meet the following label requirements:

a) Any label stating the contents of Down, Goose Down, or Duck Down shall also state the minimum percentage of Down, Goose Down, or Duck Down that is contained in the article. The down label is a qualified general label and shall include in parentheses the minimum percentage of down in the product which must be 75% or greater.

b) Down and Waterfowl Feathers: may be used to designate any plumage product containing between 50% (minimum) and 74% down and plumules. The percentage of both must be stated on the sewn-in label and hang tags,

c) Waterfowl Feathers and Down: may be used to designate any plumage product containing between 5% (minimum) and 49% down and plumules. The percentage of both must be stated on the sewn-in label and hang tags.

d) Waterfowl Feathers: may be used to designate any plumage product containing less than 5% down and plumules.

e) Quill Feathers are not permitted unless disclosed.

f) Other Plumage Products which do not meet the requirements for any of the above listed categories must be labeled accurately with each component listed separately in order of predominance.

3) The sterilization permit number (PER. NO.) shall be listed on the textile label

a) manufacturers of quilted clothing shall have five years compliance period, starting January 1, 2017, for the inclusion of the sterilization permit number on the textile label.

4) The form of identification used on labels and tags shall be the same as those supplied to the department with the registration application.

R70-101-10. Filling Material.

1) All terms and definitions of filling materials shall be those terms have been submitted and approved by the International Association of Bedding Law Officials (IABFLO), except as otherwise required by this rule.

2) All plumage materials shall follow the standards as set forth in the "USA-2000 Labeling Standards- Down and Feather Products" and ASTM D-4522.

3) All other filling materials shall be clean.

4) "Imperfect, irregular foam" means any foam products which show major imperfections or that fall below the foam manufacturer's usual standards or specifications and must be stated on the tag as "imperfect" or "irregular" along with the generic name of the foam.

5) "Imperfect, irregular fibers" shall mean fibers that have imperfections or that fall below the fiber manufacturer's usual standards or specifications and must be stated on the tag as "imperfect" or irregular" along with the generic name of the fiber.

6) The terms "Prime", "Super", "Northern" and similar terms shall not be used unless the fill can be proved to be of superior quality and meet the terms of the qualifying statement.

R70-101-11. Generic Names, Grades, Descriptive Terms, and Definitions of Filling Material.

1) Filling material shall be described on the label and on the tag using the:

a) true generic name,

b) grade,

c) description terms, or

d) definitions of the filling material which have been approved by the department.

2) When more than one kind of filling material is used in a mixture, the percentage by weight shall be listed in order of predominance.

a) Federal fiber tolerance standards are applicable, except as pertains to plumage products.

b) Blends may be described in accordance with section 10 of this rule.

3) When different filling materials are used in various parts of the garment, the areas of the garment shall be named, followed by the name of the filling material used in that area.

R70-101-12. Manufacturer Identification and Law Label Requirements For Bedding and Upholstered Furniture.

1) The form of identification used on labels and tags shall be the same as those supplied to the department with the registration application.

2) For articles of bedding and upholstered furniture, the law label shall use the format adopted by the IABFLO, as listed in the "Manual of Labeling Laws" of the International Sleep Products Association (ISPA). A copy of the current edition of the "Manual of Labeling Laws" is available for public inspection at the Utah Department of Agriculture and Food, 350 North Redwood Road, Salt Lake City, Utah.

(3) The law label for newly manufactured products shall meet the following requirements:

a) white on all sides of the label,

b) made of material that cannot be torn,

c) printed in black ink

d) printed in English,

e) printed clearly and legibly, and

f) firmly attached to the article

4) All required information shall be printed on one side of the label with the opposite side remaining blank.

5) Each law label shall state the following:

a) the phrase "UNDER PENALTY OF LAW THIS TAG NOT TO BE REMOVED EXCEPT BY THE CONSUMER" shall appear in bold at the top of the label in capital letters no less than 1/8 inches in height,

b) the phrase "ALL NEW MATERIAL" shall appear in the next section in bold, capital letters no less than 1/8 inch in height, followed by the phrase "CONSISTING OF", no case or height requirements, followed by the filling contents in bold capital letters no less than 1/8 inch in height,

c) the words "CONTENTS STERILIZED" in bold capital letters no less than 1/8 inch in height,

d) the URN issued by the state in which the firm is first registered shall appear next,

e) the Sterilization Permit Number of the sterilization facility from which the material was obtained, in bold capital letters no less than 1/8 inch in height,

f) the phrase, "Certification is made by the manufacturer that the materials in this article are described in accordance with law" shall appear in the next section of the tag, and

g) the name and complete address of the manufacturer, importer, or vendor of the article shall appear next.

6) The law label shall be easily accessible to the consumer for examination.

a) Products that are offered for sale in boxes or in some other packaging which make the law labels inaccessible shall reproduce a legible facsimile of the law label on the outer container or covering.

7) No mark, label, printed matter, illustration, sticker, or any other device shall be placed upon the label.

8) The firm's license with the state that issued the URN must be kept current for the number to be valid in the state of Utah.

9) Every firm doing business under more than one state-issued URN or permit shall obtain a license or permit for each number used on products that are offered for sale in Utah.

R70-101-13. Second Hand Law Tags and Tagging Requirements.

1) Tags for second hand materials shall be:

a) a minimum of 2 inches by 3 inches,

b) yellow on both sides of the tag,

c) made of material that cannot be torn,

d) printed in English,

e) printed in black ink,

f) printed clearly and legibly, and

g) firmly attached to the article.

2) All required information shall be printed on one side of the tag with the opposite side remaining blank.

3) Second hand tag shall contain the following information:

a) the phrase "UNDER PENALTY OF LAW THIS TAG NOT TO BE REMOVED EXCEPT BY THE CONSUMER" shall appear in bold at the top of the label in capital letters, no less than 1/8 inch in height,

b) the phrase, "THIS ARTICLE CONTAINS SECOND HAND MATERIAL CONSISTING OF CONTENTS UNKNOWN" shall appear in the next section of the tag. The words "second hand material" and "contents unknown" shall be in capital letters, size not less than 1/8 inches in height,

c) the phrase, "Certification is made that the materials in this article are described in accordance with law" shall appear in the next section of the tag, and

d) the store name and complete corporate address shall appear next.

4) The tag shall be easily accessible to the consumer for examination.

5) No mark, label, printed matter, illustration, sticker, or any other device shall be placed upon the tag.

R70-101-14. Second Hand Tag and Tagging Requirements for Repaired, Reupholstered, and Renovated Products.

1) Tags for repaired, reupholstered, and renovated products shall be:

a) a minimum of 2 inches by 3 inches,

b) yellow on both sides of the tag,

c) made of material that cannot be torn,

d) have the required information printed on one side of the tag with the opposite side remaining blank,

e) printed in English,

f) printed in black ink,

g) printed clearly and legibly, and

h) firmly attached to the article.

2) Second hand tag shall contain the following information:

a) the phrase, "UNDER PENALTY OF LAW THIS TAG NOT TO BE REMOVED EXCEPT BY THE CONSUMER" shall appear in bold at the top of the label in capital letters, no less than 1/8 inch in height,

b) the phrase, "THIS ARTICLE IS NOT FOR SALE OWNER'S MATERIAL" shall appear next in bold in capital letters, no less than 1/8 inch in height,

c) the phrase, "CERTIFICATION IS MADE THAT THIS ARTICLE CONTAINS THE SAME MATERIAL IT DID WHEN RECEIVED FROM THE OWNER AND THAT ADDED MATERIALS ARE DESCRIBED IN THE ACCORDANCE WITH LAW, AND CONSIST OF THE FOLLOWING:" followed by a description of the filling materials,

d) a description of the work that was done on the product,

e) the URN number,

f) the name and address of the renovator or repairer, and

g) the date of pick-up, owner's name, and address.

R70-101-15. Used Mattresses.

1) Retailers selling customer returns, refurbished, or used mattresses shall follow the second hand law tag requirements as set out in R70-101-13.

2) In addition, retailers must also display on such mattresses a tag stating "USED" in bold capital letters.

3) The Used tag shall be:

a) a minimum 3 inches by 6 inches,

b) yellow on both sides of the tag,

c) the font shall be a minimum of one inch in height,

d) printed in black ink, and

e) printed in English.

4) All required information shall be printed on one side of the tag with the opposite side remaining blank.

5) The USED tag shall be clearly visible to the consumer at all times.

R70-101-16. Variance.

1) The department may issue variances on labeling and tagging requirements.

2) Requests for a variance must be made to the department in writing and must contain the following information:

a) For what product you are requesting the variance,

b) where you are going to be using the variance,

c) an explanation of the need for a variance,

d) a description of how the variance will be used in practice, and

e) an example of the label or tag that will be used in place of the required label or tag.

3) Approval of variances will be given from the department in writing.

4) All variances shall be subject to a period of review.

R70-101-17. Making or Selling Material or Parts.

1) A person shall not purchase, make, process, prepare, or sell, directly or indirectly, at wholesale or retail, or otherwise, any filling material or other component parts to be used in bedding, upholstered furniture, or quilted clothing, unless such material is appropriately tagged.

R70-101-18. Retailer Responsibilities.

1) Retailers shall:

a) ensure that any article of bedding, upholstered furniture, quilted clothing, or filling material they sell is labeled and tagged correctly,

b) comply with the department's laws and rules governing false and misleading advertisement, and

c) ensure that all manufacturers from whom they purchase products hold a valid license with the department.

2) Retailers shall provide the identity of the manufacturer or wholesaler of any article of bedding, upholstered furniture, quilted clothing, or filling material sold upon request of the department.

3) A retailer may register in lieu of the manufacturer or wholesaler if the manufacturer or wholesaler is not registered.

R70-101-19. Violation of This Rule.

1) Each improperly labeled or tagged article of bedding, upholstered furniture, quilted clothing, or filling material made or sold shall be a separate violation of this rule.

2) No person shall be in violation if he has received, from the person by whom the articles were manufactured or from whom they were received, a guarantee in good faith that the articles are not contrary to the provisions of these rules in the

form prescribed by the Federal Textile Fiber Products Identification Act, Federal Wool Products Labeling Act, and the Federal Trade Commission Rules and Regulations.

3) No person shall remove, or cause to be removed, any tag, or device placed upon any article of bedding, upholstered furniture, quilted clothing, or filling material by an inspector.

4) No person may remove an article that has been condemned and ordered held on inspection notice.

5) No person shall interfere with, obstruct, or hinder any inspector of the department in the performance of their duties.

6) Any article of bedding, upholstered furniture, quilted clothing, or filling material manufactured or wholesaled by the manufacturer or wholesaler who is not registered or permitted may be withheld from sale until the manufacturer or wholesaler registers or obtains a permit.

R70-101-20. Products Not Intended for Use Subject to This Rule.

1) The Commissioner may exclude from this rule textile fiber products which:

a) Have insignificant or inconsequential textile fiber content, or

b) The disclosure of the textile fiber content is not necessary for the protection of the consumer.

KEY: inspections, labeling, quality control, registration
January 26, 2017 4-10-3
Notice of Continuation March 16, 2015

R105. Attorney General, Administration.
R105-4. Child Protection Registry.
R105-4-1. Authority and Purpose.

Pursuant to Utah Code Section 13-39-203, these rules (R105-4) are intended to establish the procedures under which:

(1) A person may register a contact point with the registry; and

(2) A marketer may verify compliance with the registry.

R105-4-2. Definitions.

As used in these rules (105-4):

(1) "Attorney General is as defined in Utah Code Section 77-42-102.

(2) "Contact point" is as defined in Utah Code Section 13-39-102.

(3) "Marketer" means a person described in Utah Code Section 13-39-201(4).

(4) "Provider" means the third party with whom the Unit has contracted, pursuant to Utah Code Section 13-39-201(1)(b), to establish and secure the registry.

(5) "Registry" is as defined in Utah Code Section 13-39-102.

(6) "Unit" is as defined in Utah Code Section 13-39-102.

R105-4-3. Information Required to Register.

(1) A person desiring to register a contact point with the registry shall provide the following information to the provider:

(a) The contact point the person desires to register;

(b) An affirmation that:

(i) the contact point belongs to a minor;

(ii) a minor has access to the contact point; or

(iii) the contact point is used in a household in which a minor is present;

(c) an affirmation that the minor referenced in R105-4-3(1)(b) is a Utah resident; and

(d) an affirmation that the person registering the contact point is:

(i) the minor referenced in R105-4-3(1)(b); or

(ii) a parent or guardian of the minor referenced in R105-4-3(1)(b).

(2) A contact point may not become a part of the registry until the provider sends a message to the contact point informing the user of the contact point:

(a) the contact point has been registered; and

(b) the process for removing the contact point from the registry.

(3) A school or institution desiring to register a domain name shall provide verification to the provider that:

(a) the school or institution primarily serves minors; and

(b) the school or institution owns the domain name being registered.

R105-4-4. Information Required to Verify Compliance.

A marketer desiring to verify compliance with the registry shall provide the following information to the provider before the provider compares the marketer's contact point list against the registry:

(1) the name, address, and telephone number of the marketer;

(2) the specific legal nature and corporate status of the marketer;

(3) the name, address, and telephone number of a natural person who consents to service of process for the marketer; and

(4) an affirmation that the person described in R105-4-4(3) understands that improper use of information obtained from the registry is a second degree felony.

R105-4-5. Compliance.

(1) After a marketer has complied with R105-4-4 and paid the fee established by the Unit under Section 13-39-201(4)(b), the marketer may check the marketer's contact point list with the provider according to the privacy and security measures implemented by the provider.

(2) After a marketer has complied with R105-4-5(1) and paid the fee established by the Unit under Section 13-39-201(4)(b), the provider shall, according to the privacy and security measures implemented by the provider, remove from the marketer's list of contact points any contact points that are contained on the registry.

(3)(a) A marketer who desires to utilize the provisions of Subsection 13-39-202(4) shall:

(i) provide the Unit with a detailed description of the methods the marketer intends to use to verify compliance with Subsection 13-39-202(4); and

(ii) agree to provide to the Unit, at any time upon request by the Unit, copies of all documentation relating to the marketer's compliance with Subsection 13-39-202(4).

(b) Within thirty calendar days after a marketer complies with R105-4-5(3)(a), the Unit shall inform the marketer in writing whether the Unit considers the marketer's methods sufficient to verify compliance with Subsection 13-39-202(4).

(c)(i) Approval of a verification method for compliance with Subsection 13-39-202(4) does not prevent the Unit from investigating further whether the approved verification method actually guarantees compliance with Subsection 13-39-202(4).

(ii) The Unit may revoke an approval granted pursuant to R105-4-5(3) upon a finding that the verification method does not adequately guarantee compliance with Subsection 13-39-202(4).

R105-4-6. Discounted Fee.

(1) In order for senders to qualify for the discounted fee schedule established pursuant to Subsection 13-39-203(3)(a), a sender must agree to be subject to enhanced security criteria for each subsequent list that they may submit to the state's compliance mechanism. To meet these criteria, senders must affirmatively agree that their scrubbing tasks may be stopped if a particular task deviates from a statistically normal baseline.

(2) The statistical baseline used for comparison will be based on the senders' past histories as well as the totality of the histories of senders that have used the compliance mechanism to scrub their lists.

(3) To restart a task and retrieve the results, senders whose tasks have been stopped must confirm that they in fact initiated the task and that the list submitted is not an attempt to abuse the registry mechanism. Depending on the amount of the deviation from the baseline, this confirmation may come from a telephone call to a pre-established phone number, completing information online, or sending an e-mail to a customer support representative.

(4) The Unit, or its appointed representative, shall have discretion in allowing the retrieval of tasks if the confirmation does not resolve the security concerns.

KEY: Child Protection Registry
October 2, 2019 **13-39**

R123. Auditor, Administration.
R123-6. Allocation of Money in the Property Tax Valuation Agency Fund.
R123-6-1. Authority.

As required by Section 59-2-1603, this rule provides the formula for disbursing monies from the property tax valuation agency fund.

R123-6-2. Definitions.

1. "Combined levy" means the sum of the local levy and the multi-county levy.
2. "Local levy" means a property tax levied in accordance with Utah Code 59-2-1602(4).
3. "Multi-county levy" means a property tax levied in accordance with Utah Code 59-2-1602(2).
4. "Fund" means the Property Tax Valuation Agency Fund created in Utah Code 59-2-1602.
5. "Office" means the Office of the State Auditor.

R123-6-3. Disbursements.

1. Subject to subsection (2), the disbursement of monies held in the fund shall be determined based on the following:

a. Fourth, fifth, or sixth class counties whose respective combined levy exceeds the mean of the combined levies of all counties shall receive an amount from the fund equal to 50% of the amount calculated when multiplying the county's Proposed Tax Rate Value (as calculated by Utah State Tax Commission) by the portion of their combined rate that exceeds the mean rate; and

b. a sixth class county shall not receive less than $30,000 annually from the fund.

2. If available monies held in the fund are not sufficient to cover amounts calculated in subsection (1) the disbursement shall be reduced on a pro-rata basis.
3. The Office shall authorize these disbursements on an annual basis.

KEY: counties, property tax
April 8, 2015 **59-2-1603**
Notice of Continuation October 28, 2019

R151. Commerce, Administration.
R151-1. Department of Commerce General Provisions.
R151-1-1. Oaths to Investigators and to Members of Boards and Commissions.

Each investigator employed by the Department of Commerce, and each board member and commission member working in conjunction with the Department or its Divisions, shall take the oath of office required by the Utah Constitution, Art. IV, Sec. 10. The oath of office may be administered by the following personnel within the Department: Department Executive Director and Deputy Director, Division Directors, Administrative Law Judges, Commerce Managers II, Division Assistant Directors, and Division Bureau Managers.

R151-1-2. Electronic Meetings.

In compliance with Utah Code Ann. Section 52-4-207, the following shall apply to electronic meetings held by any "public body" (as defined in Utah Code Ann. Section 52-4-103) within the Department of Commerce.

(1) Electronic meetings are not prohibited but may be limited by an agency director or designee based on budget, public policy, or logistical considerations.

(2)(a) An agency director or designee, on his/her own initiative, may establish an electronic meeting.

(b) Any member of a public body may also request an agency director to establish an electronic meeting.

(i) Any such request shall be made as far in advance as possible, but not less than three business days prior to a meeting to allow for arrangements to be made for the electronic meeting. The agency director or designee may shorten this time frame upon a determination of reasonable need.

(ii) The agency director or designee may determine whether such a request should be granted. No vote of the public body is required.

(3) A quorum of the public body is not required to be present at a single anchor location for an electronic meeting.

(4) Any number of separate connections for members of a public body is allowed for an electronic meeting, unless an agency director or designee limits the number of separate connections based on available equipment capability or other relevant and reasonable considerations.

KEY: oath, board members, investigators, electronic meetings

June 15, 2006	**Art. IV, Sec. 10**
Notice of Continuation October 3, 2019	**53-13-101(12)**
	13-1-6(1)
	13-1-2(1)(b)
	52-4-103
	52-4-207

R156. Commerce, Occupational and Professional Licensing.
R156-15A. State Construction Code Administration and Adoption of Approved State Construction Code Rule.
R156-15A-101. Title.

This rule is known as the "State Construction Code Administration and Adoption of Approved State Construction Code Rule".

R156-15A-102. Definitions.

In addition to the definitions in Title 15A, as used in Title 15A or this rule:

(1) "Advisory Board" or "LUEDAB" mean the Land Use and Eminent Domain Advisory Board created under Section 13-43-202.

(2) "Building permit" means, for the purpose of determining the building permit surcharge under Subsection 15A-1-209(5)(a), a warrant, license or authorization to build or construct a building or structure or any part thereof.

(3) "Building permit fee" means, for the purpose of determining the building permit surcharge under Subsection 15A-1-209(5)(a), fees assessed by a state agency or state political subdivision for the issuance of permits for construction, alteration, remodeling, repair, and installation, including building, electrical, mechanical and plumbing components.

(4) "Ombudsman" means the Office of the Property Rights Ombudsman created under Section 13-43-201.

(5) "Permit number", as used in Section 15A-1-209, means the standardized building permit number described below in Sections R156-15A-220 and R156-15A-221.

(6) "Refuses to establish a method of appeal" means, with respect to Subsection 15A-1-207(3)(b), that:

(a) a compliance agency does not in fact adopt a formal written method of appealing uniform building standard matters in accordance with generally recognized standards of due process; or

(b) that the compliance agency does not convene an appeals board and render a decision in the matter within ninety days from the date on which the appeal is properly filed with the compliance agency.

R156-15A-103. Authority.

This rule is adopted by the Division under the authority of Subsection 15A-1-204(6), Section 15A-1-205 and Subsection 58-1-106(1)(a) to enable the Division to administer Title 15A.

R156-15A-201. Advisory Peer Committees Created - Membership - Duties.

(1) There is created in accordance with Subsections 58-1-203(1)(f) and 15A-1-203(10)(d), the following advisory peer committees to the Uniform Building Codes Commission:

(a) the Education Advisory Committee consisting of ten members, which shall include a factory built housing representative, a design professional, a general contractor, an electrical contractor, a mechanical or plumbing contractor, an educator, and four inspectors (one from each of the specialties of plumbing, electrical, mechanical and general building);

(b) the Plumbing and Health Advisory Committee consisting of nine members;

(c) the Structural Advisory Committee consisting of seven members;

(d) the Architectural Advisory Committee consisting of seven members;

(e) the Fire Protection Advisory Committee consisting of five members;

(i) This committee shall join together with the Fire Advisory and Code Analysis Committee of the Utah Fire Prevention Board to form the Unified Code Analysis Council.

(ii) The Unified Code Analysis Council shall meet as directed by the Utah Fire Prevention Board, or as directed by the Uniform Building Code Commission, or as needed to review fire prevention and building code issues that require definitive and specific analysis.

(iii) The Unified Code Analysis Council shall select one of its members to act as chair and another to act as vice chair. The chair and vice chair shall serve for one-year terms on a calendar year basis. Elections for chair and vice chair shall occur at the meeting conducted in the last quarter of the calendar year.

(iv) The chair or vice chair shall report to the Utah Fire Prevention Board or Uniform Building Code Commission recommendations of the council with regard to the review of fire and building codes;

(f) the Mechanical Advisory Committee consisting of seven members; and

(g) the Electrical Advisory Committee consisting of seven members.

(2) The committees shall be appointed and serve in accordance with Subsection 15A-1-203(10)(d). The membership of each committee shall be made up of individuals who have direct knowledge or involvement in the area of code involved in the title of that committee.

(3) The duties and responsibilities of the committees shall include:

(a) reviewing codes proposed for adoption or approval as assigned by the Division in collaboration with the Commission;

(b) reviewing requests for amendments to the adopted codes or approved codes as assigned to each committee by the Division with the collaboration of the Commission; and

(c) submitting recommendations concerning the reviews made under Subsection (a) and (b).

(4) The duties and responsibilities of the Education Advisory Committee shall include:

(a) reviewing and making recommendations regarding funding requests that are submitted; and

(b) reviewing and making recommendations regarding budget, revenue and expenses of the education funds established pursuant to Subsection 15A-1-209(5)(c)(i) and (ii).

R156-15A-202. Code Amendment Process.

In accordance with Section 15A-1-206, the procedure and manner under which requests for amendments to codes shall be filed with the Division and recommended or declined for adoption are as follows:

(1) All requests for amendments to any of the adopted codes or approved codes shall be submitted to the Division on forms specifically prepared by the Division for that purpose.

(2) The processing of requests for code amendments shall be in accordance with Division policies and procedures.

R156-15A-210. Compliance with Codes - Appeals.

If the Commission is required to act as an appeals board in accordance with the provisions of Subsection 15A-1-207(3)(b), the following shall regulate the convening and conduct of the appeals board:

(1) If a compliance agency refuses to establish a method of appeal regarding a uniform building standard issue, the appellant may petition the Commission to act as the appeals board.

(2) The appellant shall file the request to convene the Commission as an appeals board in accordance with the requirements for a request for agency action, as set forth in Subsection 63G-4-201(3)(a) and Sections R151-4-202 and R151-4-203. A request by other means shall not be considered and shall be returned to the appellant with appropriate instructions.

(3) A copy of the final written decision of the compliance agency interpreting or applying a code which is the subject of the dispute shall be submitted as an attachment to the request.

If the appellant requests, but does not receive a timely final written decision, the appellant shall submit an affidavit to this effect in lieu of including a copy of the final written decision with the request.

(4) The request shall be filed with the Division no later than 30 days following the issuance of the compliance agency's disputed written decision.

(5) The compliance agency shall file a written response to the request not later than 20 days after the filing of the request. The request and response shall be provided to the Commission in advance of any hearing in order to properly frame the disputed issues.

(6) Except with regard to the time period specified in Subsection (7), the time periods specified in this section may, upon a showing of good cause, be modified by the presiding officer conducting the proceeding.

(7) The Commission shall convene as an appeals board within 45 days after a request is properly filed.

(8) Upon the convening of the Commission as an appeals board, the board members shall review the issue to be considered to determine if a member of the board has a conflict of interest which would preclude the member from fairly hearing and deciding the appeal. If it is determined that a conflict does exist, the member shall be excused from participating in the proceeding.

(9) The hearing shall be a formal hearing held in accordance with the Utah Administrative Procedures Act, Title 63G, Chapter 4.

(10) Decisions relating to the application and interpretation of the code made by a compliance agency board of appeals shall be binding for the specific individual case and shall not require Commission approval.

R156-15A-220. Standardized Building Permit Number.

As provided in Section 15A-1-209, any agency issuing a permit for construction within the state of Utah shall use the standardized building permit numbering system in a form adopted by rule. There are no additional requirements to those specified in Subsection 15A-1-209.

R156-15A-230. Building Code Training Fund Fees and Factory Built Housing Fees.

(1) In accordance with Subsection 15A-1-209(5)(a), on April 30, July 31, October 31 and January 31 of each year, each state agency and each state political subdivision that assesses a building permit fee shall:

(a) file with the Division a report of building fees and surcharge for the immediately preceding calendar quarter; and

(b) remit 85% of the amount of the surcharge collected to the Division.

(2) In accordance with Subsection 15A-1-209(5)(c), the Division shall allocate and deposit the monies received under Subsection 15A-1-209(5)(a)(ii) into the following three separate funding accounts:

(a) 30% to the Division's Building Code Inspector Training Fund, to be held, administered, and distributed pursuant to Section R156-15A-231 to provide education regarding codes and code amendments to building inspectors;

(b) 10% to the Division's Building Code Construction-Related Training Fund, to be held, administered, and distributed pursuant to Section R156-15A-231 to provide education regarding codes and code amendments to individuals licensed in construction trades or related professions; and

(c) 60% to the Ombudsman's Land Use Fund, to be held, administered, and distributed pursuant to Section R156-15A-232 to provide education and training regarding:

(i) the drafting and application of land use laws and regulations; and

(ii) land use dispute resolution.

(3) In accordance with Subsection 58-56-17.5(2)(c), the Division shall hold, administer, and distribute a portion of the monies in the Factory Built Housing Fees Account pursuant to Section R156-15A-231 to provide education for factory built housing.

(4) Department of Commerce Employees may not participate in the administration, selection, or payment of grants to an organization under Section R156-15A-231 or R156-15A-232 if the Department of Commerce Employee:

(a) is in a leadership position with the entity, including membership on a board of directors or the equivalent;

(b) is an employee of the entity or has received payment of any kind from the entity in the last five years; or

(c) has any other relationships with the entity or individuals affiliated with the entity that could lead to a reasonable question about the employee's impartiality.

R156-15A-231. Administration of Building Code Inspector Training Fund, Building Code Construction-Related Training Fund, and Factory Built Housing Fees Account.

In accordance with Subsections 15A-1-209(5)(c) and 58-56-17.5(2)(c), and Section R156-15A-230, the following procedures, standards, and policies are established to apply to the administration of the Building Code Inspector Training Fund, the Building Code Construction-Related Training Fund, and the Factory Built Housing Fees Account:

(1) The Division shall not approve or deny education grant requests from any separate fund or account until the Uniform Building Code Commission (UBCC) Education Advisory Committee ("the Committee"), created in accordance with Subsections 58-1-203(1)(f) and R156-15A-201(1)(a), has considered and made its recommendations on the requests.

(2) Appropriate funding expenditure categories include:

(a) for the Building Code Inspector Training Fund or the Factory Built Housing Fees Account, grants in the form of reimbursement funding to the following organizations that administer code-related training or factory built housing educational events, seminars, or classes:

(i) schools, colleges, universities, departments of universities, or other institutions of learning;

(ii) construction trade associations;

(iii) professional associations or organizations; and

(iv) governmental agencies;

(b) for the Building Code Construction-Related Training Fund, grants in the form of reimbursement funding to the following organizations that administer code-related training events, seminars, or classes:

(i) construction trade associations; or

(ii) professional associations;

(c) costs or expenses incurred as a result of code events, seminars, or classes directly administered by the Division;

(d) expenses incurred for the salary, benefits, or other compensation and related expenses resulting from the employment of a Board Secretary;

(e) office equipment and associated administrative expenses required for the performance of the duties of the Board Secretary, including but not limited to computer equipment, telecommunication equipment and costs and general office supplies; and

(f) other related expenses as determined by the Division.

(g) Gift cards, door prizes, and the cost of food and food services provided to training participants are not appropriate funding expenditure categories, and may not be paid or reimbursed from any fund.

(3) The following procedure shall be used for submission, review, and payment of funding grants:

(a) A funding grant applicant shall submit a completed application on forms provided for that purpose by the Division, at least 15 days prior to the meeting at which the request is to be

considered, and prior to the training event. Applications received less than 15 days prior to a meeting may be denied.

(b) Payment of approved funding grants shall be made as reimbursement after:

(i) the approved event, class, or seminar has been held; and

(ii) the required receipts, invoices, and supporting documentation, including proof of payment if requested by the Division or Committee, have been submitted to the Division.

(c) Approved funding grants shall be reimbursed only for eligible expenditures which have been executed in good faith with the intent to ensure the best reasonable value.

(d)(i) A Request for Reimbursement of an approved funding grant shall be submitted to the Division within 60 days following the approved event, class, or seminar, unless an extenuating circumstance occurs. Written notice shall be given to the Division of such an extenuating circumstance.

(ii) Failure to submit a Request for Reimbursement within 60 days shall result in non-payment of approved funds, unless an extenuating circumstance has been reviewed and accepted by the Division.

(4) The Committee shall consider the following in determining whether to recommend approval of a proposed funding request to the Division:

(a) the fund balance available and whether the proposed request meets the overall training objectives of the fund, including:

(i) the need for training on the subject matter;

(ii) the need for training in the geographical area where the training is offered; and

(iii) the need for training on new codes being considered for adoption;

(b) whether the grant applicant agrees to charge a cost for the training event, class, or seminar which is uniform across al categories of attendees;

(c) the prior record of the program sponsor in providing codes training, including:

(i) whether the subject matter taught was appropriate;

(ii) whether the instructor was appropriately qualified and prepared; and

(iii) whether the program sponsor followed appropriate and adequate procedures and requirements in providing the training and submitting requests for funding;

(d) costs of the facility, including:

(i) the location of a facility or venue, or the type of event, seminar, or class;

(ii) the suitability of said facility or venue with regard to the anticipated attendance at or in connection with additional non-funded portions of an event or conference;

(iii) the duration of the proposed event, seminar, or class; and

(iv) whether the proposed cost of the facility is reasonable compared to the cost of alternative available facilities;

(e) the estimated cost for instructor fees, including:

(i) a reimbursement rate not to exceed $150 per instruction hour without further review and approval by the Committee. This reimbursement rate represents the total amount reimbursable for instruction activities. Preparation time, event coordination, course development costs, staff time, and travel time are not separately reimbursable;

(ii) the experience or expertise of the instructor in the proposed training area;

(iii) the quality of training based upon events, seminars or classes that have been previously taught by the instructor;

(iv) the drawing power of the instructor, meaning the ability to increase the attendance at the proposed educational event, seminar, or class;

(v) travel expenses; and

(vi) whether the proposed cost for the instructor or instructors is reasonable compared to the costs of similar events, seminars, or classes;

(f) the estimated cost of advertising materials, brochures, registration, and agenda materials, including:

(i) printing costs that may include creative or design expenses;

(ii) whether printed materials comply with Subsection (4)(b); and

(iii) delivery or mailing costs;

(g) other reasonable and comparable cost alternatives for each proposed expense item;

(h) other information the Committee reasonably believes may assist in evaluating a proposed expenditure; and

(i) a total reimbursement rate of the lesser of $15 per student hour or the cost of all approved actual expenditures.

(5) The Division, after consideration and recommendation of the Committee, based upon the criteria in Subsection (4), may reimburse the following items in addition to the lesser of $15 per student hour or the cost of all approved actual expenditures:

(a) text books, code books, or code update books;

(b) cost of one Division licensee mailing list per provider per two-year renewal period;

(c) cost incurred to upload continuing education hours into the Division's online registry for contractors, plumbers, electricians, or elevator mechanics; and

(d) reasonable cost of advertising materials, brochures, registration and agency materials, including:

(i) printing costs that may include creative or design expenses; and

(ii) delivery or mailing costs.

(6) Joint function.

(a) "Joint function" means a proposed event, class, seminar, or program that provides code or code-related training or factory built housing education, and education or activities in other areas.

(b) Only the prorated portions of a joint function that apply to the purposes of a separate fund are eligible for a funding grant from that fund.

(c) In considering a proposed funding request that involves a joint function, the Committee shall consider whether:

(i) the expenses subject to funding are reasonably prorated for the costs directly related to the purposes of the separate fund; and

(ii) the education being proposed will be reasonable and successful in the training objective in the context of the entire program or event.

(7) Advertising materials, brochures, and agenda or training materials for a Building Code Training funded event, seminar, or class shall include a statement that acknowledges that partial funding of the program has been provided by the Utah Division of Occupational and Professional Licensing from the 1% surcharge funds on all building permits.

(8) Advertising materials, brochures, and agenda or training materials for a Factory Built Housing Fees Account funded educational event, seminar, or class shall include a statement that acknowledges that partial funding of the training program has been provided by the Utah Division of Occupational and Professional Licensing from surcharge fees on factory built housing sales.

(9) If an approved event or joint event is not held, no amount is reimbursable except for the costs described in Subsection (5)(d).

R156-15A-232. Administration of the Office of the Property Rights Ombudsman's Land Use Fund.

In accordance with Subsection 15A-1-209(5)(c)(iii) and Section R156-15A-230, the following procedures, standards, and policies are established for the administration of the Ombudsman's Land Use Fund:

(1) Reimbursements to the Office of the Property Rights

Ombudsman.

(a) The Ombudsman shall use the Land Use Fund to pay its expenses, including personnel salaries, course development costs, travel, and other related expenses as agreed upon by the Ombudsman and the Department of Commerce, that are incurred as a result of:

(i) administering the Land Use Fund;

(ii) conducting training activities under Subsection 13-43-203(1)(g); and

(iii) creating, compiling, and updating model land use ordinances.

(b) Expenses paid to the Ombudsman under this Subsection (1) shall first be approved by:

(i) the Advisory Board; and

(ii) the Department's executive director.

(c) The fact that an expenditure type is reimbursable to the Ombudsman under Subsection (1)(a) does not affect whether an item is reimbursable as a grant under Subsection (2).

(2) The Ombudsman shall use the Land Use Fund to provide grants to providers of land use training programs, as follows:

(a) Eligibility Criteria.

(i) To be eligible to receive funds, the provider's program shall primarily provide training on Utah land use law, and in particular the drafting and application of land use laws and regulations.

(ii) Program training may take the form of live or prerecorded seminars or lectures, continuing education programs, video production, or distribution of training materials and written information.

(iii) The following factors shall apply to the consideration of whether to approve, approve with conditions, or deny a grant request:

(A) previous experience in providing training;

(B) cost estimates, including cost-per-attendee estimates;

(C) how well the education fits in with the land use education and training objectives of Subsection 13-43-203(1)(i)(i);

(D) whether the training addresses current Utah land use law, issues, and best practices;

(E) how well the text relates to the course objectives;

(F) the target audience - for example, whether the education is targeted for land use officials such as commissioners, council members, etc.;

(G) the expected number of students, hours of instruction, and the ratio of students per dollar spent;

(H) the location or region of the state targeted by the education;

(I) the percentage of training costs paid for by the student;

(J) any other considerations deemed important by the Advisory Board, the Ombudsman, and the Department; and

(K) available funds.

(b) Reimbursement Criteria.

(i) Funds may be expended only as reimbursement for expenditures incurred in providing land use training.

(ii) The reimbursement rate for instructor fees shall be limited to $150 per instruction hour and up to $3,000 total for all instructors per day, including airfare, vehicle mileage, and meals. This fee represents the total amount reimbursable for live or prerecorded instruction activities. Preparation time, course development, event coordination, staff time, and travel time are not separately reimbursable. Any excess instructor fees, including honoraria for keynote speakers, shall require further justification, review, and approval. Instructor fees may not be paid to State or local government employees if the instructor is also being paid wages for the same time period.

(iii) Reimbursement for instructor meals, mileage, and lodging may not exceed current State of Utah rates for mileage and daily travel per diem.

(iv) Reimbursement for other expenses such as workbooks, study guides, textbooks used in the education course, meeting rooms or facilities, audio/visual equipment rental costs, if needed, actual printing costs, reasonable cost of advertising materials, and mailing and postage costs, shall be approved as needed.

(v) Gift cards, door prizes, and the cost of food and food services provided to training participants may not be paid or reimbursed from the Ombudsman's Land Use Fund. Any items that do not qualify for state funding, including food and food service provided to training participants, shall be paid for by the participant or sponsor of the program.

(vi) Programs that receive sponsorships or grants from other sources are eligible for reimbursement on a net cost basis after subtracting sponsorships or grants from other sources.

(vii) Total reimbursement shall be the lesser of $15 per student hour or the cost of all approved actual expenditures. Reimbursement in excess of this total requires further justification, review, and approval.

(viii) Notwithstanding Subsection (2)(b)(iii), if an instructor is required to travel to a remote, rural Utah location, the instructor may be compensated up to $50 an hour for time traveling to and from the event venue in addition to mileage.

(c) Procedures for the submission, review, and payment of funding grants shall be as follows:

(i) A funding grant applicant shall submit a completed Request for Land Use Training Funds application to the Ombudsman on a form provided for that purpose by the Ombudsman. The application shall require a description of the proposed land use training program, including program objectives, instructors, target audience, and budget, and may encompass other criteria including that set forth in Subsection (2)(a).

(ii) The Ombudsman shall submit the completed Request for Land Use Training Funds application to the Advisory Board for selection or proposal by the Advisory Board. The submission, selection, or proposal may be done in person or by electronic means in accordance with Title 63G.

(iii) A Request for Land Use Training Funds application selected or proposed by the Advisory Board shall then be reviewed by the Ombudsman's director, the Land Use Fund's manager, and the Department's executive director, or their designees. They may jointly approve the application, approve the application with conditions, or deny the application.

(iv) To apply for reimbursement based on an approved Request for Land Use Training Funds application, the approved program shall submit one or more completed Request for Reimbursement forms to the Ombudsman as follows:

(A) The Request for Reimbursement shall be on a form provided by the Ombudsman for that purpose, and shall include receipts, invoices, and supporting documentation of expenditures, including proof of payment if requested by the Ombudsman or the Department of Commerce.

(B) The complete Request for Reimbursement shall be submitted within 60 days following the approved event, class, or seminar, unless an extenuating circumstance occurs. Written notice shall be given to the Ombudsman of such an extenuating circumstance. Failure to submit a complete Request for Reimbursement within 60 days shall result in non-payment of approved funds, unless an extenuating circumstance has been reviewed and accepted by the Ombudsman.

(v) A Request for Reimbursement accepted by the Ombudsman for review shall then be reviewed by the Ombudsman director, the Land Use Fund manager, and the Department executive director or their designees, and may be approved, approved with conditions, or denied.

(vi) Reimbursement funds may be paid only:

(A) for eligible expenditures which have been executed in good faith with the intent to ensure the best reasonable value;

and

(B) pursuant to a Request for Reimbursement form that has been signed as approved by the Ombudsman director, the Land Use Fund manager, and the Department executive director, or their designees.

R156-15A-401. Adoption - Approved Codes.

Approved Codes. In accordance with Subsection 15A-1-204(6)(a), and subject to the limitations contained in Subsection 15A-1-204(6)(b), the following codes or standards are hereby incorporated by reference and approved for use and adoption by a compliance agency as the construction standards which may be applied to existing buildings in the regulation of building alteration, remodeling, repair, removal, seismic evaluation, and rehabilitation in the state:

(1) the 1997 edition of the Uniform Code for the Abatement of Dangerous Buildings (UCADB) promulgated by the International Code Council;

(2) ASCE 31-03, Seismic Evaluation of Existing Buildings, promulgated by the American Society of Civil Engineers;

(3) ASCE/SEI 41-06, the Seismic Rehabilitation of Existing Buildings, promulgated by the American Society of Civil Engineers, 2007 edition.

KEY: contractors, building codes, building inspections, licensing

October 22, 2019	**58-1-106(1)(a)**
Notice of Continuation June 20, 2016	**58-1-202(1)(a)**
	15A-1-204(6)
	15A-1-205

R156. Commerce, Occupational and Professional Licensing.
R156-24b. Physical Therapy Practice Act Rule.
R156-24b-101. Title.

This rule is known as the "Physical Therapy Practice Act Rule".

R156-24b-102. Definitions.

In addition to the definitions in Title 58, Chapters 1 and 24b, as used in Title 58, Chapters 1 and 24b or this rule:

(1) "An education program that is accredited by a recognized accreditation agency", as used in Subsections 58-24b-302(1)(c) and (d), (2)(c) and (d), and (3)(c), means an education program that is, at the time of an applicant's graduation:

(a) accredited by CAPTE; or

(b) a foreign education program which is equivalent to a CAPTE accredited program as determined by the FCCPT.

(2) "Credential evaluation", as used in Subsections R156-24b-302a(2) and (3), means the appropriate Course Work Tool (CWT) adopted by the Federation of State Boards of Physical Therapy. The appropriate CWT means the CWT in place at the time the foreign educated physical therapist or physical therapist assistant graduated from the physical therapy program.

(3) "CAPTE" means Commission on Accreditation in Physical Therapy Education.

(4) "FCCPT" means the Foreign Credentialing Commission on Physical Therapy.

(5) "FSBPT" means the Federation of State Licensing Boards of Physical Therapy.

(6) "Joint mobilization", as used in Subsection 58-24b-102(15)(d), means a manual therapy technique comprising a continuum of skilled passive movements to the joints and/or related soft tissues that are applied at varying speeds and amplitudes, including a small-amplitude/high velocity therapeutic movement.

(7) "Routine assistance", as used in Subsections 58-24b-102(10) and 58-24b-401(3)(b) means:

(a) engaging in assembly and disassembly, maintenance and transportation, preparation and all other operational activities relevant to equipment and accessories necessary for treatment; and

(b) providing only that type of elementary and direct patient care which the patient and family members could reasonably be expected to learn and perform.

(8) "Supportive personnel", as used in Subsection R156-24b-503(1), means a physical therapist assistant or a physical therapy aide and does not include a student in a physical therapist or physical therapist assistant program.

(9) "Unprofessional conduct" as defined in Title 58, Chapters 1 and 24b, is further defined, in accordance with Subsection 58-1-203(1)(e), in Section R156-24b-502.

R156-24b-103. Authority - Purpose.

This rule is adopted by the Division under the authority of Subsection 58-1-106(1)(a) to enable the Division to administer Title 58, Chapter 24b.

R156-24b-104. Organization - Relationship to Rule R156-1.

The organization of this rule and its relationship to Rule R156-1 is as described in Section R156-1-107.

R156-24b-302a. Qualifications for Licensure - Education Requirements.

(1) In accordance with Subsections 58-24b-302(1) and (2), an applicant for licensure as a physical therapist or physical therapist assistant who completed their physical therapy education in the United States shall document their education by providing:

(a) a transcript sent directly to the Division from the degree-granting institution showing completion of the accredited education program as defined in Subsection R156-24b-102(1)(a); or

(b) a statement signed by the program director or other authorized school official with the school seal affixed, stating that the applicant has successfully completed the accredited education program as defined in Subsection R156-24b-102(1)(a).

(2) In accordance with Subsections 58-24b-302(2) and (4), an applicant who holds a current unrestricted physical therapist or physical therapist assistant license issued by another state, district, or territory of the United States, other than Utah, may document their education by providing either:

(a) the documentation under Subsection (1); or

(b) a score transfer from FSBPT sent directly to the Division from the provider.

(3) In accordance with Subsection 58-24b-302(3), an applicant for licensure as a physical therapist who is educated outside the United States shall document that the applicant's education is equal to a CAPTE accredited degree and that the applicant is able to read, write, speak, understand, and be understood in the English language by submitting to the Division a Type I review from the FCCPT.

(a) Only educational deficiencies in pre-professional subject areas may be corrected by completing college level credits in the deficient areas or by passing the College Level Examination Program (CLEP) demonstrating proficiency in the deficient areas.

(b) Pre-professional subject areas include the following:

(i) humanities;

(ii) social sciences;

(iii) liberal arts;

(iv) physical sciences;

(v) biological sciences;

(vi) behavioral sciences;

(vii) mathematics; or

(viii) advanced first aid for health care workers.

(4) In accordance with Subsection 58-24b-302(2)(c), an applicant for licensure as a physical therapist assistant shall:

(a) have received an associate's, bachelor's, or master's degree from a CAPTE accredited physical therapy education program;

(b) in accordance with Section 58-1-302, if the applicant has been licensed in a foreign country but received a degree not accredited by CAPTE, document that the applicant's education is substantially equal to a CAPTE accredited degree by submitting to the Division a credential evaluation from the FCCPT.

(i) Only educational deficiencies in pre-professional subject areas may be corrected by completing college level credits in the deficient areas or by passing the College Level Examination Program (CLEP) demonstrating proficiency in the deficient areas.

(ii) Pre-professional subject areas include the subject areas listed in Subsection (3)(b).

(5) An applicant who has met all requirements for licensure as a physical therapist except passing the FSBPT National Physical Therapy Examination-Physical Therapist may apply for licensure as a physical therapist assistant.

R156-24b-302b. Qualifications for Licensure - Examination Requirements.

(1)(a) In accordance with Subsection 58-24b-302(1)(d) an applicant for licensure as a physical therapist who is educated in the United States shall pass the FSBPT's National Physical Therapy Examination - Physical Therapist (NPTE-PT) with a passing score as established by the FSBPT, after submitting proof that the applicant is in the final term of, or has graduated from, a professional physical therapist education program

accredited by CAPTE.

(b) In accordance with Subsections 58-24b-302(3)(d) and (g), an applicant for licensure as a physical therapist who is educated outside the United States shall pass the FSBPT's National Physical Therapy Examination - Physical Therapist (NPTE-PT) with a passing score as established by the FSBPT, after submitting proof of compliance with Subsection 58-24b-302(3)(c).

(2) In accordance with Subsection 58-24b-302(2)(d), an applicant for licensure as a physical therapist assistant shall pass the FSBPT's National Physical Therapy Examination - Physical Therapist Assistant (NPTE-PTA), with a passing score as established by the FSBPT, after submitting proof that the applicant is in the final term of, or has graduated from, an accredited physical therapist assistant education program as defined in Subsection R156-24b-102(1)(a).

(3)(a) A passing score on the FSBPT's National Physical Therapy Examination shall be verified through FSBPT.

(b) An applicant for licensure by endorsement may verify the applicant's score by providing a score transfer from FSBPT sent directly to the Division from the provider.

(4) An applicant for licensure as a physical therapist who fails the FSBPT's NPTE-PT is eligible to sit for the FSBPT's NPTE-PTA after registering with FSBPT.

R156-24b-303a. Renewal Cycle - Procedures.

(1) In accordance with Subsection 58-1-308(1), the renewal date for the two-year renewal cycle applicable to licensees under Title 58, Chapter 24b is established by rule in Section R156-1-308a.

(2) Renewal procedures shall be in accordance with Section R156-1-308c.

R156-24b-303b. Continuing Education.

(1) Required Hours. In accordance with Subsection 58-24b-303(2), during each two year renewal cycle commencing on June 1 of each odd numbered year:

(a) A physical therapist shall be required to complete not fewer than 40 contact hours of continuing education of which a minimum of two contact hours must be completed in ethics/law.

(b) A physical therapist assistant shall be required to complete not fewer than 20 contact hours of continuing education of which a minimum of two contact hours must be completed in ethics/law.

(c) Examples of subjects to be covered in an ethics/law course for physical therapists and physical therapist assistants include one or more of the following:

(i) patient/physical therapist relationships;

(ii) confidentiality;

(iii) documentation;

(iv) charging and coding;

(v) compliance with state and/or federal laws that impact the practice of physical therapy; and

(vi) any subject addressed in the American Physical Therapy Association Code of Ethics or Guide for Professional Conduct.

(d) The required number of contact hours of continuing education for an individual who first becomes licensed during the two year renewal cycle shall be decreased in a pro-rata amount.

(e) The Division may defer or waive the continuing education requirements as provided in Section R156-1-308d.

(2) A continuing education course shall meet the following standards:

(a) Time. Each contact hour of continuing education course credit shall consist of not fewer than 50 minutes of education. Licensees shall only receive credit for lecturing or instructing the same course up to two times. Licensees shall receive one contact hour of continuing education for every two hours of time spent:

(i) lecturing or instructing a course;

(ii) in a post-professional doctorate or transitional doctorate program; or

(iii) in a post-professional clinical residency or fellowship approved by the American Physical Therapy Association.

(b) Course Content and Type. The course shall be presented in a competent, well organized, and sequential manner consistent with the stated purpose and objective of the course.

(i) The content of the course shall be relevant to the practice of physical therapy and shall be completed in the form of any of the following course types:

(A) department in-service;

(B) seminar;

(C) lecture;

(D) conference;

(E) training session;

(F) webinar;

(G) internet course;

(H) distance learning course;

(I) journal club;

(J) authoring of an article or textbook publication;

(K) poster platform presentation;

(L) specialty certification through the American Board of Physical Therapy Specialties;

(M) post-professional clinical residency or fellowship approved by the American Physical Therapy Association;

(N) post-professional doctorate from a CAPTE accredited program;

(O) lecturing or instructing a continuing education course; or

(P) study of a scholarly peer-reviewed journal article.

(ii) The following limits apply to the number of contact hours recognized in the following course types during a two year license renewal cycle:

(A) a maximum of 40 contact hours for initial specialty certification through the American Board of Physical Therapy Specialties (ABPTS);

(B) a maximum of 40 contact hours for hours spent in a post-professional doctorate or transitional doctorate CAPTE accredited program;

(C) a maximum of 40 contact hours for hours spent in a post-professional clinical residency or fellowship approved by the American Physical Therapy Association;

(D) a maximum of half of the number of contact hours required for renewal for lecturing or instructing in courses meeting these requirements;

(E) a maximum of ten percent of the number of contact hours required for renewal for supervision of a physical therapist or physical therapist assistant student in an accredited college program and the licensee shall receive one contact hour of credit for every 80 hours of clinical instruction;

(F) a maximum of 15 contact hours required for renewal for serving as a clinical mentor for a physical therapy residency or fellowship training program at a credentialed program and the licensee shall receive one contact hour of credit for every ten hours of residency or fellowship;

(G) a maximum of half of the number of contact hours required for renewal for online or distance learning courses that include examination and issuance of a completion certificate;

(H) a maximum of 12 contact hours for authoring a published, peer-reviewed article;

(I) a maximum of 12 contact hours for authoring a textbook chapter;

(J) a maximum of ten contact hours for personal or group study of a scholarly peer-reviewed journal article;

(K) a maximum of six contact hours for authoring a non-peer reviewed article or abstract of published literature or book review; and

(L) a maximum of six contact hours for authoring a poster or platform presentation.

(c) Provider or Sponsor. The course shall be approved by, conducted by, or under the sponsorship of one of the following:

(i) a recognized accredited college or university;

(ii) a state or federal agency;

(iii) a professional association, organization, or facility involved in the practice of physical therapy; or

(iv) a commercial continuing education provider providing a course related to the practice of physical therapy.

(d) Objectives. The learning objectives of the course shall be clearly stated in course material.

(e) Faculty. The course shall be prepared and presented by individuals who are qualified by education, training, and experience.

(f) Documentation. Each licensee shall maintain adequate documentation as proof of compliance with this Section, such as a certificate of completion, school transcript, course description, or other course materials. The licensee shall retain this proof for a period of three years after the end of the renewal cycle for which the continuing education is due.

(i) At a minimum, the documentation shall contain the following:

(A) the date of the course;

(B) the name of the course provider;

(C) the name of the instructor;

(D) the course title;

(E) the number of contact hours of continuing education credit; and

(F) the course objectives.

(ii) If the course is self-directed, such as personal or group study or authoring of a scholarly peer-reviewed journal article, the documentation shall contain the following:

(A) the dates of study or research;

(B) the title of the article, textbook chapter, poster, or platform presentation;

(C) an abstract of the article, textbook chapter, poster, or platform presentation;

(D) the number of contact hours of continuing education credit; and

(E) the objectives of the self-study course.

(6) Extra Hours of Continuing Education. If a licensee completes more than the required number of contact hours of continuing education during the two-year renewal cycle specified in Subsection (1), up to ten contact hours of the excess may be carried over to the next two year renewal cycle. No education received prior to a license being granted may be carried forward to apply towards the continuing education required after the license is granted.

R156-24b-305. Temporary Licensure.

(1) In accordance with Subsection 58-1-303(1), the Division may issue a temporary physical therapist or temporary physical therapist assistant license to a person who meets all qualifications for licensure as a physical therapist or physical therapist assistant except for the passing of the required examination, if the applicant:

(a) submits a "Request for Authorization to Test" as a physical therapist or physical therapist assistant, and is authorized to sit for the NPTE examination;

(b) is a graduate of a CAPTE accredited physical therapy school within three months immediately preceding application for licensure;

(c) is under the direct, on-site supervision of a physical therapist with an active, non-temporary license if employed as a physical therapist; and

(d) has registered to take the required licensure examination.

(2) A temporary physical therapist or temporary physical therapist assistant license issued under Subsection (1) expires the earlier of:

(a) six months from the date of issuance;

(b) the date upon which the Division receives notice from the examination agency that the individual has failed the examination twice; or

(c) the date upon which the Division issues the individual full licensure.

(3) A temporary physical therapist or temporary physical therapist assistant license issued in accordance with this section cannot be renewed or extended.

R156-24b-308. Reinstatement of a Physical Therapist or Physical Therapist Assistant License which has Expired Beyond Two Years.

In addition to the requirements established in Section R156-1-308g and in accordance with Subsection 58-1-308(6), an applicant for reinstatement for licensure as a physical therapist or physical therapist assistant, whose license has been expired for two or more years, shall complete one or more of the following upon request of the Division in collaboration with the Board:

(1) meet with the Board to evaluate the applicant's ability to safely and competently practice physical therapy;

(2) pass the NPTE examination of the FSBPT if it is determined that examination or reexamination is necessary to verify the applicant's ability to safely and competently practice; and

(3) establish and carry out a plan of supervision under an approved supervisor which may include up to 4,000 hours of physical therapy training under a temporary physical therapist or physical therapist assistant license before qualifying for full reinstatement of the license.

R156-24b-502. Unprofessional Conduct.

Unprofessional conduct includes:

(1) violating, as a physical therapist, any provision of the American Physical Therapy Association's Code of Ethics for the Physical Therapist, last amended July 2010, which is hereby adopted and incorporated by reference;

(2) violating, as a physical therapist, any provision of the American Physical Therapy Association's Guide for Professional Conduct, last amended November 2010, which is hereby adopted and incorporated by reference;

(3) not providing supervision, as a physical therapist, as set forth in Section R156-24b-503;

(4) violating, as a physical therapist assistant, any provision of the American Physical Therapy Association's Standards of Ethical Conduct for the Physical Therapist Assistant, last amended November 2010, which is hereby adopted and incorporated by reference; and

(5) violating, as a physical therapist assistant, any provision of the American Physical Therapy Association's Guide for Conduct of the Physical Therapist Assistant, last amended July 2010, which is hereby adopted and incorporated by reference.

R156-24b-503. Physical Therapist Supervisory Authority and Responsibility.

In accordance with Section 58-24b-404, a physical therapist's supervision of a physical therapist assistant or a physical therapy aide shall meet the following conditions:

(1) a full-time equivalent physical therapist can supervise no more than three full-time equivalent supportive personnel unless approved by the board and Division; and

(2) a physical therapist shall provide treatment to a patient at least every tenth treatment but no longer than 30 days from the day of the physical therapist's last treatment day, whichever is less.

R156-24b-505. Trigger Point Dry Needling - Education and Experience Required - Registration.

(1) A trigger point dry needling course approved by one of the following organizations meets the standards of Section 58-24b-505 if it includes the hours and treatment sessions specified in Section 58-24b-505:

(a) American Physical Therapy Association (APTA) or any of its sections or local chapters; or

(b) Federation of State Boards of Physical Therapy (FSBPT).

(2) In accordance with Subsection 58-24b-505(1)(e) and (2)(b), the approved course and supervised patient treatment sessions shall be completed no later than three calendar years from the start of the course.

KEY: licensing, physical therapy, physical therapist, physical therapist assistant

October 8, 2019	**58-24b-101**
Notice of Continuation October 6, 2016	**58-1-106(1)(a)**
	58-1-202(1)(a)

R277. Education, Administration.
R277-318. Teacher Salary Supplement Program.
R277-318-1. Authority and Purpose.

(1) This rule is authorized by:

(a) Utah Constitution Article X, Section 3, which vests general control and supervision over public education in the Board;

(b) Subsection 53E-3-401(4), which allows the Board to make rules to execute the Board's duties and responsibilities under the Utah Constitution and state law; and

(c) Section 53F-2-504, which directs the Board to make rules regarding the administration of the Teacher Salary Supplement Program.

(2) The purpose of this rule is to establish application and appeal procedures for administration of the Teacher Salary Supplement Program.

R277-318-2. Definitions.

(1) "Eligible teacher" means the same as that term is defined in Subsection 53F-2-504(1)(c).

(2) "Substantially equivalent" means commonly recognized by a Utah university for a degree in a specific subject.

(3) "Teacher Salary Supplement Program" or "TSSP" means the salary supplement program authorized by the Legislature in Section 53F-2-504.

R277-318-3. Program Administration.

(1) The Superintendent shall allocate funds for salary supplements to eligible teachers in accordance with Subsection 53F-2-504(3).

(2) The Superintendent shall maintain an online application system for the TSSP and make it available to educators no later than October 1 of each school year.

(3) In order to receive an award under this program, an applicant for the TSSP shall apply to the Superintendent by the following deadlines for each school year in which the applicant is an eligible teacher:

(a) for trimester payments to the educator, prior to November 15;

(b) for semester payments to the educator, prior to January 31; and

(c) for an annual payment to the educator, prior to April 30.

(4)(a) If an applicant is denied funds under this rule, the applicant may submit a written appeal to the Superintendent prior to June 1 of each school year.

(b) An appeal under Subsection (4)(a) is limited to the following issues:

(i) whether the applicant has a degree or degree major with course requirements that are substantially equivalent to the course requirements for a degree listed in Section 53F-2-504;

(ii) whether the applicant has met the qualifying teaching background requirements described in Section 53F-2-504;

(iii) whether the Superintendent's initial denial was inconsistent with Section 53F-2-504 or this Rule R277-318; or

(iv) whether the Superintendent's initial denial was based on inaccurate or incomplete information.

(c) The Superintendent may designate a panel of at least two Board staff members to review an appeal made under Subsection (4)(a) and make a recommendation to the Superintendent.

(i) A panel designated in accordance with Subsection (4)(c) shall make a recommendation in accordance with the provisions of Section 53F-2-504 or this Rule R277-318.

(ii) The panel shall make a recommendation on an appeal within 30 days of receipt of the written appeal.

(5) The Superintendent shall issue a ruling on an appeal within 15 days of receipt of the panel's recommendation.

(6) The decision of the Superintendent on an appeal is the final Board administrative action.

(7) If the appropriation for TSSP is insufficient to cover all eligible teachers entitled to awards, the Superintendent shall reduce all awards by the same ratio and proportion.

KEY: Teacher Salary Supplement Program, salary
October 8, 2019 **Art X Sec 3**
53E-3-401
53F-2-504

R277. Education, Administration.
R277-407. School Fees.
R277-407-1. Authority and Purpose.

(1) This rule is authorized under:

(a) Utah Constitution Article X, Section 3, which vests general control and supervision over public education in the Board;

(b) Article X, Section 2 of the Utah Constitution, which provides that:

(i) public elementary schools shall be free; and

(ii) secondary schools shall be free, unless the Legislature authorizes the imposition of fees;

(c) Subsection 53E-3-401(4), which allows the Board to make rules to execute the Board's duties and responsibilities under the Utah Constitution and state law;

(d) Subsection 53G-7-503(2), which requires the Board to adopt rules regarding student fees; and

(e) Subsection 53G-7-504 which authorizes waiver of fees for eligible students with appropriate documentation.

(2) This rule also serves to comply with the order arising from the Permanent Injunction issued in Doe v. Utah State Board of Education, Civil No. 920903376 (3rd District 1994).

(3) The purpose of this rule is to:

(a) permit the orderly establishment of a system of reasonable fees;

(b) provide adequate notice to students and families of fees and fee waiver requirements; and

(c) prohibit practices that would:

(i) exclude those unable to pay from participation in school-sponsored activities; or

(ii) create a burden on a student or family as to have a detrimental impact on participation.

R277-407-2. Definitions.

(1) "Co-curricular activity" means an activity, course, or program, outside of school hours, that also includes a required regular school day program or curriculum.

(2) "Extracurricular activity" means an activity or program for students, outside of the regular school day, that:

(a) is sponsored, recognized, or sanctioned by an LEA; and

(b) supplements or compliments, but is not part of, the LEA's required program or regular curriculum.

(3)(a) "Fee" means something of monetary value requested or required by an LEA as a condition to a student's participation in an activity, class, or program provided, sponsored, or supported by a school.

(b) "Fee" includes money or something of monetary value raised by a student or the student's family through fundraising.

(4)(a) "Fundraiser," "fundraising," or "fundraising activity" means an activity or event provided, sponsored, or supported by a school that uses students to generate funds to raise money to:

(i) provide financial support to a school or any of the school's classes, groups, teams, or programs; or

(ii) benefit a particular charity or for other charitable purposes.

(b) "Fundraiser," "fundraising," or "fundraising activity" may include:

(i) the sale of goods or services;

(ii) the solicitation of monetary contributions from individuals or businesses; or

(iii) other lawful means or methods that use students to generate funds.

(c) "Fundraiser," "fundraising," or "fundraising activity" does not include an alternative method of raising revenue without students.

(5) "Group fundraiser" or "group fundraising" means a fundraising activity where the money raised is used for the benefit of the group, team, or organization.

(6) "Individual fundraiser" or "individual fundraising" means a fundraising activity where money is raised by each individual student to pay the individual student's fees.

(7)(a) "Instructional equipment" means an activity, course, or program-related tool or instrument that:

(i) is required for a student to use as part of a secondary activity, course, or program;

(ii) typically becomes the property of the student upon exiting the activity, course, or program; and

(iii) is subject to fee waiver.

(b) "Instructional equipment" includes:

(i) shears or styling tools;

(ii) a band instrument;

(iii) a camera;

(iv) a stethoscope; and

(v) sports equipment, including a bat, mitt, or tennis racquet.

(c) "Instructional equipment" does not include school equipment.

(8)(a) "Instructional supply" means a consumable or non-reusable supply that is necessary for a student to use as part of a secondary activity, course, or program.

(b) "Instructional supply" includes:

(i) prescriptive footwear;

(ii) brushes or other art supplies, including clay, paint, or art canvas;

(iii) wood for wood shop;

(iv) Legos for Lego robotics;

(v) film; and

(vi) filament used for 3D printing.

(9) "LEA" includes, for purposes of this rule, the Utah Schools for the Deaf and the Blind.

(10) "Noncurricular club" has the same meaning as that term is defined in Section 53G-7-701.

(11) "Non-waivable charge" means a cost, payment, or expenditure that:

(a) is a personal discretionary charge or purchase, including:

(i) a charge for insurance, unless the insurance is required for a student to participate in an activity, class, or program;

(ii) a charge for college credit related to the successful completion of:

(A) a concurrent enrollment class; or

(B) an advanced placement examination; or

(iii) except when requested or required by an LEA, a charge for a personal consumable item such as a yearbook, class ring, letterman jacket or sweater, or other similar item;

(b) is subject to sales tax as described in Utah State Tax Commission Publication 35, Sales Tax Information for Public and Private Elementary and Secondary Schools; or

(c) by Utah Code, federal law, or Board rule is designated not to be a fee, including:

(i) a school uniform as provided in Section 53G-7-801;

(ii) a school lunch; or

(iii) a charge for a replacement for damaged or lost school equipment or supplies.

(12)(a) "Provided, sponsored, or supported by a school" means an activity, class, program, fundraiser, club, camp, clinic, or other event that:

(i) is authorized by an LEA or school, according to local education board policy; or

(ii) satisfies at least one of the following conditions:

(A) the activity, class, program, fundraiser, club, camp, clinic, or other event is managed or supervised by an LEA or school, or an LEA or school employee;

(B) the activity, class, program, fundraiser, club, camp, clinic, or other event uses, more than inconsequentially, the LEA or school's facilities, equipment, or other school resources; or

(C) the activity, class, program, fundraising event, club,

camp, clinic, or other event is supported or subsidized, more than inconsequentially, by public funds, including the school's activity funds or minimum school program dollars.

(b) "Provided, sponsored, or supported by a school" does not include an activity, class, or program that meets the criteria of a noncurricular club as described in Title 53G, Chapter 7, Part 7, Student Clubs.

(13)(a) "Provision in lieu of fee waiver" means an alternative to fee payment or waiver of fee payment.

(b) "Provision in lieu of fee waiver" does not include a plan under which fees are paid in installments or under some other delayed payment arrangement.

(14) "Regular school day" has the same meaning as the term "school day" described in Section R277-419-2.

(15) "Requested or required by an LEA as a condition to a student's participation" means something of monetary value that is impliedly or explicitly mandated or necessary for a student, parent, or family to provide so that a student may:

(a) fully participate in school or in a school activity, class, or program;

(b) successfully complete a school class for the highest grade; or

(c) avoid a direct or indirect limitation on full participation in a school activity, class, or program, including limitations created by:

(i) peer pressure, shaming, stigmatizing, bullying, or the like; or

(ii) withholding or curtailing any privilege that is otherwise provided to any other student.

(16) "School day" has the same meaning as defined in R277-419-2.

(17)(a) "School equipment" means a durable school-owned machine, equipment, or tool used by a student as part of a secondary activity, course, or program.

(b) "School equipment" includes a saw, machine, and 3D printer.

(18)(a) "Something of monetary value" means a charge, expense, deposit, rental, fine, or payment, regardless of how the payment is termed, described, requested or required directly or indirectly, in the form of money, goods or services.

(b) "Something of monetary value" includes:

(i) charges or expenditures for a school field trip or activity trip, including related transportation, food, lodging, and admission charges;

(ii) payments made to a third party that provide a part of a school activity, class, or program;

(iii) classroom supplies or materials; and

(iv) a fine, except for a student fine specifically approved by an LEA for:

(A) failing to return school property;

(B) losing, wasting, or damaging private or school property through intentional, careless, or irresponsible behavior; or

(C) improper use of school property, including a parking violation.

(19)(a) "Student supplies" means items which are the personal property of a student which, although used in the instructional process, are also commonly purchased and used by persons not enrolled in the class or activity in question and have a high probability of regular use in other than school-sponsored activities.

(b) "Student supplies" include:

(i) pencils;

(ii) paper;

(iii) notebooks;

(iv) crayons;

(v) scissors;

(vi) basic clothing for healthy lifestyle classes; and

(vii) similar personal or consumable items over which a student retains ownership.

(c) "Student supplies" does not include items listed in Subsection (18)(b) if the requirement from the school for the student supply includes specific requirements such as brand, color, or a special imprint in order to create a uniform appearance not related to basic function.

(20) "Supplemental kindergarten" means an LEA program for students in kindergarten who voluntarily elect to receive additional hours of instruction beyond the LEA's regular school day for kindergarten students for an additional fee.

(21) "Supplemental Security Income for children with disabilities" or "SSI" means a benefit administered through the Social Security Administration that provides payments for qualified children with disabilities in low income families.

(22) "Temporary Assistance for Needy Families" or "TANF," means a program, formerly known as AFDC, which provides monthly cash assistance and food stamps to low-income families with children under age 18 through the Utah Department of Workforce Services.

(23)(a) "Textbook" means instructional material necessary for participation in a course or program, regardless of the format of the material.

(b) "Textbook" includes:

(i) hardcopy book or printed pages of instructional material, including a consumable workbook;

(ii) computer hardware, software, or digital content;

(iii) the cost of wifi to access school required digital content; and

(iv) the maintenance costs of school equipment.

(c) "Textbook" does not include:

(i) instructional equipment; or

(ii) instructional supplies.

(24) "Waiver" means a full release from the requirement of payment of a fee and from any provision in lieu of fee payment.

R277-407-3. Classes and Activities During the Regular School Day.

(1) No fee may be charged in kindergarten through grade six for:

(a) materials;

(b) textbooks;

(c) supplies, except for student supplies described in Subsection (6); or

(d) any class or regular school day activity, including assemblies and field trips.

(2)(a) An LEA may charge a fee in connection with an activity, class, or program provided, sponsored, or supported by a school for a student in a secondary school that takes place during the regular school day if the fee is approved as provided in this R277-407.

(b) All fees are subject to the fee waiver provisions of Section R277-407-8.

(3)(a) Notwithstanding, Subsection (1) and except as provided in Subsection (3)(b), a school may charge a fee to a student in grade six if the student attends a school that includes any of grades seven through twelve.

(b) A school that provides instruction to students in grades other than grades six through twelve may not charge fees for grade six unless the school follows a secondary model of delivering instruction to the school's grade six students.

(c) If a school charges fees in accordance with Subsection (3)(a), the school shall annually provide notice to parents that the school will collect fees from grade six students and that the fees are subject to waiver.

(4) If a class is established or approved, which requires payment of fees or purchase of items in order for students to participate fully and to have the opportunity to acquire all skills and knowledge required for full credit and highest grades, the

fees or costs for the class shall be subject to the fee waiver provisions of Rule R277-407-8.

(5)(a) In project related courses, projects required for course completion shall be included in the course fee.

(b) A school may require a student at any grade level to provide materials or pay for an additional discretionary project if the student chooses a project in lieu of, or in addition to a required classroom project.

(c) A school shall avoid allowing high cost additional projects, particularly if authorization of an additional discretionary project results in pressure on a student by teachers or peers to also complete a similar high cost project.

(d) A school may not require a student to select an additional project as a condition to enrolling, completing, or receiving the highest possible grade for a course.

(6) An elementary school or elementary school teacher may provide to a student's parent or guardian, a suggested list of student supplies for use during the regular school day so that a parent or guardian may furnish, on a voluntary basis, student supplies for student use, provided that, in accordance with Section 53G-7-503, the following notice is provided with the list: "NOTICE: THE ITEMS ON THIS LIST WILL BE USED DURING THE REGULAR SCHOOL DAY. THEY MAY BE BROUGHT FROM HOME ON A VOLUNTARY BASIS, OTHERWISE, THEY WILL BE FURNISHED BY THE SCHOOL."

(7) A school may require a secondary student to provide student supplies, subject to the provisions of Section R277-407-8.

(8) Except as provided in Subsection (9), if a school requires special shoes or items of clothing that meet specific requirements, including requesting a specific color, style, fabric, or imprints, the cost of the special shoes or items of clothing are:

(a) considered a fee; and

(b) subject to fee waiver.

(9) As provided in Subsection 53G-7-802(4), an LEA's school uniform policy, including a requirement for a student to wear a school uniform, is not considered a fee for either an elementary or a secondary school if the LEA's school uniform policy is consistent with the requirements of Title 53G, Chapter 7, Part 8, School Uniforms.

R277-407-4. School Activities Outside of the Regular School Day.

(1) A school may charge a fee, subject to the provisions of Section R277-407-8, in connection with any school-sponsored activity, that does not take place during the regular school day, regardless of the age or grade level of the student, if participation in the activity is voluntary and does not affect a student's grade or ability to participate fully in any course taught during the regular school day.

(2) A fee related to a co-curricular or extracurricular activity may not exceed the maximum fee amounts for the co-curricular or extracurricular activity adopted by the LEA governing board as described in Subsection R277-407-6(3).

(3) A school may only collect a fee for an activity, class, or program provided, sponsored, or supported by a school consistent with LEA policies and state law.

(4) An LEA that provides, sponsors, or supports an activity, class, or program outside of the regular school day or school calendar is subject to the provisions of this rule regardless of the time or season of the activity, class, or program.

(5)(a) An LEA may charge a charge fee related to a student's enrollment in supplemental kindergarten.

(b) An LEA's fee for supplemental kindergarten described in Subsection (5)(a) is subject to fee waiver.

R277-407-5. Fee-Waivable Activities, Classes, or Programs Provided, Sponsored, or Supported by a School.

Fees for the following are waivable:

(1) an activity, class, or program that is:

(a) primarily intended to serve school-age children; and

(b) taught or administered, more than inconsequentially, by a school employee as part of the employee's assignment;

(2) an activity, class, or program that is explicitly or implicitly required:

(a) as a condition to receive a higher grade, or for successful completion of a school class or to receive credit, including a requirement for a student to attend a concert or museum as part of a music or art class for extra credit; or

(b) as a condition to participate in a school activity, class, program, or team, including, a requirement for a student to participate in a summer camp or clinic for students who seek to participate on a school team, such as cheerleading, football, soccer, dance, or another team;

(3) an activity or program that is promoted by a school employee, such as a coach, advisor, teacher, school-recognized volunteer, or similar person, during school hours where it could be reasonably understood that the school employee is acting in the employee's official capacity;

(4) an activity or program where full participation in the activity or program includes:

(a) travel for state or national educational experiences or competitions;

(b) debate camps or competitions; or

(c) music camps or competitions; and

(5) a concurrent enrollment, CTE, or AP course.

R277-407-6. LEA Requirements to Establish a Fee Schedule -- Maximum Fee Amounts -- Notice to Parents.

(1) An LEA, school, school official, or employee may not charge or assess a fee or request or require something of monetary value in connection with an activity, class, or program provided, sponsored, or supported by a including for a co-curricular or extracurricular activity, unless the fee:

(a) has been set and approved by the LEA's governing board;

(b) is equal to or less than the maximum fee amount established by the LEA governing board as described in Subsection (4); and

(c) is included in an approved fee schedule or notice in accordance with this rule.

(2)(a) If an LEA charges a fee, on or before April 1 and in consultation with stakeholders, the LEA governing board shall annually adopt a fee schedule and fee policies for the LEA in a regularly scheduled public meeting.

(b) Before approving the LEA's fee schedule described in this Section, an LEA shall provide an opportunity for the public to comment on the proposed fee schedule during a minimum of two public LEA governing board meetings.

(c) An LEA shall:

(i) provide public notice of the meetings described in Subsections (2)(a) and (b) in accordance with Title 52, Chapter 4, Open and Public Meetings Act; and

(ii) encourage public participation in the development of fee schedules and waiver policies.

(d) In addition to the notice requirements of Subsection(2)(c), an LEA shall provide notice to parents and students of the meetings described in Subsections (2)(a) and (b) using the same form of communication regularly used by the LEA to communicate with parents, including notice by e-mail, text, flyer, or phone call.

(e) An LEA shall keep minutes of meetings during which fee and waiver policies are developed or adopted, together with copies of approved policies, in accordance with Section 52-4-203.

(3) After the fee schedule described in Subsection (2)(a)

is adopted, an LEA may amend the LEA's fee schedule if the LEA follows the process described in Subsection (2) before approving the amended fee schedule.

(4)(a) As part of an LEA's fee setting process, the LEA shall establish a per student annual maximum fee amount that the LEA's schools may charge a student for the student's participation in all courses, programs, and activities provided, sponsored, or supported by a school for the year.

(b) An LEA shall establish:

(i) a maximum fee amount per student for each activity; and

(ii) a maximum total aggregate fee amount per student per school year.

(c) The amount of revenue raised by a student through an individual fundraiser shall be included as part of the maximum fee amount per student for the activity and maximum total aggregate fee amount per student.

(d) An LEA may establish a reasonable number of activities, courses, or programs that will be covered by the annual maximum fee amount described in Subsection (4)(a).

(5) As part of an LEA's fee setting process described in this Section, the LEA may review and consider the following per school:

(a) the school's cost to provide the activity, class, or program;

(b) the school's student enrollment;

(c) the median income of families:

(i) within the school's boundary; or

(ii) enrolled in the school;

(d) the number and monetary amount of fee waivers, designated by individual fee, annually granted within the prior three years;

(e) the historical participation and school interest in certain activities;

(f) the prior year fee schedule;

(g) the amount of revenue collected from each fee in the prior year;

(h) fund-raising capacity;

(i) prior year community donors; and

(j) other resources available, including through donations and fundraising.

(6)(a) An LEA shall annually provide written notice to a parent or guardian of each student who attends a school within the LEA of all current and applicable fee schedules and fee waiver policies.

(7)(a) If an LEA charges a fee, the LEA shall:

(i) annually publish the LEA's fee waiver policies and fee schedule, including the fee maximums described in Subsection (4), on each of the LEA's schools' websites;

(ii) annually include a copy of the LEA's fee schedule and fee waiver policies with the LEA's registration materials; and

(iii) provide a copy of the LEA's fee schedule and fee waiver policies to a student's parent who enrolls a student after the initial enrollment period.

(b) If an LEA's student or parent population in a single language other than English exceeds 20%, the LEA shall also publish the LEA's fee schedule and fee waiver policies in the language of those families.

(c) An LEA representative shall meet personally with each student's parent or family and make available an interpreter for the parent to understand the LEA's fee waiver schedules and policies if:

(i) the student or parent's first language is a language other than English; and

(ii) the LEA hasn't published the LEA's fee schedule and fee waiver policies in the parent's first language.

(8) A notice described in Subsection (6)(a) shall:

(a) be in a form approved by the Board; and

(b) include the following:

(i) for a school serving elementary students:

(A) School Fees Notice for Families of Children in Elementary School;

(B) Fee Waiver applications (Elementary School);

(C) Fee Waiver Decision and Appeals Form; and

(D) the Board's elementary school poster; and

(ii) for a school serving secondary students:

(A) School Fees Notice For Families of Students in a Secondary School;

(B) Fee Waiver Application (Secondary School);

(C) Application for Fee Waivers and Community Service (Secondary School);

(D) Community Service Assignments and Notice of Appeal Rights;

(E) Appeal of Community Service Assignment; and

(F) the Board's secondary school poster.

(9)(a) An LEA policy shall include easily understandable procedures for obtaining a fee waiver and for appealing an LEA's denial of a fee waiver, as soon as possible before the fee becomes due.

(b) If an LEA denies a student or parent request for a fee waiver, the LEA shall provide the student or parent:

(i) the LEA's decision to deny a waiver; and

(ii) the procedure for the appeal in the form approved by the Board.

(10)(a) A school may not deny a present or former student receipt of transcripts or a diploma, nor may a school refuse to issue a grade for a course for failure to pay school fees.

(b) A school may impose a reasonable charge to cover the cost of duplicating, mailing, or transmitting transcripts and other school records.

(c) A school may not charge for duplicating, mailing, or transmitting copies of school records to an elementary or secondary school in which a former student is enrolled or intends to enroll.

(11) To preserve equal opportunity for all students and to limit diversion of money and school and staff resources from the basic school program, each LEA's fee policies shall be designed to limit student expenditures for school-sponsored activities, including expenditures for activities, uniforms, clubs, clinics, travel, and subject area and vocational leadership organizations, whether local, state, or national.

R277-407-7. Donations in Lieu of Fees.

(1)(a) A school may not request or accept a donation in lieu of a fee from a student or parent unless the activity, class, or program for which the donation is solicited will otherwise be fully funded by the LEA and receipt of the donation will not affect participation by an individual student.

(b) A donation is a fee if a student or parent is required to make the donation as a condition to the student's participation in an activity, class, or program.

(c) An LEA may solicit and accept a donation or contribution in accordance with the LEA's policies, but all such requests must clearly state that donations and contributions by a student or parent are voluntary.

(2) If an LEA solicits donations, the LEA:

(a) shall solicit and handle donations in accordance with policies established by the LEA; and

(b) may not place any undue burden on a student or family in relation to a donation.

(3) An LEA may raise money to offset the cost to the LEA attributed to fee waivers granted to students through the LEA's foundation.

(4) An LEA shall direct donations provided to the LEA through the LEA's foundation in accordance with the LEA's policies governing the foundation.

(5) If an LEA accepts a donation, the LEA shall prevent potential inequities in schools within the LEA when distributing

the donation.

R277-407-8. Fee Waivers.

(1)(a) All fees are subject to waiver.

(b) Fees charged for an activity, class, or program held outside of the regular school day, during the summer, or outside of an LEA's regular school year are subject to waiver.

(c) Non-waivable charges are not subject to waiver.

(2)(a) Except as provided in Subsection (2)(b), beginning with the 2020-21 school year, an LEA may not use revenue collected through fees to offset the cost of fee waivers by requiring students and families who do not qualify for fee waivers to pay an increased fee amount to cover the costs of students and families who qualify for fee waivers.

(b) An LEA may notify students and families that the students and families may voluntarily pay an increased fee amount or provide a donation to cover the costs of other students and families.

(c) For an LEA with multiple schools, the LEA shall distribute the impact of fee waivers across the LEA so that no school carries a disproportionate share of the LEA's total fee waiver burden.

(3) An LEA shall provide, as part of any fee policy or schedule, for adequate waivers or other provisions in lieu of fee waivers to ensure that no student is denied the opportunity to participate in a class or school-sponsored or supported activity because of an inability to pay a fee.

(4) An LEA shall designate at least one person at an appropriate administrative level in each school to review and grant fee waiver requests.

(5) An LEA shall administer the process for obtaining a fee waiver or pursuing an alternative fairly, objectively, without delay, and in a manner that avoids stigma, embarrassment, undue attention, and unreasonable burdens on students and parents.

(6) An LEA may not treat a student receiving a fee waiver or provision in lieu of a fee waiver differently from other students.

(7) A school may not identify a student on fee waiver to students, staff members, or other persons who do not need to know.

(8)(a) An LEA shall ensure that a fee waiver or other provision in lieu of fee waiver is available to any student whose parent is unable to pay a fee.

(b) A school or LEA administrator shall verify fee waivers consistent with this rule.

(9) An LEA shall submit school fee compliance forms to the Superintendent for each school that affirm compliance with the permanent injunction, consistent with Doe v. Utah State Board of Education, Civil No. 920903376 (3rd District 1994).

(10) An LEA shall adopt a fee waiver policy for review and appeal of fee waiver requests which:

(a) provides parents the opportunity to review proposed alternatives to fee waivers;

(b) establishes a timely appeal process, which shall include the opportunity to appeal to the LEA or its designee; and

(c) suspends any requirement that a given student pay a fee during any period for which the student's eligibility for waiver is under consideration or during which an appeal of denial of a fee waiver is in process.

(11) An LEA may pursue reasonable methods for collecting student fees, but may not, as a result of unpaid fees:

(a) exclude a student from a school, an activity, class, or program that is provided, sponsored, or supported by a school during the regular school day;

(b) refuse to issue a course grade; or

(c) withhold official student records, including written or electronic grade reports, diplomas or transcripts.

(12)(a) A school may withhold student records in accordance with Subsection 53G-8-212(2)(a).

(b) Notwithstanding Subsection (12)(a), a school may not withhold any records required for student enrollment or placement in a subsequent school.

(13) A school is not required to waive a non-waivable charge.

R277-407-9. Service In Lieu of Fees -- Voluntary Requests for Installment Plans.

(1) Subject to the provisions of Subsection (2), an LEA may allow a student to perform service in lieu of a fee, but service in lieu of a fee may not be required.

(2) An LEA may allow a student to perform service in lieu of a fee if:

(a) the LEA establishes a service policy that ensures that a service assignment is appropriate to the:

(i) age of the student;

(ii) physical condition of the student; and

(iii) maturity of the student;

(b) the LEA's service policy is consistent with state and federal laws, including:

(i) Section 53G-7-504; and

(ii) the Federal Fair Labor Standards Act, 29 U.S.C. 201;

(c) the service can be performed within a reasonable period of time; and

(d) the service is at least equal to the minimum wage for each hour of service.

(3)(a) A student who performs service may not be treated differently than other students who pay a fee.

(b) The service may not create an unreasonable burden for a student or parent and may not be of such a nature as to demean or stigmatize the student.

(4) An LEA shall transfer a student's service credit to:

(a) another school within the LEA; or

(b) another LEA upon request of the student.

(5)(a) An LEA may make an installment payment plan available to a parent or student to pay for a fee.

(b) An installment payment plan described in Subsection (5)(a) may not be required in lieu of a fee waiver.

(6) An LEA that charges fees shall adopt policies that include at least the following:

(a) a process for obtaining waivers or pursuing alternatives that is administered fairly, objectively, and without delay, and avoids stigma and unreasonable burdens on students and families;

(b) a process with no visible indicators that could lead to identification of fee waiver applicants;

(c) a process that complies with the privacy requirements of The Family Educational Rights and Privacy Act of 1974, 20 U.S.C. 123g (FERPA);

(d) a student may not collect fees or assist in the fee waiver approval process;

(e) a standard written decision and appeal form is provided to every applicant; and

(f) during an appeal the requirement that the fee be paid is suspended.

R277-407-10. Individual and Group Fundraising Requirements.

(1) An LEA governing board shall establish a fundraising policy that includes a fundraising activity approval process.

(2) An LEA's fundraising policy described in Subsection (1):

(a) may not authorize, establish, or allow for required individual fundraising;

(b) may provide optional individual fundraising opportunities for students to raise money to offset the cost of the student's fees;

(c) may allow for required group fundraisers;

(d) may not deny a student membership on a team or group, or in an activity, based on the student's non-participation in a fundraiser; and

(e) shall require compliance with the requirements of Rule R277-113 when using alternative methods of raising revenue that do not include students.

R277-407-11. Fee Waiver Eligibility.

(1) A student is eligible for fee waiver if an LEA receives verification that:

(a) based on the family income levels established by the Superintendent as described in Subsection (2);

(b) the student to whom the fee applies receives SSI;

(c) the family receives TANF funding;

(d) the student is in foster care through the Division of Child and Family Services; or

(e) the student is in state custody.

(2) The Superintendent shall annually establish income levels for fee waiver eligibility and publish the income levels on the Board's website.

(3) In lieu of income verification, an LEA may require alternative verification under the following circumstances:

(a) If a student's family receives TANF, an LEA may require a letter of decision covering the period for which a fee waiver is sought from the Utah Department of Workforce Services;

(b) If a student receives SSI, an LEA may require a benefit verification letter from the Social Security Administration;

(c) If a student is in state custody or foster care, an LEA may rely on the youth in care required intake form and school enrollment letter or both provided by a case worker from the Utah Division of Child and Family Services or the Utah Juvenile Justice Department.

(d) An LEA may not subject a family to unreasonable demands for re-qualification.

(4) A school may grant a fee waiver to a student, on a case by case basis, who does not qualify for a fee waiver under Subsection (1), but who, because of extenuating circumstances is not reasonably capable of paying the fee.

(5) An LEA may charge a proportional share of a fee or reduced fee if circumstances change for a student or family so that fee waiver eligibility no longer exists.

R277-407-12. Fees for Textbooks and Remediation.

(1) Beginning with the 2022-23 school year, an LEA may not charge a fee for:

(a) a textbook as provided in Section 53G-7-603, except for a textbook used for a concurrent enrollment or advanced placement course as described in Subsection (2); or

(b) a remediation course, if, as described in Subsection 53G-7-504(1)(b):

(i) the student or the student's parent is financially unable to pay the fee;

(ii) the fee for remediation would constitute an extreme financial hardship on the student or student's parent; or

(iii) the student has suffered a long-term illness, death in the family, or other major emergency.

(2)(a) An LEA may charge a fee for a textbook used for a concurrent enrollment or advanced placement.

(b) A fee for a textbook used for a concurrent enrollment or advanced placement course is fee waivable as described in Section R277-407-8.

R277-407-13. Budgeting and Spending Revenue Collected Through Fees -- Fee Revenue Sharing Requirements.

(1) An LEA shall follow the general accounting standards described in Rule R277-113 for treatment of fee revenue.

(2) An LEA shall:

(a) establish a spend plan for the revenue collected from each fee charged; and

(b) if the LEA has two or more schools within the LEA, share revenue lost due to fee waivers across the LEA.

(3)(a) Financial inequities or disproportional impact of fee waivers may not fall inequitably on any one school within an LEA.

(b) An LEA that has multiple schools shall establish a procedure to identify and address potential inequities due to the impact of the number of students who receive fee waivers within each of the LEA's schools.

R277-407-14. Fee Waiver Reporting Requirements.

(1) An LEA shall attach the following to the LEA's annual year end report for inclusion in the Superintendent's annual report:

(a) a summary of:

(i) the number of students in the LEA given fee waivers;

(ii) the number of students who worked in lieu of a waiver; and

(iii) the total dollar value of student fees waived by the LEA;

(b) a copy of the LEA's fee and fee waiver policies;

(c) a copy of the LEA's fee schedule for students; and

(d) the notice of fee waiver criteria provided by the LEA to a student's parent or guardian.

(e) a fee waiver compliance form approved by the Superintendent for each school and LEA.

R277-407-15. Superintendent and LEA Policy and Training Requirements.

(1) The Superintendent shall provide ongoing training, informational materials, and model policies, as available, for use by LEAs.

(2) The Superintendent shall provide online training and resources for LEAs regarding:

(a) an LEA's fee approval process;

(b) LEA notification requirements;

(c) LEA requirements to establish maximum fees;

(d) fundraising practices;

(e) fee waiver eligibility requirements, including requirements to maintain student and family confidentiality; and

(f) community service or fundraising alternatives for students and families who qualify for fee waivers.

(3) An LEA governing board shall annually review the LEA's policies on school fees, fee waivers, fundraising, and donations.

(4) An LEA shall develop a plan for, at a minimum, annual training of LEA and school employees on fee related policies enacted by the LEA specific to each employee's job function.

R277-407-16. Enforcement.

(1) The Superintendent shall monitor LEA compliance with this rule:

(a) through the compliance reports provided in Section R277-407-14; and

(b) by such other means as the Superintendent may reasonably request at any time.

(2) If an LEA fails to comply with the terms of this rule or request of the Superintendent, the Superintendent shall send the LEA a first written notice of non-compliance, which shall include a proposed corrective action plan.

(3) Within 45 days of the LEA's receipt of a notice of non-compliance, the LEA shall:

(a) respond to the allegations of noncompliance described in Subsection (2); and

(b) work with the Superintendent on the Superintendent's proposed corrective action plan to remedy the LEA's noncompliance.

(4)(a) Within fifteen days after receipt of a proposed corrective action plan described in Subsection (3)(b), an LEA may request an informal hearing with the Superintendent to respond to allegations of noncompliance or to address the appropriateness of the proposed corrective action plan.

(b) The form of an informal hearing described in Subsection (4)(a) shall be as directed by the Superintendent.

(5) The Superintendent shall send an LEA a second written notice of non-compliance and request for the LEA to appear before a Board standing committee if:

(a) the LEA fails to respond to the first notice of non-compliance within 60 days; or

(b) the LEA fails to comply with a corrective action plan described in Subsection (3)(b) within the time period established in the LEA's corrective action plan.

(6) If an LEA that failed to respond to a first notice of non-compliance receives a second written notice of non-compliance, the LEA may:

(a)(i) respond to the notice of non-compliance described in Subsection (5); and

(ii) work with the Superintendent on a corrective action plan within 30 days of receiving the second written notice of non-compliance; or

(b) seek an appeal as described in Subsection (8)(b).

(7) If an LEA that failed to respond to a first notice of non-compliance fails to comply with either of the options described in Subsection (6), the Superintendent shall impose one of the financial consequences described in Subsection (10).

(8)(a) Prior to imposing a financial consequence described in Subsection (10), the Superintendent shall provide an LEA thirty days' notice of any proposed action.

(b) The LEA may, within fifteen days after receipt of a notice described in Subsection (8)(a), request an appeal before the Board.

(9) If the LEA does not request an appeal described in Subsection (8)(b), or if after the appeal the Board finds that the allegations of noncompliance are substantially true, the Superintendent may continue with the suggested corrective action, formulate a new form of corrective action or additional terms and conditions which must be met and may proceed with the appropriate remedy which may include an order to return funds improperly collected.

(10) A financial consequence may include:

(a) requiring an LEA to repay an improperly charged fee, commensurate with the level of non-compliance;

(b) withholding all or part of an LEA's monthly Minimum School Program funds until the LEA comes into full compliance with the corrective action plan; and

(c) suspending the LEA's authority to charge fees for an amount of time specified by the Superintendent or Board in the determination.

(11) The Board's decision described in Subsection (9) is final and no further appeals are provided.

R277-407-17. Enforceable Date.

(1) This rule will be enforceable beginning January 1, 2020.

KEY: education, school fees
October 8, 2019 **Art X Sec 2**
Notice of Continuation July 19, 2017 **Art X Sec 3**
53E-3-401(4)
53G-7-503
Doe v. Utah State Board of Education, Civil No. 920903376

R277. Education, Administration.
R277-468. Parent/Guardian Review of Public Education Curriculum and Review of Complaint Process.
R277-468-1. Definitions.

A. "Board" means the Utah State Board of Education.

B. "Instructional materials" means systematically arranged content in text or digital format which may be used within the state curriculum framework for grade levels or courses of study by students in public schools including text books, workbooks, computer software, online or Internet courses, CDs or DVDs and multiple forms of communication media. Such materials may be used by students or teachers or both as principal sources of study to cover any portion of the grade level or course. These materials:

(1) shall be designed for student use;

(2) may be accompanied by or contain teaching guides and study helps;

(3) shall include all text books, workbooks and student materials and supplements necessary for a student to fully participate in coursework; and

(4) shall be high quality, research-based and prove to be effective in supporting student learning.

C. "LEA" means a local education agency, including local school boards/public school districts, charter schools, and, for purposes of this rule, the Utah Schools for the Deaf and the Blind.

D. "Parent or guardian" means the individual that establishes the residency of the child under Sections 53G-6-302, 53G-6-303, or 53G-6-402 or another applicable Utah guardianship provision.

E. "Primary instructional materials" means comprehensive or basal Core textbook or integrated instructional program for which a publisher seeks a recommendation for Core subjects as outlined in Sections R277-700-4, 5 or 6.

R277-468-2. Authority and Purpose.

A. This rule is authorized under Utah Constitution Article X, Section 3 which vests general control and supervision over public education in the Board, Subsections 53E-3-401(1)(b) and (c) which require the Board to establish rules regarding competency levels, graduation requirements, school accreditation, curriculum and instruction requirements, and school libraries, and Subsection 53E-3-401(3) which allows the Board to adopt rules in accordance with its responsibilities.

B. The purpose of this rule is to direct LEAs, consistent with the Board's responsibility to involve parents in the adoption and review of LEA primary instructional materials to support Utah Core Standards, and to include parents in reviewing complaints specific to primary curriculum materials.

R277-468-3. LEA Board Responsibilities.

A. Each LEA shall involve parents who have students who attend LEA schools and instructional staff in the consideration of LEA-purchased instructional materials.

B. Each LEA shall include parents in reviewing complaints specific to primary curriculum materials.

C. LEAs may seek assistance from parent organizations or associations or other groups to recruit and select parent members for materials and complaint reviews.

R277-468-4. USOE Responsibilities.

A. The USOE shall develop and make readily available to LEAs suggestions for effective parent participation in the instructional materials review process and the complaint review process.

B. The USOE shall assist LEAs in policy development, upon request and to the extent of resources available.

KEY: parent/guardian, committees, curriculum, complaints

March 10, 2015 **Art X Sec 3**
Notice of Continuation October 7, 2019 **53E-3-401(1)(b)**
53E-3-401(1)(c)
53E-3-401(3)

R277. Education, Administration.
R277-474. School Instruction and Sex Education.
R277-474-1. Authority and Purpose.

(1) This rule is authorized by:

(a) Utah Constitution, Article X, Section 3, which vests general control and supervision over public education in the Board;

(b) Subsections 53G-10-402(2), (4) and (5), which direct the Board to adopt rules to allow local boards to adopt sex education materials or programs as described in this Rule R277-474 and provide sex education instruction as provided in Section 53G-10-402; and

(c) Subsection 53E-3-401(4), which allows the Board to make rules to execute the Board's duties and responsibilities under the Utah Constitution and state law.

(2) The purpose of this rule is to provide:

(a) requirements for LEAs and individual educators to select instructional materials about sex education and maturation;

(b) notice to parents of proposed sex education and maturation discussions and instruction; and

(c) direction to public education employees regarding instruction and discussion of maturation and sex education with students.

R277-474-2. Definitions.

(1) "Curriculum materials review committee" or "committee" means a curriculum materials review committee formed at the school district or charter school level as described in Section R277-474-5.

(2) "Family Educational Rights and Privacy Act of 1974, 20 U.S.C. 1232g" or "FERPA" means a federal law designed to protect the privacy of students' education records.

(3) "Sex education instruction or instructional programs" means any course, unit, class, activity or presentation that provides instruction or information to students as outlined under Section 53G-10-403(1)(a).

(4) "Instructional materials commission" means the advisory commission authorized under Section 53E-4-402.

(5) "LEA" for purposes of this rule, includes the Utah Schools for the Deaf and the Blind.

(6) "Maturation education" means instruction and materials used to provide fifth or sixth grade students with age appropriate, medically accurate information regarding the physical and emotional changes associated with puberty, to assist in protecting students from abuse and to promote hygiene and good health practices.

(7) "Medically accurate" means verified or supported by a body of research conducted in compliance with scientific methods and published in journals that have received peer-review, and recognized as accurate and objective by professional organizations and agencies with expertise in the relevant field, such as the American Medical Association.

(8) "Parental notification form" means a form developed by the Superintendent and used exclusively by LEAs or public schools for parental notification of subject matter identified in this rule.

(9) "Professional development" means training in which Utah educators may participate to renew a license, receive information or training in a specific subject area, teach in another subject area or teach at another grade level.

(10) "Utah educator" means an individual such as an administrator, teacher, counselor, teacher's assistant, or coach, who is employed by a unit of the Utah public education system and who provides teaching or counseling to students.

(11) "Utah Professional Practices Advisory Commission" or "UPPAC" means a Commission established under Section 53E-6-501 and designated to review allegations against educators and recommend action against educators' licenses to the Board.

R277-474-3. General Provisions.

(1) The following may not be taught in Utah public schools through the use of instructional materials, direct instruction, or online instruction:

(a) the intricacies of intercourse, sexual stimulation or erotic behavior;

(b) the advocacy of premarital or extramarital sexual activity; or

(c) the advocacy or encouragement of the use of contraceptive methods or devices.

(2) A Utah educator may provide instruction consistent with Subsection 53G-10-402(2)(b)(iv);

(3) A Utah educator is responsible to teach the values and information identified under Subsection 53G-10-402(2)(a)and (b)(i)-(ii).

(4) A Utah educator shall follow all provisions of federal and state law including the parental notification and prior written parental consent requirements described in Sections 76-7-322 and 76-7-323 when teaching any aspect of sex education.

(5) While sex education instruction and related topics are most likely to take place in such courses as health education, health occupations, human biology, physiology, parenting, adult roles, psychology, sociology, child development, and biology, this Rule R277-474 applies to any course or class in which these topics are the focus of discussion.

R277-474-4. State Board of Education Responsibilities.

The Superintendent shall:

(1) develop and provide professional development and assistance with training for educators on law and rules specific to sex education instruction and related issues.

(2) develop, for Board approval, a parental notification form and timelines for use by LEAs.

(3) establish a review process for sex education instructional materials and programs using the instructional materials commission and requiring final Board approval of the instructional materials commission's recommendations.

(4) approve only medically accurate sex education instruction programs.

(5) receive and track parent and community complaints and comments received from LEAs related to sex education instructional materials and programs.

R277-474-5. LEA Responsibilities.

(1) An LEA shall require all newly hired or newly assigned Utah educators with responsibility for any aspect of sex education instruction to attend professional development outlining the sex education curriculum and the criteria for sex education instruction in any courses offered in the public education system.

(2) An LEA governing board shall provide training consistent with Subsection R277-474-5(1) at least once during every three years of employment for Utah educators.

(3) An LEA governing board shall form a curriculum materials review committee at the school district or charter school level as described in Subsection (4).

(4)(a) An LEA governing board shall annually appoint and review members of the LEA's curriculum materials review committee on or before August 1.

(b) An LEA's curriculum materials review committee shall include parents, health professionals, school health educators, and administrators, with at least as many parents as school employees.

(c) The members of an LEA's committee shall:

(i) meet on a regular basis, as determined by the membership;

(ii) select officers; and

(iii) comply with Title 52, Chapter 4, Open and Public Meetings Act.

(5) An LEA's curriculum materials review committee shall:

(a) be organized consistent with Subsection R277-474-2(1);

(b) designate a chair and procedures; and

(c) review and approve all guest speakers and guest presenters and their respective materials relating to sex education instruction in any course and maturation education prior to their presentation.

(6) The committee may not authorize the use of any sex education instructional program or maturation education program not previously:

(a) approved by the Board;

(b) approved consistent with R277-474-6; or

(c) approved under Subsections 53G-10-402(2)(f) and (g).

(7) The district superintendent or charter school administrator shall report educators who willfully violate the provisions of this rule to the Utah Professional Practices Advisory Commission (UPPAC) for investigation and possible discipline.

(8)(a) A student may not participate in sex education instruction, maturation education, or other instructional programs without prior affirmative parent consent, as evidenced by a completed parental notification form, on file.

(b) An LEA shall obtain parental consent from a student's parent using the common parental notification form or a form that satisfies all criteria of the law and Board rules and comply with timelines approved by the Board.

(9) The parental notification form shall:

(a) explain a parent's right to review proposed curriculum materials in a timely manner;

(b) request the parent's permission to instruct the parent's student in identified course material related to sex education or maturation education;

(c) allow the parent to exempt the parent's student from attendance for a class period where identified course material related to sex education instruction or maturation education is presented and discussed;

(d) be specific enough to give parents fair notice of topics to be covered;

(e) include a brief explanation of the topics and materials to be presented and provide a time, place and contact person for review of the identified curricular materials;

(f) be retained on file with affirmative parental consent for each student prior to the student's participation in discussion of issues protected under Section 53G-10-402; and

(g) be maintained at the student's school for a reasonable period of time.

(10) An LEA shall develop a logging and tracking system of parental and community complaints and comments resulting from student participation in sex education instruction, to include the disposition of the complaints, and provide that information to the Superintendent upon request.

(11) If a student is exempted from course material required by the Board-approved Core Standards consistent with Section 53G-10-205(1), (2), and (3), the school shall:

(a) waive the participation requirement; or

(b) provide a reasonable alternative to the requirement.

R277-474-6. Local School Board or Charter School Governing Board Adoption of Sex Education and Maturation Education Instructional Materials.

(1) An LEA governing board may adopt the LEA's instructional materials if the instructional materials meet the requirements of Subsection 53G-10-402(2).

(2) Instructional materials adopted as described in Subsection (1) shall:

(a) comply with the criteria of Subsection 53G-10-402(2)(h) and:

(b) be medically accurate;

(c) be approved by a majority vote of the LEA governing board present at a public meeting of the LEA governing board;

(d) be available for reasonable review opportunities to residents of the school district or parents of charter school students prior to consideration for adoption; and

(e) comply with the county data review requirements as outlined in Subsection 53G-10-402(8).

(3) An LEA shall comply with the reporting requirements of Section 53G-10-402.

(4) A report to the Board shall include:

(a) a copy of sex education instructional materials or maturation education materials not approved by the Instructional Materials Commission that the local board or local charter board seeks to adopt;

(b) documentation of the materials' adoption in a public board meeting;

(c) documentation that the materials or program meets the medically accurate criteria as defined in Subsection R277-474-2(7);

(d) documentation of the recommendation of the materials by the committee; and

(e) a statement of the local board's or local charter board's rationale for selecting materials not approved by the instructional materials commission.

(5) An LEA governing board's adoption process for sex education instructional materials and maturation education materials shall include:

(a) an appeals process for the adopted materials; and

(b) a process for annual review of the LEA governing board's decision.

R277-474-7. Utah Educator Responsibilities.

(1) A Utah educator shall participate in training provided under Subsections R277-474-5(1) and (2).

(2) A Utah educator shall use the common parental notification form or a form approved by the Utah educator's LEA, and follow timelines approved by the Board.

(3) A Utah educator shall individually record parent and community complaints, comments, and the Utah educators' responses regarding sex education instructional programs.

(4) A Utah educator may respond to spontaneous student questions for the purposes of providing accurate data or correcting inaccurate or misleading information or comments made by students in class regarding sex education.

KEY: health education, sex education, schools
October 8, 2019 Art X Sec 3
Notice of Continuation September 13, 2017 53G-10-402(1) and (3)
53E-3-401(4)

R277. Education, Administration.
R277-504. Early Childhood, Elementary, Secondary, Special Education (K-12), and Preschool Special Education (Birth-Age 5) Licensure.
R277-504-1. Authority and Purpose.

(1) This rule is authorized by:

(a) Utah Constitution Article X, Section 3, which vests the general control and supervision of the public schools in the State Board of Education;

(b) Subsection 53E-3-501(1)(a), which directs the Board to make rules regarding the licensing of educators; and

(c) Subsection 53E-3-401(4), which allows the Board to make rules to execute the Board's duties and responsibilities under the Utah constitution and state law.

(2) The purpose of this rule is to:

(a) specify the requirements for Early Childhood (K-3),

Elementary (K-6), Elementary (1-8), Secondary (6-12), Special Education (K-12), and Preschool Special Education (Birth-Age 5) licensing; and

(b) specify the standards which the Board expects a teacher preparation institution to meet in specific areas for the institution to receive Board approval of the program.

R277-504-2. Definitions.

(1)(a) "Council for Exceptional Children" or "CEC" is an international professional organization dedicated to improving the educational success of both individuals with disabilities and individuals with gifts and talents.

(b) CEC advocates for appropriate governmental policies, sets professional standards, provides professional development, advocates for individuals with exceptionalities, and helps professionals obtain conditions and resources necessary for effective professional practice.

(2)(a) "Early Childhood license area of concentration" means an Early Childhood Education teaching license required for teaching kindergarten and permitting assignment in kindergarten through grade three.

(b) An early childhood license area of concentration is recommended for those teaching in formal public school programs below kindergarten level.

(3)(a) "Early intervention credential" is the highest qualified personnel standard established by the Department of Health that persons shall meet to be able to provide services to infants and toddlers with disabilities age 0-3 in early intervention settings.

(b) In order to provide services to infants and toddlers with disabilities age 0-3 in early intervention settings, an individual shall have an Early Intervention Credential or a Preschool Special Education (Birth- Age 5) license.

(4) "Elementary (1-8) license area of concentration" means an elementary teaching license required for teaching grades one through eight.

(5) "Elementary (K-6) license area of concentration" means an elementary teaching license required for teaching grades kindergarten through six.

(6) "Endorsement" means a specialty field or area listed on the teaching license which indicates the specific qualification of the holder.

(7) "Highest requirements in the State applicable to a specific profession or discipline" means the highest entry-level academic degree needed for any State-approved or State-recognized certification, license, registration, or other comparable requirement that applies to that profession or discipline.

(8)(a) "Internship" means the placement of a teacher education student in an advanced stage of preparation, as a culminating experience, in employment in a school setting for a period of up to one school year during which the intern shall receive salary proportionate to the service rendered as determined by the LEA.

(b) An intern is supervised primarily by the school system but with a continuing relationship with college personnel and following a planned program designed to produce a demonstrably competent professional.

(9) "Level 1 license" means a Utah professional educator license issued upon completion of an approved preparation program or an alternative preparation program, or pursuant to an agreement under the NASDTEC Interstate Contract, to applicants who have also met all ancillary requirements established by law or rule.

(10) "Level 2 license" means a Utah professional educator license issued by the Board after satisfaction of:

(a) all requirements for a Level 1 license;

(b) satisfaction of requirements under R277-522 for teachers whose employment as a Level 1 licensed educator began after January 1, 2003 in a Utah public LEA or accredited private school;

(c) at least three years of successful education experience in a Utah public LEA or accredited private school or one year of successful education experience in a Utah public LEA or accredited private school and at least three years of successful education experience in a public LEA or accredited private school outside of Utah; and

(d) additional requirements established by law or rule.

(11) "Preschool Special Education (Birth-Age 5) license area of concentration" means a teaching license required for teaching preschool students with disabilities.

(12)(a) "Secondary license area of concentration" means a secondary teaching license required for teaching grades six through twelve.

(b) Secondary license areas carry endorsements for the areas in which the holder is qualified to provide instruction.

(13)(a) "Special Education license area of concentration (K-12)" means a special education teaching license required for teaching students with disabilities in kindergarten through grade twelve.

(b) Special Education areas of concentration carry endorsements in at least one of the following areas:

(i) Mild/Moderate Endorsement, which indicates that the holder's preparation focused on teaching students with mild/moderate learning and behavior problems;

(ii) Severe Endorsement, which indicates that the holder's preparation focused on teaching students with severe learning and behavior problems;

(iii) Deaf and Hard of Hearing Endorsement, which indicates that the holder's preparation focused on teaching students who are deaf or other hearing impaired;

(iv) Blind and Visually Impaired Endorsement, which indicates that the holder's preparation focused on teaching students who are blind or other visually impaired; and

(v) Deafblind Endorsement, which indicates that the holder's preparation focused on teaching students who are both blind or other visually impaired and deaf or other hearing impaired.

(14) "Student teaching" means the placement of a teacher education student in an advanced stage of preparation for a period of guided teaching in a school setting during which the student assumes increasing responsibility for directing the learning of a group or groups of students over a period of time.

R277-504-3. General Standards for Approval of Programs for the Preparation of Teachers.

(1) The Board may approve the educator preparation program of an institution if the institution:

(a) prepares candidates to meet the Utah Effective Teaching Standards in R277-530;

(b) prepares candidates to teach the Utah Core Standards, the Utah Early Childhood Core Standards, and the Essential Elements as appropriate to the area of licensure as established by the Board;

(c) requires candidates to maintain a cumulative university GPA of 3.0 and receive a C or better in all education related courses and major required content courses:

(d) requires the study of:

(i) content and content-specific pedagogy appropriate for the area of licensure;

(ii) knowledge and skills designed to assist in the identification of students with disabilities and to meet the needs of students with disabilities in the regular classroom. Knowledge and skills shall include the following domains:

(A) knowledge of disabilities under IDEA and Section 504 of the Rehabilitation Act;

(B) knowledge of the role of non-special-education teachers in the education of students with disabilities;

(C) skills in providing tier one instruction on the Utah Core Standards and positive behavior supports to students with disabilities within a multi-tiered system of supports including:

(I) assessing and monitoring the education needs and progress of students with disabilities;

(II) implementing and assessing the results of interventions; and

(III) skills in the implementation of an educational program with accommodations and modifications established by an IEP or 504 plan for students with disabilities in the regular classroom; and

(iii) knowledge and skills designed to meet the needs of diverse student populations in the regular classroom. These skills for diverse student populations shall include the skills to:

(A) allow teachers to create an environment using a teaching model that is sensitive to multiple experiences and diversity;

(B) design, adapt, and deliver instruction to address each student's diverse learning strengths and needs; and

(C) incorporate tools of language development into planning and instruction for English language learners and support development of English proficiency; and

(e) requires a student teaching culminating experience that:

(i) requires a minimum of 400 clock hours with at least 200 clock hours in a single placement;

(ii) requires that student teachers meet the same contract hours as licensed teachers in the same LEA;

(iii) requires that the student teacher not be employed in any capacity by the LEA where he is placed except as provided in R277-504-7(3);

(iv) includes placement in all content or licensure areas in which the candidate shall be licensed unless:

(A) no viable student teaching placement in one or more of the candidate's endorsement areas is available; or

(B) the candidate is seeking a license in Elementary (1-8) and is completing an elementary student teaching placement, but has also completed the USOE course requirements for an endorsement;

(v) includes intermittent supervision and evaluation by institution personnel;

(vi) includes direct supervision of the candidate by a classroom teacher that:

(A) has been jointly selected by the institution student teaching placement officer and the LEA-designated authority over student teaching placement;

(B) has been deemed effective by an evaluation system meeting the standards of R277-531 or the LEA's equivalent; and

(C) has received training from the institution on the role and responsibilities of a classroom mentor teacher for student teachers, including the standards of R277-515;

(vii) include meaningful self-reflection with review and feedback from both the classroom mentor teacher and institution personnel; or

(f) Requires an internship culminating experience that:

(i) consists of full-time employment as an educator for one school year with a minimum of 1260 clock hours at a single school site;

(ii) requires that interns meet the same contract teaching hours as licensed teachers in the same LEA;

(iii) includes placement in the major content or licensure area in which the candidate shall be licensed;

(iv) where possible, includes placement in all content or licensure areas in which the candidate shall be licensed unless:

(A) no viable internship in one or more of the candidate's non-major endorsement areas could be found; or

(B) the candidate is seeking licensure in Elementary (1-8) and is completing an elementary internship, but has also completed the USOE course requirements for an endorsement;

(v) includes intermittent supervision and evaluation by institution personnel;

(vi) includes an LEA assigned mentor that:

(A) has been jointly selected by the institution internship placement officer and the LEA-designated authority over internship placement;

(B) has been deemed effective by an evaluation system meeting the standards of R277-531 or the LEA's equivalent; and

(C) provides direct support and supervision to the intern during the regular school day in addition to the standard LEA supports of new teachers.

(vii) includes meaningful self-reflection with review and feedback from both the assigned mentor and institution personnel;

(2) The Board may accept the following for an individual candidate as completely or partially satisfying the student teaching/internship requirement:

(a) one year of full-time contract teaching experience in a teaching position in a public or accredited private school in the candidate's proposed licensure content areas may completely satisfy the requirement;

(b) teaching in a preschool or Headstart program may be accepted for up to one-half of the student teaching requirement;

(c) teaching experience in business or industry may be accepted for up to one-half of the student teaching requirement; and

(d) other experience accepted by the Board and designated as totally or partially fulfilling the requirement.

R277-504-4. Early Childhood Education (K-3) and Elementary (K-6) License Areas.

(1) The Board may approve the Early Childhood Education (K-3), Elementary (K-6), or Elementary (1-8) teacher preparation program of an institution if the program:

(a) is aligned with:

(i) the 2010 National Association for the Education of Young Children Standards for Initial and Advanced Early Childhood Professional Preparation Programs; or

(ii) the 2007 Association for Childhood Education International Standards for Elementary Level Teacher Preparation, as appropriate;

(b) requires study and experiences which provide appropriate content knowledge needed to teach:

(i) literacy including listening, speaking, writing, and reading;

(ii) mathematics;

(iii) physical and life science;

(iv) health and physical education;

(v) social studies; and

(vi) fine arts; and

(c) includes coursework specifically designed to prepare teachers:

(i) in the science of reading instruction including phonemic awareness, phonics, fluency, vocabulary and comprehension;

(ii) in the science of mathematics instruction including quantitative reasoning, problem solving, representation, and numeracy;

(iii) with the technical skills to utilize common education technology;

(iv) to integrate technology to support and meaningfully supplement the learning of students;

(v) to facilitate student use of software for personalized learning;

(vi) to teach effectively in traditional, online-only, and blended classrooms;

(vii) to design, administer, and review educational assessments in a meaningful and ethical manner;

(viii) in early childhood development and learning, if it is an Early Childhood Education (K-3), or Elementary (K-6); and

(ix) in a specific content area resulting in an endorsement added to the license area, if it is an Elementary (1-8) program.

(2) The program shall apply the standards to the specific age group or grade level for which the program of preparation is designed.

(a) An Early Childhood Education (K-3) program shall focus primarily on early childhood development and learning.

(b) An Elementary (K-6) program shall include both early childhood development and learning and elementary content and pedagogy.

(c) An Elementary (1-8) program shall focus primarily on elementary content and pedagogy.

(3) A teacher holding an Elementary (1-8) license area may earn an Early Childhood (K-3) license area by completing specific coursework requirements established by the Superintendent.

(4) An Elementary (1-8) license permits the teacher to teach in any academic area in self-contained classes in grades 1-8.

(5) An Elementary (1-8) license permits the teacher to teach specific content courses at the 7th or 8th grade level only if the teacher's license includes the appropriate endorsement.

R277-504-5. Secondary (6-12) License Area.

(1) A Secondary (6-12) license area with an endorsement is valid in grades six through twelve.

(2) A Secondary (6-12) license area requires a major or major equivalent in a content area, but the teacher cannot teach in an elementary self-contained class.

(3) The Board may approve the secondary educator preparation program of an institution if the program:

(a) is an undergraduate level program and requires candidates to have completed:

(i) an approved content area or teaching major consistent with subjects taught in Utah secondary schools; and

(ii) content coursework reasonably equivalent to that required for individuals completing a non-teaching degree in the subject; or

(b) Is a graduate level program and requires candidates to have completed:

(i) a bachelor's degree or higher from an accredited university; and

(ii) coursework equivalent to the minimum requirements for an endorsement as established by the Superintendent, including the appropriate content knowledge assessment; and

(c) includes coursework specifically designed to prepare candidates:

(i) with the technical skills necessary to utilize common education technology;

(ii) to integrate technology to support and meaningfully supplement the learning of students;

(iii) to facilitate student use of software for personalized learning;

(iv) to teach effectively in traditional, online-only, and blended classrooms;

(v) to design, administer, and review educational assessments in a meaningful and ethical manner; and

(vi) to include literacy and quantitative learning objectives in content specific classes in alignment with the Utah Core Standards.

(4) After completing a Board-approved Secondary (6-12) educator preparation program, the license area shall be endorsed for all subjects in which the candidate has met the course requirements for an endorsement as established by the Superintendent.

(5) A content area or teaching major require not fewer than 30 semester hours of credit in one content area.

(6) An endorsement requires not fewer than 16 semester hours of credit in one content area.

R277-504-6. Special Education (K-12+) and Preschool Special Education (Birth-Age 5) License Areas.

(1) The Board may approve an institution's special education teacher preparation program if the program is aligned with the 2011 Council for Exceptional Children Special Education Standards for Professional Practice and is focused in one or more of the following special education areas:

(a) Mild/Moderate Disabilities

(b) Severe Disabilities

(c) Deaf and Hard of Hearing;

(d) Blind and Visually Impaired;

(e) Deafblind; or

(f) Preschool Special Education (Birth-Age 5).

(2) The Board may issue additional endorsements to teachers who hold Special Education (K-12+) license areas if all endorsement requirements are met.

(3) A teacher who holds only a Special Education (K-12+) license area may only be assigned as a teacher of record of students with disabilities.

(4) The Board may approve a special education preparation program of an institution if the program includes coursework specifically designed to train candidates to:

(a) understand the legal and ethical issues surrounding special education;

(b) comply with IDEA and Utah State Board of Education Special Education Rules;

(c) work with other school personnel to implement and evaluate academic and positive behavior supports and interventions for students with disabilities within a multi-tiered system of supports;

(d) train and monitor education teachers, related service providers, and paraeducators in providing services and supports to students with disabilities;

(e) provide the necessary specialized instruction, as per IEPs, to students with disabilities, including:

(i) core content from the Utah Early Childhood Core Standards, the Essential Elements, and content specific pedagogy;

(ii) skills in assessing and addressing the educational needs and progress of students with disabilities;

(iii) skills in implementing and assessing the results of research and evidence-based interventions for students with disabilities; and

(iv) skills in the implementation of an educational program with accommodations and modifications established by an IEP for students with disabilities.

(5) The Board may issue Blind and Visually Impaired/Deaf and Hard of Hearing endorsements required under this rule to meet the highest requirements in the State applicable to a specific profession or discipline required by the IDEA.

(6) Preschool Special Education (Birth-Age 5) license holders who teach children who are hearing impaired (Birth-Age 5) or vision impaired (Birth-Age 5), or both, in self-contained, categorical classrooms shall hold an endorsement for Deaf and Hard of Hearing (Birth-Age 5) or Blind and Visually Impaired (Birth-Age 5), or both.

R277-504-7. Miscellaneous.

(1) An LEA that employs intern teachers shall have a policy that includes the following:

(a) the maximum number of interns that may be supported by each LEA assigned mentor; and

(b) a specific resource commitment to significant and quality LEA support services to interns.

(2)(a) A Middle Level license (5-9) continues to be valid

(b) A Middle Level license (5-9) is no longer required of teachers or issued to teachers assigned to a middle school.

(3) Consistent with LEA and university policy and R277-

508-4(4), a student teacher may work as a paid substitute in the classroom of the student teacher's classroom mentor teacher for no more than five days and no more than three consecutive days per university semester.

(4) On the days a student teacher is working as a substitute teacher, the candidate's legal status as a substitute teacher/district employee will take precedence over the legal status as a teacher candidate.

(5) A student teaching placement may be changed to an internship placement upon agreement of the student teacher, the university program, and the LEA.

R277-504-8. Sunset Clause.

(1) This rule will sunset on June 30, 2020.

(2) An individual enrolled in an approved preparation program prior to January 1, 2020 may receive a professional license by completing the program approved in accordance with this rule.

KEY: accreditation, teacher licensing, professional education

October 8, 2019	**Art X Sec 3**
Notice of Continuation August 6, 2019	**53E-3-501(1)(a)**
	53E-3-401(4)

R277. Education, Administration.
R277-607. Truancy Prevention.
R277-607-1. Authority and Purpose.

(1) This rule is authorized by:

(a) Utah Constitution Article X, Section 3 which vests general control and supervision over public education in the Board;

(b) Subsection 53E-3-401(4), which allows the Board to make rules to execute the Board's duties and responsibilities under the Utah Constitution and state; and

(c) Section 53G-6-206, which directs educational entities and parents working on behalf of children to make efforts to resolve school attendance problems of school-age minors who are or who should be enrolled in an LEA.

(2) The purpose of this rule is to direct an LEA to create policies for truancy procedures and compulsory education.

R277-607-2. Definitions.

(1) "Absence" means the same as that term is defined in Subsection 53G-6-201(1).

(2) "Habitual truant" means the same as that term is defined in Subsection 53G-6-201(2).

(3) "Habitual truant citation" is a citation issued only consistent with Section 53G-6-203.

(4) "Truant" means the same as that term is defined in Subsection 53G-6-201(7).

(5) "Unexcused absence" means a student's absence from school for reasons other than those authorized under the LEA policy.

(6) "Valid excuse" means the same as that term is defined in Subsection 53G-6-201(9).

R277-607-3. Truancy Policy Requirements.

(1) An LEA shall:

(a) develop a truancy policy that encourages regular, punctual attendance of students, consistent with Section 53G-8-211 and Title 53G Public Education System -- Local Administration, Chapter 6 Participation in Public Schools, Part 2 Compulsory Education;

(b) review the LEA's truancy policy annually;

(c) review attendance data annually and consider revisions to the truancy policy to encourage student attendance; and

(d) make the truancy policy available for review by parents or interested parties.

(2) An LEA may issue a habitual truant citation to a student consistent with the LEA's truancy policy and Section 53G-6-203.

R277-607-4. Compulsory Education Procedures.

(1) An LEA shall develop compulsory education procedures as part of the LEA's truancy policy described in Section R277-607-3.

(2) The compulsory education procedures shall:

(a) provide a process for notice to parents about the truancy policy;

(b) require notice to parents regarding the progress of a student's discipline and consequences for violation of the truancy policy;

(c) provide an appeals process to contest:

(i) a notice of truancy; or

(ii) any disciplinary actions against a student pursuant to the truancy policy or;

(d) establish definitions not provided in law or this rule necessary to implement the truancy policy and compulsory education procedures;

(e) include definitions of "approved school activity" under Subsection 53G-6-201(9)(c) and "any other excuse" under Subsection 53G-6-201(9)(e);

(f) include criteria and procedures for preapproval of extended absences consistent with Section 53G-6-205; and

(g) establish programs and meaningful incentives which promote regular, punctual student attendance.

(3) An LEA shall publish the appeals process described in Subsection R277-607-4(2)(c) for use by a student or the student's parents.

KEY: compulsory education, truancy

October 8, 2019	**Art X Sec 3**
Notice of Continuation August 6, 2019	**53E-3-401(4)**
	53G-6-206

R277. Education, Administration.
R277-704. Financial and Economic Literacy: Integration into Core Curriculum.
R277-704-1. Authority and Purpose.

(1) This rule is authorized by:

(a) Utah Constitution Article X, Section 3 which vests general control and supervision over public education in the Board;

(b) Subsection 53E-3-401(4), which allows the Board to make rules to execute the Board's duties and responsibilities under the Utah Constitution and state;

(c) Section 53E-3-505, which directs the Board to work with financial and economic experts and private and non-profit entities to develop and integrate financial and economic literacy and skills into the public school curriculum at all appropriate levels.

(2) The purpose of this rule is:

(a) to provide funds appropriated by the Legislature to develop and integrate financial and economic literacy concepts effectively into the core curriculum in various programs and at various grade levels;

(b) to provide for educator professional development using business and community expertise;

(c) to provide curriculum resources and assessments for financial and economic literacy;

(d) to provide simple and consistent messaging to students that becomes part of the core curriculum that reinforces the importance of financial and economic literacy for students and parents; and

(e) to help students and parents to locate and use school and community resources to improve financial and economic literacy among students and families.

R277-704-2. Definitions.

(1) "Content Specialist" means a licensed educator who provides instruction or specialized support for students and teachers in a school setting.

(2) "End of course assessment" means an online end of course assessment for students who take the general financial literacy course.

(3) "Endorsement" means the licensing document required by the board for teachers who teach general financial literacy.

(4) "Financial and economic literacy project" means a program or series of activities developed locally to implement financial and economic literacy education as described in Section 53E-3-505.

(5) "LEA" for purposes of this rule, includes the Utah Schools for the Deaf and the Blind.

(6) "Professional development" means locally or Board-approved education-related training or activities that enhance an educator's background.

R277-704-3. General Financial Literacy End of Course Assessment.

(1) The Superintendent shall provide an LEA with an end of course assessment for general financial literacy which shall be:

(a) administered to every student who takes the general financial literacy course;

(b) aligned with general financial literacy revised core standards and objectives; and

(c) measured and analyzed at the school, district, and state-wide levels.

R277-704-4. General Financial Literacy Teacher Endorsement.

(1) A Board licensed educator who teaches general financial literacy is required to have licensing, endorsements, and other credentials equal to other content specialists as described in Section R277-520-4.

(2) An educator's course work may be part of or in addition to course work and programs of study required for licensure by the Board consistent with R277-303.

R277-704-5. Financial and Economic Literacy Professional Development Opportunities.

(1) The Superintendent shall provide professional development for all areas of financial and economic literacy utilizing the expertise of community and business groups.

(2) Professional development activities shall:

(a) provide information about financial and economic literacy including personal finance and economic responsibility;

(c) provide resources for teaching financial and economic literacy without promoting specific products or businesses; and

(d) work with the Superintendent to develop strategies for promoting financial and economic literacy.

R277-704-6. Financial and Economic Literacy Taskforce.

(1) The financial and economic literacy taskforce shall have the membership and general responsibilities outlined in Subsection 53E-3-505(4).

(2) In addition to the responsibilities outlined in Subsection 53E-3-505(4), the financial and economic literacy taskforce shall:

(a) analyze data provided by the Superintendent that includes:

(i) aggregated-school level proficiency results from the end of course assessment;

(ii) general enrollment data;

(iii) assessment of general financial literacy education quality; and

(iv) other relevant data to inform strategies for strengthening financial literacy proficiency; and

(b) serve as the writing committee for the financial literacy course standards.

(3) Prior to final approval, the board shall fulfill all the requirements in Subsection 53E-4-202(4).

KEY: financial, economics, literacy

October 8, 2019	**Art X Sec 3**
Notice of Continuation November 5, 2018	**53G-3-505**
	53E-3-401(4)

R277. Education, Administration.
R277-706. Public Education Regional Service Centers.
R277-706-1. Authority and Purpose.

(1) This rule is authorized by:

(a) the Utah Constitution Article X, Section 3, which vests general control and supervision of public education in the Board;

(b) Subsection 53G-4-410(6), which directs the Board to make rules regarding eligible regional service center's; and

(c) Subsection 53E-3-401(4), which permits the Board to adopt rules in accordance with the Board's responsibilities.

(2) The purpose of this rule is:

(a) to provide definitions and procedures for school districts to form interlocal agreements; and

(b) to provide for distribution of legislative funds to eligible regional service centers by the Board.

R277-706-2. Definitions.

(1) "Eligible regional service center" has the same meaning as the term is defined in Section 53G-4-410.

R277-706-3. Eligible Regional Service Centers.

(1) Two or more school districts may enter into an interlocal agreement and form an eligible regional service center as described in Section 53G-4-410.

(2) An interlocal agreement described in Subsection (1) shall confirm or formalize a regional service center as described in Subsection 53G-4-410(4) as of the effective date of the agreement.

R277-706-4. Distribution of Funds.

(1) The Superintendent shall distribute funds, if provided by the Legislature, in equal amounts to each eligible regional service centerif the eligible regional service center:

(a) submits a request for funds; and

(b) satisfies all requirements established by the Board.

(2) The Superintendent shall provide notice to an eligible regional service center of the deadlines and requirements for a request for funds described in Subsection (1).

(3) Subject to legislative appropriation, the Superintendent shall distribute funds to an eligible regional service center after July 1 annually.

R277-706-5. Eligible Regional Service Center Responsibilities.

(1) An eligible regional service center shall submit an annual application for available funds to the Superintendent.

(2) An eligible regional service center's application for funds shall include:

(a) a copy of the eligible regional service center's completed interlocal agreement;

(b) a proposed budget and request for funds;

(c) a current external audit of the eligible regional service center's assets and liabilities;

(d) assurance, signed by all parties to the interlocal agreement, that the eligible regional service center will provide the eligible regional service center's records to the Superintendent upon request;

(e) an annual financial report from the previous fiscal year; and

(f) a plan for the use and distribution of the eligible regional service center's funds for the applicable fiscal year with specific attention to:

(i) the delivery of Utah Education Network and Telehealth services to the LEAs within the eligible regional service center; and

(ii) the delivery of education-related services.

(3) An eligible regional service center shall provide an annual performance report to the Superintendent and the Board , including the following information:

(a) the eligible regional service center's delivery of Utah Education and Telehealth Network services;

(b) the eligible regional service center's type, amount, and effectiveness of delivery of public and higher education related services; and

(c) the eligible regional service center's coordination of public and higher education related services.

KEY: eligible regional service centers

October 8, 2019	**Art X Sec 3**
Notice of Continuation August 6, 2019	**53G-4-410(6)**
	53E-3-401(4)

R277. Education, Administration.
R277-713. Concurrent Enrollment of Students in College Courses.
R277-713-1. Authority and Purpose.

(1) This rule is authorized by:

(a) Utah Constitution Article X, Section 3, which vests general control and supervision over public education in the Board;

(b) Subsection 53E-3-401(4), which allows the Board to make rules to execute the Board's duties and responsibilities under the Utah Constitution and state law; and

(c) Section 53F-2-409, which directs the Board to provide for the distribution of concurrent enrollment dollars in rule.

(2) The purpose of the concurrent enrollment program is to provide a challenging college-level and productive experience to eligible students, and to provide transition courses that can be applied to postsecondary education.

(3) The purpose of this rule is to specify the standards and procedures for concurrent enrollment courses and the criteria for funding appropriate concurrent enrollment expenditures.

R277-713-2. Definitions.

(1) "Concurrent enrollment" means a public high school student is enrolled in a course that satisfies both high school graduation requirements and qualifies for higher education credit at a USHE institution.

(2) "Concurrent enrollment program" or "program" means the program created in Section 53E-10-302 that receives funding in accordance with Section 53F-2-409, which allows students to participate in concurrent enrollment courses.

(3) "Master course list" means a list of approved courses, maintained by the Superintendent and USHE, which may be offered and funded through the concurrent enrollment program.

(4) "USHE" means the Utah System of Higher Education as described in Section 53B-1-102.

R277-713-3. Student Eligibility and Participation.

(1) A student participating in the program shall:

(a) be an "eligible student" as described in Subsection 53E-10-301(5); and

(b) have completed a concurrent enrollment participation form, including a parent permission form and acknowledgment of program participation requirements, as required in section 53E-10-304.

(2) Student eligibility requirements for the program shall be:

(a) established by an LEA and a USHE institution; and

(b) sufficiently selective to predict a successful experience for qualified students.

(3) An LEA has the primary responsibility for identifying a student who is eligible to participate in a concurrent enrollment class.

(4) To ensure that a student is prepared for college level work, an LEA shall appropriately evaluate the student's abilities prior to participation in concurrent enrollment courses, and to determine that the student meets prerequisites previously established for the same campus-based course by the sponsoring USHE institution.

R277-713-4. Course Credit and Offerings - Course Approval Process.

(1) Credit earned through a concurrent enrollment course:

(a) has the same credit hour value as when taught on a college campus;

(b) applies toward graduation on the same basis as a course taught at a USHE institution to which the credits are submitted;

(c) generates higher education credit that becomes a part of a student's permanent college transcript;

(d) generates high school credit that is consistent with the LEA policies for awarding credit for graduation; and

(e) is transferable from one USHE institution to another.

(2) A USHE institution is responsible to determine the credit for a concurrent enrollment course, consistent with State Board of Regents' policies.

(3) An LEA and a USHE institution shall provide the Superintendent and USHE with proposed new course offerings, including syllabi and curriculum materials, by November 15 of the year preceding the school year in which the courses would be offered.

(4) A concurrent enrollment course shall be approved by the Superintendent and USHE, and designated on the master course list, maintained by the Superintendent and USHE.

(5)(a) Concurrent enrollment course offerings shall reflect the strengths and resources of the respective schools and USHE institutions and be based upon student needs.

(b) The number of courses selected shall be kept small enough to ensure coordinated statewide development and professional development activities for participating teachers.

(6) To provide for the focus of energy and resources on quality instruction in the concurrent enrollment program, program courses shall be limited to courses in:

(a) English;
(b) mathematics;
(c) fine arts;
(d) humanities;
(e) science;
(f) social science;
(g) world languages; and
(h) career and technical education.

(7) A Technology-intensive concurrent enrollment (TICE) course is a hybrid course, having a blend of different learning activities, available both in the classroom and online, or may be delivered exclusively online.

(8) A concurrent enrollment course shall be a course at the 1000 or 2000 level in postsecondary education, except for a 3000-level accelerated foreign language course, which may be approved as a concurrent enrollment course for eligible students.

(9) A course may not be approved as a concurrent enrollment course if the course is:

(a) a high school course that is typically offered in grade 9 or 10; or

(b) a postsecondary course below the 1000 level.

(10) The appropriate USHE institution shall take responsibility for:

(a) course content;
(b) procedures;
(c) examinations;
(d) teaching materials; and
(e) program monitoring.

(11) Concurrent enrollment procedures and materials shall be:

(a) consistent with Utah law; and

(b) ensure quality and comparability with courses offered on a college or university campus.

R277-713-5. Program Management and Delivery.

(1)(a) Concurrent enrollment courses and curriculum may be provided through live classroom instruction or by other means, including electronic communications.

(b) An LEA and a USHE institution shall design and implement courses to take full advantage of the most currently available educational technology.

(2) An LEA shall use a Superintendent-designated 11-digit course code for a concurrent enrollment course.

(3) An LEA and a USHE institution shall jointly align information technology systems with all individual student

academic achievement data so that student information will be tracked through both education systems consistent with Section 53E-4-308.

R277-713-6. Faculty and Educator Requirements.

(1) An educator who is not employed by a USHE institution and teaches a concurrent enrollment course shall:

(a) be employed by an LEA; and

(b) meet the requirements of Subsections 53E-10-302(5) and (6).

(2) An educator employed by an LEA who teaches a concurrent enrollment course shall be approved as an adjunct faculty member at the contracting USHE institution prior to teaching the concurrent enrollment course.

(3) High school educators who hold adjunct or part time faculty status with a USHE institution for the purpose of teaching concurrent enrollment courses shall be included as fully as possible in the academic life of the supervising academic department at the USHE institution.

(4) An LEA and a USHE institution shall share expertise and professional development, as necessary, to adequately prepare a teacher to teach in the concurrent enrollment program, including federal and state laws specific to student privacy and student records.

(5) A USHE institution that employs a faculty member who teaches in a high school has responsibility for ensuring and maintaining documentation that the faculty member has successfully completed a criminal background check, consistent with Section 53G-11-402.

R277-713-7. Concurrent Enrollment Funding and Use of Concurrent Enrollment Funds.

(1) Program funds shall be allocated in accordance with Section 53F-2-409.

(2) Program funds allocated to LEAs may not be used for any other program or purpose, except as provided in Section 53F-2-206.

(3) Concurrent enrollment funding may not be used to fund a parent- or student-initiated college-level course at an institution of higher education.

(4) The Superintendent may not distribute concurrent enrollment funds to an LEA for reimbursement of a concurrent enrollment course:

(a) that is not on the master course list;

(b) for a student that has exceeded 30 semester hours of concurrent enrollment for the school year;

(c) for a concurrent enrollment course repeated by a student; or

(d) taken by a student:

(i) who has received a diploma;

(ii) whose class has graduated; or

(iii) who has participated in graduation exercises.

(5)(a) An LEA shall receive a pro-rated amount of the funds appropriated for concurrent enrollment according to the number of semester hours successfully completed by students registered through the LEA in the prior year compared to the state total of completed concurrent enrollment hours.

(b) Successfully completed means that a student received USHE credit for the course.

(6) An LEA's use of state funds for concurrent enrollment is limited to the following:

(a) aid in professional development of adjunct faculty in cooperation with the participating USHE institution;

(b) assistance with delivery costs for distance learning programs;

(c) participation in the costs of LEA personnel who work with the program;

(d) student textbooks and other instructional materials;

(e) fee waivers for costs or expenses related to concurrent enrollment for fee waiver eligible students under R277-407;

(f) purchases by LEAs of classroom equipment required to conduct concurrent enrollment courses; and

(g) other uses approved in writing by the Superintendent consistent with the law and purposes of this rule.

(7) An LEA that receives program funds shall provide the Superintendent with the following:

(a) end-of-year expenditures reports; and

(b) an annual report regarding supervisory services and professional development provided by a USHE institution.

(8) Appropriate reimbursement may be verified at any time by an audit.

R277-713-8. Student Tuition and Fees.

(1) A concurrent enrollment program student may be charged partial tuition and program-related fees, in accordance with Section 53E-10-305.

(2) Postsecondary tuition and participation fees charged to a concurrent enrollment student are not fees, as defined in R277-407, and do not qualify for a fee waiver under R277-407.

(3)(a) All costs related to concurrent enrollment classes that are not tuition and participation fees are subject to a fee waiver consistent with R277-407.

(b) Concurrent enrollment costs subject to fee waiver may include consumables, lab fees, copying, material costs, and textbooks required for the course.

(4)(a) Except as provided in Subsection (4)(b), an LEA shall be responsible for fee waivers.

(b) An agreement between a USHE institution and an LEA may address the responsibility for fee waivers.

R277-713-9. Annual Contracts and Other Student Instruction Issues.

(1) An LEA and a USHE institution that plan to collaborate to offer a concurrent enrollment course shall enter into an annual contract for the upcoming school year by no later than May 30.

(2) An LEA shall provide the Superintendent a copy of each annual contract entered into between the LEA and a USHE institution for the upcoming school year by no later than May 30.

(3) An LEA and a USHE institution shall use the standard contract language developed by the Superintendent and USHE.

KEY: students, curricula, higher education

October 8, 2019	**Art X Sec 3**
Notice of Continuation July 19, 2017	**53E-3-401(4)**
	53E-3-501(1)(c)
	53E-10-3

R277. Education, Administration.
R277-927. Teacher and Student Success Act (TSSA) Program.
R277-927-1. Authority and Purpose.

(1) This rule is authorized by:

(a) Utah Constitution Article X, Section 3, which vests general control and supervision of public education in the Board;

(b) Subsection 53E-3-401(4), which allows the Board to make rules to execute the Board's duties and responsibilities under the Utah Constitution and state law; and

(c) Section 53F-2-416, which requires the Board to calculate and distribute student and teacher success program money to LEAs;

(d) Section 53G-7-1304, which requires the Board to make rules for an LEA governing board to calculate and distribute a school's allocation of program money for each school within the LEA; and

(e) Section 53G-7-1306, which require the Board to determine:

(i) a threshold of points under the statewide school accountability system that designates a school as succeeding in school performance and student academic achievement; and

(ii) performance standards for certain schools.

(2) The purpose of this rule is to:

(a) set standards for the Board's distribution of student and teacher success program money to LEAs;

(b) set standards governing an LEA's distribution of student and teacher success program money to each school within the LEA; and

(c) to establish certain accountability standards related to the student and teacher success program.

R277-927-2. Definitions.

(1) As used in Subsection 53G-7-1304, "capital expenditures" are funds used to acquire, maintain, or upgrade physical assets like property, building, technology, or equipment and may include:

(a) improvements to a building or school grounds;

(b) a school bus;

(c) rent, lease, or bond payments; and

(d) a portable classroom or costs related to moving a portable classroom.

(2) "Program" means the student and teacher success program created in Section 53G-7-1302.

(3) "Satellite school" means the same as that term is defined in R277-550.

(4) "School personnel who work directly with and support students in an academic role" does not include:

(a) school level administrative or operational staff;

(b) building and maintenance staff, including custodial and grounds staff;

(c) transportation staff;

(d) child nutrition services staff;

(e) operational or facility support staff;

(f) financial staff;

(g) information technology staff;

(h) legal staff;

(i) secretarial staff; or

(j) other district level staff paid on an administrative salary schedule.

R277-927-3. Program Requirements and Board Distribution of Program Money.

(1)(a) For the 2019-20 school year, the Superintendent shall distribute an LEA's annual program allocation, in equal payment amounts, to an LEA once the LEA submits the LEA's student success framework through the Board's grant management system.

(b) If an LEA amends the LEA's student success framework, the LEA shall submit the amended student success framework through the Board's grant management system.

(2) Beginning with the 2020-21 school year, if the LEA previously submitted a student success framework, before the LEA receives the LEA's annual program allocation, the LEA shall submit annual assurances in accordance with the requirements of R277-108.

(3) If an LEA fails to submit the LEA's student success framework as described in Subsection (1) or annual assurances described in Subsection (2) to the Superintendent by November 1 of a fiscal year:

(a) the LEA may not receive a program allocation for that fiscal year; and

(b) the undistributed balance will be included with the new year appropriation and distributed in the following fiscal year according to the formula described in Subsection 53F-2-416(3).

(4) For purposes of calculating the formula described in Subsection 53F-2-416(3), "weighted pupil units" means:

(a) for a school district or charter school:

(i) the weighted pupil units for the current year budget request for the minimum school basic program; minus

(ii) the weighted pupil units allocated to LEAs for foreign exchange students; and

(b) for the Utah Schools for the Deaf and Blind, USDB's prior year October 1 headcount multiplied by two.

(5) For a new LEA or new charter satellite campus in the LEA or charter school satellite's second year of operation, the Superintendent shall increase or decrease the new LEA or charter school satellite's first year distribution of funds in the LEA or charter school satellite's second year to reflect the LEA or charter school satellite's actual first year October 1 counts.

(6) For purposes of determining whether a school district in a county of the first, second, or third class has an approved board local levy for the maximum amount allowed for the purposes described in Subsection 53G-7-1304(2)(c)(i)(A), the school district meets the property tax requirements of Subsection 53G-7-1304(2)(a)(i) if in the applicable fiscal year:

(a) the school district's rate imposed for the board local levy is equal to the maximum amount allowed under Section 53F-8-302; or

(b)(i) meets or exceeds an amount equal to the certified board local levy rate; and

(ii) the school district's board local levy rate equaled the maximum amount allowed under Section 53F-8-302 sometime within the prior five fiscal years.

(7) For purposes of determining whether a school district in a county of the first, second, or third class increased the school district's board local levy by at least .0001 per dollar of taxable value as described in Subsection 53G-7-1304(2)(c)(i)(B), a school district that does not meet the property tax requirements of Subsection (6), the school district meets the requirements of Subsection 53G-7-1304(2)(c)(i)(B) if the school district's board local levy rate for the current fiscal year is at least .0001 per dollar of taxable value more than the school district's board local levy rate imposed in the prior fiscal year.

(8) For fiscal year 2020, "state average teacher salary" means a weighted calculation of the statewide teacher salary expenditures reported on the annual financial report by LEA from fiscal year 2018 divided by the number of full-time equivalent educators or FTEs from the most recent educator cactus submission.

(9) Except as provided in Subsection (10), for fiscal year 2020, "LEA's average teacher salary" means the LEA's teacher salary expenditures reported on the annual financial report from fiscal year 2018 divided by the LEA's number of full-time equivalent educators or FTEs from the most recent educator cactus submission.

(10) For a new LEA in the new LEA's first or second year of operation, the new LEA's average teacher salary is equal to the state average teacher salary.

R277-927-4. LEA Financial Reporting and Prohibited Uses of Program Funds.

(1) An LEA shall report expenditures of program money by location according to the Board approved chart of accounts.

(2) An LEA may not use program money:

(a) for a purpose described in Subsection 53G-7-1304(1);

(b) to support adult education or preschool programs; or

(c) to pay for contracted services commonly performed by the following staff:

(i) school level administration staff;

(ii) building and maintenance staff, including custodial staff;

(iii) transportation staff;

(iv) child nutrition services staff;

(v) operational or facility support staff; or

(vi) district level staff.

(3) As used in Subsection 53G-7-1304(2), "district administration costs" does not include salary driven benefits for school personnel charged at the district level.

(4) An LEA may carry over restricted program funds into the next fiscal year to support a purpose identified by the LEA governing board student success framework. Any funds carried over must be reported according to the Board approved chart of accounts.

R277-927-5. LEA Allocations to Schools.

(1) An LEA with two or more schools shall establish a policy that defines how the LEA will calculate and distribute program allocations based on prior year average daily membership as determined by the Superintendent, to all schools within the LEA, including how the LEA will calculate allocations for new schools within the LEA.

(2) For a new school within an LEA, the LEA shall calculate and distribute school's allocation based on the school's projected October 1 headcount for the applicable school year.

(3) After calculating an LEA's school level allocations, an LEA may make adjustments to individual school ADM values and school level allocations due to changes in current year student enrollment for reasons including:

(a) changes in school boundaries;

(b) changes to feeder school patterns;

(c) changes in grade levels offered; or

(d) significant student growth of 30% or more.

R277-927-6. Accountability Performance Standards.

(1) For purposes of determining the threshold of points that designates a school as succeeding in school performance as described in Subsection 53G-7-1306(1)(a), a school is succeeding in school performance if, in the most recently published overall school accountability ratings the school is designated as a commendable or exemplary school as described in Section R277-497-2.

(2) For purposes of determining the performance standards for a school described in Section 53G-7-1306(1)(b), a school meets the performance standards if the school meets the criteria described in Section 53E-5-203(2).

KEY: Student and Teacher Success Act (TSSA), program money, allocation

October 8, 2019

Art X Sec 3
53E-3-401(4)
53F-2-416
53G-7-1304
53G-7-1306

R277. Education, Administration. **53F-5-212**
R277-928. High-Need Schools Grant.
R277-928-1. Authority and Purpose.

(1) This rule is authorized by:

(a) Utah Constitution Article X, Section 3, which vests general control and supervision over public education in the Board;

(b) Subsection 53E-3-401(4), which allows the Board to make rules to execute the Board's duties and responsibilities under the Utah Constitution and state law; and

(c) Section 53F-5-212, which establishes a grant to hire educators in high-need schools and directs the Board to make rules to govern the application process.

(2) The purpose of this rule is to provide:

(a) procedures for an LEA to apply for the High-Need Schools Grant; and

(b) criteria for determining if an elementary school is a high-need school.

R277-928-2. Definitions.

(1) "High-need school" means the same as the term is defined in Subsection 53F-5-212(1)(c).

(2) "Qualifying educator," except as provided in Subsection R277-928-4(2), means a first-year classroom teacher holding a professional educator license.

R277-928-3. Application Process.

(1) The Superintendent shall establish an application process for an LEA to apply for a high-need school grant.

(2) An LEA shall submit an application for the high-need school grant by November 30th annually.

(3) An LEA's application shall include acknowledgments that:

(a) the high-need school grant is for a single year only;

(b) the LEA shall match the grant amount in accordance with Subsection 53F-5-212(4)(b); and

(c) comply with the requirements of Subsection 53F-5-212(6).

(4) The Superintendent shall review an LEA's application based on October 1 enrollment data.

(5) The Superintendent shall:

(a) create a rubric to assign weight to the criteria outlined in Subsection 53F-5-212(5)(b); and

(b) assess low school performance to include the lowest ten percent of schools as evidenced by results from Board-approved standardized testing.

(6) The Superintendent shall select grantees by January 31st annually.

(7) An LEA shall submit the report required under Subsection 53F-5-212(6)(b) by June 30th annually.

(8) If an LEA that receives a high-need school grant is unable to fill a position with a qualifying educator or a funded educator leaves mid-year and the LEA is unable to fill the position with a qualifying educator:

(a) the LEA shall notify the Superintendent; and

(b) the LEA shall forfeit grant funds on a pro rata basis for the remainder of the school year.

R277-928-4. Grants for the 2019-20 School Year.

(1) The Superintendent shall establish an expedited process to take applications and award grant funds for the high-need school grant in the 2019-20 school year.

(2) A qualifying educator shall hold a Level 1 License for an LEA to qualify for a high-need school grant in the 2019-20 school year.

KEY: grant, high-need school
October 8, 2019 **Art X Sec 3**
53E-3-401(4)

R315. Environmental Quality, Waste Management and Radiation Control, Waste Management.
R315-260. Hazardous Waste Management System.
R315-260-1. Purpose, scope, and applicability.

(a) Rule R315-260 provides definitions of terms, general standards, and overview information applicable to Rules R315-260 through 265 and 268.

R315-260-2. Availability of Information and Confidentiality of Information.

(a) Any information provided to The Director under Rules R315-15 and 101; Rules R315-260 through 266, 268, 270 and 273 will be made available to the public to the extent and in the manner authorized by Sections 63G-2-101 through 901.

(b) Except as provided under Subsection R315-260-2(c) and (d), any person who submits information to the Director in accordance with Rules R315-15 and 101; Rules R315-260 through 266, 268, 270 and 273 may assert a claim of business confidentiality covering part or all of that information by following the procedures set forth in Section 63G-2-309. Information covered by such a claim shall be disclosed by the Director only to the extent, and by means of the procedures, set forth Sections 63G-2-101 through 901. However, if no claim under Sections 63G-2-101 through 804 accompanies the information when it is received by the Director, it may be made available to the public without further notice to the person submitting it.

(c)(1) After August 6, 2014, no claim of business confidentiality may be asserted by any person with respect to information entered on a Hazardous Waste Manifest, EPA Form 8700-22, a Hazardous Waste Manifest Continuation Sheet, EPA Form 8700-22A, or an electronic manifest format that may be prepared and used in accordance with Subsection R315-262-20(a)(3).

(2) EPA shall make any electronic manifest that is prepared and used in accordance with Subsection R315-262-20(a)(3), or any paper manifest that is submitted to the system under Subsection R315-264-71(a)(6) or Subsection R315-265-71(a)(6), available to the public under Section R315-260-2 when the electronic or paper manifest is a complete and final document. Electronic manifests and paper manifests submitted to the system are considered by EPA to be complete and final documents and publicly available information after 90 days have passed since the delivery to the designated facility of the hazardous waste shipment identified in the manifest.

(d)(1) After June 26, 2018, no claim of business confidentiality may be asserted by any person with respect to information contained in cathode ray tube export documents prepared, used and submitted under Subsections R315-261-39(a)(5) and 261-41(a), and with respect to information contained in hazardous waste export, import, and transit documents prepared, used and submitted under Sections R315-262-82, 262-83, 262-84, 263-20, 264-12, 264-71, 265-12, and 265-71, whether submitted electronically into EPA's Waste Import Export Tracking System or in paper format.

(2) EPA will make any cathode ray tube export documents prepared, used and submitted under Subsections R315-261-39(a)(5) and 261-41(a), and any hazardous waste export, import, and transit documents prepared, used and submitted under Sections R315-262-82, 262-83, 262-84, 263-20, 264-12, 264-71, 265-12, and 265-71 available to the public under Section R315-260-2 when these electronic or paper documents are considered by EPA to be final documents. These submitted electronic and paper documents related to hazardous waste exports, imports and transits and cathode ray tube exports are considered by EPA to be final documents on March 1 of the calendar year after the related cathode ray tube exports or hazardous waste exports, imports, or transits occur.

R315-260-4. References to Other Statutes and Regulations.

(a) Federal statutes and regulations that are cited in Rules R315-260 through 266, 268, 270, 273 and 124 that are not specifically adopted by reference shall be used as guidance in interpreting the Rules R315-260 through 266, 268, 270, 273 and 124.

(b) Any reference to the "Department of Transportation" or "DOT" in Rules R315-260 through 266, 268, 270, 273 and 124 shall mean the "U.S. Department of Transportation".

R315-260-5. Inspections.

Any duly authorized officer, employee or representative of the Department or the Director may, in accordance with Section 19-6-109, enter upon and inspect any property, premise, or place on or at which solid or hazardous wastes are generated, transported, stored, treated or disposed of for the purpose of ascertaining the compliance with Rules R315-15, R315-101, R315-124, R315-260 through 266, R315-268, R315-270, and R315-273. Inspectors may also inspect any waste and obtain samples thereof, including samples from any vehicle in which wastes are being transported or samples of any containers or labels. Inspectors may also have access to and the right to make copies of any records, either in hard copy or electronic format, relating to compliance with Rules R315-15, R315-101, R315-124, R315-260 through 266, R315-268, R315-270, and R315-273. Inspectors may also take photographs and make video and audio recordings while conducting authorized activities.

R315-260-10. Definitions.

(a) Terms used in Rules R315-15, R315-260 through 266, R315-268, R315-270, R315-273, and Rule R315-101 are defined in Sections 19-1-103 and 19-6-102.

(b) Terms used in Rule R315-15 are also defined in Sections 19-6-703 and 19-6-706(b).

(c) Additional terms used in Rules R315-260 through 266, R315-268, R315-270, R315-273, and Rule R315-101 are defined as follows:

(1) "Above ground tank" means a device meeting the definition of "tank" in Section R315-260-10 and that is situated in such a way that the entire surface area of the tank is completely above the plane of the adjacent surrounding surface and the entire surface area of the tank, including the tank bottom, is able to be visually inspected.

(2) "Acute hazardous waste" means hazardous wastes that meet the listing criteria in Subsection R315-261-11(a)(2) and therefore are either listed in Section R315-261-31 with the assigned hazard code of (H) or are listed in Subsection R315-261-33(e).

(3) "Active life" of a facility means the period from the initial receipt of hazardous waste at the facility until the Director receives certification of final closure.

(4) "Active portion" means that portion of a facility where treatment, storage, or disposal operations are being or have been conducted after November 19, 1980 and which is not a closed portion. See also "closed portion" and "inactive portion."

(5) "AES filing compliance date" means the date that EPA announces in the Federal Register, on or after which exporters of hazardous waste and exporters of cathode ray tubes for recycling are required to file EPA information in the Automated Export System or its successor system, under the International Trade Data System (ITDS) platform.

(6) "Airbag waste" means any hazardous waste airbag modules or hazardous waste airbag inflators.

(7) "Airbag waste collection facility" means any facility that receives airbag waste from airbag handlers subject to regulation under Subsection R315-261-4(j), and accumulates the waste for more than ten days.

(8) "Airbag waste handler" means any person, by site, who generates airbag waste that is subject to regulation under Rules

R315-260 through 266, R315-268, R315-270, and R315-273.

(9) "Approved hazardous waste management facility" or "approved facility" means a hazardous waste treatment, storage, or disposal facility which has received an EPA permit in accordance with federal requirements, has been approved under Section 19-6-108 and Rule R315-270, or has been permitted or approved under any other EPA authorized hazardous waste state program.

(10) "Ancillary equipment" means any device including, but not limited to, such devices as piping, fittings, flanges, valves, and pumps, that is used to distribute, meter, or control the flow of hazardous waste from its point of generation to a storage or treatment tank(s), between hazardous waste storage and treatment tanks to a point of disposal onsite, or to a point of shipment for disposal off-site.

(11) "Aquifer" means a geologic formation, group of formations, or part of a formation capable of yielding a significant amount of ground water to wells or springs.

(12) "Authorized representative" means the person responsible for the overall operation of a facility or an operational unit, i.e., part of a facility, e.g., the plant manager, superintendent or person of equivalent responsibility.

(13) "Battery" means a device consisting of one or more electrically connected electrochemical cells which is designed to receive, store, and deliver electric energy. An electrochemical cell is a system consisting of an anode, cathode, and an electrolyte, plus such connections, electrical and mechanical, as may be needed to allow the cell to deliver or receive electrical energy. The term battery also includes an intact, unbroken battery from which the electrolyte has been removed.

(14) "Boiler" means an enclosed device using controlled flame combustion and having the following characteristics:

(i)(A) The unit shall have physical provisions for recovering and exporting thermal energy in the form of steam, heated fluids, or heated gases; and

(B) The unit's combustion chamber and primary energy recovery sections(s) shall be of integral design. To be of integral design, the combustion chamber and the primary energy recovery section(s), such as waterwalls and superheaters, shall be physically formed into one manufactured or assembled unit. A unit in which the combustion chamber and the primary energy recovery section(s) are joined only by ducts or connections carrying flue gas is not integrally designed; however, secondary energy recovery equipment, such as economizers or air preheaters, need not be physically formed into the same unit as the combustion chamber and the primary energy recovery section. The following units are not precluded from being boilers solely because they are not of integral design: process heaters, units that transfer energy directly to a process stream, and fluidized bed combustion units; and

(C) While in operation, the unit shall maintain a thermal energy recovery efficiency of at least 60 percent, calculated in terms of the recovered energy compared with the thermal value of the fuel; and

(D) The unit shall export and utilize at least 75 percent of the recovered energy, calculated on an annual basis. In this calculation, no credit shall be given for recovered heat used internally in the same unit. Examples of internal use are the preheating of fuel or combustion air, and the driving of induced or forced draft fans or feedwater pumps; or

(ii) The unit is one which the Board has determined, on a case-by-case basis, to be a boiler, after considering the standards in Section R315-260-32

(15) "Carbon dioxide stream" means carbon dioxide that has been captured from an emission source, e.g., power plant, plus incidental associated substances derived from the source materials and the capture process, and any substances added to the stream to enable or improve the injection process.

(16) "Carbon regeneration unit" means any enclosed thermal treatment device used to regenerate spent activated carbon.

(17) "Cathode ray tube" or "CRT" means a vacuum tube, composed primarily of glass, which is the visual or video display component of an electronic device. A used, intact CRT means a CRT whose vacuum has not been released. A used, broken CRT means glass removed from its housing or casing whose vacuum has been released.

(18) "Central accumulation area" means any on-site hazardous waste accumulation area with hazardous waste accumulating in units subject to either Section R315-262-16, for small quantity generators, or Section R315-262-17, for large quantity generators. A central accumulation area at an eligible academic entity that chooses to operate under Sections R315-262-200 through 216 is also subject to Section R315-262-211 when accumulating unwanted material or hazardous waste, or both.

(19) "Certification" means a statement of professional opinion based upon knowledge and belief.

(20) "Closed portion" means that portion of a facility which an owner or operator has closed in accordance with the approved facility closure plan and all applicable closure requirements. See also "active portion" and "inactive portion".

(21) "Component" means either the tank or ancillary equipment of a tank system.

(22) "Confined aquifer" means an aquifer bounded above and below by impermeable beds or by beds of distinctly lower permeability than that of the aquifer itself; an aquifer containing confined ground water.

(23) "Contained" means held in a unit, including a land-based unit as defined in R315-260-10, that meets the following criteria:

(i) The unit is in good condition, with no leaks or other continuing or intermittent unpermitted releases of the hazardous secondary materials to the environment, and is designed, as appropriate for the hazardous secondary materials, to prevent releases of hazardous secondary materials to the environment. Unpermitted releases are releases that are not covered by a permit, such as a permit to discharge to water or air, and may include, but are not limited to, releases through surface transport by precipitation runoff, releases to soil and groundwater, wind-blown dust, fugitive air emissions, and catastrophic unit failures;

(ii) The unit is properly labeled or otherwise has a system, such as a log, to immediately identify the hazardous secondary materials in the unit; and

(iii) The unit holds hazardous secondary materials that are compatible with other hazardous secondary materials placed in the unit and is compatible with the materials used to construct the unit and addresses any potential risks of fires or explosions.

(iv) Hazardous secondary materials in units that meet the applicable requirements of Rules R315-264 or 265 are presumptively contained.

(24) "Container" means any portable device in which a material is stored, transported, treated, disposed of, or otherwise handled.

(25) "Containment building" means a hazardous waste management unit that is used to store or treat hazardous waste under the provisions of Subsections R315-264-1100 through 1102 or 40 CFR 265.1100 through 1102, which are adopted and incorporated by reference.

(26) "Contingency plan" means a document setting out an organized, planned, and coordinated course of action to be followed in case of a fire, explosion, or release of hazardous waste or hazardous waste constituents which could threaten human health or the environment.

(27) "Corrosion expert" means a person who, by reason of his knowledge of the physical sciences and the principles of engineering and mathematics, acquired by a professional

education and related practical experience, is qualified to engage in the practice of corrosion control on buried or submerged metal piping systems and metal tanks. Such a person shall be certified as being qualified by the National Association of Corrosion Engineers (NACE) or be a registered professional engineer who has certification or licensing that includes education and experience in corrosion control on buried or submerged metal piping systems and metal tanks.

(28) "CRT collector" means a person who receives used, intact CRTs for recycling, repair, resale, or donation.

(29) "CRT glass manufacturer" means an operation or part of an operation that uses a furnace to manufacture CRT glass.

(30) "CRT processing" means conducting all of the following activities:

(i) Receiving broken or intact CRTs; and

(ii) Intentionally breaking intact CRTs or further breaking or separating broken CRTs; and

(iii) Sorting or otherwise managing glass removed from CRT monitors.

(31) "Designated facility" means:

(i) A hazardous waste treatment, storage, or disposal facility which:

(A) Has received a permit, or interim status, in accordance with the requirements of Rule R315-270 and 124;

(B) Has received a permit, or interim status, from a State authorized in accordance with 40 CFR 271; or

(C) Is regulated under Subsection R315-261-6(c)(2) or Section R315-266-70; and

(D) That has been designated on the manifest by the generator pursuant to Section R315-262-20.

(ii) "Designated facility" also means a generator site designated on the manifest to receive its waste as a return shipment from a facility that has rejected the waste in accordance with Subsections R315-264-72(f) or R315-265-72(f).

(iii) If a waste is destined to a facility in an authorized State which has not yet obtained authorization to regulate that particular waste as hazardous, then the designated facility shall be a facility allowed by the receiving State to accept such waste.

(32) "Destination facility" means a facility that treats, disposes of, or recycles a particular category of universal waste, except those management activities described in Subsection R315-273-13(a) and (c) and Section R315-273-33. A facility at which a particular category of universal waste is only accumulated, is not a destination facility for purposes of managing that category of universal waste.

(33) "Dike" means an embankment or ridge of either natural or man-made materials used to prevent the movement of liquids, sludges, solids, or other materials.

(34) "Dioxins and furans (D/F)" means tetra, penta, hexa, hepta, and octa-chlorinated dibenzo dioxins and furans.

(35) "Discharge" or "hazardous waste discharge" means the accidental or intentional spilling, leaking, pumping, pouring, emitting, emptying, or dumping of hazardous waste into or on any land or water.

(36) "Disposal facility" means a facility or part of a facility at which hazardous waste is intentionally placed into or on any land or water, and at which waste will remain after closure. The term disposal facility does not include a corrective action management unit into which remediation wastes are placed.

(37) "Division" means the Division of Waste Management and Radiation Control.

(38) "Drip pad" is an engineered structure consisting of a curbed, free-draining base, constructed of non-earthen materials and designed to convey preservative kick-back or drippage from treated wood, precipitation, and surface water run-on to an associated collection system at wood preserving plants.

(39) "Electronic import-export reporting compliance date" means the date that EPA announces in the Federal Register, on or after which exporters, importers, and receiving facilities are required to submit certain export and import related documents to EPA using EPA's Waste Import Export Tracking System, or its successor system.

(40) "Elementary neutralization unit" means a device which:

(i) Is used for neutralizing wastes that are hazardous only because they exhibit the corrosivity characteristic defined in Section R315-261-22, or they are listed in Sections R315-261-30 through 35 only for this reason; and

(ii) Meets the definition of tank, tank system, container, transport vehicle, or vessel in Sections R315-260-10.

(41) "Electronic manifest, or e-Manifest" means the electronic format of the hazardous waste manifest that is obtained from EPA's national e-Manifest system and transmitted electronically to the system, and that is the legal equivalent of EPA Forms 8700-22, Manifest, and 8700-22A, Continuation Sheet.

(42) "Electronic Manifest System, or e-Manifest System" means EPA's national information technology system through which the electronic manifest may be obtained, completed, transmitted, and distributed to users of the electronic manifest and to regulatory agencies.

(43) "EPA hazardous waste number" means the number assigned by EPA to each hazardous waste listed in Sections R315-261-30 through 35 and to each characteristic identified in Sections R315-261-20 through 24.

(44) "EPA identification number" means the number assigned by EPA to each generator, transporter, and treatment, storage, or disposal facility.

(45) "EPA region" means the states and territories found in any one of the following ten regions:

(i) Region I-Maine, Vermont, New Hampshire, Massachusetts, Connecticut, and Rhode Island.

(ii) Region II-New York, New Jersey, Commonwealth of Puerto Rico, and the U.S. Virgin Islands.

(iii) Region III-Pennsylvania, Delaware, Maryland, West Virginia, Virginia, and the District of Columbia.

(iv) Region IV-Kentucky, Tennessee, North Carolina, Mississippi, Alabama, Georgia, South Carolina, and Florida.

(v) Region V-Minnesota, Wisconsin, Illinois, Michigan, Indiana and Ohio.

(vi) Region VI-New Mexico, Oklahoma, Arkansas, Louisiana, and Texas.

(vii) Region VII-Nebraska, Kansas, Missouri, and Iowa.

(viii) Region VIII-Montana, Wyoming, North Dakota, South Dakota, Utah, and Colorado.

(ix) Region IX-California, Nevada, Arizona, Hawaii, Guam, American Samoa, Commonwealth of the Northern Mariana Islands.

(x) Region X-Washington, Oregon, Idaho, and Alaska.

(46) "Equivalent method" means any testing or analytical method approved by the Director under Sections R315-260-20 and 21.

(47) "Existing hazardous waste management (HWM) facility" or "existing facility" means a facility which was in operation or for which construction commenced on or before November 19, 1980. A facility has commenced construction if:

(i) The owner or operator has obtained the Federal, State and local approvals or permits necessary to begin physical construction; and either

(ii)(A) A continuous on-site, physical construction program has begun; or

(B) The owner or operator has entered into contractual obligations-which cannot be cancelled or modified without substantial loss-for physical construction of the facility to be completed within a reasonable time.

(48) "Existing portion" means that land surface area of an existing waste management unit, included in the original Part A

permit application, on which wastes have been placed prior to the issuance of a permit.

(49) "Existing tank system" or "existing component" means a tank system or component that is used for the storage or treatment of hazardous waste and that is in operation, or for which installation has commenced on or prior to July 14, 1986, or December 16, 1988 for purposes of implementing the non-HSWA requirements of the tank regulations as promulgated by EPA on July 14, 1986, 51 FR 25470, as they have been incorporated into the corresponding rules of R315. A non-HSWA existing tank system or non-HSWA tank component is one which does not implement any of the requirements of the federal Hazardous and Solid Waste Amendments of 1984 (HSWA) as identified in Table 1 of 40 CFR 271.1. Installation shall be considered to have commenced if the owner or operator has obtained all Federal, State, and local approvals or permits necessary to begin physical construction of the site or installation of the tank system and if either:

(i) a continuous on-site physical construction or installation program has begun; or

(ii) the owner or operator has entered into contractual obligations, which cannot be canceled or modified without substantial loss, for physical construction of the site or installation of the tank system to be completed within a reasonable time.

(50) "Facility" means:

(i) All contiguous land, and structures, other appurtenances, and improvements on the land, used for treating, storing, or disposing of hazardous waste, or for managing hazardous secondary materials prior to reclamation. A facility may consist of several treatment, storage, or disposal operational units, e.g., one or more landfills, surface impoundments, or combinations of them.

(ii) For the purpose of implementing corrective action under Section R315-264-101, all contiguous property under the control of the owner or operator seeking a permit under Section 19-6-108. This definition also applies to facilities implementing corrective action under Section R315-263-31 and Rule R315-101.

(iii) Notwithstanding Subsection R315-260-10(c)(48)(ii), a remediation waste management site is not a facility that is subject to Section R315-264-101, but is subject to corrective action requirements if the site is located within such a facility.

(51) "Federal agency" means any department, agency, or other instrumentality of the Federal Government, any independent agency or establishment of the Federal Government including any Government corporation, and the Government Printing Office.

(52) "Federal, State and local approvals or permits necessary to begin physical construction" means permits and approvals required under Federal, State or local hazardous waste control statutes, regulations or ordinances.

(53) "Final closure" means the closure of all hazardous waste management units at the facility in accordance with all applicable closure requirements so that hazardous waste management activities under Rules R315-264 and 265 are no longer conducted at the facility unless subject to the provisions in Section R315-262-34.

(54) "Food-chain crops" means tobacco, crops grown for human consumption, and crops grown for feed for animals whose products are consumed by humans.

(55) "Free liquids" means liquids which readily separate from the solid portion of a waste under ambient temperature and pressure.

(56) "Freeboard" means the vertical distance between the top of a tank or surface impoundment dike, and the surface of the waste contained therein.

(57) "Generator" means any person, by site, whose act or process produces hazardous waste identified or listed in Rule R315-261 or whose act first causes a hazardous waste to become subject to regulation.

(58) "Ground water" means water below the land surface in a zone of saturation.

(59) "Hazard class" means:

(i) The DOT hazard class identified in 49 CFR 172; and

(ii) If the DOT hazard class is "OTHER REGULATED MATERIAL," ORM, the EPA hazardous waste characteristic exhibited by the waste and identified in Sections R315-261-20 through 24.

(60) "Hazardous secondary material" means a secondary material, e.g., spent material, by-product, or sludge, that, when discarded, would be identified as hazardous waste under Rule R315-261.

(61) "Hazardous secondary material generator" means any person whose act or process produces hazardous secondary materials at the generating facility. For purposes of Subsection R315-260-10(c)(59), "generating facility" means all contiguous property owned, leased, or otherwise controlled by the hazardous secondary material generator. For the purposes of Subsections R315-261-2(a)(2)(ii) and R315-261-4(a)(23), a facility that collects hazardous secondary materials from other persons is not the hazardous secondary material generator.

(62) "Hazardous waste constituent" means a constituent that caused the Board to list the hazardous waste in Sections R315-261-30 through 35, or a constituent listed in table 1 of Section R315-261-24.

(63) "Hazardous waste management unit" is a contiguous area of land on or in which hazardous waste is placed, or the largest area in which there is significant likelihood of mixing hazardous waste constituents in the same area. Examples of hazardous waste management units include a surface impoundment, a waste pile, a land treatment area, a landfill cell, an incinerator, a tank and its associated piping and underlying containment system and a container storage area. A container alone does not constitute a unit; the unit includes containers and the land or pad upon which they are placed.

(64) "In operation" refers to a facility which is treating, storing, or disposing of hazardous waste.

(65) "Inactive portion" means that portion of a facility which is not operated after November 19, 1980. See also "active portion" and "closed portion".

(66) "Incinerator" means any enclosed device that:

(i) Uses controlled flame combustion and neither meets the criteria for classification as a boiler, sludge dryer, or carbon regeneration unit, nor is listed as an industrial furnace; or

(ii) Meets the definition of infrared incinerator or plasma arc incinerator.

(67) "Incompatible waste" means a hazardous waste which is unsuitable for:

(i) Placement in a particular device or facility because it may cause corrosion or decay of containment materials, e.g., container inner liners or tank walls; or

(ii) Commingling with another waste or material under uncontrolled conditions because the commingling might produce heat or pressure, fire or explosion, violent reaction, toxic dusts, mists, fumes, or gases, or flammable fumes or gases.

(68) "Individual generation site" means the contiguous site at or on which one or more hazardous wastes are generated. An individual generation site, such as a large manufacturing plant, may have one or more sources of hazardous waste but is considered a single or individual generation site if the site or property is contiguous.

(69) "Industrial furnace" means any of the following enclosed devices that are integral components of manufacturing processes and that use thermal treatment to accomplish recovery of materials or energy:

(i) Cement kilns;

(ii) Lime kilns;

(iii) Aggregate kilns;
(iv) Phosphate kilns;
(v) Coke ovens;
(vi) Blast furnaces;
(vii) Smelting, melting and refining furnaces, including pyrometallurgical devices such as cupolas, reverberator furnaces, sintering machine, roasters, and foundry furnaces;
(viii) Titanium dioxide chloride process oxidation reactors;
(ix) Methane reforming furnaces;
(x) Pulping liquor recovery furnaces;
(xi) Combustion devices used in the recovery of sulfur values from spent sulfuric acid;
(xii) Halogen acid furnaces (HAFs) for the production of acid from halogenated hazardous waste generated by chemical production facilities where the furnace is located on the site of a chemical production facility, the acid product has a halogen acid content of at least 3%, the acid product is used in a manufacturing process, and, except for hazardous waste burned as fuel, hazardous waste fed to the furnace has a minimum halogen content of 20% as-generated.
(xiii) Such other devices as the Board may, after notice and comment, add to this list on the basis of one or more of the following factors:
(A) The design and use of the device primarily to accomplish recovery of material products;
(B) The use of the device to burn or reduce raw materials to make a material product;
(C) The use of the device to burn or reduce secondary materials as effective substitutes for raw materials, in processes using raw materials as principal feedstocks;
(D) The use of the device to burn or reduce secondary materials as ingredients in an industrial process to make a material product;
(E) The use of the device in common industrial practice to produce a material product; and
(F) Other factors, as appropriate.
(70) "Infrared incinerator" means any enclosed device that uses electric powered resistance heaters as a source of radiant heat followed by an afterburner using controlled flame combustion and which is not listed as an industrial furnace.
(71) "Inground tank" means a device meeting the definition of "tank" in Section R315-260-10 whereby a portion of the tank wall is situated to any degree within the ground, thereby preventing visual inspection of that external surface area of the tank that is in the ground.
(72) "Injection well" means a well into which fluids are injected. See also "underground injection".
(73) "Inner liner" means a continuous layer of material placed inside a tank or container which protects the construction materials of the tank or container from the contained waste or reagents used to treat the waste.
(74) "Installation inspector" means a person who, by reason of his knowledge of the physical sciences and the principles of engineering, acquired by a professional education and related practical experience, is qualified to supervise the installation of tank systems.
(75) "Intermediate facility" means any facility that stores hazardous secondary materials for more than 10 days, other than a hazardous secondary material generator or reclaimer of such material.
(76) "International shipment" means the transportation of hazardous waste into or out of the jurisdiction of the United States.
(77) "Lamp," also referred to as "universal waste lamp", is defined as the bulb or tube portion of an electric lighting device. A lamp is specifically designed to produce radiant energy, most often in the ultraviolet, visible, and infra-red regions of the electromagnetic spectrum. Examples of common universal waste electric lamps include, but are not limited to, fluorescent, high intensity discharge, neon, mercury vapor, high pressure sodium, and metal halide lamps.
(78) "Land-based unit" means an area where hazardous secondary materials are placed in or on the land before recycling. This definition does not include land-based production units.
(79) "Landfill" means a disposal facility or part of a facility where hazardous waste is placed in or on land and which is not a pile, a land treatment facility, a surface impoundment, an underground injection well, a salt dome formation, a salt bed formation, an underground mine, a cave, or a corrective action management unit.
(80) "Landfill cell" means a discrete volume of a hazardous waste landfill which uses a liner to provide isolation of wastes from adjacent cells or wastes. Examples of landfill cells are trenches and pits.
(81) "Land treatment facility" means a facility or part of a facility at which hazardous waste is applied onto or incorporated into the soil surface; such facilities are disposal facilities if the waste will remain after closure.
(82) "Large quantity generator" is a generator who generates any of the following amounts in a calendar month:
(i) Greater than or equal to 1,000 kilograms (2,200 lbs) of non-acute hazardous waste; or
(ii) Greater than 1 kilogram (2.2 lbs) of acute hazardous waste listed in Section R315-261-31 or Subsection R315-261-33(e); or
(iii) Greater than 100 kilograms (220 lbs) of any residue or contaminated soil, water, or other debris resulting from the cleanup of a spill, into or on any land or water, of any acute hazardous waste listed in Section R315-261-31 or Subsection R315-261-33(e).
(83) "Leachate" means any liquid, including any suspended components in the liquid, that has percolated through or drained from hazardous waste.
(84) "Leak-detection system" means a system capable of detecting the failure of either the primary or secondary containment structure or the presence of a release of hazardous waste or accumulated liquid in the secondary containment structure. Such a system shall employ operational controls, e.g., daily visual inspections for releases into the secondary containment system of aboveground tanks, or consist of an interstitial monitoring device designed to detect continuously and automatically the failure of the primary or secondary containment structure or the presence of a release of hazardous waste into the secondary containment structure.
(85) "Liner" means a continuous layer of natural or man-made materials, beneath or on the sides of a surface impoundment, landfill, or landfill cell, which restricts the downward or lateral escape of hazardous waste, hazardous waste constituents, or leachate.
(86) "Management" or "hazardous waste management" means the systematic control of the collection, source separation, storage, transportation, processing, treatment, recovery, and disposal of hazardous waste.
(87) "Manifest" is defined in Subsection 19-6-102(14) and is further defined as: the shipping document EPA Form 8700-22, including, if necessary, EPA Form 8700-22A, or the electronic manifest, originated and signed in accordance with the applicable requirements of Rules R315-262 through 265.
(88) "Manifest tracking number" means: The alphanumeric identification number, i.e., a unique three letter suffix preceded by nine numerical digits, which is pre-printed in Item 4 of the Manifest by a registered source.
(89) "Mercury-containing equipment" means a device or part of a device, including thermostats, but excluding batteries and lamps, that contains elemental mercury integral to its function.
(90) "Mining overburden returned to the mine site" means

any material overlying an economic mineral deposit which is removed to gain access to that deposit and is then used for reclamation of a surface mine.

(91) "Miscellaneous unit" means a hazardous waste management unit where hazardous waste is treated, stored, or disposed of and that is not a container, tank, surface impoundment, pile, land treatment unit, landfill, incinerator, boiler, industrial furnace, underground injection well with appropriate technical standards under 40 CFR 146, containment building, corrective action management unit, unit eligible for a research, development, and demonstration permit under Section R315-270-65, or staging pile.

(92) "Monitoring" means all procedures used to systematically inspect and collect data on operational parameters of the facility or on the quality of the air, ground water, surface water, or soils.

(93) "Movement" means that hazardous waste transported to a facility in an individual vehicle.

(94) "New hazardous waste management facility" or "new facility" means a facility which began operation, or for which construction commenced after November 19, 1980. See also "Existing hazardous waste management facility".

(95) "New tank system" or "new tank component" means a tank system or component that will be used for the storage or treatment of hazardous waste and for which installation has commenced after July 14, 1986; except, however, for purposes of Subsections R315-264-193(g)(2) and R315-265-193(g)(2), a new tank system is one for which construction commences after July 14, 1986, or December 16, 1988 for purposes of implementing the non-HSWA requirements of the tank regulations as promulgated by EPA on July 14, 1986, 51 FR 25470, as they have been incorporated into the corresponding rules of R315; except, however, for purposes of Subsection R315-265-193(g)(2) and Subsection R315-264-193(g)(2), a new tank system is one which construction commences after July 14, 1986. A non-HSWA new tank system or non-HSWA new tank component is one which does not implement any of the requirements of the federal Hazardous and Solid Waste Amendments of 1984 (HSWA) as identified in Table 1 of 40 CFR 271.1. See also "existing tank system."

(96) "No free liquids, as used in Subsections R315-261-4(a)(26) and R315-261-4(b)(18)", means that solvent-contaminated wipes may not contain free liquids as determined by Method 9095B, Paint Filter Liquids Test, included in "Test Methods for Evaluating Solid Waste, Physical/Chemical Methods," EPA Publication SW-846, and that there is no free liquid in the container holding the wipes. No free liquids may also be determined using another standard or test method as defined by the Director.

(97) "Non-acute hazardous waste" means all hazardous wastes that are not acute hazardous waste, as defined in Section R315-260-10.

(98) "On ground tank" means a device meeting the definition of "tank" in Section R315-260-10 and that is situated in such a way that the bottom of the tank is on the same level as the adjacent surrounding surface so that the external tank bottom cannot be visually inspected.

(99) "On-site" means the same or geographically contiguous property which may be divided by public or private right-of-way, provided the entrance and exit between the properties is at a cross-roads intersection, and access is by crossing as opposed to going along, the right-of-way. Non-contiguous properties owned by the same person but connected by a right-of-way which he controls and to which the public does not have access, is also considered on-site property.

(100) "Open burning" means the combustion of any material without the following characteristics:

(i) Control of combustion air to maintain adequate temperature for efficient combustion,

(ii) Containment of the combustion-reaction in an enclosed device to provide sufficient residence time and mixing for complete combustion, and

(iii) Control of emission of the gaseous combustion products. See also "incineration" and "thermal treatment".

(101) "Operator" means the person responsible for the overall operation of a facility.

(102) "Owner" means the person who owns a facility or part of a facility.

(103) "Partial closure" means the closure of a hazardous waste management unit in accordance with the applicable closure requirements of Rules R315-264 and 265 at a facility that contains other active hazardous waste management units. For example, partial closure may include the closure of a tank, including its associated piping and underlying containment systems, landfill cell, surface impoundment, waste pile, or other hazardous waste management unit, while other units of the same facility continue to operate.

(104) "Polychlorinated biphenyl, PCB" and "PCBs" means any chemical substance that is limited to the biphenyl molecule that has been chlorinated to varying degrees or any combination of substances which contains such substance. PCB and PCBs as contained in PCB items are defined in Section R315-260-10. For any purposes under Rules R315-260 through 266, 268, 270, 273, R315-15, and R315-101, inadvertently generated non-Aroclor PCBs are defined as the total PCBs calculated following division of the quantity of monochlorinated biphenyls by 50 and dichlorinated biphenyls by 5.

(105) "PCB Item" means any PCB Article, PCB Article Container, PCB Container, PCB Equipment, or anything that deliberately or unintentionally contains or has as a part of it any PCB or PCBs.

(106) "Permit" means the plan approval as required by subsection 19-6-108(3)(a), or equivalent control document issued by the Director to implement the requirements of the Utah Solid and Hazardous Waste Act;

(107) "Permittee" is defined in Subsection 19-6-102(18) and includes any person who has received an approval of a hazardous waste operation plan under Section 19-6-108 and Rule R315-262 or a Federal RCRA permit for a treatment, storage, or disposal facility.

(108) "Person" means an individual, trust, firm, joint stock company, Federal Agency, corporation, including a government corporation, partnership, association, State, municipality, commission, political subdivision of a State, or any interstate body.

(109) "Personnel" or "facility personnel" means all persons who work at, or oversee the operations of, a hazardous waste facility, and whose actions or failure to act may result in noncompliance with the requirements of Rules R315-264 or 265.

(110) "Pesticide" means any substance or mixture of substances intended for preventing, destroying, repelling, or mitigating any pest, or intended for use as a plant regulator, defoliant, or desiccant, other than any article that:

(i) Is a new animal drug under FFDCA section 201(w), or

(ii) Is an animal drug that has been determined by regulation of the Secretary of Health and Human Services not to be a new animal drug, or

(iii) Is an animal feed under FFDCA section 201(x) that bears or contains any substances described by Subsection R315-260-10(c)(108)(i) or (ii).

(111) "Pile" means any non-containerized accumulation of solid, nonflowing hazardous waste that is used for treatment or storage and that is not a containment building.

(112) "Plasma arc incinerator" means any enclosed device using a high intensity electrical discharge or arc as a source of heat followed by an afterburner using controlled flame combustion and which is not listed as an industrial furnace.

(113) "POHC's" means principle organic hazardous constituents.

(114) "Point source" means any discernible, confined, and discrete conveyance, including, but not limited to any pipe, ditch, channel, tunnel, conduit, well, discrete fissure, container, rolling stock, concentrated animal feeding operation, or vessel or other floating craft, from which pollutants are or may be discharged. This term does not include return flows from irrigated agriculture.

(115) "Precipitation run-off" means water generated from naturally occurring storm events. If the precipitation run-off has been in contact with a waste defined in Sections R315-261-20 through 24, it qualifies as "precipitation run-off" if the water does not exhibit any of the characteristics identified in Section R315-261-20 through 24. If the precipitation run-off has been in contact with a waste listed in Sections R315-261-30 through 35, then it qualifies as "precipitation run-off" when the water has been excluded under Section R315-260-22. Water containing any leachate does not qualify as "precipitation run-off".

(116) "Publicly owned treatment works" or "POTW" means any device or system used in the treatment, including recycling and reclamation, of municipal sewage or industrial wastes of a liquid nature which is owned by the State or a political subdivision within the State. This definition includes sewers, pipes, or other conveyances only if they convey wastewater to a POTW providing treatment.

(117) "Qualified Ground-Water Scientist" means a scientist or engineer who has received a baccalaureate or post-graduate degree in the natural sciences or engineering, and has sufficient training and experience in ground-water hydrology and related fields as may be demonstrated by state registration, professional certifications, or completion of accredited university courses that enable that individual to make sound professional judgements regarding ground-water monitoring and contaminant fate and transport.

(118) "RCRA" means the Solid Waste Disposal Act, as amended by the Resource Conservation and Recovery Act of 1976, as amended, 42 U.S.C. section 6901 et seq.

(119) "Recognized trader" means a person domiciled in the United States, by site of business, who acts to arrange and facilitate transboundary movements of wastes destined for recovery or disposal operations, either by purchasing from and subsequently selling to United States and foreign facilities, or by acting under arrangements with a United States waste facility to arrange for the export or import of the wastes.

(120) "Remanufacturing" means processing a higher-value hazardous secondary material in order to manufacture a product that serves a similar functional purpose as the original commercial-grade material. For the purpose of this definition, a hazardous secondary material is considered higher-value if it was generated from the use of a commercial-grade material in a manufacturing process and can be remanufactured into a similar commercial-grade material.

(121) "Remediation waste" means all solid and hazardous wastes, and all media, including ground water, surface water, soils, and sediments, and debris, that are managed for implementing cleanup.

(122) "Remediation waste management site" means a facility where an owner or operator is or will be treating, storing or disposing of hazardous remediation wastes. A remediation waste management site is not a facility that is subject to corrective action under Section R315-264-101, but is subject to corrective action requirements if the site is located in such a facility.

(123)(i) "Replacement unit" means a landfill, surface impoundment, or waste pile unit:

(A) from which all or substantially all of the waste is removed; and

(B) that is subsequently reused to treat, store, or dispose of hazardous waste.

(ii) "Replacement unit" does not apply to a unit from which waste is removed during closure, if the subsequent reuse solely involves the disposal of waste from that unit and other closing units or corrective action areas at the facility, in accordance with a closure plan approved by the Director or a corrective action approved by the Director.

(124) "Representative sample" means a sample of a universe or whole, e.g., waste pile, lagoon, ground water, which can be expected to exhibit the average properties of the universe or whole.

(125) "Run-off" means any rainwater, leachate, or other liquid that drains over land from any part of a facility.

(126) "Run-on" means any rainwater, leachate, or other liquid that drains over land onto any part of a facility.

(127) "Saturated zone" or "zone of saturation" means that part of the earth's crust in which all voids are filled with water.

(128) "Sludge" means any solid, semi-solid, or liquid waste generated from a municipal, commercial, or industrial wastewater treatment plant, water supply treatment plant, or air pollution control facility exclusive of the treated effluent from a wastewater treatment plant.

(129) "Sludge dryer" means any enclosed thermal treatment device that is used to dehydrate sludge and that has a maximum total thermal input, excluding the heating value of the sludge itself, of 2,500 Btu/lb of sludge treated on a wet-weight basis.

(130) "Small Quantity Generator" is a generator who generates the following amounts in a calendar month:

(i) Greater than 100 kilograms (220 lbs) but less than 1,000 kilograms (2,200 lbs) of non-acute hazardous waste; and

(ii) Less than or equal to 1 kilogram (2.2 lbs) of acute hazardous waste listed in Section R315-261-31 or Subsection R315-261-33(e); and

(iii) Less than or equal to 100 kilograms (220 lbs) of any residue or contaminated soil, water, or other debris resulting from the cleanup of a spill, into or on any land or water, of any acute hazardous waste listed in Section R315-261-31 or Subsection R315-261-33(e).

(131) "Solid Waste Management Unit" means any discernible unit at which solid wastes have been placed at any time, irrespective of whether the unit was intended for the management of solid or hazardous waste. Such units include any area at a facility at which solid wastes have been routinely and systematically released.

(132) "Solvent-contaminated wipe" means:

(i) A wipe that, after use or after cleaning up a spill, either:

(A) Contains one or more of the F001 through F005 solvents listed in Section R315-261-31 or the corresponding P- or U- listed solvents found in Section R315-261-33;

(B) Exhibits a hazardous characteristic found in Sections R315-261-20 through 24 when that characteristic results from a solvent listed in Rule R315-261; and/or

(C) Exhibits only the hazardous waste characteristic of ignitability found in Section R315-261-21 due to the presence of one or more solvents that are not listed in Rule R315-261.

(ii) Solvent-contaminated wipes that contain listed hazardous waste other than solvents, or exhibit the characteristic of toxicity, corrosivity, or reactivity due to contaminants other than solvents, are not eligible for the exclusions at Subsections R315-261-4(a)(26) and R315-261-4(b)(18).

(133) "Sorbent" means a material that is used to soak up free liquids by either adsorption or absorption, or both.

(134) "Sorb" means to either adsorb or absorb, or both.

(135) A "spent material" is any material that has been used and as a result of contamination can no longer serve the purpose for which it was produced without processing.

(136) "Spill" means the accidental discharging, spilling, leaking, pumping, pouring, emitting, emptying, releasing, or

dumping of hazardous wastes or materials which, when spilled, become hazardous wastes, into or on any land or water.

(137) "Staging pile" means an accumulation of solid, non-flowing remediation waste, as defined in Section R315-260-10, that is not a containment building and that is used only during remedial operations for temporary storage at a facility. Staging piles shall be designated by the Director according to the requirements of Section R315-264-554.

(138) "State" means the state of Utah.

(139) "Storage" is defined in Subsection 19-6-102(20) and includes the holding of hazardous waste for a temporary period, at the end of which the hazardous waste is treated, disposed of, or stored elsewhere.

(140) "Sump" means any pit or reservoir that meets the definition of tank and those troughs/trenches connected to it that serve to collect hazardous waste for transport to hazardous waste storage, treatment, or disposal facilities; except that as used in the landfill, surface impoundment, and waste pile rules, "sump" means any lined pit or reservoir that serves to collect liquids drained from a leachate collection and removal system or leak detection system for subsequent removal from the system.

(141) "Surface impoundment" or "impoundment" means a facility or part of a facility which is a natural topographic depression, man-made excavation, or diked area formed primarily of earthen materials, although it may be lined with man-made materials, which is designed to hold an accumulation of liquid wastes or wastes containing free liquids, and which is not an injection well. Examples of surface impoundments are holding, storage, settling, and aeration pits, ponds, and lagoons.

(142) "Tank" means a stationary device, designed to contain an accumulation of hazardous waste which is constructed primarily of non-earthen materials, e.g., wood, concrete, steel, plastic, which provide structural support.

(143) "Tank system" means a hazardous waste storage or treatment tank and its associated ancillary equipment and containment system.

(144) "TEQ" means toxicity equivalence, the international method of relating the toxicity of various dioxin/furan congeners to the toxicity of 2,3,7,8-tetrachlorodibenzo-p-dioxin.

(145) "Thermal treatment" means the treatment of hazardous waste in a device which uses elevated temperatures as the primary means to change the chemical, physical, or biological character or composition of the hazardous waste. Examples of thermal treatment processes are incineration, molten salt, pyrolysis, calcination, wet air oxidation, and microwave discharge. See also "incinerator" and "open burning".

(146) "Thermostat" means a temperature control device that contains metallic mercury in an ampule attached to a bimetal sensing element, and mercury-containing ampules that have been removed from these temperature control devices in compliance with the requirements of Subsections R315-273-13(c)(2) or R315-273-33(c)(2).

(147) "Totally enclosed treatment facility" means a facility for the treatment of hazardous waste which is directly connected to an industrial production process and which is constructed and operated in a manner which prevents the release of any hazardous waste or any constituent thereof into the environment during treatment. An example is a pipe in which waste acid is neutralized.

(148) "Transfer facility" means any transportation-related facility, including loading docks, parking areas, storage areas and other similar areas where shipments of hazardous waste or hazardous secondary materials are held during the normal course of transportation.

(149) "Transport vehicle" means a motor vehicle or rail car used for the transportation of cargo by any mode. Each cargo-carrying body; trailer, railroad freight car, etc.; is a separate transport vehicle.

(150) Transportation" is defined in Subsection 19-6-102(21) and includes the movement of hazardous waste by air, rail, highway, or water.

(151) "Transporter" means a person engaged in the offsite transportation of hazardous waste by air, rail, highway, or water.

(152)(i) "Treatability study" means a study in which a hazardous waste is subjected to a treatment process to determine:

(A) Whether the waste is amenable to the treatment process,

(B) what pretreatment, if any, is required,

(C) the optimal process conditions needed to achieve the desired treatment,

(D) the efficiency of a treatment process for a specific waste or wastes, or

(E) the characteristics and volumes of residuals from a particular treatment process.

(ii) Also included in this definition for the purpose of the Subsection R315-261-4 (e) and (f) exemptions are liner compatibility, corrosion, and other material compatibility studies and toxicological and health effects studies.

(iii) A "treatability study" is not a means to commercially treat or dispose of hazardous waste.

(153) "Treatment" is defined in Subsection 19-6-102(22) and includes any method, technique, or process, including neutralization, designed to change the physical, chemical, or biological character or composition of any hazardous waste so as to neutralize such waste, or so as to recover energy or material resources from the waste, or so as to render such waste non-hazardous, or less hazardous; safer to transport, store, or dispose of; or amenable for recovery, amenable for storage, or reduced in volume.

(154) "Treatment zone" means a soil area of the unsaturated zone of a land treatment unit within which hazardous constituents are degraded, transformed, or immobilized.

(155) "Underground injection" means the subsurface emplacement of fluids through a bored, drilled or driven well; or through a dug well, where the depth of the dug well is greater than the largest surface dimension. See also "injection well".

(156) "Underground tank" means a device meeting the definition of "tank" in Section R315-260-10 whose entire surface area is totally below the surface of and covered by the ground.

(157) "Unfit-for use tank system" means a tank system that has been determined through an integrity assessment or other inspection to be no longer capable of storing or treating hazardous waste without posing a threat of release of hazardous waste to the environment.

(158) "United States" means the 50 States, the District of Columbia, the Commonwealth of Puerto Rico, the U.S. Virgin Islands, Guam, American Samoa, and the Commonwealth of the Northern Mariana Islands.

(159) "Universal waste" means any of the following hazardous wastes that are managed under the universal waste requirements of Rule R315-273:

(i) Batteries as described in Section R315-273-2;

(ii) Pesticides as described in Section R315-273-3;

(iii) Mercury-containing equipment as described in Section R315-273-4;

(iv) Lamps as described in Section R315-273-5;

(v) Antifreeze as described in Subsection R315-273-6(a); and

(vi) Aerosol cans as described in Subsection R315-273-6(b).

(160) Universal waste handler

(i) Means:

(A) A generator of universal waste; or

(B) The owner or operator of a facility, including all

contiguous property, that receives universal waste from other universal waste handlers, accumulates universal waste, and sends universal waste to another universal waste handler, to a destination facility, or to a foreign destination.

(ii) Does not mean:

(A) A person who treats, except under the provisions of Subsection R315-273-13(a) or (c), or R315-273-33(a) or (c), disposes of, or recycles universal waste; or

(B) A person engaged in the off-site transportation of universal waste by air, rail, highway, or water, including a universal waste transfer facility.

(161) "Universal waste transporter" means a person engaged in the off-site transportation of universal waste by air, rail, highway, or water.

(162) "Unsaturated zone" or "zone of aeration" means the zone between the land surface and the water table.

(163) "Uppermost aquifer" means the geologic formation nearest the natural ground surface that is an aquifer, as well as lower aquifers that are hydraulically interconnected with this aquifer within the facility's property boundary.

(164) Used oil is defined in Subsection 19-6-703(19).

(165) "User of the electronic manifest system" means a hazardous waste generator, a hazardous waste transporter, an owner or operator of a hazardous waste treatment, storage, recycling, or disposal facility, or any other person that:

(i) Is required to use a manifest to comply with:

(A) Any federal or state requirement to track the shipment, transportation, and receipt of hazardous waste or other waste material that is shipped from the site of generation to an off-site designated facility for treatment, storage, recycling, or disposal; or

(B) Any federal or state requirement to track the shipment, transportation, and receipt of rejected wastes or regulated container residues that are shipped from a designated facility to an alternative facility, or returned to the generator; and

(ii) Elects to use the system to obtain, complete and transmit an electronic manifest format supplied by the EPA electronic manifest system, or

(iii) Elects to use the paper manifest form and submits to the system for data processing purposes a paper copy of the manifest, or data from such a paper copy, in accordance with Subsections R315-264-71(a)(2)(v) or R315-265-71(a)(2)(v). These paper copies are submitted for data exchange purposes only and are not the official copies of record for legal purposes.

(166) "Very small quantity generator" is a generator who generates less than or equal to the following amounts in a calendar month:

(i) 100 kilograms (220 lbs) of non-acute hazardous waste; and

(ii) 1 kilogram (2.2 lbs) of acute hazardous waste listed in Section R315-261-31 or Subsection R315-261-33(e); and

(iii) 100 kilograms (220 lbs) of any residue or contaminated soil, water, or other debris resulting from the cleanup of a spill, into or on any land or water, of any acute hazardous waste listed in Section R315-261-31 or Subsection R315-261-33(e).

(167) "Vessel" includes every description of watercraft, used or capable of being used as a means of transportation on the water.

(168) "Waste management area" means the limit projected in the horizontal plane of the area on which waste will be placed during the active life of a regulated unit. The waste management area includes horizontal space taken up by any liner, dike, or other barrier designed to contain waste in a regulated unit. If the facility contains more than one regulated unit, the waste management area is described by an imaginary line circumscribing the several regulated units.

(169) "Wastewater treatment unit" means a device which:

(i) Is part of a wastewater treatment facility that is subject to regulation under either section 402 or 307(b) of the Clean Water Act; and

(ii) Receives and treats or stores an influent wastewater that is a hazardous waste as defined in Section R315-261-3, or that generates and accumulates a wastewater treatment sludge that is a hazardous waste as defined in Section R315-261-3, or treats or stores a wastewater treatment sludge which is a hazardous waste as defined in Section R315-261-3; and

(iii) Meets the definition of tank or tank system in Section R315-260-10.

(170) "Water, bulk shipment" means the bulk transportation of hazardous waste which is loaded or carried on board a vessel without containers or labels.

(171) "Well" means any shaft or pit dug or bored into the earth, generally of a cylindrical form, and often walled with bricks or tubing to prevent the earth from caving in.

(172) "Well injection": See "underground injection"

(173) "Wipe" means a woven or non-woven shop towel, rag, pad, or swab made of wood pulp, fabric, cotton, polyester blends, or other material.

(174) "Zone of engineering control" means an area under the control of the owner/operator that, upon detection of a hazardous waste release, can be readily cleaned up prior to the release of hazardous waste or hazardous constituents to ground water or surface water.

R315-260-11. References.

(a) For purposes of Rules R315-260 through 266, 268, 270, and 273, Rule R315-15 and Rule R315-101, the references of 40 CFR 260.11, 2015 ed, with the modifications to 40 CFR 260.11 adopted in Federal Register Vol. 81, No 228 page 85713 and page 85806 published on November 28, 2016, are adopted and incorporated by reference.

R315-260-12. Definitions for Rule R315-101.

(a) For purposes of Rule R315-101 regarding cleanup action and Risk-Based Closure Standards, the following terms are defined:

(1) "The concentration term, C" is calculated as the 95% upper confidence limit, UCL, on the arithmetic average for normally distributed data, or as the 95% upper confidence limit on the arithmetic average for lognormally distributed data. For normally distributed data, C = Mean + t x Standard Deviation/$n^{1/2}$, where n is the number of observations, and t is Student's t distribution (at the 95% one-sided confidence level and n-1 degrees of freedom), tables of which are printed in most introductory statistics textbooks. For lognormally distributed data, C = exp (Mean of lognormal-transformed data + 0.5 x Variance of lognormal-transformed data + Standard Deviation of lognormal-transformed data x H/$(n - 1)^{1/2}$), where n is the number of observations, and H is Land's H statistic (at the 95% one-sided confidence level), tables of which are printed in advanced statistics books. For data which are not normally nor lognormally distributed, appropriate statistics, such as nonparametric confidence limits, shall be applied.

(2) "Area of contamination" means a hazardous waste management unit or an area where a release has occurred. The boundary is defined as the furthest extent where contamination from a defined source has migrated in any medium at the time the release is first identified.

(3) "Contaminate" means to render a medium polluted through the introduction of hazardous waste or hazardous constituents as identified in R315-261, Appendix VIII.

(4) "Hazard index" means the sum of more than one hazard quotient for multiple substances, multiple exposure pathways, or both. The Hazard Index is calculated separately for chronic, subchronic, and shorter duration exposures.

(5) "Hazard quotient" means the ratio of a single substance exposure level over a specified time period, e.g. subchronic, to

a reference dose for that substance derived from a similar exposure period.

(6) "Risk-based closure" means closure of a site where hazardous waste was managed or any medium has been contaminated by a release of hazardous waste or hazardous constituents, and where hazardous waste or hazardous constituents remain at the site in any medium at concentrations determined, under Rule R315-101, to cause minimal levels of risk to human health and the environment so as to require no further action or monitoring on the part of the responsible party nor any notice of hazardous waste management on the deed to the property.

(7) "Reasonable maximum exposure (RME)" means the highest exposure that is reasonably expected to occur at a site. The goal of RME is to combine upper-bound and mid-range exposure factors so that the result represents an exposure scenario that is both protective and reasonable; not the worst possible case.

(8) "Release" means spill or discharge of hazardous waste, hazardous constituents, or material that becomes hazardous waste when released to the environment.

(9) "Responsible party" means the owner or operator of a facility, or any other person responsible for the release of hazardous waste or hazardous constituents.

(10) "Site" means the area of contamination and any other area that could be impacted by the released contaminants, or could influence the migration of those contaminants, regardless of whether the site is owned by the responsible party.

R315-260-19. Variances Authorized.

(a) Variances shall be granted by the Board only to the extent allowed under State and Federal law.

(b) The Board may consider a variance request in accordance with the standard established in section 19-6-111.

(c) The Board may, at its own instance, review any variance granted during the term for which a variance was granted.

(d) A person applying for a variance shall submit the application, in writing, to the Director. The application shall provide the following:

(1) Citation of the statutory, regulatory, or permit requirement from which the variance is sought;

(2) For variances for which the Board promulgates or has promulgated specific rules, information meeting the requirements of those rules;

(3) Information demonstrating that application of or compliance with the requirement would cause undue or unreasonable hardship on the person applying for the variance;

(4) Proposed alternative requirements, if any;

(5) Information demonstrating that the variance will achieve the purpose and intent of the statutory, regulatory, or permit provision from which the variance is sought;

(6) Information demonstrating that any alternative requirement or requirements will adequately protect human health and the environment; and

(7) If no alternative requirement is proposed, information demonstrating that if the variance is granted, human health and the environment will be adequately protected.

(e) A person applying for a variance shall provide such additional information as the Board or the Director requires.

(f) Nothing in Subsection R315-260-19(d) or (e) limits the authority of the Board to grant variances in accordance with the standard established in Section 19-6-111. A person applying for a variance under Section R315-263-32 shall provide such information described in Subsection R315-260-19(d) as the Director determines.

R315-260-20. Petition to Amend Rules.

(a) It is the intent of the Board to insure the compatibility and equivalency of Rules R315-260 through 266, 268, 270, 273 and 124 with the regulations promulgated by EPA under the Resource Conservation and Recovery Act of 1976.

(b) Any person may petition the Board to modify or revoke any provision in Rules R315-260 through 266, 268, 270, 273, Rule R315-15 Rule R315-101, R315-102, and R315-124. A petition shall be considered under the procedures outlined in Section 63G-3-601 and Rule R15-2.

R315-260-21. Petitions for Equivalent Testing or Analytical Methods.

(a) Any person seeking to add a testing or analytical method to Rules R315-261, R315-264, or R315-265 may petition for a regulatory amendment under Section R315-260-21 and Section R315-260-20. To be successful, the person shall demonstrate to the satisfaction of the Board that the proposed method is equal to or superior to the corresponding method prescribed in Rules R315-261, R315-264, or R315-265, in terms of its sensitivity, accuracy, and precision, i.e., reproducibility.

(b) Each petition shall include, in addition to the information required by Section R315-260-20:

(1) A full description of the proposed method, including all procedural steps and equipment used in the method;

(2) A description of the types of wastes or waste matrices for which the proposed method may be used;

(3) Comparative results obtained from using the proposed method with those obtained from using the relevant or corresponding methods prescribed in Rules R315-261, R315-264, or R315-265;

(4) An assessment of any factors which may interfere with, or limit the use of, the proposed method; and

(5) A description of the quality control procedures necessary to ensure the sensitivity, accuracy and precision of the proposed method.

(c) After receiving a petition for an equivalent method, the Board may request any additional information on the proposed method which the Board may reasonably require to evaluate the method.

(d) If the Board amends the rules to permit use of a new testing method, the method shall be incorporated by reference in Section R315-260-11.

(e) Petitioner may, alternatively, proceed under the provisions of 40 CFR 260.21 to have an alternative analytical method approved by EPA. In the event approval is granted, the petitioner shall so notify the Board and the Director and the decision of EPA shall be binding upon the Board and the Director.

R315-260-22. Petitions to Amend Rule to Exclude a Waste Produced at a Particular Facility.

(a) Any person seeking to exclude a waste at a particular generating facility from the lists in Sections R315-261-30 through 35 may petition for a regulatory amendment under Section R315-260-22 and Section R315-260-20. To be successful:

(1) The petitioner shall demonstrate to the satisfaction of the Board that the waste produced by a particular generating facility does not meet any of the criteria under which the waste was listed as a hazardous or an acutely hazardous waste; and

(2) Based on a complete application, the Board shall determine, where it has a reasonable basis to believe that factors, including additional constituents, other than those for which the waste was listed could cause the waste to be a hazardous waste, that such factors do not warrant retaining the waste as a hazardous waste. A waste which is so excluded, however, still may be a hazardous waste by operation of Sections 261-20 through 24.

(b) The procedures in Sections R315-260-22 and R315-

260-20 may also be used to petition the Board for a regulatory amendment to exclude from Subsections R315-261-3(a)(2)(ii) or (c), a waste which is described in Subsections R315-261-3(a)(2)(ii) or (c) and is either a waste listed Sections R315-261-30 through 35 or is derived from a waste listed in Sections R315-261-30 through 35. This exclusion may only be issued for a particular generating, storage, treatment, or disposal facility. The petitioner shall make the same demonstration as required by Subsection R315-260-22(a). Where the waste is a mixture of solid waste and one or more listed hazardous wastes or is derived from one or more hazardous wastes, his demonstration shall be made with respect to the waste mixture as a whole; analyses shall be conducted for not only those constituents for which the listed waste contained in the mixture was listed as hazardous, but also for factors, including additional constituents, that could cause the waste mixture to be a hazardous waste. A waste which is so excluded may still be a hazardous waste by operation of Sections R315-261-20 through 24.

(c) If the waste is listed with codes "I", "C", "R", or "E", in Sections R315-261-30 through 35,

(1) The petitioner shall show that the waste does not exhibit the relevant characteristic for which the waste was listed as defined in Sections R315-261-21 through 24 using any applicable methods prescribed therein. The petitioner also shall show that the waste does not exhibit any of the other characteristics defined in Sections R315-261-21 through 24 using any applicable methods prescribed therein;

(2) Based on a complete application, the Board shall determine, where it has a reasonable basis to believe that factors, including additional constituents, other than those for which the waste was listed could cause the waste to be hazardous waste, that such factors do not warrant retaining the waste as a hazardous waste. A waste which is so excluded, however, still may be a hazardous waste by operation of Sections R315-261-20 through 24.

(d) If the waste is listed with code "T" in Sections R315-2611-30 through 35,

(1) The petitioner shall demonstrate that the waste:

(i) Does not contain the constituent or constituents, as defined in appendix VII of Rule R315-261, that caused the waste to be listed; or

(ii) Although containing one or more of the hazardous constituents, as defined in appendix VII of Rule R315-261, that caused the waste to be listed, does not meet the criterion of Subsection R315-261-11(a)(3) when considering the factors in Subsections R315-261-11(a)(3)(i) through (xi) under which the waste was listed as hazardous; and

(2) Based on a complete application, the Board shall determine, where it has a reasonable basis to believe that factors, including additional constituents, other than those for which the waste was listed could cause the waste to be a hazardous waste, that such factors do not warrant retaining the waste as a hazardous waste; and

(3) The petitioner shall demonstrate that the waste does not exhibit any of the characteristics defined in Sections R315-261.21 Through 24 using any applicable methods prescribed therein;

(4) A waste which is so excluded, however, still may be a hazardous waste by operation of Sections R315-261-20 through 24.

(e) If the waste is listed with the code "H" in Sections R315-261-30 through 35,

(1) The petitioner shall demonstrate that the waste does not meet the criterion of Subsection R315-261-11(a)(2); and

(2) Based on a complete application, the Board shall determine, where it has a reasonable basis to believe that additional factors, including additional constituents, other than those for which the waste was listed could cause the waste to be a hazardous waste, that such factors do not warrant retaining the waste as a hazardous waste; and

(3) The petitioner shall demonstrate that the waste does not exhibit any of the characteristics defined in Sections R315-261-21 through 24 using any applicable methods prescribed therein;

(4) A waste which is so excluded, however, still may be a hazardous waste by operation of Sections R315-261-20 through 24.

(f) Reserved.

(g) Reserved.

(h) Demonstration samples shall consist of enough representative samples, but in no case less than four samples, taken over a period of time sufficient to represent the variability or the uniformity of the waste.

(i) Each petition shall include, in addition to the information required by subsection R315-260-20(b):

(1) The name and address of the laboratory facility performing the sampling or tests of the waste;

(2) The names and qualifications of the persons sampling and testing the waste;

(3) The dates of sampling and testing;

(4) The location of the generating facility;

(5) A description of the manufacturing processes or other operations and feed materials producing the waste and an assessment of whether such processes, operations, or feed materials can or might produce a waste that is not covered by the demonstration;

(6) A description of the waste and an estimate of the average and maximum monthly and annual quantities of waste covered by the demonstration;

(7) Pertinent data on and discussion of the factors delineated in the respective criterion for listing a hazardous waste, where the demonstration is based on the factors in Subsection R315-261-11(a)(3);

(8) A description of the methodologies and equipment used to obtain the representative samples;

(9) A description of the sample handling and preparation techniques, including techniques used for extraction, containerization and preservation of the samples;

(10) A description of the tests performed, including results;

(11) The names and model numbers of the instruments used in performing the tests; and

(12) The following statement signed by the generator of the waste or his authorized representative:

(i) I certify under penalty of law that I have personally examined and am familiar with the information submitted in this demonstration and all attached documents, and that, based on my inquiry of those individuals immediately responsible for obtaining the information, I believe that the submitted information is true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment.

(j) After receiving a petition for an exclusion, the Board may request any additional information which the Board may reasonably require to evaluate the petition.

(k) An exclusion will only apply to the waste generated at the individual facility covered by the demonstration and will not apply to waste from any other facility.

(l) The Board may exclude only part of the waste for which the demonstration is submitted where it has reason to believe that variability of the waste justifies a partial exclusion.

(m) Petitioner may, alternatively, proceed under the provisions of 40 CFR 260.22 to have a particular waste delisted by EPA. In the event delisting is granted, the petitioner shall so notify the Board and the Director and the decision of EPA will be binding upon the Board and the Director unless, within 30 days after such notification, the Board specifically overrules the decision of EPA. In such event, the petitioner may petition the

Board directly under Section R315-260-22 for the relief sought.

R315-260-23. Petitions to Amend Rule R315-273 to Include Additional Hazardous Wastes.

(a) Any person seeking to add a hazardous waste or a category of hazardous waste to the universal waste regulations of Rule R315-273 may petition for a regulatory amendment under Section R315-260-23 Section R315-260-20, and Sections R315-273-80 and 81.

(b) To be successful, the petitioner shall demonstrate to the satisfaction of the Board that regulation under the universal waste regulations of Rule R315-273: Is appropriate for the waste or category of waste; will improve management practices for the waste or category of waste; and will improve implementation of the hazardous waste program. The petition shall include the information required by Subsection R315-260-20(b). The petition should also address as many of the factors listed in Section R315-273-81 as are appropriate for the waste or category of waste addressed in the petition.

(c) The Board shall grant or deny a petition using the factors listed in Section R315-273-81. The decision shall be based on the weight of evidence showing that regulation under Rule R315-273 is appropriate for the waste or category of waste, will improve management practices for the waste or category of waste, and will improve implementation of the hazardous waste program.

(d) The Board may request additional information needed to evaluate the merits of the petition.

R315-260-30. Non-Waste Determinations and Exclusion from Classification as a Solid Waste.

In accordance with the standards and criteria in Sections R315-260-31 and 34 and the procedures in Section R315-260-33, the Director may determine on a case-by-case basis that the following recycled materials are not solid wastes:

(a) Materials that are accumulated speculatively without sufficient amounts being recycled, as defined in Subsection R315-261-1(c)(8);

(b) Materials that are reclaimed and then reused within the original production process in which they were generated;

(c) Materials that have been reclaimed but must be reclaimed further before the materials are completely recovered;

(d) Hazardous secondary materials that are reclaimed in a continuous industrial process; and

(e) Hazardous secondary materials that are indistinguishable in all relevant aspects from a product or intermediate.

R315-260-31. Standards and Criteria for Exclusion from Classification as a Solid Waste.

(a) The Director may grant requests for exclusion from classifying as a solid waste those materials that are accumulated speculatively without sufficient amounts being recycled if the applicant demonstrates that sufficient amounts of the material will be recycled or transferred for recycling in the following year. If exclusion is granted, it is valid only for the following year, but can be renewed, on an annual basis, by filing a new application. The Director's decision will be based on the following criteria:

(1) The manner in which the material is expected to be recycled, when the material is expected to be recycled, and whether this expected disposition is likely to occur, for example, because of past practice, market factors, the nature of the material, or contractual arrangements for recycling;

(2) The reason that the applicant has accumulated the material for one or more years without recycling 75 percent of the volume accumulated at the beginning of the year;

(3) The quantity of material already accumulated and the quantity expected to be generated and accumulated before the material is recycled;

(4) The extent to which the material is handled to minimize loss; and

(5) Other relevant factors.

(b) The Director may grant requests for exclusion from classifying as a solid waste those materials that are reclaimed and then reused as feedstock within the original production process in which the materials were generated if the reclamation operation is an essential part of the production process. This determination will be based on the following criteria:

(1) How economically viable the production process would be if it were to use virgin materials, rather than reclaimed materials;

(2) The extent to which the material is handled before reclamation to minimize loss;

(3) The time periods between generating the material and its reclamation, and between reclamation and return to the original primary production process;

(4) The location of the reclamation operation in relation to the production process;

(5) Whether the reclaimed material is used for the purpose for which it was originally produced when it is returned to the original process, and whether it is returned to the process in substantially its original form;

(6) Whether the person who generates the material also reclaims it; and

(7) Other relevant factors.

(c) The Director may grant requests for exclusion from classifying as a solid waste those hazardous secondary materials that have been partially reclaimed, but must be reclaimed further before recovery is completed, if the partial reclamation has produced a commodity-like material. A determination that a partially-reclaimed material for which the change in classification is sought is commodity-like will be based on whether the hazardous secondary material is legitimately recycled as specified in Section R315-260-43 and on whether all of the following decision criteria are satisfied:

(1) Whether the degree of partial reclamation the material has undergone is substantial as demonstrated by using a partial reclamation process other than the process that generated the hazardous waste;

(2) Whether the partially reclaimed material has sufficient economic value that it will be purchased for further reclamation;

(3) Whether the partially-reclaimed material is a viable substitute for a product or intermediate produced from virgin or raw materials which is used in subsequent production steps;

(4) Whether there is a market for the partially-reclaimed material as demonstrated by known customer(s) who are further reclaiming the material, e.g., records of sales and/or contracts and evidence of subsequent use, such as bills of lading; and

(5) Whether the partially-reclaimed material is handled to minimize loss.

R315-260-32. Reclassification as a Boiler.

In accordance with the standards and criteria in the definition of a boiler found in Section R315-260-10, and the procedures in Section R315-260-33, the Board may determine on a case-by-case basis that certain enclosed devices using controlled flame combustion are boilers, even though they do not otherwise meet the definition of boiler contained in Subsection R315-260-10, after considering the following criteria:

(a) The extent to which the unit has provisions for recovering and exporting thermal energy in the form of steam, heated fluids, or heated gases; and

(b) The extent to which the combustion chamber and energy recovery equipment are of integral design; and

(c) The efficiency of energy recovery, calculated in terms of the recovered energy compared with the thermal value of the

fuel; and

(d) The extent to which exported energy is utilized; and

(e) The extent to which the device is in common and customary use as a "boiler" functioning primarily to produce steam, heated fluids, or heated gases; and

(f) Other factors, as appropriate.

R315-260-33. Procedures for Exclusion from Classification as a Solid Waste, for Reclassification as a Boiler, or for Non-waste Determinations.

The Director shall use the following procedures in evaluating applications for exclusion from classification as a solid waste, applications to classify particular enclosed controlled flame combustion devices as boilers, or applications for non-waste determinations.

(a) The applicant shall apply to the Director for the exclusion, reclassification, or non-waste determination. The application shall address the relevant criteria contained in Sections R315-260-31, 32, or 34, as applicable.

(b) The Director shall evaluate the application and issue a draft notice tentatively granting or denying the application. Notification of this tentative decision shall be provided by newspaper advertisement or radio broadcast in the locality where the facility requesting the exclusion, reclassification, or non-waste determination is located. The Director shall accept comment on the tentative decision for 30 days, and may also hold a public hearing upon request or at the Director's discretion. The Director shall issue a final decision after receipt of comments and after the hearing, if any.

(c) In the event of a change in circumstances that affect how a hazardous secondary material meets the relevant criteria contained in Sections R315-260-31 or 34 upon which a exclusion determination or non-waste determination has been based, the applicant shall send a description of the change in circumstances to the Director. The Director may issue a determination that the hazardous secondary material continues to meet the relevant criteria of the exclusion determination or non-waste determination or may require the facility to re-apply for the exclusion determination or non-waste determination.

(d) Exclusion determinations and non-waste determinations shall be effective for a fixed term not to exceed ten years. No later than six months prior to the end of this term, facilities shall re-apply for a exclusion determination or non-waste determination. If a facility re-applies for a exclusion determination or non-waste determination within six months, the facility may continue to operate under an expired exclusion determination or non-waste determination until receiving a decision on their re-application from the Director.

(e) Facilities receiving a exclusion determination or non-waste determination shall provide notification as required by Section R315-260-42.

R315-260-34. Standards and Criteria for Non-Waste Determinations.

(a) An applicant may apply to the Director for a formal determination that a hazardous secondary material is not discarded and therefore not a solid waste. The determinations will be based on the criteria contained in Subsections R315-260-34(b) or (c), as applicable. If an application is denied, the hazardous secondary material might still be eligible for a solid waste variance or exclusion.

(b) The Director may grant a non-waste determination for hazardous secondary material which is reclaimed in a continuous industrial process if the applicant demonstrates that the hazardous secondary material is a part of the production process and is not discarded. The determination will be based on whether the hazardous secondary material is legitimately recycled as specified in Section R315-260-43 and on the following criteria:

(1) The extent that the management of the hazardous secondary material is part of the continuous primary production process and is not waste treatment;

(2) Whether the capacity of the production process would use the hazardous secondary material in a reasonable time frame and ensure that the hazardous secondary material will not be abandoned, for example, based on past practices, market factors, the nature of the hazardous secondary material, or any contractual arrangements;

(3) Whether the hazardous constituents in the hazardous secondary material are reclaimed rather than released to the air, water or land at significantly higher levels from either a statistical or from a health and environmental risk perspective than would otherwise be released by the production process; and

(4) Other relevant factors that demonstrate the hazardous secondary material is not discarded, including why the hazardous secondary material cannot meet, or should not have to meet, the conditions of an exclusion under Sections R315-261-2 or 4.

(c) The Director may grant a non-waste determination for hazardous secondary material which is indistinguishable in all relevant aspects from a product or intermediate if the applicant demonstrates that the hazardous secondary material is comparable to a product or intermediate and is not discarded. The determination will be based on whether the hazardous secondary material is legitimately recycled as specified in Section R315-260-43 and on the following criteria:

(1) Whether market participants treat the hazardous secondary material as a product or intermediate rather than a waste, for example, based on the current positive value of the hazardous secondary material, stability of demand, or any contractual arrangements;

(2) Whether the chemical and physical identity of the hazardous secondary material is comparable to commercial products or intermediates;

(3) Whether the capacity of the market would use the hazardous secondary material in a reasonable time frame and ensure that the hazardous secondary material will not be abandoned, for example, based on past practices, market factors, the nature of the hazardous secondary material, or any contractual arrangements;

(4) Whether the hazardous constituents in the hazardous secondary material are reclaimed rather than released to the air, water or land at significantly higher levels from either a statistical or from a health and environmental risk perspective than would otherwise be released by the production process; and

(5) Other relevant factors that demonstrate the hazardous secondary material is not discarded, including why the hazardous secondary material cannot meet, or should not have to meet, the conditions of an exclusion under Sections R315-261-2 or 4.

R315-260-40. Additional Regulation of Certain Hazardous Waste Recycling Activities on a Case-by-Case Basis.

(a) The Director may decide on a case-by-case basis that persons accumulating or storing the recyclable materials described in Subsection R315-261-6(a)(2)(iii) should be regulated under Subsection R315-261-6(b) and (c). The basis for this decision is that the materials are being accumulated or stored in a manner that does not protect human health and the environment because the materials or their toxic constituents have not been adequately contained, or because the materials being accumulated or stored together are incompatible. In making this decision, the Director shall consider the following factors:

(1) The types of materials accumulated or stored and the amounts accumulated or stored;

(2) The method of accumulation or storage;

(3) The length of time the materials have been

accumulated or stored before being reclaimed;

(4) Whether any contaminants are being released into the environment, or are likely to be so released; and

(5) Other relevant factors.

(2) The procedures for this decision are set forth in R315-260-41.

R315-260-41. Procedures for Case-by-Case Regulation of Hazardous Waste Recycling Activities.

The Director shall use the following procedures when determining whether to regulate hazardous waste recycling activities described in Subsection R315-261-6(a)(2)(iii) under the provisions of Subsection R315-261-6(b) and (c), rather than under the provisions of Section R315-266-70.

(a) If a generator is accumulating the waste, the Director shall issue a notice setting forth the factual basis for the decision and stating that the person shall comply with the applicable requirements of Sections R315-262-10 through 12, R315-262-30 through 34, R315-262-40 through 44, and R315-262-50 through 58. The notice shall become final within 30 days, unless a request for agency action is made under the requirements of the Administrative Procedures Act.

(b) If the person is accumulating the recyclable material as a storage facility, the notice will state that the person shall obtain a permit in accordance with all applicable provisions of Rule R315-270 and 124. The owner or operator of the facility shall apply for a permit within no less than 60 days and no more than six months of notice, as specified in the notice. If the owner or operator of the facility wishes to challenge the Director's decision, he may do so in in accordance with the Administrative Procedures Act.

R315-260-42. Notification Requirement for Hazardous Secondary Materials.

(a) Facilities managing hazardous secondary materials under Section R315-260-30, or Subsections R315-261-4(a)(23), (24), (25), or (27) shall send a notification prior to operating under the regulatory provision and by March 1 of each even numbered year thereafter to the Director using EPA Form 8700-12 that includes the following information:

(1) The name, address, and EPA ID number, if applicable, of the facility;

(2) The name and telephone number of a contact person;

(3) The NAICS code of the facility;

(4) The regulation under which the hazardous secondary materials shall be managed;

(5) For reclaimers and intermediate facilities managing hazardous secondary materials in accordance with Subsections R315-261-4(a)(24) or (25), whether the reclaimer or intermediate facility has financial assurance (not applicable for persons managing hazardous secondary materials generated and reclaimed under the control of the generator);

(6) When the facility began or expects to begin managing the hazardous secondary materials in accordance with the regulation;

(7) A list of hazardous secondary materials that shall be managed according to the regulation, reported as the EPA hazardous waste numbers that would apply if the hazardous secondary materials were managed as hazardous wastes;

(8) For each hazardous secondary material, whether the hazardous secondary material, or any portion thereof, will be managed in a land-based unit;

(9) The quantity of each hazardous secondary material to be managed annually; and

(10) The certification, included in EPA Form 8700-12, signed and dated by an authorized representative of the facility.

(b) If a facility managing hazardous secondary materials has submitted a notification, but then subsequently stops managing hazardous secondary materials in accordance with the regulation(s) listed above, the facility shall notify the Director within thirty days using EPA Form 8700-12. For purposes of Section R315-260-42, a facility has stopped managing hazardous secondary materials if the facility no longer generates, manages and/or reclaims hazardous secondary materials under the regulation(s) above and does not expect to manage any amount of hazardous secondary materials for at least 1 year.

R315-260-43. Legitimate Recycling of Hazardous Secondary Materials.

(a) Recycling of hazardous secondary materials for the purpose of the exclusions or exemptions from the hazardous waste regulations shall be legitimate. Hazardous secondary material that is not legitimately recycled is discarded material and is a solid waste. In determining if their recycling is legitimate, persons shall address all the requirements of Subsections R315-260-43(a)(1) through (3) and shall consider the requirements of Subsection R315-260-43(b).

(1) Legitimate recycling shall involve a hazardous secondary material that provides a useful contribution to the recycling process or to a product or intermediate of the recycling process. The hazardous secondary material provides a useful contribution if it:

(i) Contributes valuable ingredients to a product or intermediate; or

(ii) Replaces a catalyst or carrier in the recycling process; or

(iii) Is the source of a valuable constituent recovered in the recycling process; or

(iv) Is recovered or regenerated by the recycling process; or

(v) Is used as an effective substitute for a commercial product.

(2) The recycling process shall produce a valuable product or intermediate. The product or intermediate is valuable if it is:

(i) Sold to a third party; or

(ii) Used by the recycler or the generator as an effective substitute for a commercial product or as an ingredient or intermediate in an industrial process.

(3) The generator and the recycler shall manage the hazardous secondary material as a valuable commodity when it is under their control. Where there is an analogous raw material, the hazardous secondary material shall be managed, at a minimum, in a manner consistent with the management of the raw material or in an equally protective manner. Where there is no analogous raw material, the hazardous secondary material shall be contained. Hazardous secondary materials that are released to the environment and are not recovered immediately are discarded.

(b) The following factor shall be considered in making a determination as to the overall legitimacy of a specific recycling activity.

(1) The product of the recycling process does not:

(i) Contain significant concentrations of any hazardous constituents found in Section R315-261-1092 that are not found in analogous products; or

(ii) Contain concentrations of hazardous constituents found in Section R315-261-1092 at levels that are significantly elevated from those found in analogous products, or

(iii) Exhibit a hazardous characteristic, as defined in Subsections R315-261-20 through 24, that analogous products do not exhibit.

(2) In making a determination that a hazardous secondary material is legitimately recycled, persons shall evaluate all factors and consider legitimacy as a whole. If, after careful evaluation of these considerations, the factor in this paragraph is not met, then this fact may be an indication that the material is not legitimately recycled. However, the factor in this

paragraph does not have to be met for the recycling to be considered legitimate. In evaluating the extent to which this factor is met and in determining whether a process that does not meet this factor is still legitimate, persons can consider exposure from toxics in the product, the bioavailability of the toxics in the product and other relevant considerations.

KEY: hazardous waste
October 15, 2019 **19-1-301**
19-6-105
19-6-106

R315. Environmental Quality, Waste Management and Radiation Control, Waste Management.
R315-261. General Requirements -- Identification and Listing of Hazardous Waste.
R315-261-1. Purpose and Scope.

(a) This rule identifies those solid wastes which are subject to regulation as hazardous wastes under Rules R315-262 through 265, 268, 270, and 124 and which are subject to the notification requirements of these rules.

(1) Sections R315-261-1 through 9 define the terms "solid waste" and "hazardous waste", identfies those wastes which are excluded from regulation under Rules R315-262 through R315-266, R315-268 and R315-270 and establish special management requirements for hazardous waste produced by very small quantity generators and hazardous waste which is recycled.

(2) Sections R315-261-10 and 11 set forth the criteria used to identify characteristics of hazardous waste and to list particular hazardous wastes.

(3) Sections R315-261-20 through 24 identify characteristics of hazardous waste.

(4) Sections R315-261-30 through 35 list particular hazardous wastes.

(b)(1) The definition of solid waste contained in this rule applies only to wastes that also are hazardous for purposes of the rules implementing Title 19 Chapter 6. For example, it does not apply to materials such as non-hazardous scrap, paper, textiles, or rubber that are not otherwise hazardous wastes and that are recycled.

(2) Rule R315-261 identifies only some of the materials which are solid wastes and hazardous wastes under the Utah Solid and Hazardous Waste Act. A material which is not defined as a solid waste in Rule R315-261, or is not a hazardous waste identified or listed in Rule R315-261, is still a solid waste and a hazardous waste for purposes of these sections if:

(i) In the case of section 19-6-109, the Director has reason to believe that the material may be a solid waste within the meaning of Subsection 19-6-102(13) and a hazardous waste within the meaning of Subsection 19-6-102(7) or

(ii) In the case of section 19-6-115, the material is presenting an imminent and substantial danger to human health or the environment.

(c) For the purposes of Sections R315-261-2 and 261-6:

(1) A "spent material" is any material that has been used and as a result of contamination can no longer serve the purpose for which it was produced without processing;

(2) "Sludge" has the same meaning used in Section R315-260-10;

(3) A "by-product" is a material that is not one of the primary products of a production process and is not solely or separately produced by the production process. Examples are process residues such as slags or distillation column bottoms. The term does not include a co-product that is produced for the general public's use and is ordinarily used in the form it is produced by the process.

(4) A material is "reclaimed" if it is processed to recover a usable product, or if it is regenerated. Examples are recovery of lead values from spent batteries and regeneration of spent solvents. In addition, for purposes of Subsections R315-261-4(a)(23), and (24) smelting, melting and refining furnaces are considered to be solely engaged in metals reclamation if the metal recovery from the hazardous secondary materials meets the same requirements as those specified for metals recovery from hazardous waste found in Subsection R315-266-100(d)(1) through (3), and if the residuals meet the requirements specified in Section R315-266-112.

(5) A material is "used or reused" if it is either:

(i) Employed as an ingredient, including use as an intermediate, in an industrial process to make a product, for example, distillation bottoms from one process used as feedstock in another process. However, a material will not satisfy this condition if distinct components of the material are recovered as separate end products, as when metals are recovered from metal-containing secondary materials; or

(ii) Employed in a particular function or application as an effective substitute for a commercial product, for example, spent pickle liquor used as phosphorous precipitant and sludge conditioner in wastewater treatment.

(6) "Scrap metal" is bits and pieces of metal parts; for example bars, turnings, rods, sheets, or wire; or metal pieces that may be combined together with bolts or soldering; for example radiators, scrap automobiles, or railroad box cars; which when worn or superfluous can be recycled.

(7) A material is "recycled" if it is used, reused, or reclaimed.

(8) A material is "accumulated speculatively" if it is accumulated before being recycled. A material is not accumulated speculatively, however, if the person accumulating it can show that the material is potentially recyclable and has a feasible means of being recycled; and that during the calendar year, commencing on January 1, the amount of material that is recycled, or transferred to a different site for recycling, equals at least 75 percent by weight or volume of the amount of that material accumulated at the beginning of the period. Materials shall be placed in a storage unit with a label indicating the first date that the material began to be accumulated. If placing a label on the storage unit is not practicable, the accumulation period shall be documented through an inventory log or other appropriate method. In calculating the percentage of turnover, the 75 percent requirement is to be applied to each material of the same type, e.g., slags from a single smelting process, that is recycled in the same way, i.e., from which the same material is recovered or that is used in the same way. Materials accumulating in units that would be exempt from regulation under Subsection R315-261-4(c) are not to be included in making the calculation. Materials that are already defined as solid wastes also are not to be included in making the calculation. Materials are no longer in this category once they are removed from accumulation for recycling, however.

(9) "Excluded scrap metal" is processed scrap metal, unprocessed home scrap metal, and unprocessed prompt scrap metal.

(10) "Processed scrap metal" is scrap metal which has been manually or physically altered to either separate it into distinct materials to enhance economic value or to improve the handling of materials. Processed scrap metal includes, but is not limited to scrap metal which has been baled, shredded, sheared, chopped, crushed, flattened, cut, melted, or separated by metal type, i.e., sorted, and, fines, drosses and related materials which have been agglomerated. Note: shredded circuit boards being sent for recycling are not considered processed scrap metal. They are covered under the exclusion from the definition of solid waste for shredded circuit boards being recycled Subsection R315-261-4(a)(14).

(11) "Home scrap metal" is scrap metal as generated by steel mills, foundries, and refineries such as turnings, cuttings, punchings, and borings.

(12) "Prompt scrap metal" is scrap metal as generated by the metal working/fabrication industries and includes such scrap metal as turnings, cuttings, punchings, and borings. Prompt scrap is also known as industrial or new scrap metal.

R315-261-2. Definition of Solid Waste.

(a)(1) A solid waste is any discarded material that is not excluded by Subsection R315-261-4(a) or that is not excluded under Sections R315-260-30 and R315-260-31 or that is not excluded by a non-waste determination under Sections R315-260-30 and R315-260-34.

(2)(i) A discarded material is any material which is:

(A) Abandoned, as explained in Subsection R315-261-2(b); or

(B) Recycled, as explained in Subsection R315-261-2(c); or

(C) Considered inherently waste-like, as explained in Subsection R315-261-2(d).

(b) Materials are solid waste if they are abandoned by being:

(1) Disposed of; or

(2) Burned or incinerated; or

(3) Accumulated, stored, or treated, but not recycled, before or in lieu of being abandoned by being disposed of, burned, or incinerated; or

(4) Sham recycled, as explained in Subsection R315-261-2(g)

(c) Materials are solid wastes if they are recycled-or accumulated, stored, or treated before recycling-as specified in Subsections R315-261-2(c)(1) through (4).

(1) Used in a manner constituting disposal.

(i) Materials noted with a "*" in Column 1 of Table 1 are solid wastes when they are:

(A) Applied to or placed on the land in a manner that constitutes disposal; or

(B) Used to produce products that are applied to or placed on the land or are otherwise contained in products that are applied to or placed on the land (in which cases the product itself remains a solid waste).

(ii) However, commercial chemical products listed in Section R315-261-33 are not solid wastes if they are applied to the land and that is their ordinary manner of use.

(2) Burning for energy recovery.

(i) Materials noted with a "*" in column 2 of Table 1 are solid wastes when they are:

(A) Burned to recover energy;

(B) Used to produce a fuel or are otherwise contained in fuels, in which cases the fuel itself remains a solid waste.

(ii) However, commercial chemical products listed in Section R315-261-33 are not solid wastes if they are themselves fuels.

(3) Reclaimed. Materials noted with a "-" in column 3 of Table 1 are not solid wastes when reclaimed. Materials noted with an "*" in column 3 of Table 1 are solid wastes when reclaimed unless they meet the requirements of Subsections R315-261-4(a)(17), or R315-261-4(a)(23), R315-261-4(a)(24) or R35-261-4(a)(27).

(4) Accumulated speculatively. Materials noted with a "*" in column 4 of Table 1 are solid wastes when accumulated speculatively.

Table 1

	Use Constituting Disposal 261-2(c)(1)	Energy recovery/ fuel 261-2(c)(2)	Reclamation except as provided in 261-4-(a)(17) 261-4(a)(23) 261-4(a)(24) or 261-4(a)(27)	Speculative accumulation 261-2(c)(3)	261-2(c)(4)
	1	2	3	4	
Spent Materials	(*)	(*)	(*)	(*)	
Sludges (listed in 261-31 or 261-32)	(*)	(*)	(*)	(*)	
Sludges exhibiting a characteristic of hazardous waste	(*)	(*)	-	(*)	
By-products	(*)	(*)	(*)	(*)	
(listed in 261-31 or 261-32					
By-products exhibiting a characteristic of hazardous waste	(*)	(*)	-	(*)	
Commercial chemical products listed in 261-33	(*)	(*)			
Scrap metal that is not excluded under 261-4(a)(13)	(*)	(*)	(*)	(*)	

Note 1: All rule references in Table 1 are to R315.
Note 2: The terms "spent materials," "sludges," "by-products," and "scrap metal" and "processed scrap metal" are defined in Section R315-261-1.

(d) Inherently waste-like materials. The following materials are solid wastes when they are recycled in any manner:

(1) Hazardous Waste Nos. F020; F021, unless used as an ingredient to make a product at the site of generation; F022; F023; F026; and F028.

(2) Secondary materials fed to a halogen acid furnace that exhibit a characteristic of a hazardous waste or are listed as a hazardous waste as defined in Sections R315-261-20 through 24 and 30 through 35, except for brominated material that meets the following criteria:

(i) The material shall contain a bromine concentration of at least 45%; and

(ii) The material shall contain less than a total of 1% of toxic organic compounds listed in Rule R315-261 appendix VIII; and

(iii) The material is processed continually on-site in the halogen acid furnace via direct conveyance, hard piping.

(3) The Board shall use the following criteria to add wastes to Subsection R315-261-2(d)(1) or (2):

(i)(A) The materials are ordinarily disposed of, burned, or incinerated; or

(B) The materials contain toxic constituents listed in appendix VIII of Rule R315-261 and these constituents are not ordinarily found in raw materials or products for which the materials substitute (or are found in raw materials or products in smaller concentrations) and are not used or reused during the recycling process; and

(ii) The material may pose a substantial hazard to human health and the environment when recycled.

(e) Materials that are not solid waste when recycled.

(1) Materials are not solid wastes when they can be shown to be recycled by being:

(i) Used or reused as ingredients in an industrial process to make a product, provided the materials are not being reclaimed; or

(ii) Used or reused as effective substitutes for commercial products; or

(iii) Returned to the original process from which they are generated, without first being reclaimed or land disposed. The material shall be returned as a substitute for feedstock materials. In cases where the original process to which the material is returned is a secondary process, the materials shall be managed such that there is no placement on the land. In cases where the materials are generated and reclaimed within the primary mineral processing industry, the conditions of the exclusion found at Subsection R315-261-4(a)(17) apply rather than Subsection R315-261-2(e)(1)(iii).

(2) The following materials are solid wastes, even if the recycling involves use, reuse, or return to the original process described in Subsections R315-261-2(e)(1)(i) through (iii):

(i) Materials used in a manner constituting disposal, or used to produce products that are applied to the land; or

(ii) Materials burned for energy recovery, used to produce a fuel, or contained in fuels; or

(iii) Materials accumulated speculatively; or

(iv) Materials listed in Subsections R315-261-2(d)(1) and (d)(2).

(f) Documentation of claims that materials are not solid wastes or are conditionally exempt from regulation. Respondents in actions to enforce rules implementing Sections 19-6-101 through 125 who raise a claim that a certain material is not a solid waste, or is conditionally exempt from regulation, shall demonstrate that there is a known market or disposition for the material, and that they meet the terms of the exclusion or exemption. In doing so, they shall provide appropriate documentation, such as contracts showing that a second person uses the material as an ingredient in a production process, to demonstrate that the material is not a waste, or is exempt from regulation. In addition, owners or operators of facilities claiming that they actually are recycling materials shall show that they have the necessary equipment to do so.

(g) Sham recycling. A hazardous secondary material found to be sham recycled is considered discarded and a solid waste. Sham recycling is recycling that is not legitimate recycling as defined in Section R315-260-43.

R315-261-3. Definition of Hazardous Waste.

(a) A solid waste, as defined in Section R315-261-2, is a hazardous waste if:

(1) It is not excluded from regulation as a hazardous waste under Subsection R315-261-4(b); and

(2) It meets any of the following criteria:

(i) It exhibits any of the characteristics of hazardous waste identified in Sections R315-261-20 through 24. However, any mixture of a waste from the extraction, beneficiation, and processing of ores and minerals excluded under Subsection R315-261-4(b)(7) and any other solid waste exhibiting a characteristic of hazardous waste under Sections R315-261-20 through 24 is a hazardous waste only if it exhibits a characteristic that would not have been exhibited by the excluded waste alone if such mixture had not occurred, or if it continues to exhibit any of the characteristics exhibited by the non-excluded wastes prior to mixture. Further, for the purposes of applying the Toxicity Characteristic to such mixtures, the mixture is also a hazardous waste if it exceeds the maximum concentration for any contaminant listed in table 1 to Section R315-261-24 that would not have been exceeded by the excluded waste alone if the mixture had not occurred or if it continues to exceed the maximum concentration for any contaminant exceeded by the nonexempt waste prior to mixture.

(ii) It is listed in Sections R315-261-30 through 35 and has not been excluded from the lists in Sections R315-261-30 through 35 under Sections R315-260-.20 and R315-260-22.

(iii) (Reserved)

(iv) It is a mixture of solid waste and one or more hazardous wastes listed in Sections R315-261-30 through 35 and has not been excluded from Subsection R315-261-3(a)(2) under Sections R315-260-20 and R315-260-22, Subsection R315-261-3(g), or Subsection R315-261-3(h); however, the following mixtures of solid wastes and hazardous wastes listed in Sections R315-261-30 through 35 are not hazardous wastes, except by application of Subsections R315-261-3(a)(2)(i) or (ii), if the generator can demonstrate that the mixture consists of wastewater the discharge of which is subject to regulation under either section 402 or section 307(b) of the Clean Water Act,including wastewater at facilities which have eliminated the discharge of wastewater, and;

(A) One or more of the following spent solvents listed in Section R315-261-31: benzene, carbon tetrachloride, tetrachloroethylene, trichloroethylene or the scrubber waters derived-from the combustion of these spent solvents-Provided, That the maximum total weekly usage of these solvents, other than the amounts that can be demonstrated not to be discharged to wastewater, divided by the average weekly flow of wastewater into the headworks of the facility's wastewater treatment or pretreatment system does not exceed 1 part per million, or the total measured concentration of these solvents entering the headworks of the facility's wastewater treatment system, at facilities subject to regulation under the Utah Air Conservation Act, or at facilities subject to an enforceable limit in a federal operating permit that minimizes fugitive emissions, does not exceed 1 part per million on an average weekly basis. Any facility that uses benzene as a solvent and claims this exemption shall use an aerated biological wastewater treatment system and shall use only lined surface impoundments or tanks prior to secondary clarification in the wastewater treatment system. Facilities that choose to measure concentration levels shall file a copy of their sampling and analysis plan with the Director. A facility shall file a copy of a revised sampling and analysis plan only if the initial plan is rendered inaccurate by changes in the facility's operations. The sampling and analysis plan shall include the monitoring point location (headworks), the sampling frequency and methodology, and a list of constituents to be monitored. A facility is eligible for the direct monitoring option once they receive confirmation that the sampling and analysis plan has been received by the Director. The Director may reject the sampling and analysis plan if the Director finds that, the sampling and analysis plan fails to include the above information; or the plan parameters would not enable the facility to calculate the weekly average concentration of these chemicals accurately. If the Director rejects the sampling and analysis plan or if the Director finds that the facility is not following the sampling and analysis plan, the Director shall notify the facility to cease the use of the direct monitoring option until such time as the bases for rejection are corrected; or

(B) One or more of the following spent solvents listed in Section R315-261-31: methylene chloride, 1,1,1-trichloroethane, chlorobenzene, o-dichlorobenzene, cresols, cresylic acid, nitrobenzene, toluene, methyl ethyl ketone, carbon disulfide, isobutanol, pyridine, spent chlorofluorocarbon solvents, 2-ethoxyethanol, or the scrubber waters derived-from the combustion of these spent solvents-Provided That the maximum total weekly usage of these solvents, other than the amounts that can be demonstrated not to be discharged to wastewater, divided by the average weekly flow of wastewater into the headworks of the facility's wastewater treatment or pretreatment system does not exceed 25 parts per million, or the total measured concentration of these solvents entering the headworks of the facility's wastewater treatment system; at facilities subject to regulation under the Utah Air Conservation Act, or at facilities subject to an enforceable limit in a federal operating permit that minimizes fugitive emissions; does not exceed 25 parts per million on an average weekly basis. Facilities that choose to measure concentration levels shall file a copy of their sampling and analysis plan with the Director. A facility shall file a copy of a revised sampling and analysis plan only if the initial plan is rendered inaccurate by changes in the facility's operations. The sampling and analysis plan shall include the monitoring point location (headworks), the sampling frequency and methodology, and a list of constituents to be monitored. A facility is eligible for the direct monitoring option once they receive confirmation that the sampling and analysis plan has been received by the Director. The Director may reject the sampling and analysis plan if the Director finds that, the sampling and analysis plan fails to include the above information; or the plan parameters would not enable the facility to calculate the weekly average concentration of these chemicals

accurately. If the Director rejects the sampling and analysis plan or if the Director finds that the facility is not following the sampling and analysis plan, the Director shall notify the facility to cease the use of the direct monitoring option until such time as the bases for rejection are corrected; or

(C) One of the following wastes listed in Section R315-261-32, provided that the wastes are discharged to the refinery oil recovery sewer before primary oil/water/solids separation-heat exchanger bundle cleaning sludge from the petroleum refining industry, EPA Hazardous Waste No. K050; crude oil storage tank sediment from petroleum refining operations, EPA Hazardous Waste No. K169; clarified slurry oil tank sediment and/or in-line filter/separation solids from petroleum refining operations, EPA Hazardous Waste No. K170; spent hydrotreating catalyst, EPA Hazardous Waste No. K171; and spent hydrorefining catalyst, EPA Hazardous Waste No. K172; or

(D) A discarded hazardous waste, commercial chemical product, or chemical intermediate listed in Sections R315-261-31 through R315-261-33, arising from de minimis losses of these materials. For purposes of this Subsection R315-261-3(a)(2)(iv)(D), de minimis losses are inadvertent releases to a wastewater treatment system, including those from normal material handling operations, e.g., spills from the unloading or transfer of materials from bins or other containers, leaks from pipes, valves or other devices used to transfer materials; minor leaks of process equipment, storage tanks or containers; leaks from well maintained pump packings and seals; sample purgings; relief device discharges; discharges from safety showers and rinsing and cleaning of personal safety equipment; and rinsate from empty containers or from containers that are rendered empty by that rinsing. Any manufacturing facility that claims an exemption for de minimis quantities of wastes listed in Sections R315-261-31 through R315-261-32, or any nonmanufacturing facility that claims an exemption for de minimis quantities of wastes listed in Sections R315-261-30 through 35 shall either have eliminated the discharge of wastewaters or have included in its Clean Water Act permit application or submission to its pretreatment control authority the constituents for which each waste was listed in Rule R315-261 appendix VII; and the constituents in the table "Treatment Standards for Hazardous Wastes" in Section R315-268-40 for which each waste has a treatment standard (i.e., Land Disposal Restriction constituents). A facility is eligible to claim the exemption once the permit writer or control authority has been notified of possible de minimis releases via the Clean Water Act permit application or the pretreatment control authority submission. A copy of the Clean Water permit application or the submission to the pretreatment control authority shall be placed in the facility's on-site files; or

(E) Wastewater resulting from laboratory operations containing toxic (T) wastes listed in Sections R315-261-30 through 35, Provided, That the annualized average flow of laboratory wastewater does not exceed one percent of total wastewater flow into the headworks of the facility's wastewater treatment or pre-treatment system or provided the wastes, combined annualized average concentration does not exceed one part per million in the headworks of the facility's wastewater treatment or pre-treatment facility. Toxic wastes used in laboratories that are demonstrated not to be discharged to wastewater are not to be included in this calculation; or

(F) One or more of the following wastes listed in Section R315-261.32: wastewaters from the production of carbamates and carbamoyl oximes, EPA Hazardous Waste No. K157 - Provided that the maximum weekly usage of formaldehyde, methyl chloride, methylene chloride, and triethylamine, including all amounts that cannot be demonstrated to be reacted in the process, destroyed through treatment, or is recovered, i.e., what is discharged or volatilized, divided by the average weekly flow of process wastewater prior to any dilution into the headworks of the facility's wastewater treatment system does not exceed a total of 5 parts per million by weight or the total measured concentration of these chemicals entering the headworks of the facility's wastewater treatment system (at facilities subject to regulation under the Utah Air Conservation Act, or at facilities subject to an enforceable limit in a federal operating permit that minimizes fugitive emissions), does not exceed 5 parts per million on an average weekly basis. Facilities that choose to measure concentration levels shall file copy of their sampling and analysis plan with the Director. A facility shall file a copy of a revised sampling and analysis plan only if the initial plan is rendered inaccurate by changes in the facility's operations. The sampling and analysis plan shall include the monitoring point location (headworks), the sampling frequency and methodology, and a list of constituents to be monitored. A facility is eligible for the direct monitoring option once they receive confirmation that the sampling and analysis plan has been received by the Director. The Director may reject the sampling and analysis plan if the Director finds that, the sampling and analysis plan fails to include the above information; or the plan parameters would not enable the facility to calculate the weekly average concentration of these chemicals accurately. If the Director rejects the sampling and analysis plan or if the Director finds that the facility is not following the sampling and analysis plan, the Director shall notify the facility to cease the use of the direct monitoring option until such time as the bases for rejection are corrected; or

(G) Wastewaters derived-from the treatment of one or more of the following wastes listed in Section R315-261-32:organic waste, including heavy ends, still bottoms, light ends, spent solvents, filtrates, and decantates, from the production of carbamates and carbamoyl oximes, EPA Hazardous Waste No. K156. Provided, that the maximum concentration of formaldehyde, methyl chloride, methylene chloride, and triethylamine prior to any dilutions into the headworks of the facility's wastewater treatment system does not exceed a total of 5 milligrams per liter or the total measured concentration of these chemicals entering the headworks of the facility's wastewater treatment system (at facilities subject to regulation under the Utah Air Conservation Act, or at facilities subject to an enforceable limit in a federal operating permit that minimizes fugitive emissions), does not exceed 5 milligrams per liter on an average weekly basis. Facilities that choose to measure concentration levels shall file copy of their sampling and analysis plan with the Director. A facility shall file a copy of a revised sampling and analysis plan only if the initial plan is rendered inaccurate by changes in the facility's operations. The sampling and analysis plan shall include the monitoring point location (headworks), the sampling frequency and methodology, and a list of constituents to be monitored. A facility is eligible for the direct monitoring option once they receive confirmation that the sampling and analysis plan has been received by the Director. The Director may reject the sampling and analysis plan if the Director finds that, the sampling and analysis plan fails to include the above information; or the plan parameters would not enable the facility to calculate the weekly average concentration of these chemicals accurately. If the Director rejects the sampling and analysis plan or if the Director finds that the facility is not following the sampling and analysis plan, the Director shall notify the facility to cease the use of the direct monitoring option until such time as the bases for rejection are corrected.

(v) Rebuttable presumption for used oil. Used oil containing more than 1000 ppm total halogens is presumed to be a hazardous waste because it has been mixed with halogenated hazardous waste listed in Sections R315-261-30 through 35. Persons may rebut this presumption by demonstrating that the used oil does not contain hazardous

waste; for example, to show that the used oil does not contain significant concentrations of halogenated hazardous constituents listed in appendix VIII of Rule R315-261.

(A) The rebuttable presumption does not apply to metalworking oils/fluids containing chlorinated paraffins, if they are processed, through a tolling agreement, to reclaim metalworking oils/fluids. The presumption does apply to metalworking oils/fluids if such oils/fluids are recycled in any other manner, or disposed.

(B) The rebuttable presumption does not apply to used oils contaminated with chlorofluorocarbons (CFCs) removed from refrigeration units where the CFCs are destined for reclamation. The rebuttable presumption does apply to used oils contaminated with CFCs that have been mixed with used oil from sources other than refrigeration units.

(b) A solid waste which is not excluded from regulation under Subsection R315-261-3(a)(1) becomes a hazardous waste when any of the following events occur:

(1) In the case of a waste listed in Sections R315-261-30 through 35, when the waste first meets the listing description set forth in R315-261-30 through 35.

(2) In the case of a mixture of solid waste and one or more listed hazardous wastes, when a hazardous waste listed in R315-261-30 through 35 is first added to the solid waste.

(3) In the case of any other waste, including a waste mixture, when the waste exhibits any of the characteristics identified in Sections R315-261-20 through 24.

(c) Unless and until it meets the criteria of Subsection R315-261-3(d):

(1) A hazardous waste shall remain a hazardous waste.

(2)(i) Except as otherwise provided in Subsections R315-261-3(c)(2)(ii), or (g), any solid waste generated from the treatment, storage, or disposal of a hazardous waste, including any sludge, spill residue, ash emission control dust, or leachate, but not including precipitation run-off, is a hazardous waste. However, materials that are reclaimed from solid wastes and that are used beneficially are not solid wastes and hence are not hazardous wastes under this provision unless the reclaimed material is burned for energy recovery or used in a manner constituting disposal.

(ii) The following solid wastes are not hazardous even though they are generated from the treatment, storage, or disposal of a hazardous waste, unless they exhibit one or more of the characteristics of hazardous waste:

(A) Waste pickle liquor sludge generated by lime stabilization of spent pickle liquor from the iron and steel industry, SIC Codes 331 and 332.

(B) Waste from burning any of the materials exempted from regulation by Subsection R315-261-6(a)(3)(iii) and (iv).

(C)(I) Nonwastewater residues, such as slag, resulting from high temperature metals recovery processing of K061, K062 or F006 waste, in units identified as rotary kilns, flame reactors, electric furnaces, plasma arc furnaces, slag reactors, rotary hearth furnace/electric furnace combinations or industrial furnaces, as defined in Section R315-260-10, that are disposed in solid waste landfills regulated under Rules R315-301 through R315-320, provided that these residues meet the generic exclusion levels identified in the tables below for all constituents, and exhibit no characteristics of hazardous waste. Testing requirements shall be incorporated in a facility's waste analysis plan or a generator's self-implementing waste analysis plan; at a minimum, composite samples of residues shall be collected and analyzed quarterly and/or when the process or operation generating the waste changes. Persons claiming this exclusion in an enforcement action shall have the burden of proving by clear and convincing evidence that the material meets all of the exclusion requirements.

TABLE

Constituent	Maximum for any single composite sample - TCLP (mg/l)
Generic exclusion levels for K061 and K062 nonwastewater high temperature metals recovery residues	
Antimony	0.10
Arsenic	0.50
Barium	7.6
Beryllium	0.010
Cadmium	0.050
Chromium (total)	0.33
Lead	0.15
Mercury	0.009
Nickel	1.0
Selenium	0.16
Silver	0.30
Thallium	0.020
Zinc	70
Generic exclusion levels for F006 nonwastewater high temperature metals recovery residues	
Antimony	0.10
Arsenic	0.50
Barium	7.6
Beryllium	0.010
Cadmium	0.050
Chromium (total)	0.33
Cyanide (total)(mg/kg)	1.8
Lead	0.15
Mercury	0.009
Nickel	1.0
Selenium	0.16
Silver	0.30
Thallium	0.020
Zinc	70

(2) A one-time notification and certification shall be placed in the facility's files and sent to the Director for K061, K062 or F006 high temperature metals recovery residues that meet the generic exclusion levels for all constituents and do not exhibit any characteristics that are sent to solid waste landfills regulated under Rules R315-301 through R315-320. The notification and certification that is placed in the generators or treaters files shall be updated if the process or operation generating the waste changes and/or if the landfill receiving the waste changes. However, the generator or treater need only notify the Director on an annual basis if such changes occur. Such notification and certification should be sent to the Director by the end of the calendar year, but no later than December 31. The notification shall include the following information: The name and address of the solid waste landfill regulated under Rules R315-301 through R315-320 receiving the waste shipments; the EPA Hazardous Waste Number(s) and treatability group(s) at the initial point of generation; and, the treatment standards applicable to the waste at the initial point of generation. The certification shall be signed by an authorized representative and shall state as follows: "I certify under penalty of law that the generic exclusion levels for all constituents have been met without impermissible dilution and that no characteristic of hazardous waste is exhibited. I am aware that there are significant penalties for submitting a false certification, including the possibility of fine and imprisonment."

(D) Biological treatment sludge from the treatment of one of the following wastes listed in Section R315-261-32: organic waste (including heavy ends, still bottoms, light ends, spent solvents, filtrates, and decantates) from the production of carbamates and carbamoyl oximes, EPA Hazardous Waste No. K156, and wastewaters from the production of carbamates and carbamoyl oximes, EPA Hazardous Waste No. K157.

(E) Catalyst inert support media separated from one of the following wastes listed in Section R315-261-32: - Spent hydrotreating catalyst, EPA Hazardous Waste No. K171), and Spent hydrorefining catalyst (EPA Hazardous Waste No. K172.

(d) Any solid waste described in Subsection R315-261-3(c) is not a hazardous waste if it meets the following criteria:

(1) In the case of any solid waste, it does not exhibit any of the characteristics of hazardous waste identified in Sections R315-261-20 through 24. However, wastes that exhibit a characteristic at the point of generation may still be subject to the requirements of Rule R315-268, even if they no longer exhibit a characteristic at the point of land disposal.

(2) In the case of a waste which is a listed waste under Sections R315-261-30 through 35, contains a waste listed under Sections R315-261-30 through 35 or is derived from a waste listed in Sections R315-261-30 through 35, it also has been excluded from Subsection R315-261-3(c) under Sections R315-260-20 and R315-260-22.

(e) (Reserved)

(f) Notwithstanding Subsections R315-261-3(a) through (d) and provided the debris as defined in Rule R315-268 does not exhibit a characteristic identified in Sections R315-261-20 through 24, the following materials are not subject to regulation under Rules R315-260 through 266, R315-268, or R315-270:

(1) Hazardous debris as defined in Rule R315-268 that has been treated using one of the required extraction or destruction technologies specified in Table 1 of Section R315-268-45; persons claiming this exclusion in an enforcement action shall have the burden of proving by clear and convincing evidence that the material meets all of the exclusion requirements; or

(2) Debris as defined in Rule R315-268 that the Director, considering the extent of contamination, has determined is no longer contaminated with hazardous waste.

(g)(1) A hazardous waste that is listed in Sections R315-261-30 through 35 solely because it exhibits one or more characteristics of ignitability as defined under Section R315-261-21, corrosivity as defined under Section R315-261-22, or reactivity as defined under Section R315-261-23 is not a hazardous waste, if the waste no longer exhibits any characteristic of hazardous waste identified in Sections R315-261-20 through 24.

(2) The exclusion described in Subsection R315-261-3(g)(1) also pertains to:

(i) Any mixture of a solid waste and a hazardous waste listed in Sections R315-261-30 through 35 solely because it exhibits the characteristics of ignitability, corrosivity, or reactivity as regulated under Subsection R315-261-3(a)(2)(iv); and

(ii) Any solid waste generated from treating, storing, or disposing of a hazardous waste listed in Sections R315-261-30 through 35 solely because it exhibits the characteristics of ignitability, corrosivity, or reactivity as regulated under Subsection R315-261-3(c)(2)(i).

(3) Wastes excluded under Subsection R315-261-3(g) are subject to Rule R315-268, as applicable, even if they no longer exhibit a characteristic at the point of land disposal.

(4) Any mixture of a solid waste excluded from regulation under Subsection R315-261-4(b)(7) and a hazardous waste listed in Sections R315-261-30 through 35 solely because it exhibits one or more of the characteristics of ignitability, corrosivity, or reactivity as regulated under Subsection R315-261-3(a)(2)(iv) is not a hazardous waste, if the mixture no longer exhibits any characteristic of hazardous waste identified in Sections R315-261-20 through 24 for which the hazardous waste listed in Sections R315-261-30 through 35 was listed.

R315-261-4. Exclusions.

(a) Materials which are not solid wastes. The following materials are not solid wastes for the purpose of Rule R315-261:

(1)(i) Domestic sewage; and

(ii) Any mixture of domestic sewage and other wastes that passes through a sewer system to a publicly-owned treatment works for treatment. "Domestic sewage" means untreated sanitary wastes that pass through a sewer system.

(2) Industrial wastewater discharges that are point source discharges subject to regulation under section 402 of the Clean Water Act, as amended. This exclusion applies only to the actual point source discharge. It does not exclude industrial wastewaters while they are being collected, stored or treated before discharge, nor does it exclude sludges that are generated by industrial wastewater treatment.

(3) Irrigation return flows.

(4) Source, special nuclear or by-product material as defined by the Atomic Energy Act of 1954, as amended, 42 U.S.C. 2011 et seq.

(5) Materials subjected to in-situ mining techniques which are not removed from the ground as part of the extraction process.

(6) Pulping liquors, i.e., black liquor, that are reclaimed in a pulping liquor recovery furnace and then reused in the pulping process, unless it is accumulated speculatively as defined in Subsection R315-261-1(c).

(7) Spent sulfuric acid used to produce virgin sulfuric acid provided it is not accumulated speculatively as defined in Subsection R315-261-1(c).

(8) Secondary materials that are reclaimed and returned to the original process or processes in which they were generated where they are reused in the production process provided:

(i) Only tank storage is involved, and the entire process through completion of reclamation is closed by being entirely connected with pipes or other comparable enclosed means of conveyance;

(ii) Reclamation does not involve controlled flame combustion, such as occurs in boilers, industrial furnaces, or incinerators;

(iii) The secondary materials are never accumulated in such tanks for over twelve months without being reclaimed; and

(iv) The reclaimed material is not used to produce a fuel, or used to produce products that are used in a manner constituting disposal.

(9)(i) Spent wood preserving solutions that have been reclaimed and are reused for their original intended purpose; and

(ii) Wastewaters from the wood preserving process that have been reclaimed and are reused to treat wood.

(iii) Prior to reuse, the wood preserving wastewaters and spent wood preserving solutions described in Subsections R315-261-4(a)(9)(i) and (ii), so long as they meet all of the following conditions:

(A) The wood preserving wastewaters and spent wood preserving solutions are reused on-site at water borne plants in the production process for their original intended purpose;

(B) Prior to reuse, the wastewaters and spent wood preserving solutions are managed to prevent release to either land or groundwater or both;

(C) Any unit used to manage wastewaters and/or spent wood preserving solutions prior to reuse can be visually or otherwise determined to prevent such releases;

(D) Any drip pad used to manage the wastewaters and/or spent wood preserving solutions prior to reuse complies with the standards in 40 CFR 265.440 through 265.445, which are adopted and incorporated by reference, regardless of whether the plant generates a total of less than 100 kg/month of hazardous waste; and

(E) Prior to operating pursuant to this exclusion, the plant owner or operator prepares a one-time notification stating that the plant intends to claim the exclusion, giving the date on which the plant intends to begin operating under the exclusion, and containing the following language: "I have read the applicable regulation establishing an exclusion for wood preserving wastewaters and spent wood preserving solutions and understand it requires me to comply at all times with the

conditions set out in the regulation." The plant shall maintain a copy of that document in its on-site records until closure of the facility. The exclusion applies so long as the plant meets all of the conditions. If the plant goes out of compliance with any condition, it may apply to the Director for reinstatement. The Director may reinstate the exclusion upon finding that the plant has returned to compliance with all conditions and that the violations are not likely to recur.

(10) EPA Hazardous Waste Nos. K060, K087, K141, K142, K143, K144, K145, K147, and K148, and any wastes from the coke by-products processes that are hazardous only because they exhibit the Toxicity Characteristic specified in Section R315-261-24, subsequent to generation, these materials are recycled to coke ovens, to the tar recovery process as a feedstock to produce coal tar, or mixed with coal tar prior to the tar's sale or refining. This exclusion is conditioned on there being no land disposal of the wastes from the point they are generated to the point they are recycled to coke ovens or tar recovery or refining processes, or mixed with coal tar.

(11) Nonwastewater splash condenser dross residue from the treatment of K061 in high temperature metals recovery units, provided it is shipped in drums, if shipped and not land disposed before recovery.

(12)(i) Oil-bearing hazardous secondary materials, i.e., sludges, byproducts, or spent materials, that are generated at a petroleum refinery, SIC code 2911, and are inserted into the petroleum refining process, SIC code 2911-including, but not limited to, distillation, catalytic cracking, fractionation, or thermal cracking units, i.e., cokers, unless the material is placed on the land, or speculatively accumulated before being so recycled. Materials inserted into thermal cracking units are excluded under Subsection R315-261-4(12)(i), provided that the coke product also does not exhibit a characteristic of hazardous waste. Oil-bearing hazardous secondary materials may be inserted into the same petroleum refinery where they are generated, or sent directly to another petroleum refinery and still be excluded under this provision. Except as provided in Subsection R315-261-4(a)(12)(ii), oil-bearing hazardous secondary materials generated elsewhere in the petroleum industry, i.e., from sources other than petroleum refineries, are not excluded under Section R315-261-4. Residuals generated from processing or recycling materials excluded under Subsection R315-261-4(a)(12)(i), where such materials as generated would have otherwise met a listing under Sections R315-261-30 through R315-261-35, are designated as F037 listed wastes when disposed of or intended for disposal.

(ii) Recovered oil that is recycled in the same manner and with the same conditions as described in Subsection R315-261-4(a)(12)(i). Recovered oil is oil that has been reclaimed from secondary materials, including wastewater, generated from normal petroleum industry practices, including refining, exploration and production, bulk storage, and transportation incident thereto, SIC codes 1311, 1321, 1381, 1382, 1389, 2911, 4612, 4613, 4922, 4923, 4789, 5171, and 5172. Recovered oil does not include oil-bearing hazardous wastes listed in Sections R315-261-30 through 35; however, oil recovered from such wastes may be considered recovered oil. Recovered oil does not include used oil as defined in Subsection 19-6-703(19).

(13) Excluded scrap metal (processed scrap metal, unprocessed home scrap metal, and unprocessed prompt scrap metal) being recycled.

(14) Shredded circuit boards being recycled provided that they are:

(i) Stored in containers sufficient to prevent a release to the environment prior to recovery; and

(ii) Free of mercury switches, mercury relays and nickel-cadmium batteries and lithium batteries.

(15) Condensates derived from the overhead gases from kraft mill steam strippers that are used to comply with 40 CFR 63.446(e). The exemption applies only to combustion at the mill generating the condensates.

(16) Reserved.

(17) Spent materials, as defined in Section R315-261-1, other than hazardous wastes listed in Sections R315-261-30 through 35, generated within the primary mineral processing industry from which minerals, acids, cyanide, water, or other values are recovered by mineral processing or by beneficiation, provided that:

(i) The spent material is legitimately recycled to recover minerals, acids, cyanide, water or other values;

(ii) The spent material is not accumulated speculatively;

(iii) Except as provided in Subsection R315-261-4(a)(17)(iv), the spent material is stored in tanks, containers, or buildings meeting the following minimum integrity standards: a building shall be an engineered structure with a floor, walls, and a roof all of which are made of non-earthen materials providing structural support, except smelter buildings may have partially earthen floors provided the secondary material is stored on the non-earthen portion, and have a roof suitable for diverting rainwater away from the foundation; a tank shall be free standing, not be a surface impoundment, as defined in Section R315-260-10, and be manufactured of a material suitable for containment of its contents; a container shall be free standing and be manufactured of a material suitable for containment of its contents. If tanks or containers contain any particulate which may be subject to wind dispersal, the owner/operator shall operate these units in a manner which controls fugitive dust. Tanks, containers, and buildings shall be designed, constructed and operated to prevent significant releases to the environment of these materials.

(iv) The Director may make a site-specific determination, after public review and comment, that only solid mineral processing spent material may be placed on pads rather than tanks containers, or buildings. Solid mineral processing spent materials do not contain any free liquid. The Director shall affirm that pads are designed, constructed and operated to prevent significant releases of the secondary material into the environment. Pads shall provide the same degree of containment afforded by the non-RCRA tanks, containers and buildings eligible for exclusion.

(A) The Director shall also consider if storage on pads poses the potential for significant releases via groundwater, surface water, and air exposure pathways. Factors to be considered for assessing the groundwater, surface water, air exposure pathways are: The volume and physical and chemical properties of the secondary material, including its potential for migration off the pad; the potential for human or environmental exposure to hazardous constituents migrating from the pad via each exposure pathway, and the possibility and extent of harm to human and environmental receptors via each exposure pathway.

(B) Pads shall meet the following minimum standards: Be designed of non-earthen material that is compatible with the chemical nature of the mineral processing spent material, capable of withstanding physical stresses associated with placement and removal, have run on/runoff controls, be operated in a manner which controls fugitive dust, and have integrity assurance through inspections and maintenance programs.

(C) Before making a determination under Subsection R315-261-4(a)(17)(iv), the Director shall provide notice and the opportunity for comment to all persons potentially interested in the determination. This can be accomplished by placing notice of this action in major local newspapers, or broadcasting notice over local radio stations.

(v) The owner or operator provides notice to the Director providing the following information: The types of materials to

be recycled; the type and location of the storage units and recycling processes; and the annual quantities expected to be placed in land-based units. This notification shall be updated when there is a change in the type of materials recycled or the location of the recycling process.

(vi) For purposes of Subsection R315-261-4(b)(7), mineral processing spent materials shall be the result of mineral processing and may not include any listed hazardous wastes. Listed hazardous wastes and characteristic hazardous wastes generated by non-mineral processing industries are not eligible for the conditional exclusion from the definition of solid waste.

(18) Petrochemical recovered oil from an associated organic chemical manufacturing facility, where the oil is to be inserted into the petroleum refining process, SIC code 2911, along with normal petroleum refinery process streams, provided:

(i) The oil is hazardous only because it exhibits the characteristic of ignitability, as defined in Section R315-261-21, and/or toxicity for benzene, Section R315-261-24, waste code D018; and

(ii) The oil generated by the organic chemical manufacturing facility is not placed on the land, or speculatively accumulated before being recycled into the petroleum refining process. An "associated organic chemical manufacturing facility" is a facility where the primary SIC code is 2869, but where operations may also include SIC codes 2821, 2822, and 2865; and is physically co-located with a petroleum refinery; and where the petroleum refinery to which the oil being recycled is returned also provides hydrocarbon feedstocks to the organic chemical manufacturing facility. "Petrochemical recovered oil" is oil that has been reclaimed from secondary materials, i.e., sludges, byproducts, or spent materials, including wastewater, from normal organic chemical manufacturing operations, as well as oil recovered from organic chemical manufacturing processes.

(19) Spent caustic solutions from petroleum refining liquid treating processes used as a feedstock to produce cresylic or naphthenic acid unless the material is placed on the land, or accumulated speculatively as defined in Subsection R315-261-1(c).

(20) Hazardous secondary materials used to make zinc fertilizers, provided that the following conditions specified are satisfied:

(i) Hazardous secondary materials used to make zinc micronutrient fertilizers shall not be accumulated speculatively, as defined in Subsection R315-261-1(c)(8).

(ii) Generators and intermediate handlers of zinc-bearing hazardous secondary materials that are to be incorporated into zinc fertilizers shall:

(A) Submit a one-time notice to the Director, which contains the name, address and EPA ID number of the generator or intermediate handler facility, provides a brief description of the secondary material that will be subject to the exclusion, and identifies when the manufacturer intends to begin managing excluded, zinc-bearing hazardous secondary materials under the conditions specified in Subsection R315-261-4(a)(20).

(B) Store the excluded secondary material in tanks, containers, or buildings that are constructed and maintained in a way that prevents releases of the secondary materials into the environment. At a minimum, any building used for this purpose shall be an engineered structure made of non-earthen materials that provide structural support, and shall have a floor, walls and a roof that prevent wind dispersal and contact with rainwater. Tanks used for this purpose shall be structurally sound and, if outdoors, shall have roofs or covers that prevent contact with wind and rain. Containers used for this purpose shall be kept closed except when it is necessary to add or remove material, and shall be in sound condition. Containers that are stored outdoors shall be managed within storage areas that:

(I) Have containment structures or systems sufficiently impervious to contain leaks, spills and accumulated precipitation; and

(II) Provide for effective drainage and removal of leaks, spills and accumulated precipitation; and

(III) Prevent run-on into the containment system.

(C) With each off-site shipment of excluded hazardous secondary materials, provide written notice to the receiving facility that the material is subject to the conditions of Subsection R315-261-4(a)(20).

(D) Maintain at the generator's or intermediate handlers's facility for no less than three years records of all shipments of excluded hazardous secondary materials. For each shipment these records shall at a minimum contain the following information:

(I) Name of the transporter and date of the shipment;

(II) Name and address of the facility that received the excluded material, and documentation confirming receipt of the shipment; and

(III) Type and quantity of excluded secondary material in each shipment.

(iii) Manufacturers of zinc fertilizers or zinc fertilizer ingredients made from excluded hazardous secondary materials shall:

(A) Store excluded hazardous secondary materials in accordance with the storage requirements for generators and intermediate handlers, as specified in Subsection R315-261-4(a)(20)(ii)(B).

(B) Submit a one-time notification to the Director that, at a minimum, specifies the name, address and EPA ID number of the manufacturing facility, and identifies when the manufacturer intends to begin managing excluded, zinc-bearing hazardous secondary materials under the conditions specified in Subsection R315-261-4(a)(20).

(C) Maintain for a minimum of three years records of all shipments of excluded hazardous secondary materials received by the manufacturer, which shall at a minimum identify for each shipment the name and address of the generating facility, name of transporter and date the materials were received, the quantity received, and a brief description of the industrial process that generated the material.

(D) Submit to the Director an annual report that identifies the total quantities of all excluded hazardous secondary materials that were used to manufacture zinc fertilizers or zinc fertilizer ingredients in the previous year, the name and address of each generating facility, and the industrial process(s) from which they were generated.

(iv) Nothing in Section R315-261-4 preempts, overrides or otherwise negates the provision in Section R315-262-11, which requires any person who generates a solid waste to determine if that waste is a hazardous waste.

(v) Interim status and permitted storage units that have been used to store only zinc-bearing hazardous wastes prior to the submission of the one-time notice described in Subsection R315-261-4(a)(20)(ii)(A), and that afterward will be used only to store hazardous secondary materials excluded under Subsection R315-261-4(a)(20), are not subject to the closure requirements of Rules R315-264 and R315-265.

(21) Zinc fertilizers made from hazardous wastes, or hazardous secondary materials that are excluded under Subsection R315-261-4(a)(20), provided that:

(i) The fertilizers meet the following contaminant limits:

(A) For metal contaminants:

TABLE

Constituent Maximum Allowable Total Concentration in Fertilizer, per Unit (1%) of Zinc ppm)

Arsenic	0.3
Cadmium	1.4
Chromium	0.6
Lead	2.8

Mercury	0.3

(B) For dioxin contaminants the fertilizer shall contain no more than eight (8) parts per trillion of dioxin, measured as toxic equivalent.

(ii) The manufacturer performs sampling and analysis of the fertilizer product to determine compliance with the contaminant limits for metals no less than every six months, and for dioxins no less than every twelve months. Testing shall also be performed whenever changes occur to manufacturing processes or ingredients that could significantly affect the amounts of contaminants in the fertilizer product. The manufacturer may use any reliable analytical method to demonstrate that no constituent of concern is present in the product at concentrations above the applicable limits. It is the responsibility of the manufacturer to ensure that the sampling and analysis are unbiased, precise, and representative of the product(s) introduced into commerce.

(iii) The manufacturer maintains for no less than three years records of all sampling and analyses performed for purposes of determining compliance with the requirements of Subsection R315-261-4(a)(21)(ii). Such records shall at a minimum include:

(A) The dates and times product samples were taken, and the dates the samples were analyzed;

(B) The names and qualifications of the person(s) taking the samples;

(C) A description of the methods and equipment used to take the samples;

(D) The name and address of the laboratory facility at which analyses of the samples were performed;

(E) A description of the analytical methods used, including any cleanup and sample preparation methods; and

(F) All laboratory analytical results used to determine compliance with the contaminant limits specified in this Subsection R315-261-4(a)(21).

(22) Used cathode ray tubes (CRTs)

(i) Used, intact CRTs as defined in Section R315-260-10 are not solid wastes within the United States unless they are disposed, or unless they are speculatively accumulated as defined in Subsection R315-261-1(c)(8) by CRT collectors or glass processors.

(ii) Used, intact CRTs as defined in Section R315-260-10 are not solid wastes when exported for recycling provided that they meet the requirements of Section R315-261-40.

(iii) Used, broken CRTs as defined in Section R315-260-10 are not solid wastes provided that they meet the requirements of Section R315-261-39.

(iv) Glass removed from CRTs is not a solid waste provided that it meets the requirements of Section R315-261-39(c).

(23) Hazardous secondary material generated and legitimately reclaimed within the United States or its territories and under the control of the generator, provided that the material complies with Subsections R315-261-4(a)(23)(i) and (ii):

(i)(A) The hazardous secondary material is generated and reclaimed at the generating facility, for purposes of this definition, generating facility means all contiguous property owned, leased, or otherwise controlled by the hazardous secondary material generator; or

(B) The hazardous secondary material is generated and reclaimed at different facilities, if the reclaiming facility is controlled by the generator or if both the generating facility and the reclaiming facility are controlled by a person as defined in Section R315-260-10, and if the generator provides one of the following certifications: "on behalf of (insert generator facility name), I certify that this facility will send the indicated hazardous secondary material to (insert reclaimer facility name), which is controlled by (insert generator facility name) and that (insert name of either facility) has acknowledged full responsibility for the safe management of the hazardous secondary material," or "on behalf of (insert generator facility name), I certify that this facility will send the indicated hazardous secondary material to (insert reclaimer facility name), that both facilities are under common control, and that (insert name of either facility) has acknowledged full responsibility for the safe management of the hazardous secondary material." For purposes of this paragraph, "control" means the power to direct the policies of the facility, whether by the ownership of stock, voting rights, or otherwise, except that contractors who operate facilities on behalf of a different person as defined in Section R315-260-10 shall not be deemed to "control" such facilities. The generating and receiving facilities shall both maintain at their facilities for no less than three years records of hazardous secondary materials sent or received under this exclusion. In both cases, the records shall contain the name of the transporter, the date of the shipment, and the type and quantity of the hazardous secondary material shipped or received under the exclusion. These requirements may be satisfied by routine business records, e.g., financial records, bills of lading, copies of DOT shipping papers, or electronic confirmations; or

(C) The hazardous secondary material is generated pursuant to a written contract between a tolling contractor and a toll manufacturer and is reclaimed by the tolling contractor, if the tolling contractor certifies the following: "On behalf of (insert tolling contractor name), I certify that (insert tolling contractor name) has a written contract with (insert toll manufacturer name) to manufacture (insert name of product or intermediate) which is made from specified unused materials, and that (insert tolling contractor name) will reclaim the hazardous secondary materials generated during this manufacture. On behalf of (insert tolling contractor name), I also certify that (insert tolling contractor name) retains ownership of, and responsibility for, the hazardous secondary materials that are generated during the course of the manufacture, including any releases of hazardous secondary materials that occur during the manufacturing process". The tolling contractor shall maintain at its facility for no less than three years records of hazardous secondary materials received pursuant to its written contract with the tolling manufacturer, and the tolling manufacturer shall maintain at its facility for no less than three years records of hazardous secondary materials shipped pursuant to its written contract with the tolling contractor. In both cases, the records shall contain the name of the transporter, the date of the shipment, and the type and quantity of the hazardous secondary material shipped or received pursuant to the written contract. These requirements may be satisfied by routine business records, e.g., financial records, bills of lading, copies of DOT shipping papers, or electronic confirmations. For purposes of Subsection R315-261-4(a)(23)(i)(C), tolling contractor means a person who arranges for the production of a product or intermediate made from specified unused materials through a written contract with a toll manufacturer. Toll manufacturer means a person who produces a product or intermediate made from specified unused materials pursuant to a written contract with a tolling contractor.

(ii)(A) The hazardous secondary material is contained as defined in Section R315-260-10. A hazardous secondary material released to the environment is discarded and a solid waste unless it is immediately recovered for the purpose of reclamation. Hazardous secondary material managed in a unit with leaks or other continuing or intermittent unpermitted releases is discarded and a solid waste.

(B) The hazardous secondary material is not speculatively accumulated, as defined in Subsection R315-261-1(c)(8).

(C) Notice is provided as required by Section R315-260-42.

(D) The material is not otherwise subject to material-specific management conditions under Subsection R315-261-

4(a) when reclaimed, and it is not a spent lead-acid battery, see Sections R315-266-80 and R315-273-2.

(E) Persons performing the recycling of hazardous secondary materials under this exclusion shall maintain documentation of their legitimacy determination on-site. Documentation shall be a written description of how the recycling meets all three factors in Subsection R315-260-43(a) and how the factor in Subsection R315-260-43(b) was considered. Documentation shall be maintained for three years after the recycling operation has ceased.

(F) The emergency preparedness and response requirements found in Sections R315-261-400, 410, 411 and 420 are met.

(24) Hazardous secondary material that is generated and then transferred to another person for the purpose of reclamation is not a solid waste, provided that:

(i) The material is not speculatively accumulated, as defined in Subsection R315-261-1(c)(8);

(ii) The material is not handled by any person or facility other than the hazardous secondary material generator, the transporter, an intermediate facility or a reclaimer, and, while in transport, is not stored for more than 10 days at a transfer facility, as defined in Section R315-260-10, and is packaged according to applicable Department of Transportation regulations at 49 CFR parts 173, 178, and 179 while in transport;

(iii) The material is not otherwise subject to material-specific management conditions under Subsection R315-261-4(a) when reclaimed, and it is not a spent lead-acid battery, see Sections R315-266-80 and R315-273-2;

(iv) The reclamation of the material is legitimate, as specified under Section R315-260-43;

(v) The hazardous secondary material generator satisfies all of the following conditions:

(A) The material shall be contained as defined in Section R315-260-10. A hazardous secondary material released to the environment is discarded and a solid waste unless it is immediately recovered for the purpose of recycling. Hazardous secondary material managed in a unit with leaks or other continuing releases is discarded and a solid waste.

(B) Prior to arranging for transport of hazardous secondary materials to a reclamation facility (or facilities) where the management of the hazardous secondary materials is not addressed under a hazardous waste part B permit or interim status standards, the hazardous secondary material generator shall make reasonable efforts to ensure that each reclaimer intends to properly and legitimately reclaim the hazardous secondary material and not discard it, and that each reclaimer will manage the hazardous secondary material in a manner that is protective of human health and the environment. If the hazardous secondary material will be passing through an intermediate facility where the management of the hazardous secondary materials is not addressed under a hazardous waste part B permit or interim status standards, the hazardous secondary material generator shall make contractual arrangements with the intermediate facility to ensure that the hazardous secondary material is sent to the reclamation facility identified by the hazardous secondary material generator, and the hazardous secondary material generator shall perform reasonable efforts to ensure that the intermediate facility will manage the hazardous secondary material in a manner that is protective of human health and the environment. Reasonable efforts shall be repeated at a minimum of every three years for the hazardous secondary material generator to claim the exclusion and to send the hazardous secondary materials to each reclaimer and any intermediate facility. In making these reasonable efforts, the generator may use any credible evidence available, including information gathered by the hazardous secondary material generator, provided by the reclaimer or intermediate facility, and/or provided by a third party. The hazardous secondary material generator shall affirmatively answer all of the following questions for each reclamation facility and any intermediate facility:

(I) Does the available information indicate that the reclamation process is legitimate pursuant to Section R315-260-43? In answering this question, the hazardous secondary material generator can rely on their existing knowledge of the physical and chemical properties of the hazardous secondary material, as well as information from other sources including the reclamation facility and audit reports about the reclamation process.

(II) Does the publicly available information indicate that the reclamation facility and any intermediate facility that is used by the hazardous secondary material generator notified the appropriate authorities of hazardous secondary materials reclamation activities pursuant to Section R315-260-42 and have they notified the appropriate authorities that the financial assurance condition is satisfied per Subsection R315-261-4(a)(24)(vi)(F)? In answering these questions, the hazardous secondary material generator can rely on the available information documenting the reclamation facility's and any intermediate facility's compliance with the notification requirements per Section R315-260-42, including the requirement in Subsection R315-260-42(a)(5) to notify the Director whether the reclaimer or intermediate facility has financial assurance.

(III) Does publicly available information indicate that the reclamation facility or any intermediate facility that is used by the hazardous secondary material generator has not had any formal enforcement actions taken against the facility in the previous three years for violations of Sections R315-260 through 268, 270, and 273 and has not been classified as a significant non-complier with Sections R315-260 through 268, 270, and 273? In answering this question, the hazardous secondary material generator can rely on the publicly available information from EPA or the state. If the reclamation facility or any intermediate facility that is used by the hazardous secondary material generator has had a formal enforcement action taken against the facility in the previous three years for violations of Sections R315-260 through 268, 270, and 273 and has been classified as a significant non-complier with Sections R315-260 through 268, 270, and 273, does the hazardous secondary material generator have credible evidence that the facilities will manage the hazardous secondary materials properly? In answering this question, the hazardous secondary material generator can obtain additional information from EPA, the state, or the facility itself that the facility has addressed the violations, taken remedial steps to address the violations and prevent future violations, or that the violations are not relevant to the proper management of the hazardous secondary materials.

(IV) Does the available information indicate that the reclamation facility and any intermediate facility that is used by the hazardous secondary material generator have the equipment and trained personnel to safely recycle the hazardous secondary material? In answering this question, the generator may rely on a description by the reclamation facility or by an independent third party of the equipment and trained personnel to be used to recycle the generator's hazardous secondary material.

(V) If residuals are generated from the reclamation of the excluded hazardous secondary materials, does the reclamation facility have the permits required (if any) to manage the residuals? If not, does the reclamation facility have a contract with an appropriately permitted facility to dispose of the residuals? If not, does the hazardous secondary material generator have credible evidence that the residuals will be managed in a manner that is protective of human health and the environment? In answering these questions, the hazardous secondary material generator can rely on publicly available

information from EPA or the state, or information provided by the facility itself.

(C) The hazardous secondary material generator shall maintain for a minimum of three years documentation and certification that reasonable efforts were made for each reclamation facility and, if applicable, intermediate facility where the management of the hazardous secondary materials is not addressed under a hazardous waste part B permit or interim status standards prior to transferring hazardous secondary material. Documentation and certification shall be made available upon request by the Director within 72 hours, or within a longer period of time as specified by the Director. The certification statement shall:

(I) Include the printed name and official title of an authorized representative of the hazardous secondary material generator company, the authorized representative's signature, and the date signed;

(II) Incorporate the following language: "I hereby certify in good faith and to the best of my knowledge that, prior to arranging for transport of excluded hazardous secondary materials to (insert name(s) of reclamation facility and any intermediate facility), reasonable efforts were made in accordance with Subsection R315-261-4(a)(24)(v)(B) to ensure that the hazardous secondary materials would be recycled legitimately, and otherwise managed in a manner that is protective of human health and the environment, and that such efforts were based on current and accurate information."

(D) The hazardous secondary material generator shall maintain at the generating facility for no less than three years records of all off-site shipments of hazardous secondary materials. For each shipment, these records shall, at a minimum, contain the following information:

(I) Name of the transporter and date of the shipment;

(II) Name and address of each reclaimer and, if applicable, the name and address of each intermediate facility to which the hazardous secondary material was sent;

(III) The type and quantity of hazardous secondary material in the shipment.

(E) The hazardous secondary material generator shall maintain at the generating facility for no less than three years confirmations of receipt from each reclaimer and, if applicable, each intermediate facility for all off-site shipments of hazardous secondary materials. Confirmations of receipt shall include the name and address of the reclaimer, or intermediate facility, the type and quantity of the hazardous secondary materials received and the date which the hazardous secondary materials were received. This requirement may be satisfied by routine business records, e.g., financial records, bills of lading, copies of DOT shipping papers, or electronic confirmations of receipt;

(F) The hazardous secondary material generator shall comply with the emergency preparedness and response conditions in Sections R315-261-400, 410, 411, and 420.

(vi) Reclaimers of hazardous secondary material excluded from regulation under this exclusion and intermediate facilities as defined in Section R315-260-10 satisfy all of the following conditions:

(A) The reclaimer and intermediate facility shall maintain at its facility for no less than three years records of all shipments of hazardous secondary material that were received at the facility and, if applicable, for all shipments of hazardous secondary materials that were received and subsequently sent off-site from the facility for further reclamation. For each shipment, these records shall at a minimum contain the following information:

(I) Name of the transporter and date of the shipment;

(II) Name and address of the hazardous secondary material generator and, if applicable, the name and address of the reclaimer or intermediate facility which the hazardous secondary materials were received from;

(III) The type and quantity of hazardous secondary material in the shipment; and

(IV) For hazardous secondary materials that, after being received by the reclaimer or intermediate facility, were subsequently transferred off-site for further reclamation, the name and address of the, subsequent, reclaimer and, if applicable, the name and address of each intermediate facility to which the hazardous secondary material was sent.

(B) The intermediate facility shall send the hazardous secondary material to the reclaimer(s) designated by the hazardous secondary materials generator.

(C) The reclaimer and intermediate facility shall send to the hazardous secondary material generator confirmations of receipt for all off-site shipments of hazardous secondary materials. Confirmations of receipt shall include the name and address of the reclaimer, or intermediate facility, the type and quantity of the hazardous secondary materials received and the date which the hazardous secondary materials were received. This requirement may be satisfied by routine business records, e.g., financial records, bills of lading, copies of DOT shipping papers, or electronic confirmations of receipt.

(D) The reclaimer and intermediate facility shall manage the hazardous secondary material in a manner that is at least as protective as that employed for analogous raw material and shall be contained. An "analogous raw material" is a raw material for which a hazardous secondary material is a substitute and serves the same function and has similar physical and chemical properties as the hazardous secondary material.

(E) Any residuals that are generated from reclamation processes shall be managed in a manner that is protective of human health and the environment. If any residuals exhibit a hazardous characteristic according to Sections R315-261-20 through 24, or if they themselves are specifically listed in Sections R315-261-30 through 35, such residuals are hazardous wastes and shall be managed in accordance with the applicable requirements of Rules R315-260 through 266, 268, and 270.

(F) The reclaimer and intermediate facility have financial assurance as required under Sections R315-261-140 through 151,

(vii) In addition, all persons claiming the exclusion under Subsection R315-261-4(a)(24) provide notification as required under Section R315-260-42.

(25) Hazardous secondary material that is exported from the United States and reclaimed at a reclamation facility located in a foreign country is not a solid waste, provided that the hazardous secondary material generator complies with the applicable requirements of Subsection R315-261-4(a)(24)(i)-(v), excepting Subsection R315-261-4(a)(24)(v)(B)(2) for foreign reclaimers and foreign intermediate facilities, and that the hazardous secondary material generator also complies with the following requirements:

(i) Notify EPA of an intended export before the hazardous secondary material is scheduled to leave the United States. A complete notification shall be submitted at least sixty days before the initial shipment is intended to be shipped off-site. This notification may cover export activities extending over a twelve month or lesser period. The notification shall be in writing, signed by the hazardous secondary material generator, and include the following information:

(A) Name, mailing address, telephone number and EPA ID number, if applicable, of the hazardous secondary material generator;

(B) A description of the hazardous secondary material and the EPA hazardous waste number that would apply if the hazardous secondary material was managed as hazardous waste and the U.S. DOT proper shipping name, hazard class and ID number, UN/NA, for each hazardous secondary material as identified in 49 CFR parts 171 through 177;

(C) The estimated frequency or rate at which the

hazardous secondary material is to be exported and the period of time over which the hazardous secondary material is to be exported;

(D) The estimated total quantity of hazardous secondary material;

(E) All points of entry to and departure from each foreign country through which the hazardous secondary material will pass;

(F) A description of the means by which each shipment of the hazardous secondary material will be transported, for example mode of transportation vehicle including air, highway, rail and water, and types of containers including drums, boxes and tanks;

(G) A description of the manner in which the hazardous secondary material will be reclaimed in the country of import;

(H) The name and address of the reclaimer, any intermediate facility and any alternate reclaimer and intermediate facilities; and

(I) The name of any countries of transit through which the hazardous secondary material will be sent and a description of the approximate length of time it will remain in such countries and the nature of its handling while there, for purposes of this section, the terms "EPA Acknowledgement of Consent", "country of import" and "country of transit" are used as defined in 40 CFR 262.81 with the exception that the terms in Section R315-261-4 refer to hazardous secondary materials, rather than hazardous waste:

(ii) Notifications shall be submitted electronically using EPA's Waste Import Export Tracking System, WIETS, or its successor system.

(iii) Except for changes to the telephone number in Subsection R315-261-4(a)(25)(i)(A) and decreases in the quantity of hazardous secondary material indicated pursuant to Subsection R315-261-4(a)(25)(i)(D), when the conditions specified on the original notification change, including any exceedance of the estimate of the quantity of hazardous secondary material specified in the original notification, the hazardous secondary material generator shall provide EPA with a written renotification of the change. The shipment cannot take place until consent of the country of import to the changes, except for changes to Subsection R315-261-4(a)(25)(i)(I) and in the ports of entry to and departure from countries of transit pursuant to Subsection R315-261-4(a)(25)(i)(E), has been obtained and the hazardous secondary material generator receives from EPA an EPA Acknowledgment of Consent reflecting the country of import's consent to the changes.

(iv) Upon request by EPA, the hazardous secondary material generator shall furnish to EPA any additional information which a country of import requests in order to respond to a notification.

(v) EPA will provide a complete notification to the country of import and any countries of transit. A notification is complete when EPA receives a notification which EPA determines satisfies the requirements of Subsection R315-261-4(a)(25)(i). Where a claim of confidentiality is asserted with respect to any notification information required by Subsection R315-261-4(a)(25)(i), EPA may find the notification not complete until any such claim is resolved in accordance with 40 CFR 260.2.

(vi) The export of hazardous secondary material under Subsection R315-261-4(a)(25) is prohibited unless the country of import consents to the intended export. When the country of import consents in writing to the receipt of the hazardous secondary material, EPA will send an EPA Acknowledgment of Consent to the hazardous secondary material generator. Where the country of import objects to receipt of the hazardous secondary material or withdraws a prior consent, EPA will notify the hazardous secondary material generator in writing. EPA will also notify the hazardous secondary material generator of any responses from countries of transit.

(vii) For exports to OECD Member countries, the receiving country may respond to the notification using tacit consent. If no objection has been lodged by any country of import or countries of transit to a notification provided pursuant to Subsection R315-261-4(a)(25)(i) within thirty days after the date of issuance of the acknowledgement of receipt of notification by the competent authority of the country of import, the transboundary movement may commence. In such cases, EPA will send an EPA Acknowledgment of Consent to inform the hazardous secondary material generator that the country of import and any relevant countries of transit have not objected to the shipment, and are thus presumed to have consented tacitly. Tacit consent expires one calendar year after the close of the thirty day period; renotification and renewal of all consents is required for exports after that date.

(viii) A copy of the EPA Acknowledgment of Consent shall accompany the shipment. The shipment shall conform to the terms of the EPA Acknowledgment of Consent.

(ix) If a shipment cannot be delivered for any reason to the reclaimer, intermediate facility or the alternate reclaimer or alternate intermediate facility, the hazardous secondary material generator shall re-notify EPA of a change in the conditions of the original notification to allow shipment to a new reclaimer in accordance with Subsection R315-261-4(a)(25)(iii) and obtain another EPA Acknowledgment of Consent.

(x) Hazardous secondary material generators shall keep a copy of each notification of intent to export and each EPA Acknowledgment of Consent for a period of three years following receipt of the EPA Acknowledgment of Consent. They may satisfy this recordkeeping requirement by retaining electronically submitted notifications or electronically generated Acknowledgements in their account on EPA's Waste Import Export Tracking System, WIETS, or its successor system, provided that such copies are readily available for viewing and production if requested by any EPA or authorized state inspector. No hazardous secondary material generator may be held liable for the inability to produce a notification or Acknowledgement for inspection under Subsection R315-261-4(a)(25) if they can demonstrate that the inability to produce such copies are due exclusively to technical difficulty with EPA's Waste Import Export Tracking System, WIETS, or its successor system for which the hazardous secondary material generator bears no responsibility.

(xi) Hazardous secondary material generators shall file with the Administrator no later than March 1 of each year, a report summarizing the types, quantities, frequency and ultimate destination of all hazardous secondary materials exported during the previous calendar year. Annual reports shall be submitted electronically using EPA's Waste Import Export Tracking System, WIETS, or its successor system. Such reports shall include the following information:

(A) Name, mailing and site address, and EPA ID number, if applicable, of the hazardous secondary material generator;

(B) The calendar year covered by the report;

(C) The name and site address of each reclaimer and intermediate facility;

(D) By reclaimer and intermediate facility, for each hazardous secondary material exported, a description of the hazardous secondary material and the EPA hazardous waste number that would apply if the hazardous secondary material was managed as hazardous waste, the DOT hazard class, the name and U.S. EPA ID number, where applicable, for each transporter used, the total amount of hazardous secondary material shipped and the number of shipments pursuant to each notification;

(E) A certification signed by the hazardous secondary material generator which states: "I certify under penalty of law that I have personally examined and am familiar with the information submitted in this and all attached documents, and

that based on my inquiry of those individuals immediately responsible for obtaining the information, I believe that the submitted information is true, accurate, and complete. I am aware that there are significant penalties for submitting false information including the possibility of fine and imprisonment."

(xii) All persons claiming an exclusion under Subsection R315-261-4(a)(25) shall provide notification as required by Section R315-260-42.

(26) Solvent-contaminated wipes that are sent for cleaning and reuse are not solid wastes from the point of generation, provided that

(i) The solvent-contaminated wipes, when accumulated, stored, and transported, are contained in non-leaking, closed containers that are labeled "Excluded Solvent-Contaminated Wipes." The containers shall be able to contain free liquids, should free liquids occur. During accumulation, a container is considered closed when there is complete contact between the fitted lid and the rim, except when it is necessary to add or remove solvent-contaminated wipes. When the container is full, or when the solvent-contaminated wipes are no longer being accumulated, or when the container is being transported, the container shall be sealed with all lids properly and securely affixed to the container and all openings tightly bound or closed sufficiently to prevent leaks and emissions;

(ii) The solvent-contaminated wipes may be accumulated by the generator for up to 180 days from the start date of accumulation for each container prior to being sent for cleaning;

(iii) At the point of being sent for cleaning on-site or at the point of being transported off-site for cleaning, the solvent-contaminated wipes shall contain no free liquids as defined in Section R315-260-10.

(iv) Free liquids removed from the solvent-contaminated wipes or from the container holding the wipes shall be managed according to the applicable regulations found in Rules R315-260 through 266, 268, 270 and 273;

(v) Generators shall maintain at their site the following documentation:

(A) Name and address of the laundry or dry cleaner that is receiving the solvent-contaminated wipes;

(B) Documentation that the 180-day accumulation time limit in Subsection R315-261-4(a)(26)(ii) is being met;

(C) Description of the process the generator is using to ensure the solvent-contaminated wipes contain no free liquids at the point of being laundered or dry cleaned on-site or at the point of being transported off-site for laundering or dry cleaning;

(vi) The solvent-contaminated wipes are sent to a laundry or dry cleaner whose discharge, if any, is regulated under sections 301 and 402 or section 307 of the Clean Water Act.

(27) Hazardous secondary material that is generated and then transferred to another person for the purpose of remanufacturing is not a solid waste, provided that:

(i) The hazardous secondary material consists of one or more of the following spent solvents: Toluene, xylenes, ethylbenzene, 1,2,4-trimethylbenzene, chlorobenzene, n-hexane, cyclohexane, methyl tert-butyl ether, acetonitrile, chloroform, chloromethane, dichloromethane, methyl isobutyl ketone, NN-dimethylformamide, tetrahydrofuran, n-butyl alcohol, ethanol, and/or methanol;

(ii) The hazardous secondary material originated from using one or more of the solvents listed in Subsection R315-261-4(a)(27)(i) in a commercial grade for reacting, extracting, purifying, or blending chemicals, or for rinsing out the process lines associated with these functions; in the pharmaceutical manufacturing, NAICS 325412; basic organic chemical manufacturing, NAICS 325199; plastics and resins manufacturing, NAICS 325211; and/or the paints and coatings manufacturing sectors, NAICS 325510.

(iii) The hazardous secondary material generator sends the hazardous secondary material spent solvents listed in Subsection R315-261-4(a)(27)(i) to a remanufacturer in the pharmaceutical manufacturing, NAICS 325412; basic organic chemical manufacturing, NAICS 325199; plastics and resins manufacturing, NAICS 325211; and/or the paints and coatings manufacturing sectors, NAICS 325510.

(iv) After remanufacturing one or more of the solvents listed in Subsection R315-261-4(a)(27)(i), the use of the remanufactured solvent shall be limited to reacting, extracting, purifying, or blending chemicals, or for rinsing out the process lines associated with these functions, in the pharmaceutical manufacturing, NAICS 325412; basic organic chemical manufacturing, NAICS 325199; plastics and resins manufacturing, NAICS 325211; and the paints and coatings manufacturing sectors, NAICS 325510; or to using them as ingredients in a product. These allowed uses correspond to chemical functional uses enumerated under the Chemical Data Reporting Rule of the Toxic Substances Control Act, 40 CFR parts 704, 710-711, including Industrial Function Codes U015, solvents consumed in a reaction to produce other chemicals, and U030, solvents become part of the mixture;

(v) After remanufacturing one or more of the solvents listed in Subsection R315-261-4(a)(27)(i), the use of the remanufactured solvent does not involve cleaning or degreasing oil, grease, or similar material from textiles, glassware, metal surfaces, or other articles. (These disallowed continuing uses correspond to chemical functional uses in Industrial Function Code U029 under the Chemical Data Reporting Rule of the Toxics Substances Control Act.); and

(vi) Both the hazardous secondary material generator and the remanufacturer shall:

(A) Notify the Director and update the notification every two years per Section R315-260-42;

(B) Develop and maintain an up-to-date remanufacturing plan which identifies:

(I) The name, address and EPA ID number of the generator(s) and the remanufacturer(s),

(II) The types and estimated annual volumes of spent solvents to be remanufactured,

(III) The processes and industry sectors that generate the spent solvents,

(IV) The specific uses and industry sectors for the remanufactured solvents, and

(V) A certification from the remanufacturer stating "on behalf of (insert remanufacturer facility name), I certify that this facility is a remanufacturer under pharmaceutical manufacturing, NAICS 325412; basic organic chemical manufacturing, NAICS 325199; plastics and resins manufacturing, NAICS 325211; and/or the paints and coatings manufacturing sectors, NAICS 325510; and will accept the spent solvent(s) for the sole purpose of remanufacturing into commercial-grade solvent(s) that will be used for reacting, extracting, purifying, or blending chemicals, or for rinsing out the process lines associated with these functions, or for use as product ingredient(s). I also certify that the remanufacturing equipment, vents, and tanks are equipped with and are operating air emission controls in compliance with the appropriate Clean Air Act regulations under 40 CFR part 60, part 61 or part 63, or, absent such Clean Air Act standards for the particular operation or piece of equipment covered by the remanufacturing exclusion, are in compliance with the appropriate standards in Sections R315-261-1030 through 1035, 1050 through 1064 and 1080 through 1089";

(C) Maintain records of shipments and confirmations of receipts for a period of three years from the dates of the shipments;

(D) Prior to remanufacturing, store the hazardous spent solvents in tanks or containers that meet technical standards found in Sections R315-261-17- through 179 and 190 through

200, with the tanks and containers being labeled or otherwise having an immediately available record of the material being stored;

(E) During remanufacturing, and during storage of the hazardous secondary materials prior to remanufacturing, the remanufacturer certifies that the remanufacturing equipment, vents, and tanks are equipped with and are operating air emission controls in compliance with the appropriate Clean Air Act regulations under 40 CFR part 60, part 61 or part 63; or, absent such Clean Air Act standards for the particular operation or piece of equipment covered by the remanufacturing exclusion, are in compliance with the appropriate standards in Sections R315-261-1030 through 1035, 1050 through 1064 and 1080 through 1089; and

(F) Meet the requirements prohibiting speculative accumulation per Subsection R315-261-1(c)(8).

(b) Solid wastes which are not hazardous wastes. The following solid wastes are not hazardous wastes:

(1) Household waste, including household waste that has been collected, transported, stored, treated, disposed, recovered, e.g., refuse-derived fuel, or reused. "Household waste" means any material, including garbage, trash and sanitary wastes in septic tanks, derived from households, including single and multiple residences, hotels and motels, bunkhouses, ranger stations, crew quarters, campgrounds, picnic grounds and day-use recreation areas. A resource recovery facility managing municipal solid waste shall not be deemed to be treating, storing, disposing of, or otherwise managing hazardous wastes for the purposes of regulation under this subtitle, if such facility:

(i) Receives and burns only

(A) Household waste, from single and multiple dwellings, hotels, motels, and other residential sources, and

(B) Solid waste from commercial or industrial sources that does not contain hazardous waste; and

(ii) Such facility does not accept hazardous wastes and the owner or operator of such facility has established contractual requirements or other appropriate notification or inspection procedures to assure that hazardous wastes are not received at or burned in such facility.

(2) Solid wastes generated by any of the following and which are returned to the soils as fertilizers:

(i) The growing and harvesting of agricultural crops.

(ii) The raising of animals, including animal manures.

(3) Mining overburden returned to the mine site.

(4)(i) Fly ash waste, bottom ash waste, slag waste, and flue gas emission control waste generated primarily from the combustion of coal or other fossil fuels, except as provided by Section R315-266-112 for facilities that burn or process hazardous waste.

(ii) The following wastes generated primarily from processes that support the combustion of coal or other fossil fuels that are co-disposed with the wastes in Subsection R315-261-4(b)(4)(i), except as provided by Section R315-266-112 for facilities that burn or process hazardous waste:

(A) Coal pile run-off. For purposes of Subsection R315-261-4(b)(4), coal pile run-off means any precipitation that drains off coal piles.

(B) Boiler cleaning solutions. For purposes of Subsection R315-261-4(b)(4), boiler cleaning solutions means water solutions and chemical solutions used to clean the fire-side and water-side of the boiler.

(C) Boiler blowdown. For purposes of Subsection R315-261-4(b)(4), boiler blowdown means water purged from boilers used to generate steam.

(D) Process water treatment and demineralizer regeneration wastes. For purposes of Subsection R315-261-4(b)(4), process water treatment and demineralizer regeneration wastes means sludges, rinses, and spent resins generated from processes to remove dissolved gases, suspended solids, and dissolved chemical salts from combustion system process water.

(E) Cooling tower blowdown. For purposes of Subsection R315-261-4(b)(4), cooling tower blowdown means water purged from a closed cycle cooling system. Closed cycle cooling systems include cooling towers, cooling ponds, or spray canals.

(F) Air heater and precipitator washes. For purposes of Subsection R315-261-4(b)(4), air heater and precipitator washes means wastes from cleaning air preheaters and electrostatic precipitators.

(G) Effluents from floor and yard drains and sumps. For purposes of Subsection R315-261-4(b)(4), effluents from floor and yard drains and sumps means wastewaters, such as wash water, collected by or from floor drains, equipment drains, and sumps located inside the power plant building; and wastewaters, such as rain runoff, collected by yard drains and sumps located outside the power plant building.

(H) Wastewater treatment sludges. For purposes of Subsection R315-261-4(b)(4), wastewater treatment sludges refers to sludges generated from the treatment of wastewaters specified in Subsections R315-261-4(b)(4)(ii)(A) through (F).

(5) Drilling fluids, produced waters, and other wastes associated with the exploration, development, or production of crude oil, natural gas or geothermal energy.

(6)(i) Wastes which fail the test for the Toxicity Characteristic because chromium is present or are listed in Sections R315-261-30 through R316-261-35 due to the presence of chromium, which do not fail the test for the Toxicity Characteristic for any other constituent or are not listed due to the presence of any other constituent, and which do not fail the test for any other characteristic, if it is shown by a waste generator or by waste generators that:

(A) The chromium in the waste is exclusively, or nearly exclusively, trivalent chromium; and

(B) The waste is generated from an industrial process which uses trivalent chromium exclusively (or nearly exclusively) and the process does not generate hexavalent chromium; and

(C) The waste is typically and frequently managed in non-oxidizing environments.

(ii) Specific wastes which meet the standard in Subsections R315-261-4(b)(6)(i)(A), (B), and (C), so long as they do not fail the test for the toxicity characteristic for any other constituent, and do not exhibit any other characteristic, are:

(A) Chrome (blue) trimmings generated by the following subcategories of the leather tanning and finishing industry; hair pulp/chrome tan/retan/wet finish; hair save/chrome tan/retan/wet finish; retan/wet finish; no beamhouse; through-the-blue; and shearling.

(B) Chrome (blue) shavings generated by the following subcategories of the leather tanning and finishing industry: Hair pulp/chrome tan/retan/wet finish; hair save/chrome tan/retan/wet finish; retan/wet finish; no beamhouse; through-the-blue; and shearling.

(C) Buffing dust generated by the following subcategories of the leather tanning and finishing industry; hair pulp/chrome tan/retan/wet finish; hair save/chrome tan/retan/wet finish; retan/wet finish; no beamhouse; through-the-blue.

(D) Sewer screenings generated by the following subcategories of the leather tanning and finishing industry: Hair pulp/chrome tan/retan/wet finish; hair save/chrome tan/retan/wet finish; retan/wet finish; no beamhouse; through-the-blue; and shearling.

(E) Wastewater treatment sludges generated by the following subcategories of the leather tanning and finishing industry: Hair pulp/chrome tan/retan/wet finish; hair save/chrome tan/retan/wet finish; retan/wet finish; no beamhouse; through-the-blue; and shearling.

(F) Wastewater treatment sludges generated by the following subcategories of the leather tanning and finishing industry: Hair pulp/chrome tan/retan/wet finish; hair save/chrome tan/retan/wet finish; and through-the-blue.

(G) Waste scrap leather from the leather tanning industry, the shoe manufacturing industry, and other leather product manufacturing industries.

(H) Wastewater treatment sludges from the production of TiO2 pigment using chromium-bearing ores by the chloride process.

(7) Solid waste from the extraction, beneficiation, and processing of ores and minerals, including coal, phosphate rock, and overburden from the mining of uranium ore, except as provided by Section R315-266-112 for facilities that burn or process hazardous waste.

(i) For purposes of Subsection R315-261-4(b)(7) beneficiation of ores and minerals is restricted to the following activities; crushing; grinding; washing; dissolution; crystallization; filtration; sorting; sizing; drying; sintering; pelletizing; briquetting; calcining to remove water and/or carbon dioxide; roasting, autoclaving, and/or chlorination in preparation for leaching (except where the roasting (and/or autoclaving and/or chlorination)/leaching sequence produces a final or intermediate product that does not undergo further beneficiation or processing); gravity concentration; magnetic separation; electrostatic separation; flotation; ion exchange; solvent extraction; electrowinning; precipitation; amalgamation; and heap, dump, vat, tank, and in situ leaching.

(ii) For the purposes of Subsection R315-261-4(b)(7), solid waste from the processing of ores and minerals includes only the following wastes as generated:

(A) Slag from primary copper processing;

(B) Slag from primary lead processing;

(C) Red and brown muds from bauxite refining;

(D) Phosphogypsum from phosphoric acid production;

(E) Slag from elemental phosphorus production;

(F) Gasifier ash from coal gasification;

(G) Process wastewater from coal gasification;

(H) Calcium sulfate wastewater treatment plant sludge from primary copper processing;

(I) Slag tailings from primary copper processing;

(J) Fluorogypsum from hydrofluoric acid production;

(K) Process wastewater from hydrofluoric acid production;

(L) Air pollution control dust/sludge from iron blast furnaces;

(M) Iron blast furnace slag;

(N) Treated residue from roasting/leaching of chrome ore;

(O) Process wastewater from primary magnesium processing by the anhydrous process;

(P) Process wastewater from phosphoric acid production;

(Q) Basic oxygen furnace and open hearth furnace air pollution control dust/sludge from carbon steel production;

(R) Basic oxygen furnace and open hearth furnace slag from carbon steel production;

(S) Chloride process waste solids from titanium tetrachloride production;

(T) Slag from primary zinc processing.

(iii) A residue derived from co-processing mineral processing secondary materials with normal beneficiation raw materials or with normal mineral processing raw materials remains excluded under Subsection R315-261-4(b) if the owner or operator:

(A) Processes at least 50 percent by weight normal beneficiation raw materials or normal mineral processing raw materials; and,

(B) Legitimately reclaims the secondary mineral processing materials.

(8) Cement kiln dust waste, except as provided by Section R315-266-112 for facilities that burn or process hazardous waste.

(9) Solid waste which consists of discarded arsenical-treated wood or wood products which fails the test for the Toxicity Characteristic for Hazardous Waste Codes D004 through D017 and which is not a hazardous waste for any other reason if the waste is generated by persons who utilize the arsenical-treated wood and wood products for these materials' intended end use.

(10) Petroleum-contaminated media and debris that fail the test for the Toxicity Characteristic of Section R315-261-24, Hazardous Waste Codes D018 through D043 only, and are subject to the corrective action regulations under Section R315-311-202-1 which adopts 40 CFR 280 by reference.

(11) Injected groundwater that is hazardous only because it exhibits the Toxicity Characteristic, Hazardous Waste Codes D018 through D043 only, in Section R315-261-24 that is reinjected through an underground injection well pursuant to free phase hydrocarbon recovery operations undertaken at petroleum refineries, petroleum marketing terminals, petroleum bulk plants, petroleum pipelines, and petroleum transportation spill sites until January 25, 1993. This extension applies to recovery operations in existence, or for which contracts have been issued, on or before March 25, 1991. For groundwater returned through infiltration galleries from such operations at petroleum refineries, marketing terminals, and bulk plants, until October 2, 1991. New operations involving injection wells, beginning after March 25, 1991, will qualify for this compliance date extension, until January 25, 1993, only if:

(i) Operations are performed pursuant to a written state agreement that includes a provision to assess the groundwater and the need for further remediation once the free phase recovery is completed; and

(ii) A copy of the written agreement has been submitted to: Waste Identification Branch (5304), U.S. Environmental Protection Agency, 1200 Pennsylvania Ave., NW., Washington, DC 20460 and the Division of Waste Management and Radiation Control, PO Box 144880, Salt Lake City, UT 84114-4880.

(12) Used chlorofluorocarbon refrigerants from totally enclosed heat transfer equipment, including mobile air conditioning systems, mobile refrigeration, and commercial and industrial air conditioning and refrigeration systems that use chlorofluorocarbons as the heat transfer fluid in a refrigeration cycle, provided the refrigerant is reclaimed for further use.

(13) Non-terne plated used oil filters that are not mixed with wastes listed in Sections R315-261-30 through R315-261-35 if these oil filters have been gravity hot-drained using one of the following methods:

(i) Puncturing the filter anti-drain back valve or the filter dome end and hot-draining;

(ii) Hot-draining and crushing;

(iii) Dismantling and hot-draining; or

(iv) Any other equivalent hot-draining method that will remove used oil.

(14) Used oil re-refining distillation bottoms that are used as feedstock to manufacture asphalt products.

(15) Leachate or gas condensate collected from landfills where certain solid wastes have been disposed, provided that:

(i) The solid wastes disposed would meet one or more of the listing descriptions for Hazardous Waste Codes K169, K170, K171, K172, K174, K175, K176, K177, K178 and K181 if these wastes had been generated after the effective date of the listing;

(ii) The solid wastes described in Subsection R315-261-4(b)(15)(i) were disposed prior to the effective date of the listing;

(iii) The leachate or gas condensate do not exhibit any characteristic of hazardous waste nor are derived from any other listed hazardous waste;

(iv) Discharge of the leachate or gas condensate, including leachate or gas condensate transferred from the landfill to a POTW by truck, rail, or dedicated pipe, is subject to regulation under sections 307(b) or 402 of the Clean Water Act.

(v) As of February 13, 2001, leachate or gas condensate derived from K169-K172 is no longer exempt if it is stored or managed in a surface impoundment prior to discharge. As of November 21, 2003, leachate or gas condensate derived from K176, K177, and K178 is no longer exempt if it is stored or managed in a surface impoundment prior to discharge. After February 26, 2007, leachate or gas condensate derived from K181 will no longer be exempt if it is stored or managed in a surface impoundment prior to discharge. There is one exception: if the surface impoundment is used to temporarily store leachate or gas condensate in response to an emergency situation, e.g., shutdown of wastewater treatment system, provided the impoundment has a double liner, and provided the leachate or gas condensate is removed from the impoundment and continues to be managed in compliance with the conditions of Subsection R315-261-4(b)(15)(v) after the emergency ends.

(16) Reserved

(17) Reserved

(18) Solvent-contaminated wipes, except for wipes that are hazardous waste due to the presence of trichloroethylene, that are sent for disposal are not hazardous wastes from the point of generation provided that

(i) The solvent-contaminated wipes, when accumulated, stored, and transported, are contained in non-leaking, closed containers that are labeled "Excluded Solvent-Contaminated Wipes." The containers shall be able to contain free liquids, should free liquids occur. During accumulation, a container is considered closed when there is complete contact between the fitted lid and the rim, except when it is necessary to add or remove solvent-contaminated wipes. When the container is full, or when the solvent-contaminated wipes are no longer being accumulated, or when the container is being transported, the container shall be sealed with all lids properly and securely affixed to the container and all openings tightly bound or closed sufficiently to prevent leaks and emissions;

(ii) The solvent-contaminated wipes may be accumulated by the generator for up to 180 days from the start date of accumulation for each container prior to being sent for disposal;

(iii) At the point of being transported for disposal, the solvent-contaminated wipes shall contain no free liquids as defined in Section R315-260-10.

(iv) Free liquids removed from the solvent-contaminated wipes or from the container holding the wipes shall be managed according to the applicable regulations found in Rules R315-260 through 266, 268, 270 and 273;

(v) Generators shall maintain at their site the following documentation:

(A) Name and address of the landfill or combustor that is receiving the solvent-contaminated wipes;

(B) Documentation that the 180 day accumulation time limit in Subsection R315-261-4(b)(18)(ii) is being met;

(C) Description of the process the generator is using to ensure solvent-contaminated wipes contain no free liquids at the point of being transported for disposal;

(vi) The solvent-contaminated wipes are sent for disposal

(A) To a solid waste landfill that:

(I) is regulated under R315-301 through R315-320

(II) is a Class I or V Landfill; and

(III) has a composite liner; or

(B) To a hazardous waste landfill regulated under Rules R315-260 through 266, 268, and 270; or

(C) To a municipal waste combustor or other combustion facility regulated under section 129 of the Clean Air Act or to a hazardous waste combustor, boiler, or industrial furnace regulated under Rule R315-264, Rule R315-265, or Sections R315-266-100 through R315-266-112.

(c) Hazardous wastes which are exempted from certain regulations. A hazardous waste which is generated in a product or raw material storage tank, a product or raw material transport vehicle or vessel, a product or raw material pipeline, or in a manufacturing process unit or an associated non-waste-treatment-manufacturing unit, is not subject to regulation under Rules R315-262 through 265, 268, 270, and 124 or to the notification requirements of section 3010 of RCRA until it exits the unit in which it was generated, unless the unit is a surface impoundment, or unless the hazardous waste remains in the unit more than 90 days after the unit ceases to be operated for manufacturing, or for storage or transportation of product or raw materials.

(d)(1) Samples. Except as provided in Subsections R315-261-4(d)(2) and (4), a sample of solid waste or a sample of water, soil, or air, which is collected for the sole purpose of testing to determine its characteristics or composition, is not subject to any requirements of Rules R315-261 through 266, 268 or 270 or 124 or to the notification requirements of Section 3010 of RCRA, when:

(i) The sample is being transported to a laboratory for the purpose of testing; or

(ii) The sample is being transported back to the sample collector after testing; or

(iii) The sample is being stored by the sample collector before transport to a laboratory for testing; or

(iv) The sample is being stored in a laboratory before testing; or

(v) The sample is being stored in a laboratory after testing but before it is returned to the sample collector; or

(vi) The sample is being stored temporarily in the laboratory after testing for a specific purpose (for example, until conclusion of a court case or enforcement action where further testing of the sample may be necessary).

(2) In order to qualify for the exemption in Subsections R315-261-4(d)(1) (i) and (ii), a sample collector shipping samples to a laboratory and a laboratory returning samples to a sample collector shall:

(i) Comply with U.S. Department of Transportation (DOT), U.S. Postal Service (USPS), or any other applicable shipping requirements; or

(ii) Comply with the following requirements if the sample collector determines that DOT, USPS, or other shipping requirements do not apply to the shipment of the sample:

(A) Assure that the following information accompanies the sample:

(I) The sample collector's name, mailing address, and telephone number;

(II) The laboratory's name, mailing address, and telephone number;

(III) The quantity of the sample;

(IV) The date of shipment; and

(V) A description of the sample.

(B) Package the sample so that it does not leak, spill, or vaporize from its packaging.

(3) This exemption does not apply if the laboratory determines that the waste is hazardous but the laboratory is no longer meeting any of the conditions stated in Subsection R315-261-4(d)(1).

(4) In order to qualify for the exemption in Subsections R315-261-4(d)(1)(i) and (ii), the mass of a sample that will be exported to a foreign laboratory or that will be imported to a U.S. laboratory from a foreign source must additionally not exceed 25 kg.

(e)(1) Treatability Study Samples. Except as provided in Subsections R315-261-4(e)(2) and (4), persons who generate or collect samples for the purpose of conducting treatability studies as defined in Section R315-260-10, are not subject to any

requirement of Rules R315-261 through 263 or to the notification requirements of Section 3010 of RCRA, nor are such samples included in the quantity determinations of Section R315-261-5 and Subsection R315-262-34(d) when:

(i) The sample is being collected and prepared for transportation by the generator or sample collector; or

(ii) The sample is being accumulated or stored by the generator or sample collector prior to transportation to a laboratory or testing facility; or

(iii) The sample is being transported to the laboratory or testing facility for the purpose of conducting a treatability study.

(2) The exemption in Subsection R315-261-4(e)(1) is applicable to samples of hazardous waste being collected and shipped for the purpose of conducting treatability studies provided that:

(i) The generator or sample collector uses (in "treatability studies") no more than 10,000 kg of media contaminated with non-acute hazardous waste, 1000 kg of non-acute hazardous waste other than contaminated media, 1 kg of acute hazardous waste, 2500 kg of media contaminated with acute hazardous waste for each process being evaluated for each generated waste stream; and

(ii) The mass of each sample shipment does not exceed 10,000 kg; the 10,000 kg quantity may be all media contaminated with non-acute hazardous waste, or may include 2500 kg of media contaminated with acute hazardous waste, 1000 kg of hazardous waste, and 1 kg of acute hazardous waste; and

(iii) The sample shall be packaged so that it will not leak, spill, or vaporize from its packaging during shipment and the requirements of Subsections R315-261-4(e)(2)(iii)(A) or (B) are met.

(A) The transportation of each sample shipment complies with U.S. Department of Transportation (DOT), U.S. Postal Service (USPS), or any other applicable shipping requirements; or

(B) If the DOT, USPS, or other shipping requirements do not apply to the shipment of the sample, the following information shall accompany the sample:

(I) The name, mailing address, and telephone number of the originator of the sample;

(II) The name, address, and telephone number of the facility that will perform the treatability study;

(III) The quantity of the sample;

(IV) The date of shipment; and

(V) A description of the sample, including its EPA Hazardous Waste Number.

(iv) The sample is shipped to a laboratory or testing facility which is exempt under Subsection R315-261-4(f) or has an appropriate RCRA permit or interim status.

(v) The generator or sample collector maintains the following records for a period ending three years after completion of the treatability study:

(A) Copies of the shipping documents;

(B) A copy of the contract with the facility conducting the treatability study;

(C) Documentation showing:

(I) The amount of waste shipped under this exemption;

(II) The name, address, and EPA identification number of the laboratory or testing facility that received the waste;

(III) The date the shipment was made; and

(IV) Whether or not unused samples and residues were returned to the generator.

(vi) The generator reports the information required under Subsection R315-261-4(e)(2)(v)(C) in its biennial report.

(3) The Director may grant requests on a case-by-case basis for up to an additional two years for treatability studies involving bioremediation. The Director may grant requests on a case-by-case basis for quantity limits in excess of those specified in Subsections R315-261-4(e)(2)(i) and (ii) and Subsection R315-261-4(f)(4), for up to an additional 5000 kg of media contaminated with non-acute hazardous waste, 500 kg of non-acute hazardous waste, 2500 kg of media contaminated with acute hazardous waste and 1 kg of acute hazardous waste:

(i) In response to requests for authorization to ship, store and conduct treatability studies on additional quantities in advance of commencing treatability studies. Factors to be considered in reviewing such requests include the nature of the technology; the type of process, e.g., batch versus continuous; size of the unit undergoing testing, particularly in relation to scale-up considerations; the time/quantity of material required to reach steady state operating conditions; or test design considerations such as mass balance calculations.

(ii) In response to requests for authorization to ship, store and conduct treatability studies on additional quantities after initiation or completion of initial treatability studies, when: There has been an equipment or mechanical failure during the conduct of a treatability study; there is a need to verify the results of a previously conducted treatability study; there is a need to study and analyze alternative techniques within a previously evaluated treatment process; or there is a need to do further evaluation of an ongoing treatability study to determine final specifications for treatment.

(iii) The additional quantities and timeframes allowed in Subsections R315-261-4(e)(3)(i) and (ii) are subject to all the provisions in Subsections R315-261-4(e)(1) and (e)(2)(iii) through (vi). The generator or sample collector shall apply to the Director and provide in writing the following information:

(A) The reason why the generator or sample collector requires additional time or quantity of sample for treatability study evaluation and the additional time or quantity needed;

(B) Documentation accounting for all samples of hazardous waste from the waste stream which have been sent for or undergone treatability studies including the date each previous sample from the waste stream was shipped, the quantity of each previous shipment, the laboratory or testing facility to which it was shipped, what treatability study processes were conducted on each sample shipped, and the available results on each treatability study;

(C) A description of the technical modifications or change in specifications which will be evaluated and the expected results;

(D) If such further study is being required due to equipment or mechanical failure, the applicant shall include information regarding the reason for the failure or breakdown and also include what procedures or equipment improvements have been made to protect against further breakdowns; and

(E) Such other information that the Director considers necessary.

(4) In order to qualify for the exemption in Subsection R315-261-4(e)(1)(i), the mass of a sample that will be exported to a foreign laboratory or testing facility or that will be imported to a U.S. laboratory or testing facility from a foreign source must additionally no exceed 25 kg.

(f) Samples Undergoing Treatability Studies at Laboratories and Testing Facilities. Samples undergoing treatability studies and the laboratory or testing facility conducting such treatability studies, to the extent such facilities are not otherwise subject to RCRA requirements, are not subject to any requirement of Rules R315-261 through 266, 268 and 270, or to the notification requirements of Section 3010 of RCRA provided that the conditions of Subsection R315-261-4(f)(1) through (11) are met. A mobile treatment unit (MTU) may qualify as a testing facility subject to Subsections R315-261-4(f)(1) through (11). Where a group of MTUs are located at the same site, the limitations specified in Subsections R315-261-4(f)(1) through (11) apply to the entire group of MTUs collectively as if the group were one MTU.

(1) No less than 45 days before conducting treatability studies, the facility notifies the Director, in writing that it intends to conduct treatability studies under Subsection R315-261-4(f).

(2) The laboratory or testing facility conducting the treatability study has an EPA identification number.

(3) No more than a total of 10,000 kg of "as received" media contaminated with non-acute hazardous waste, 2500 kg of media contaminated with acute hazardous waste or 250 kg of other "as received" hazardous waste is subject to initiation of treatment in all treatability studies in any single day. "As received" waste refers to the waste as received in the shipment from the generator or sample collector.

(4) The quantity of "as received" hazardous waste stored at the facility for the purpose of evaluation in treatability studies does not exceed 10,000 kg, the total of which can include 10,000 kg of media contaminated with non-acute hazardous waste, 2500 kg of media contaminated with acute hazardous waste, 1000 kg of non-acute hazardous wastes other than contaminated media, and 1 kg of acute hazardous waste. This quantity limitation does not include treatment materials, including nonhazardous solid waste, added to "as received" hazardous waste.

(5) No more than 90 days have elapsed since the treatability study for the sample was completed, or no more than one year, two years for treatability studies involving bioremediation, have elapsed since the generator or sample collector shipped the sample to the laboratory or testing facility, whichever date first occurs. Up to 500 kg of treated material from a particular waste stream from treatability studies may be archived for future evaluation up to five years from the date of initial receipt. Quantities of materials archived are counted against the total storage limit for the facility.

(6) The treatability study does not involve the placement of hazardous waste on the land or open burning of hazardous waste.

(7) The facility maintains records for three years following completion of each study that show compliance with the treatment rate limits and the storage time and quantity limits. The following specific information shall be included for each treatability study conducted:

(i) The name, address, and EPA identification number of the generator or sample collector of each waste sample;

(ii) The date the shipment was received;

(iii) The quantity of waste accepted;

(iv) The quantity of "as received" waste in storage each day;

(v) The date the treatment study was initiated and the amount of "as received" waste introduced to treatment each day;

(vi) The date the treatability study was concluded;

(vii) The date any unused sample or residues generated from the treatability study were returned to the generator or sample collector or, if sent to a designated facility, the name of the facility and the EPA identification number.

(8) The facility keeps, on-site, a copy of the treatability study contract and all shipping papers associated with the transport of treatability study samples to and from the facility for a period ending three years from the completion date of each treatability study.

(9) The facility prepares and submits a report to the Director, by March 15 of each year, that includes the following information for the previous calendar year:

(i) The name, address, and EPA identification number of the facility conducting the treatability studies;

(ii) The types (by process) of treatability studies conducted;

(iii) The names and addresses of persons for whom studies have been conducted, including their EPA identification numbers;

(iv) The total quantity of waste in storage each day;

(v) The quantity and types of waste subjected to treatability studies;

(vi) When each treatability study was conducted;

(vii) The final disposition of residues and unused sample from each treatability study.

(10) The facility determines whether any unused sample or residues generated by the treatability study are hazardous waste under Section R315-261-3 and, if so, are subject to Rules R315-261 through 268 and 270, unless the residues and unused samples are returned to the sample originator under the Subsection R3315-261-4(e) exemption.

(11) The facility notifies the Director, by letter when the facility is no longer planning to conduct any treatability studies at the site.

(g) Dredged material that is not a hazardous waste. Dredged material that is subject to the requirements of a permit that has been issued under 404 of the Federal Water Pollution Control Act (33 U.S.C. 1344) or section 103 of the Marine Protection, Research, and Sanctuaries Act of 1972 (33 U.S.C. 1413) is not a hazardous waste. For Subsection R315-261-4(g), the following definitions apply:

(1) The term dredged material has the same meaning as defined in 40 CFR 232.2;

(2) The term permit means:

(i) A permit issued by the U.S. Army Corps of Engineers (Corps) or an approved State under section 404 of the Federal Water Pollution Control Act (33 U.S.C. 1344);

(ii) A permit issued by the Corps under section 103 of the Marine Protection, Research, and Sanctuaries Act of 1972 (33 U.S.C. 1413); or

(iii) In the case of Corps civil works projects, the administrative equivalent of the permits referred to in Subsections R315-261-4(g)(2)(i) and (ii), as provided for in Corps regulations.

(h) Carbon dioxide stream injected for geologic sequestration. Carbon dioxide streams that are captured and transported for purposes of injection into an underground injection well subject to the requirements for Class VI Underground Injection Control wells, including the requirements in Rule R317-7, are not a hazardous waste, provided the following conditions are met:

(1) Transportation of the carbon dioxide stream shall be in compliance with U.S. Department of Transportation requirements, including the pipeline safety laws, 49 U.S.C. 60101 et seq. and regulations, 49 CFR Parts 190-199, of the U.S. Department of Transportation, and pipeline safety regulations adopted and administered by a state authority pursuant to a certification under 49 U.S.C. 60105, as applicable.

(2) Injection of the carbon dioxide stream shall be in compliance with the applicable requirements for Class VI Underground Injection Control wells, including the applicable requirements in Rule R317-7;

(3) No hazardous wastes shall be mixed with, or otherwise co-injected with, the carbon dioxide stream; and

(4)(i) Any generator of a carbon dioxide stream, who claims that a carbon dioxide stream is excluded under Subsection R315-261-4(h), shall have an authorized representative, as defined in Section R315-260-10, sign a certification statement worded as follows: I certify under penalty of law that the carbon dioxide stream that I am claiming to be excluded under Subsection R315-261.4(h) has not been mixed with hazardous wastes, and I have transported the carbon dioxide stream in compliance with, or have contracted with a pipeline operator or transporter to transport the carbon dioxide stream in compliance with, Department of Transportation requirements, including the pipeline safety laws, 49 U.S.C. 60101 et seq., and regulations, 49 CFR Parts 190-199, of the U.S. Department of Transportation, and the pipeline safety

regulations adopted and administered by a state authority pursuant to a certification under 49 U.S.C. 60105, as applicable, for injection into a well subject to the requirements for the Class VI Underground Injection Control Program of Rule R317-7.

(ii) Any Class VI Underground Injection Control well owner or operator, who claims that a carbon dioxide stream is excluded under Subsection R315-261-4(h), shall have an authorized representative, as defined in Section R315-260-10, sign a certification statement worded as follows: I certify under penalty of law that the carbon dioxide stream that I am claiming to be excluded under Subsection R315-261-4(h) has not been mixed with, or otherwise co-injected with, hazardous waste at the Underground Injection Control (UIC) Class VI permitted facility, and that injection of the carbon dioxide stream is in compliance with the applicable requirements for UIC Class VI wells, including the applicable requirements in Rule R317-7.

(iii) The signed certification statement shall be kept on-site for no less than three years, and shall be made available within 72 hours of a written request from the Director. The signed certification statement shall be renewed every year that the exclusion is claimed, by having an authorized representative, as defined in Section R315-260-10, annually prepare and sign a new copy of the certification statement within one year of the date of the previous statement. The signed certification statement shall also be readily accessible on the facility's publicly-available Web site, if such Web site exists, as a public notification with the title of "Carbon Dioxide Stream Certification" at the time the exclusion is claimed.

(i) Reserved

(j)(1) Airbag waste at the airbag waste handler or during transport to an airbag waste collection facility or designated facility is not subject to regulation under Rules R315-262 through 268, R315-270 or R315-124, and is not subject to the notification requirements of section 3010 of RCRA provided that:

(i) The airbag waste is accumulated in a quantity of no more than 250 airbag modules or airbag inflators, for no longer than 180 days;

(ii) The airbag waste is packaged in a container designed to address the risk posed by the airbag waste and labeled "Airbag Waste -- Do Not Reuse;"

(iii) The airbag waste is sent directly to either

(A) An airbag waste collection facility in the United States under the control of a vehicle manufacturer or their authorized representative, or under the control of an authorized party administering a remedy program in response to a recall under the National Highway Traffic Safety Administration, or

(B) A designated facility as defined in Section R315-260-10;

(iv) The transport of the airbag waste complies with all applicable U.S. Department of Transportation regulations in 49 CFR part 171 through 180 during transit;

(v) The airbag waste handler maintains at the handler facility for no less than three years records of all off-site shipments of airbag waste and all confirmations of receipt from the receiving facility. For each shipment, these records must, at a minimum, contain the name of the transporter and date of the shipment; name and address of receiving facility; and the type and quantity of airbag waste, i.e., airbag modules or airbag inflators, in the shipment. Confirmations of receipt must include the name and address of the receiving facility; the type and quantity of the airbag waste, i.e., airbag modules and airbag inflators, received; and the date which it was received. Shipping records and confirmations of receipt must be made available for inspection and may be satisfied by routine business records, e.g., electronic or paper financial records, bills of lading, copies of DOT shipping papers, or electronic confirmations of receipt.

(2) Once the airbag waste arrives at an airbag waste collection facility or designated facility, it becomes subject to all applicable hazardous waste regulations, and the facility receiving airbag waste is considered the hazardous waste generator for the purposes of the hazardous waste regulations and must comply with the requirements of Rule R315-262.

(3) Reuse in vehicles of defective airbag modules or defective airbag inflators subject to a recall under the National Highway Traffic Safety Administration is considered sham recycling and prohibited under Subsection R315-261-2(g).

R315-261-6. Requirements for Recyclable Materials.

(a)(1) Hazardous wastes that are recycled are subject to the requirements for generators, transporters, and storage facilities of Subsections R315-261-6(b) and (c), except for the materials listed in Subsections R315-261-6(a)(2) and (a)(3). Hazardous wastes that are recycled shall be known as "recyclable materials."

(2) The following recyclable materials are not subject to the requirements of Section R315-261-6 but are regulated under Sections R315-266-20 through 23, Section R315-266-70, Section R315-266-80, Sections R315-266-100 through 112, Sections R315-266-200 through 206, and Sections R315-266-210, 220, 225, 230,235, 240, 245, 250, 255, 260, 310, 315, 320, 325, 330, 335, 340, 345,350, 355, and 360 and all applicable provisions in Rules R315-268, 270 and 124.

(i) Recyclable materials used in a manner constituting disposal, Sections R315-266-20 through 23;

(ii) Hazardous wastes burned, as defined in Subsection R315-266-100(a), in boilers and industrial furnaces that are not regulated under Sections R315-264-340 through 345, 347 and 351; Sections R315-370, 373, 375, 377, and 381 through 383; and Section R315-266-100 through 112;

(iii) Recyclable materials from which precious metals are reclaimed, Section R315-266-70;

(iv) Spent lead-acid batteries that are being reclaimed, Section R315-266-80.

(3) The following recyclable materials are not subject to regulation under Rules R315-262 through 268, 270 and 124, and are not subject to the notification requirements of section 3010 of RCRA:

(i) Industrial ethyl alcohol that is reclaimed except that exports and imports of such recyclable materials must comply with the requirements of Sections R315-262-80 through 84.

(ii) Scrap metal that is not excluded under Subsection R315-261-4(a)(13);

(iii) Fuels produced from the refining of oil-bearing hazardous waste along with normal process streams at a petroleum refining facility if such wastes result from normal petroleum refining, production, and transportation practices, this exemption does not apply to fuels produced from oil recovered from oil-bearing hazardous waste, where such recovered oil is already excluded under Subsection R315-261-4(a)(12);

(iv)(A) Hazardous waste fuel produced from oil-bearing hazardous wastes from petroleum refining, production, or transportation practices, or produced from oil reclaimed from such hazardous wastes, where such hazardous wastes are reintroduced into a process that does not use distillation or does not produce products from crude oil so long as the resulting fuel meets the used oil specification under Subsection R315-15-1.2(c) and so long as no other hazardous wastes are used to produce the hazardous waste fuel;

(B) Hazardous waste fuel produced from oil-bearing hazardous waste from petroleum refining production, and transportation practices, where such hazardous wastes are reintroduced into a refining process after a point at which contaminants are removed, so long as the fuel meets the used oil fuel specification under Subsection R315-15-1.2(c); and

(C) Oil reclaimed from oil-bearing hazardous wastes from petroleum refining, production, and transportation practices, which reclaimed oil is burned as a fuel without reintroduction

to a refining process, so long as the reclaimed oil meets the used oil fuel specification under Subsection R315-15-1.2(c).

(4) Used oil that is recycled and is also a hazardous waste solely because it exhibits a hazardous characteristic is not subject to the requirements of Rules R315-260 through 268, but is regulated under Rule R315-15. Used oil that is recycled includes any used oil which is reused, following its original use, for any purpose, including the purpose for which the oil was originally used. Such term includes, but is not limited to, oil which is re-refined, reclaimed, burned for energy recovery, or reprocessed.

(5) Hazardous waste that is exported or imported for purpose of recovery is subject to the requirements of Sections R315-262-80 through 84.

(b) Generators and transporters of recyclable materials are subject to the applicable requirements of Rules R315-262 and 263 and the notification requirements under section 3010 of RCRA, except as provided in Subsection R315-261-6(a).

(c)(1) Owners and operators of facilities that store recyclable materials before they are recycled are regulated under all applicable provisions of Rules R315-264 and 265, and under Rules R315-266, 268, 270 and 124 and the notification requirements under section 3010 of RCRA, except as provided in Subsection R315-261-6(a). The recycling process itself is exempt from regulation except as provided in Subsection R315-261-6(d).

(2) Owners or operators of facilities that recycle recyclable materials without storing them before they are recycled are subject to the following requirements, except as provided in R315-261-6(a):

(i) Notification requirements under section 3010 of RCRA;

(ii) Sections R315-265-71 and 72 dealing with the use of the manifest and manifest discrepancies;

(iii) Subsection R315-261-6(d); and

(iv) Section R315-265-75, addressing biennial reporting requirements.

(d) Owners or operators of facilities subject to permitting requirements under Section 19-6-108 with hazardous waste management units that recycle hazardous wastes are subject to the requirements of Sections R315-264-1030 through 1036; and Sections R315-264-1050 through 1065; 40 CFR 265.1030 through 1035, which are adopted and incorporated by reference; or 40 CFR 265.1050 through 1064.

R315-261-7. Residues of Hazardous Waste in Empty Containers.

(a)(1) Any hazardous waste remaining in either: an empty container; or an inner liner removed from an empty container, as defined in Subsection R315-261-7(b), is not subject to regulation under Rules R315-261 through 266, 268, 270 or 124 or to the notification requirements of section 3010 of RCRA.

(2) Any hazardous waste in either a container that is not empty or an inner liner removed from a container that is not empty, as defined in Subsection R315-261-7(b), is subject to regulation under Rules R315-261 through 266, 268, 270 and 124 and to the notification requirements of section 3010 of RCRA.

(b)(1) A container or an inner liner removed from a container that has held any hazardous waste, except a waste that is a compressed gas or that is identified as an acute hazardous waste listed in Section R315-261-31 or Subsection R315-261-33(e) is empty if:

(i) All wastes have been removed that can be removed using the practices commonly employed to remove materials from that type of container, e.g., pouring, pumping, and aspirating, and

(ii) No more than 2.5 centimeters, one inch, of residue remain on the bottom of the container or inner liner, or

(iii)(A) No more than three percent by weight of the total capacity of the container remains in the container or inner liner if the container is less than or equal to 119 gallons in size; or

(B) No more than 0.3 percent by weight of the total capacity of the container remains in the container or inner liner if the container is greater than 119 gallons in size.

(2) A container that has held a hazardous waste that is a compressed gas is empty when the pressure in the container approaches atmospheric.

(3) A container or an inner liner removed from a container that has held an acute hazardous waste listed in Section R315-261-31 or Subsection R315-261-33(e) is empty if:

(i) The container or inner liner has been triple rinsed using a solvent capable of removing the commercial chemical product or manufacturing chemical intermediate;

(ii) The container or inner liner has been cleaned by another method that has been shown in the scientific literature, or by tests conducted by the generator, to achieve equivalent removal; or

(iii) In the case of a container, the inner liner that prevented contact of the commercial chemical product or manufacturing chemical intermediate with the container, has been removed.

R315-261-8. PCB Wastes Regulated Under Toxic Substance Control Act.

The disposal of PCB-containing dielectric fluid and electric equipment containing such fluid authorized for use and regulated under 40 CFR 761 and that are hazardous only because they fail the test for the Toxicity Characteristic. Hazardous Waste Codes D018 through D043 only, are exempt from regulation under Rules R315-261 through 265, 268, 270 and 124, and the notification requirements of section 3010 of RCRA.

R315-261-9. Requirements for Universal Waste.

The wastes listed in Section R315-261-9 are exempt from regulation under Rules R315-262 through 270 except as specified in Rule R315-273 and, therefore are not fully regulated as hazardous waste. The wastes listed in Section R315-261-9 are subject to regulation under Rule R315-273:

(a) Batteries as described in Section R315-273-2;

(b) Pesticides as described in Section R315-273-3;

(c) Mercury-containing equipment as described in Section R315-273-4; and

(d) Lamps as described in Section R315-273-5.

(e) Antifreeze as described in Subsection R315-273-6(a).

(f) Aerosol cans as described in Subsection R315-273-6(b).

R315-261-10. Criteria for Identifying the Characteristics of Hazardous Waste.

(a) The Board shall identify and define a characteristic of hazardous waste in Sections R315-261-20 through 24 only upon determining that:

(1) A solid waste that exhibits the characteristic may:

(i) Cause, or significantly contribute to, an increase in mortality or an increase in serious irreversible, or incapacitating reversible, illness; or

(ii) Pose a substantial present or potential hazard to human health or the environment when it is improperly treated, stored, transported, disposed of or otherwise managed; and

(2) The characteristic can be:

(i) Measured by an available standardized test method which is reasonably within the capability of generators of solid waste or private sector laboratories that are available to serve generators of solid waste; or

(ii) Reasonably detected by generators of solid waste through their knowledge of their waste.

R315-261-11. Criteria for Listing Hazardous Waste.

(a) The Board shall list a solid waste as a hazardous waste only upon determining that the solid waste meets one of the following criteria:

(1) It exhibits any of the characteristics of hazardous waste identified in Sections R315-261-20 through 24.

(2) It has been found to be fatal to humans in low doses or, in the absence of data on human toxicity, it has been shown in studies to have an oral LD 50 toxicity, rat, of less than 50 milligrams per kilogram, an inhalation LC 50 toxicity, rat, of less than 2 milligrams per liter, or a dermal LD 50 toxicity, rabbit, of less than 200 milligrams per kilogram or is otherwise capable of causing or significantly contributing to an increase in serious irreversible, or incapacitating reversible, illness. Waste listed in accordance with these criteria shall be designated Acute Hazardous Waste.

(3) It contains any of the toxic constituents listed in Rule R315-261 appendix VIII and, after considering the following factors, the Board concludes that the waste is capable of posing a substantial present or potential hazard to human health or the environment when improperly treated, stored, transported or disposed of, or otherwise managed:

(i) The nature of the toxicity presented by the constituent.

(ii) The concentration of the constituent in the waste.

(iii) The potential of the constituent or any toxic degradation product of the constituent to migrate from the waste into the environment under the types of improper management considered in Subsection R315-261-11(a)(3)(vii).

(iv) The persistence of the constituent or any toxic degradation product of the constituent.

(v) The potential for the constituent or any toxic degradation product of the constituent to degrade into non-harmful constituents and the rate of degradation.

(vi) The degree to which the constituent or any degradation product of the constituent bioaccumulates in ecosystems.

(vii) The plausible types of improper management to which the waste could be subjected.

(viii) The quantities of the waste generated at individual generation sites or on a regional or national basis.

(ix) The nature and severity of the human health and environmental damage that has occurred as a result of the improper management of wastes containing the constituent.

(x) Action taken by other governmental agencies or regulatory programs based on the health or environmental hazard posed by the waste or waste constituent.

(xi) Such other factors as may be appropriate. Substances shall be listed on appendix VIII of Rule R315-261 only if they have been shown in scientific studies to have toxic, carcinogenic, mutagenic or teratogenic effects on humans or other life forms. Wastes listed in accordance with these criteria shall be designated Toxic wastes.

(b) The Board may list classes or types of solid waste as hazardous waste if it has reason to believe that individual wastes, within the class or type of waste, typically or frequently are hazardous under the definition of hazardous waste found in Section 19-6-102.

(c) The Board shall use the criteria for listing specified in Section R315-261-11 to establish the exclusion limits referred to in Subsection R315-261-5(c).

R315-261-20. Characteristics of Hazardous Waste - General.

(a) A solid waste, as defined in Section R315-261-2, which is not excluded from regulation as a hazardous waste under Subsection R315-261-4(b), is a hazardous waste if it exhibits any of the characteristics identified in Sections R315-261-20 through 24.

(b) A hazardous waste which is identified by a characteristic in Sections R315-261-20 through 24 is assigned every EPA Hazardous Waste Number that is applicable as set forth in Sections R315-261-20 through 24. This number shall be used in complying with the notification requirements of section 3010 of RCRA and all applicable recordkeeping and reporting requirements under Rules R315-262 through 265, 268 and 270.

(c) For purposes of Sections R315-261-20 through 24, the Board shall consider a sample obtained using any of the applicable sampling methods specified in appendix I of Rule R315-261 to be a representative sample within the meaning of Rule R315-260.

R315-261-21. Characteristics of Hazardous Waste - Characteristic of Ignitability.

(a) A solid waste exhibits the characteristic of ignitability if a representative sample of the waste has any of the following properties:

(1) It is a liquid, other than an aqueous solution containing less than 24 percent alcohol by volume and has flash point less than 60 degrees C (140 degrees F), as determined by a Pensky-Martens Closed Cup Tester, using the test method specified in ASTM Standard D 93-79 or D 93-80, see Section R315-260-11, or a Setaflash Closed Cup Tester, using the test method specified in ASTM Standard D 3278-78, see Section R315-260-11.

(2) It is not a liquid and is capable, under standard temperature and pressure, of causing fire through friction, absorption of moisture or spontaneous chemical changes and, when ignited, burns so vigorously and persistently that it creates a hazard.

(3) It is an ignitable compressed gas.

(i) The term "compressed gas" shall designate any material or mixture having in the container an absolute pressure exceeding 40 p.s.i. at 70 degrees Fahrenheit or, regardless of the pressure at 70 degrees Fahrenheit, having an absolute pressure exceeding 104 p.s.i. at 130 degrees Fahrenheit; or any liquid flammable material having a vapor pressure exceeding 40 p.s.i. absolute at 100 degrees Fahrenheit as determined by ASTM Test D-323.

(ii) A compressed gas shall be characterized as ignitable if any one of the following occurs:

(A) Either a mixture of 13 percent or less, by volume, with air forms a flammable mixture or the flammable range with air is wider than 12 percent regardless of the lower limit. These limits shall be determined at atmospheric temperature and pressure. The method of sampling and test procedure shall be acceptable to the Bureau of Explosives and approved by the director, Pipeline and Hazardous Materials Technology, U.S. Department of Transportation, see Note 2.

(B) Using the Bureau of Explosives' Flame Projection Apparatus, see Note 1, the flame projects more than 18 inches beyond the ignition source with valve opened fully, or, the flame flashes back and burns at the valve with any degree of valve opening.

(C) Using the Bureau of Explosives' Open Drum Apparatus, see Note 1, there is any significant propagation of flame away from the ignition source.

(D) Using the Bureau of Explosives' Closed Drum Apparatus, see Note 1, there is any explosion of the vapor-air mixture in the drum.

(4) It is an oxidizer. An oxidizer for the purpose of this subchapter is a substance such as a chlorate, permanganate, inorganic peroxide, or a nitrate, that yields oxygen readily to stimulate the combustion of organic matter (see Note 4).

(i) An organic compound containing the bivalent -O-O- structure and which may be considered a derivative of hydrogen peroxide where one or more of the hydrogen atoms have been replaced by organic radicals shall be classed as an organic peroxide unless:

(A) The material meets the definition of a Class A

explosive or a Class B explosive, as defined in Subsection R315-261-23(a)(8), in which case it shall be classed as an explosive,

(B) The material is forbidden to be offered for transportation according to 49 CFR 172.101 and 49 CFR 173.21,

(C) It is determined that the predominant hazard of the material containing an organic peroxide is other than that of an organic peroxide, or

(D) According to data on file with the Pipeline and Hazardous Materials Safety Administration in the U.S. Department of Transportation (see Note 3), it has been determined that the material does not present a hazard in transportation.

(b) A solid waste that exhibits the characteristic of ignitability has the EPA Hazardous Waste Number of D001.

Note 1: A description of the Bureau of Explosives' Flame Projection Apparatus, Open Drum Apparatus, Closed Drum Apparatus, and method of tests may be procured from the Bureau of Explosives.

Note 2: As part of a U.S. Department of Transportation (DOT) reorganization, the Office of Hazardous Materials Technology (OHMT), which was the office listed in the 1980 publication of 49 CFR 173.300 for the purposes of approving sampling and test procedures for a flammable gas, ceased operations on February 20, 2005. OHMT programs have moved to the Pipeline and Hazardous Materials Safety Administration (PHMSA) in the DOT.

Note 3: As part of a U.S. Department of Transportation (DOT) reorganization, the Research and Special Programs Administration (RSPA), which was the office listed in the 1980 publication of 49 CFR 173.151a for the purposes of determining that a material does not present a hazard in transport, ceased operations on February 20, 2005. RSPA programs have moved to the Pipeline and Hazardous Materials Safety Administration (PHMSA) in the DOT.

Note 4: The DOT regulatory definition of an oxidizer was contained in Section 173.151 of 49 CFR, and the definition of an organic peroxide was contained in paragraph 173.151a. An organic peroxide is a type of oxidizer.

R315-261-22. Characteristics of Hazardous Waste - Characteristic of Corrosivity.

(a) A solid waste exhibits the characteristic of corrosivity if a representative sample of the waste has either of the following properties:

(1) It is aqueous and has a pH less than or equal to 2 or greater than or equal to 12.5, as determined by a pH meter using Method 9040C in "Test Methods for Evaluating Solid Waste, Physical/Chemical Methods," EPA Publication SW-846, see Section R315-260-11 which incorporates 40 CFR 260.11 by reference.

(2) It is a liquid and corrodes steel (SAE 1020) at a rate greater than 6.35 mm (0.250 inch) per year at a test temperature of 55 degrees C (130 degrees F) as determined by Method 1110A in "Test Methods for Evaluating Solid Waste, Physical/Chemical Methods," EPA Publication SW-846, see Section R315-260-11 which incorporates 40 CFR 260.11 by reference.

(b) A solid waste that exhibits the characteristic of corrosivity has the EPA Hazardous Waste Number of D002.

R315-261-23. Characteristics of Hazardous Waste - Characteristic of Reactivity.

(a) A solid waste exhibits the characteristic of reactivity if a representative sample of the waste has any of the following properties:

(1) It is normally unstable and readily undergoes violent change without detonating.

(2) It reacts violently with water.

(3) It forms potentially explosive mixtures with water.

(4) When mixed with water, it generates toxic gases, vapors or fumes in a quantity sufficient to present a danger to human health or the environment.

(5) It is a cyanide or sulfide bearing waste which, when exposed to pH conditions between 2 and 12.5, can generate toxic gases, vapors or fumes in a quantity sufficient to present a danger to human health or the environment.

(6) It is capable of detonation or explosive reaction if it is subjected to a strong initiating source or if heated under confinement.

(7) It is readily capable of detonation or explosive decomposition or reaction at standard temperature and pressure.

(8) It is a forbidden explosive as defined in 49 CFR 173.54, or is a Division 1.1, 1.2 or 1.3 explosive as defined in 49 CFR 173.50 and 173.53.

(b) A solid waste that exhibits the characteristic of reactivity has the EPA Hazardous Waste Number of D003.

R315-261-24. Characteristics of Hazardous Waste - Toxicity Characteristic.

(a) A solid waste (except manufactured gas plant waste) exhibits the characteristic of toxicity if, using the Toxicity Characteristic Leaching Procedure, test Method 1311 in "Test Methods for Evaluating Solid Waste, Physical/Chemical Methods," EPA Publication SW-846, see Section R315-260-11, the extract from a representative sample of the waste contains any of the contaminants listed in Table 1 at the concentration equal to or greater than the respective value given in that Table 1. Where the waste contains less than 0.5 percent filterable solids, the waste itself, after filtering using the methodology outlined in Method 1311, is considered to be the extract for the purpose of Section R315-261-24.

(b) A solid waste that exhibits the characteristic of toxicity has the EPA Hazardous Waste Number specified in Table 1 which corresponds to the toxic contaminant causing it to be hazardous.

TABLE 1
Maximum Concentration of Contaminants for the Toxicity Characteristic

PA HW(1)	Contaminant CAS(2)	Regulatory Level (mg/L)
D004 Arsenic	7440-38-2	5.0
D005 Barium	7440-39-3	100.0
D018 Benzene	71-43-2	0.5
D006 Cadmium	7440-43-9	1.0
D019 Carbon tetrachloride	56-23-5	0.5
D020 Chlordane	57-74-9	0.03
D021 Chlorobenzene	108-90-7	100.0
D022 Chloroform	67-66-3	6.0
D007 Chromium	7440-47-3	5.0
D023 o-Cresol	95-48-7	200.0(4)
D024 m-Cresol	108-39-4	200.0(4)
D025 p-Cresol	106-44-5	200.0(4)
D026 Cresol		200.0(4)
D016 2,4-D	94-75-7	10.0
D027 1,4-Dichlorobenzene	106-46-7	7.5
D028 1,2-Dichloroethane	107-06-2	0.5
D029 1,1-Dichloroethylene	75-35-4	0.7
D030 2,4-Dinitrotoluene	121-14-2	0.13(3)
D012 Endrin	72-20-8	0.02
D031 Heptachlor (and its epoxide)	76-44-8	0.008
D032 Hexachlorobenzene	118-74-1	0.13(3)
D033 Hexachlorobutadiene	87-68-3	0.5
D034 Hexachloroethane	67-72-1	3.0
D008 Lead	7439-92-1	5.0

D013 Lindane	58-89-9	0.4
D009 Mercury	7439-97-6	0.2
D014 Methoxychlor	72-43-5	10.0
D035 Methyl ethyl ketone	78-93-3	200.0
D036 Nitrobenzene	98-95-3	2.0
D037 Pentrachlorophenol	87-86-5	100.0
D038 Pyridine	110-86-1	5.0(3)
D010 Selenium	7782-49-2	1.0
D011 Silver	7440-22-4	5.0
D039 Tetrachloroethylene	127-18-4	0.7
D015 Toxaphene	8001-35-2	0.5
D040 Trichloroethylene	79-01-6	0.5
D04 2,4,5-Trichlorophenol	95-95-4	400.0
D042 2,4,6-Trichlorophenol	88-06-2	2.0
D017 2,4,5-TP (Silvex)	93-72-1	1.0
D043 Vinyl chloride	75-01-4	0.2

(1) Hazardous waste number.
(2) Chemical abstracts service number.
(3) Quantitation limit is greater than the calculated regulatory level. The quantitation limit therefore becomes the regulatory level.
(4) If o-, m-, and p-Cresol concentrations cannot be differentiated, the total cresol (D026) concentration is used. The regulatory level of total cresol is 200 mg/l.

R315-261-30. Lists of Hazardous Wastes - General.

(a) A solid waste is a hazardous waste if it is listed in Sections R315-261-30 through 35, unless it has been excluded from this list under Sections R315-260.20 and 22.

(b) The Board shall indicate the basis for listing the classes or types of wastes listed in Sections R315-261-30 through 35 by employing one or more of the following Hazard Codes:

(1) Ignitable Waste: (I)
(2) Corrosive Waste: (C)
(3) Reactive Waste: (R)
(4) Toxicity Characteristic Waste: (E)
(5) Acute Hazardous Waste: (H)
(6) Toxic Waste: (T)

Appendix VII identifies the constituent which caused the Board to list the waste as a Toxicity Characteristic Waste or Toxic Waste in Sections R315-261-31 and 32.

(c) Each hazardous waste listed in Sections R315-261-30 through 35 is assigned an EPA Hazardous Waste Number which precedes the name of the waste. This number shall be used in complying with the notification requirements of Section 3010 of the RCRA and certain recordkeeping and reporting requirements under Rules R315-262 through 265, 268, and 270.

(d) The following hazardous wastes listed in Section R315-261-31 are subject to the exclusion limits for acutely hazardous wastes established in Section R315-261-5: EPA Hazardous Wastes Nos. F020, F021, F022, F023, F026 and F027.

R315-261-31. Lists of Hazardous Wastes - Hazardous Wastes from Non-Specific Sources.

(a) The following solid wastes are listed hazardous wastes from non-specific sources unless they are excluded under Sections R315-260-20 and 22 and listed in R315-260 appendix IX which incorporates 40 CFR 260 appendix IX by reference.

TABLE 2
Hazardous Wastes From Non-specific Sources

Industry and EPA hazardous waste No. Generic:	Hazardous waste	Hazard Code
F001	The following spent halogenated solvents used in degreasing: Tetrachloroethylene, trichloroethylene, methylene chloride, 1,1,1-trichloroethane, carbon tetrachloride, and chlorinated fluorocarbons; all spent solvent mixtures/blends used in degreasing containing, before use, a total of ten percent or more, by volume, of one or more of the above halogenated solvents or those solvents listed in F002, F004, and F005; and still bottoms from the recovery of these spent solvents and spent solvent mixtures	(T)
F002	The following spent halogenated solvents: Tetrachloroethylene, methylene chloride, trichloroethylene, 1,1,1-trichloroethane, chlorobenzene, 1,1,2-trichloro-1,2,2-trifluoroethane, ortho-dichlorobenzene, trichlorofluoromethane, and 1,1,2-trichloroethane; all spent solvent mixtures/blends containing, before use, a total of ten percent or more (by volume) of one or more of the above halogenated solvents or those listed in F001, F004, or F005; and still bottoms from the recovery of these spent solvents and spent solvent mixtures	(T)
F003	The following spent non-halogenated solvents: Xylene, acetone, ethyl acetate, ethyl benzene, methyl isobutyl ketone, n-butyl alcohol, cyclohexanone, and methanol; all spent solvent mixtures/blends containing, before use, only the above spent non-halogenated solvents; and all spent solvent mixtures/blends containing, before use, one or more of the above non-halogenated solvents, and, a total of ten percent or more (by volume) of one or more of those solvents listed in F001, F002, F004, and F005; and still bottoms from the recovery of these spent solvents and spent solvent mixtures	(I)*
F004	The following spent non-halogenated solvents: Cresols and cresylic acid, and nitrobenzene; all spent solvent mixtures/blends containing, before use, a total of ten percent or more (by volume) of one or more of the above non-halogenated solvents or those solvents listed in F001, F002, and F005; and still bottoms from the recovery of these spent solvents and spent solvent mixtures	(T)
F005	The following spent non-halogenated solvents: Toluene, methyl ethyl ketone, carbon disulfide, isobutanol, pyridine, benzene, 2-ethoxyethanol, and 2-nitropropane; all spent solvent mixtures/blends containing, before use, a total of ten percent or more, by volume, of one or more of the above non-halogenated solvents or those solvents listed in F001, F002, or F004; and still bottoms from the recovery of these spent solvents and spent solvent mixtures	(I,T)
F006	Wastewater treatment sludges from electroplating operations except from the following processes: (1) Sulfuric acid anodizing of aluminum; (2) tin plating on carbon steel; (3) zinc plating, segregated basis, on carbon steel; (4) aluminum or zinc-aluminum plating on carbon steel; (5) cleaning/stripping associated with tin, zinc and aluminum plating on carbon steel; and (6) chemical etching and milling of aluminum	(T)
F007	Spent cyanide plating bath solutions from electroplating operations	(R,T)
F008	Plating bath residues from the bottom of plating baths from electroplating operations where cyanides are used in the process	(R,T)
F009	Spent stripping and cleaning bath solutions from electroplating operations where cyanides are used in the process	(R,T)
F010	Quenching bath residues from oil baths from metal heat treating operations where cyanides are used in the process	(R,T)
F011	Spent cyanide solutions from salt bath pot	(R,T)

cleaning from metal heat treating operations

F012 Quenching waste water treatment sludges from metal heat treating operations where cyanides are used in the process (T)

F019 Wastewater treatment sludges from the chemical conversion coating of aluminum except from zirconium phosphating in aluminum can washing when such phosphating is an exclusive conversion coating process. Wastewater treatment sludges from the manufacturing of motor vehicles using a zinc phosphating process will not be subject to this listing at the point of generation if the wastes are not placed outside on the land prior to shipment to a landfill for disposal and are either: disposed in a Subtitle D municipal or industrial landfill unit that is equipped with a single clay liner and is permitted, licensed or otherwise authorized by the state; or disposed in a landfill unit subject to, or otherwise meeting, the landfill requirements in Sections R315-258-40, R315-264-301 or 40 CFR 265.301, which is adopted by reference. For the purposes of this listing, motor vehicle manufacturing is defined in Subsection R315-261-31(b)(4)(i) and Subsection R315-261-31(b)(4)(ii) Describes the Recordkeeping requirements for motor vehicle manufacturing facilities (T)

F020 Wastes, except wastewater and spent carbon from hydrogen chloride purification, from the production or manufacturing use (as a reactant, chemical intermediate, or component in a formulating process) of tri- or tetrachlorophenol, or of intermediates used to produce their pesticide derivatives. This listing does not include wastes from the production of Hexachlorophene from highly purified 2,4,5-trichlorophenol. (H)

F021 Wastes (except wastewater and spent carbon from hydrogen chloride purification) from the production or manufacturing use (as a reactant, chemical intermediate, or component in a formulating process) of pentachlorophenol, or of intermediates used to produce its derivatives (H)

F022 Wastes (except wastewater and spent carbon from hydrogen chloride purification) from the manufacturing use; as a reactant, chemical intermediate, or component in a formulating process; of tetra-, penta-, or hexachlorobenzenes under alkaline conditions (H)

F023 Wastes (except wastewater and spent carbon from hydrogen chloride purification) from the production of materials on equipment previously used for the production or manufacturing use;as a reactant, chemical intermediate, or component in a formulating process; of tri- and tetrachlorophenols. This listing does not include wastes from equipment used only for the production or use of Hexachlorophene from highly purified 2,4,5-trichlorophenol. (H)

F024 Process wastes, including but not limited to, distillation residues, heavy ends, tars, and reactor clean-out wastes, from the production of certain chlorinated aliphatic hydrocarbons by free radical catalyzed processes. These chlorinated aliphatic hydrocarbons are those having carbon chain lengths ranging from one to and including five, with varying amounts and positions of chlorine substitution. This listing does not include wastewaters, wastewater treatment sludges, spent catalysts, and wastes listed in Sections R315-261.31 or 32. (T)

F025 Condensed light ends, spent filters and filter aids, and spent desiccant wastes from the production of certain chlorinated aliphatic hydrocarbons, by free radical catalyzed processes. These chlorinated aliphatic hydrocarbons are those having carbon chain lengths ranging from one to and including five, with varying amounts and positions of chlorine substitution (T)

F026 Wastes, except wastewater and spent carbon from hydrogen chloride purification) from the production of materials on equipment previously used for the manufacturing use, as a reactant, chemical intermediate, or component in a formulating process, of tetra-, penta-, or hexachlorobenzene under alkaline conditions (H)

F027 Discarded unused formulations containing tri-, tetra-, or pentachlorophenol or discarded unused formulations containing compounds derived from these chlorophenols. This listing does not include formulations containing Hexachlorophene sythesized from prepurified 2,4,5-trichlorophenol as the sole component. (H)

F028 Residues resulting from the incineration or thermal treatment of soil contaminated with EPA Hazardous Waste Nos. F020, F021, F022, F023, F026, and F027 (T)

F032 Wastewaters, except those that have not come into contact with process contaminants), process residuals, preservative drippage, and spent formulations from wood preserving processes generated at plants that currently use or have previously used chlorophenolic formulations, except potentially cross-contaminated wastes that have had the F032 waste code deleted in accordance with Section R315-261-35 or potentially cross-contaminated wastes that are otherwise currently regulated as hazardous wastes, i.e., F034 or F035, and where the generator does not resume or initiate use of chlorophenolic formulations. This listing does not include K001 bottom sediment sludge from the treatment of wastewater from wood preserving processes that use creosote and/or pentachlorophenol (T)

F034 Wastewaters (except those that have not come into contact with process contaminants), process residuals, preservative drippage, and spent formulations from wood preserving processes generated at plants that use creosote formulations. This listing does not include K001 bottom sediment sludge from the treatment of wastewater from wood preserving processes that use creosote and/or pentachlorophenol (T)

F035 Wastewaters (except those that have not come into contact with process contaminants), process residuals, preservative drippage, and spent formulations from wood preserving processes generated at plants that use inorganic preservatives containing arsenic or chromium. This listing does not include K001 bottom sediment sludge from the treatment of wastewater from wood preserving processes that use creosote and/or pentachlorophenol (T)

F037 Petroleum refinery primary oil/water/solids separation sludge-Any sludge generated from the gravitational separation of oil/water/solids during the storage or treatment of process wastewaters and oily cooling wastewaters from petroleum refineries. Such sludges include, but are not limited to, those generated in oil/water/solids separators; tanks and impoundments; ditches and other conveyances; sumps; and stormwater units receiving dry weather flow. Sludge generated in stormwater units that do not receive dry weather flow, sludges generated from non-contact once-through cooling waters segregated for treatment from other process or oily cooling waters, sludges generated in aggressive biological treatment units as defined in Subsection R315-261-31(b)(2), including sludges generated in one or more (T)

	additional units after wastewaters have been treated in aggressive biological treatment units, and K051 wastes are not included in this listing. This listing does include residuals generated from processing or recycling oil-bearing hazardous secondary materials excluded under Subsection R315-261-4 (a)(12)(i), if those residuals are to be disposed of	
F038	Petroleum refinery secondary (emulsified) oil/water/solids separation sludge-Any sludge and/or float generated from the physical and/or chemical separation of oil/water/solids in process wastewaters and oily cooling wastewaters from petroleum refineries. Such wastes include, but are not limited to, all sludges and floats generated in: induced air flotation (IAF) units, tanks and impoundments, and all sludges generated in DAF units. Sludges generated in stormwater units that do not receive dry weather flow, sludges generated from non-contact once-through cooling waters segregated for treatment from other process or oily cooling waters, sludges and floats generated in aggressive biological treatment units as defined in Subsection R315-261-31(b)(2), including sludges and floats generated in one or more additional units after wastewaters have been treated in aggressive biological treatment units) and F037, K048, and K051 wastes are not included in this listing	(T)
F039	Leachate (liquids that have percolated through land disposed wastes) resulting from the disposal of more than one restricted waste classified as hazardous under Sections R316-261-30 through 35. Leachate resulting from the disposal of one or more of the following EPA Hazardous Wastes and no other Hazardous Wastes retains its EPA Hazardous Waste Number(s): F020, F021, F022, F026, F027, and/or F028.	(T)
F999	Residues from demilitarization, treatment, and testing of nerve, military, and chemical agents CX, GA, GB, GD, H, HD, HL, HN-1, HN-2, HN-3, HT, L, T, and VX.	R,T,C,H)

*(I,T) should be used to specify mixtures that are ignitable and contain toxic constituents.

(b) Listing Specific Definitions:

(1) For the purposes of the F037 and F038 listings, oil/water/solids is defined as oil and/or water and/or solids.

(2)(i) For the purposes of the F037 and F038 listings, aggressive biological treatment units are defined as units which employ one of the following four treatment methods: activated sludge; trickling filter; rotating biological contactor for the continuous accelerated biological oxidation of wastewaters; or high-rate aeration. High-rate aeration is a system of surface impoundments or tanks, in which intense mechanical aeration is used to completely mix the wastes, enhance biological activity, and

(A) the units employ a minimum of 6 hp per million gallons of treatment volume; and either

(B) the hydraulic retention time of the unit is no longer than 5 days; or

(C) the hydraulic retention time is no longer than 30 days and the unit does not generate a sludge that is a hazardous waste by the Toxicity Characteristic.

(ii) Generators and treatment, storage and disposal facilities have the burden of proving that their sludges are exempt from listing as F037 and F038 wastes under this definition. Generators and treatment, storage and disposal facilities shall maintain, in their operating or other onsite records, documents and data sufficient to prove that:

(A) the unit is an aggressive biological treatment unit as defined in this subsection; and

(B) the sludges sought to be exempted from the definitions of F037 and/or F038 were actually generated in the aggressive biological treatment unit.

(3)(i) For the purposes of the F037 listing, sludges are considered to be generated at the moment of deposition in the unit, where deposition is defined as at least a temporary cessation of lateral particle movement.

(ii) For the purposes of the F038 listing,

(A) sludges are considered to be generated at the moment of deposition in the unit, where deposition is defined as at least a temporary cessation of lateral particle movement and

(B) floats are considered to be generated at the moment they are formed in the top of the unit.

(4) For the purposes of the F019 listing, the following apply to wastewater treatment sludges from the manufacturing of motor vehicles using a zinc phosphating process.

(i) Motor vehicle manufacturing is defined to include the manufacture of automobiles and light trucks/utility vehicles, including light duty vans, pick-up trucks, minivans, and sport utility vehicles. Facilities shall be engaged in manufacturing complete vehicles, body and chassis or unibody, or chassis only.

(ii) Generators shall maintain in their on-site records documentation and information sufficient to prove that the wastewater treatment sludges to be exempted from the F019 listing meet the conditions of the listing. These records shall include: the volume of waste generated and disposed of off site; documentation showing when the waste volumes were generated and sent off site; the name and address of the receiving facility; and documentation confirming receipt of the waste by the receiving facility. Generators shall maintain these documents on site for no less than three years. The retention period for the documentation is automatically extended during the course of any enforcement action or as requested by the Director.

R315-261-32. Lists of Hazardous Wastes - Hazardous Wastes from Specific Sources.

(a) The following solid wastes are listed hazardous wastes from specific sources unless they are excluded under Sections R315-260-20 and 22 and listed in appendix IX.

TABLE

Industry and EPA hazardous waste No.	Hazardous waste	Hazard code
Wood preservation:		
K001	Bottom sediment sludge from the treatment of wastewaters from wood preserving processes that use creosote and/or pentachlorophenol	(T)
Inorganic pigments:		
K002	Wastewater treatment sludge from the production of chrome yellow and orange pigments	(T)
K003	Wastewater treatment sludge from the production of molybdate orange pigments	(T)
K004	Wastewater treatment sludge from the production of zinc yellow pigments	(T)
K005	Wastewater treatment sludge from the production of chrome green pigments	(T)
K006	Wastewater treatment sludge from the production of chrome oxide green pigments, anhydrous and hydrated,	(T)
K007	Wastewater treatment sludge from the production of iron blue pigments	(T)
K008	Oven residue from the production of chrome oxide green pigments	(T)

Organic chemicals:

K009 Distillation bottoms from the production of acetaldehyde from ethylene (T)

K010 Distillation side cuts from the production of acetaldehyde from ethylene (T)

K011 Bottom stream from the wastewater stripper in the production of acrylonitrile (R,T)

K013 Bottom stream from the acetonitrile column in the production of acrylonitrile (R,T)

K014 Bottoms from the acetonitrile purification column in the production of acrylonitrile (T)

K015 Still bottoms from the distillation of benzyl chloride (T)

K016 Heavy ends or distillation residues from the production of carbon tetrachloride (T)

K017 Heavy ends (still bottoms) from the purification column in the production of epichlorohydrin (T)

K018 Heavy ends from the fractionation column in ethyl chloride production (T)

K019 Heavy ends from the distillation of ethylene dichloride in ethylene dichloride production (T)

K020 Heavy ends from the distillation of vinyl chloride in vinyl chloride monomer production (T)

K021 Aqueous spent antimony catalyst waste from fluoromethanes production (T)

K022 Distillation bottom tars from the production of phenol/acetone from cumene (T)

K023 Distillation light ends from the production of phthalic anhydride from naphthalene (T)

K024 Distillation bottoms from the production of phthalic anhydride from naphthalene (T)

K025 Distillation bottoms from the production of nitrobenzene by the nitration of benzene (T)

K026 Stripping still tails from the production of methy ethyl pyridines (T)

K027 Centrifuge and distillation residues from toluene diisocyanate production (R,T)

K028 Spent catalyst from the hydrochlorinator reactor in the production of 1,1,1-trichloroethane (T)

K029 Waste from the product steam stripper in the production of 1,1,1-trichloroethane (T)

K030 Column bottoms or heavy ends from the combined production of trichloroethylene and perchloroethylene (T)

K083 Distillation bottoms from aniline production (T)

K085 Distillation or fractionation column bottoms from the production of chlorobenzenes (T)

K093 Distillation light ends from the production of phthalic anhydride from ortho-xylene (T)

K094 Distillation bottoms from the production of phthalic anhydride from ortho-xylene (T)

K095 Distillation bottoms from the production of 1,1,1-trichloroethane (T)

K096 Heavy ends from the heavy ends column from the production of 1,1,1-trichloroethane (T)

K103 Process residues from aniline extraction from the production of aniline (T)

K104 Combined wastewater streams generated from nitrobenzene/aniline production (T)

K105 Separated aqueous stream from the reactor product washing step in the production of chlorobenzenes (T)

K107 Column bottoms from product separation from the production of 1,1-dimethylhydrazine (UDMH) from carboxylic acid hydrazides (C,T)

K108 Condensed column overheads from product separation and condensed reactor vent gases from the production of 1,1-dimethylhydrazine (UDMH) from carboxylic acid hydrazides (I,T)

K109 Spent filter cartridges from product purification from the production of 1,1-dimethylhydrazine (UDMH) from carboxylic acid hydrazides (T)

K110 Condensed column overheads from intermediate separation from the production of 1,1-dimethylhydrazine (UDMH) from arboxylic acid hydrazides (T)

K111 Product washwaters from the production of dinitrotoluene via nitration of toluene (C,T)

K112 Reaction by-product water from the drying column in the production of toluenediamine via hydrogenation of dinitrotoluene (T)

K113 Condensed liquid light ends from the purification of toluenediamine in the production of toluenediamine via hydrogenation of dinitrotoluene (T)

K114 Vicinals from the purification of toluenediamine in the production of toluenediamine via hydrogenation of dinitrotoluene (T)

K115 Heavy ends from the purification of toluenediamine in the production of toluenediamine via hydrogenation of dinitrotoluene (T)

K116 Organic condensate from the solvent recovery column in the production of toluene diisocyanate via phosgenation of toluenediamine (T)

K117 Wastewater from the reactor vent gas scrubber in the production of ethylene dibromide via bromination of ethane (T)

K118 Spent adsorbent solids from purification of ethylene dibromide in the production of ethylene dibromide via bromination of ethane (T)

K136 Still bottoms from the purification of ethylene dibromide in the production of ethylene dibromide via bromination of ethane (T)

K149 Distillation bottoms from the production of alpha-, or methyl-, chlorinated toluenes, ring-chlorinated toluenes, benzoyl chlorides, and compounds with mixtures of these functional groups, This waste does not include still bottoms from the distillation of benzyl chloride. (T)

K150 Organic residuals, excluding spent carbon adsorbent, from the spent chlorine gas and hydrochloric acid recovery processes associated with the production of alpha-, or methyl-, chlorinated toluenes, ring-chlorinated toluenes, benzoyl chlorides, and compounds with mixtures of these functional groups (T)

K151 Wastewater treatment sludges, excluding neutralization and biological sludges, generated during the treatment of wastewaters from the production of alpha-, or methyl-, chlorinated toluenes, ring-chlorinated toluenes, benzoyl chlorides, and compounds with mixtures of these functional groups (T)

K156	Organic waste, including heavy ends, still bottoms, light ends, spent solvents, filtrates, and decantates, from the production of carbamates and carbamoyl oximes. This listing does not apply to wastes generated from the manufacture of 3-iodo-2-propynyl n-butylcarbamate.	(T)
K157	Wastewaters, including scrubber waters, condenser waters, washwaters, and separation waters, from the production of carbamates and carbamoyl oximes. This listing does not apply to wastes generated from the manufacture of 3-iodo-2-propynyl n-butylcarbamate.	(T)
K158	Bag house dusts and filter/separation solids from the production of carbamates and carbamoyl oximes. This listing does not apply to wastes generated from the manufacture of 3-iodo-2-propynyl n-butylcarbamate.	(T)
K159	Organics from the treatment of thiocarbamate wastes	(T)
K161	Purification solids; including filtration, evaporation, and centrifugation solids; bag house dust and floor sweepings from the production of dithiocarbamate acids and their salts. This listing does not include K125 or K126.	(R,T)
K174	Wastewater treatment sludges from the production of ethylene dichloride or vinyl chloride monomer, including sludges that result from commingled ethylene dichloride or vinyl chloride monomer wastewater and other wastewater, unless the sludges meet the following conditions: (i) they are disposed of in a subtitle C or non-hazardous landfill licensed or permitted by the state or federal government; (ii) they are not otherwise placed on the land prior to final disposal; and (iii) the generator maintains documentation demonstrating that the waste was either disposed of in an on-site landfill or consigned to a transporter or disposal facility that provided a written commitment to dispose of the waste in an off-site landfill. Respondents in any action brought to enforce the requirements of subtitle C shall, upon a showing by the government that the respondent managed wastewater treatment sludges from the production of vinyl chloride monomer or ethylene dichloride, demonstrate that they meet the terms of the exclusion set forth above. In doing so, they shall provide appropriate documentation, e.g., contracts between the generator and the landfill owner/operator, invoices documenting delivery of waste to landfill, etc., that the terms of the exclusion were met	(T)
K175	Wastewater treatment sludges from the production of vinyl chloride monomer using mercuric chloride catalyst in an acetylene-based process	(T)
K181	Nonwastewaters from the production of dyes and/or pigments, including nonwastewaters commingled at the point of generation with nonwastewaters from other processes, that, at the point of generation, contain mass loadings of any of the constituents identified in Subsection R315-261-32(c) that are equal to or greater than the corresponding Subsection R315-261-32(c) levels, as determined on a calendar year basis. These wastes will not be hazardous if the nonwastewaters are: (i) disposed in a Class I or V lined landfill, (ii) disposed in a hazardous waste landfill unit subject to either Section R315-264-301 or 40 CFR 265.301, which is adopted by reference, (iii) disposed in other landfill units that are Class I or V lined landfills regulated under Rules R315-301 through 320 or meet the design criteria in Sections R315-264-301, or 40 CFR 265.301, which is adopted by reference, or (iv) treated in a combustion unit that is permitted under Rules R315-260 through 270, or an onsite combustion unit that is permitted under the Clean Air Act. For the purposes of this listing, dyes and/or pigments production is defined in Subsection R315-261-32(b)(1). Section R315-261-32(d) describes the process for demonstrating that a facility's nonwastewaters are not K181. This listing does not apply to wastes that are otherwise identified as hazardous under Sections R315-261-21 through 24 and R315-261-31 through 33 at the point of generation. Also, the listing does not apply to wastes generated before any annual mass loading limit is met	(T)
Inorganic chemicals:		
K071	Brine purification muds from the mercury cell process in chlorine production, where separately prepurified brine is not used	(T)
K073	Chlorinated hydrocarbon waste from the purification step of the diaphragm cell process using graphite anodes in chlorine production	(T)
K106	Wastewater treatment sludge from the mercury cell process in chlorine production	(T)
K176	Baghouse filters from the production of antimony oxide, including filters from the production of intermediates, e.g., antimony metal or crude antimony oxide	(E)
K177	Slag from the production of antimony oxide that is speculatively accumulated or disposed, including slag from the production of intermediates, e.g., antimony metal or crude antimony oxide	(T)
K178	Residues from manufacturing and manufacturing-site storage of ferric chloride from acids formed during the production of titanium dioxide using the chloride-ilmenite process	(T)
Pesticides:		
K031	By-product salts generated in the production of MSMA and cacodylic acid	(T)
K032	Wastewater treatment sludge from the production of chlordane	(T)
K033	Wastewater and scrub water from the chlorination of cyclopentadiene in the production of chlordane	(T)
K034	Filter solids from the filtration of hexachlorocyclopentadiene in the production of chlordane	(T)
K035	Wastewater treatment sludges generated in the production of creosote	(T)
K036	Still bottoms from toluene reclamation distillation in the production of disulfoton	(T)
K037	Wastewater treatment sludges from the production of disulfoton	(T)
K038	Wastewater from the washing and stripping of phorate production	(T)
K039	Filter cake from the filtration of diethylphosphorodithioic acid in the production of phorate	(T)
K040	Wastewater treatment sludge from the production of phorate	(T)
K041	Wastewater treatment sludge from the production of toxaphene	(T)
K042	Heavy ends or distillation residues from	(T)

	the distillation of tetrachlorobenzene in the production of 2,4,5-T	
K043	2,6-Dichlorophenol waste from the production of 2,4-D	(T)
K097	Vacuum stripper discharge from the chlordane chlorinator in the production of chlordane	(T)
K098	Untreated process wastewater from the production of toxaphene	(T)
K099	Untreated wastewater from the production of 2,4-D	(T)
K123	Process wastewater (including supernates, filtrates, and washwaters) from the production of ethylenebisdithiocarbamic acid and its salt	(T)
K124	Reactor vent scrubber water from the production of ethylenebisdithiocarbamic acid and its salts	(C,T)
K125	Filtration, evaporation, and centrifugation solids from the production of ethylenebisdithiocarbamic acid and its salts	(T)
K126	Baghouse dust and floor sweepings in milling and packaging operations from the production or formulation of ethylenebisdithiocarbamic acid and its salts	(T)
K131	Wastewater from the reactor and spent sulfuric acid from the acid dryer from the production of methyl bromide	(C,T)
K132	Spent absorbent and wastewater separator solids from the production of methyl bromide	(T)
Explosives:		
K044	Wastewater treatment sludges from the manufacturing and processing of explosives	(R)
K045	Spent carbon from the treatment of wastewater containing explosives	(R)
K046	Wastewater treatment sludges from the manufacturing, formulation and loading of lead-based initiating compounds	(T)
K047	Pink/red water from TNT operations	(R)
Petroleum refining:		
K048	Dissolved air flotation (DAF) float from the petroleum refining industry	(T)
K049	Slop oil emulsion solids from the petroleum refining industry	(T)
K050	Heat exchanger bundle cleaning sludge from the petroleum refining industry	(T)
K051	API separator sludge from the petroleum refining industry	(T)
K052	Tank bottoms, leaded, from the petroleum refining industry	(T)
K169	Crude oil storage tank sediment from petroleum refining operations	(T)
K170	Clarified slurry oil tank sediment and/or in-line filter/separation solids from petroleum refining operations	(T)
K171	Spent Hydrotreating catalyst from petroleum refining operations, including guard beds used to desulfurize feeds to other catalytic reactors, this listing does not include inert support media	(I,T)
K172	Spent Hydrorefining catalyst from petroleum refining operations, including guard beds used to desulfurize feeds to other catalytic reactors, this listing does not include inert support media	(I,T)
Iron and steel:		
K061	Emission control dust/sludge from the primary production of steel in electric furnaces	(T)
K062	Spent pickle liquor generated by steel finishing operations of facilities within the iron and steel industry, SIC Codes 331 and 332	(C,T)
Primary aluminum:		
K088	Spent potliners from primary aluminum reduction	(T)
Secondary lead:		
K069	Emission control dust/sludge from secondary lead smelting. Note: This listing is stayed administratively for sludge generated from secondary acid scrubber systems. The stay will remain in effect until further administrative action is taken. If EPA takes further action effecting this stay, EPA will publish a notice of the action in the Federal Register	(T)
K100	Waste leaching solution from acid leaching of emission control dust/sludge from secondary lead smelting	(T)
Veterinary pharmaceuticals:		
K084	Wastewater treatment sludges generated during the production of veterinary pharmaceuticals from arsenic or organo-arsenic compounds	(T)
K101	Distillation tar residues from the distillation of aniline-based compounds in the production of veterinary pharmaceuticals from arsenic or organo-arsenic compounds	(T)
K102	Residue from the use of activated carbon for decolorization in the production of veterinary pharmaceuticals from arsenic or organo-arsenic compounds	(T)
Ink formulation:		
K086	Solvent washes and sludges, caustic washes and sludges, or water washes and sludges from cleaning tubs and equipment used in the formulation of ink from pigments, driers, soaps, and stabilizers containing chromium and lead	(T)
Coking:		
K060	Ammonia still lime sludge from coking operations	(T)
K087	Decanter tank tar sludge from coking operations	(T)
K141	Process residues from the recovery of coal tar, including, but not limited to, collecting sump residues from the production of coke from coal or the recovery of coke by-products produced from coal. This listing does not include K087, decanter tank tar sludges from coking operations	(T)
K142	Tar storage tank residues from the production of coke from coal or from the recovery of coke by-products produced from coal	(T)
K143	Process residues from the recovery of light oil, including, but not limited to, those generated in stills, decanters, and wash oil recovery units from the recovery	(T)

	of coke by-products produced from coal	
K144	Wastewater sump residues from light oil refining, including, but not limited to, intercepting or contamination sump sludges from the recovery of coke by-products produced from coal	(T)
K145	Residues from naphthalene collection and recovery operations from the recovery of coke by-products produced from coal	(T)
K147	Tar storage tank residues from coal tar refining	(T)
K148	Residues from coal tar distillation, including but not limited to, still bottoms	(T)

(b) Listing Specific Definitions:

(1) For the purposes of the K181 listing, dyes and/or pigments production is defined to include manufacture of the following product classes: dyes, pigments, or FDA certified colors that are classified as azo, triarylmethane, perylene or anthraquinone classes. Azo products include azo, monoazo, diazo, triazo, polyazo, azoic, benzidine, and pyrazolone products. Triarylmethane products include both triarylmethane and triphenylmethane products. Wastes that are not generated at a dyes and/or pigments manufacturing site, such as wastes from the offsite use, formulation, and packaging of dyes and/or pigments, are not included in the K181 listing.

(c) K181 Listing Levels. Nonwastewaters containing constituents in amounts equal to or exceeding the following levels during any calendar year are subject to the K181 listing, unless the conditions in the K181 listing are met.

TABLE

Constituent	Chemical abstracts No.	Mass levels (kg/yr)
Aniline	62-53-3	9,300
o-Anisidine	90-04-0	110
4-Chloroaniline	106-47-8	4,800
p-Cresidine	120-71-8	660
2,4-Dimethylaniline	95-68-1	100
1,2-Phenylenediamine	95-54-5	710
1,3-Phenylenediamine	108-45-2	1,200

(d) Procedures for demonstrating that dyes and/or pigment nonwastewaters are not K181. The procedures described in Subsections R315-261-32(d)(1) through(d)(3) and (d)(5) establish when nonwastewaters from the production of dyes/pigments would not be hazardous, these procedures apply to wastes that are not disposed in landfill units or treated in combustion units as specified in Subsection R315-261-32(a). If the nonwastewaters are disposed in landfill units or treated in combustion units as described in Subsection R315-261-32(a), then the nonwastewaters are not hazardous. In order to demonstrate that it is meeting the landfill disposal or combustion conditions contained in the K181 listing description, the generator shall maintain documentation as described in Subsection R315-261-32(d)(4).

(1) Determination based on no K181 constituents. Generators that have knowledge; e.g., knowledge of constituents in wastes based on prior sampling and analysis data and/or information about raw materials used, production processes used, and reaction and degradation products formed; that their wastes contain none of the K181 constituents, see Subsection R315-261-32(c), can use their knowledge to determine that their waste is not K181. The generator shall document the basis for all such determinations on an annual basis and keep each annual documentation for three years.

(2) Determination for generated quantities of 1,000 MT/yr or less for wastes that contain K181 constituents. If the total annual quantity of dyes and/or pigment nonwastewaters generated is 1,000 metric tons or less, the generator can use knowledge of the wastes; e.g., knowledge of constituents in wastes based on prior analytical data and/or information about raw materials used, production processes used, and reaction and degradation products formed; to conclude that annual mass loadings for the K181 constituents are below the listing levels of Subsection R315-261-32(c). To make this determination, the generator shall:

(i) Each year document the basis for determining that the annual quantity of nonwastewaters expected to be generated will be less than 1,000 metric tons.

(ii) Track the actual quantity of nonwastewaters generated from January 1 through December 31 of each year. If, at any time within the year, the actual waste quantity exceeds 1,000 metric tons, the generator shall comply with the requirements of Subsection R315-261-32(d)(3) for the remainder of the year.

(iii) Keep a running total of the K181 constituent mass loadings over the course of the calendar year.

(iv) Keep the following records on site for the three most recent calendar years in which the hazardous waste determinations are made:

(A) The quantity of dyes and/or pigment nonwastewaters generated.

(B) The relevant process information used.

(C) The calculations performed to determine annual total mass loadings for each K181 constituent in the nonwastewaters during the year.

(3) Determination for generated quantities greater than 1,000 MT/yr for wastes that contain K181 constituents. If the total annual quantity of dyes and/or pigment nonwastewaters generated is greater than 1,000 metric tons, the generator shall perform all of the steps described in Subsections R315-261-32(d)(3)(i) through (d)(3)(xi) in order to make a determination that its waste is not K181.

(i) Determine which K181 constituents, see Subsection R315-261-32(c), are reasonably expected to be present in the wastes based on knowledge of the wastes; e.g., based on prior sampling and analysis data and/or information about raw materials used, production processes used, and reaction and degradation products formed.

(ii) If 1,2-phenylenediamine is present in the wastes, the generator can use either knowledge or sampling and analysis procedures to determine the level of this constituent in the wastes. For determinations based on use of knowledge, the generator shall comply with the procedures for using knowledge described in Subsection R315-261-32(d)(2) and keep the records described in Subsection R315-261-32(d)(2)(iv). For determinations based on sampling and analysis, the generator shall comply with the sampling and analysis and recordkeeping requirements described in Subsections R315-261-32(d)(3)(iii) through (xi).

(iii) Develop a waste sampling and analysis plan, or modify an existing plan, to collect and analyze representative waste samples for the K181 constituents reasonably expected to be present in the wastes. At a minimum, the plan shall include:

(A) A discussion of the number of samples needed to characterize the wastes fully;

(B) The planned sample collection method to obtain representative waste samples;

(C) A discussion of how the sampling plan accounts for potential temporal and spatial variability of the wastes.

(D) A detailed description of the test methods to be used, including sample preparation, clean up, if necessary, and determinative methods.

(iv) Collect and analyze samples in accordance with the waste sampling and analysis plan.

(A) The sampling and analysis shall be unbiased, precise, and representative of the wastes.

(B) The analytical measurements shall be sufficiently sensitive, accurate and precise to support any claim that the

constituent mass loadings are below the listing levels of Subsection R315-261-32(c).

(v) Record the analytical results.

(vi) Record the waste quantity represented by the sampling and analysis results.

(vii) Calculate constituent-specific mass loadings, product of concentrations and waste quantity.

(viii) Keep a running total of the K181 constituent mass loadings over the course of the calendar year.

(ix) Determine whether the mass of any of the K181 constituents listed in Subsection R315-261-32(c) generated between January 1 and December 31 of any year is below the K181 listing levels.

(x) Keep the following records on site for the three most recent calendar years in which the hazardous waste determinations are made:

(A) The sampling and analysis plan.

(B) The sampling and analysis results, including QA/QC data.

(C) The quantity of dyes and/or pigment nonwastewaters generated.

(D) The calculations performed to determine annual mass loadings.

(xi) Nonhazardous waste determinations shall be conducted annually to verify that the wastes remain nonhazardous.

(A) The annual testing requirements are suspended after three consecutive successful annual demonstrations that the wastes are nonhazardous. The generator can then use knowledge of the wastes to support subsequent annual determinations.

(B) The annual testing requirements are reinstated if the manufacturing or waste treatment processes generating the wastes are significantly altered, resulting in an increase of the potential for the wastes to exceed the listing levels.

(C) If the annual testing requirements are suspended, the generator shall keep records of the process knowledge information used to support a nonhazardous determination. If testing is reinstated, a description of the process change shall be retained.

(4) Recordkeeping for the landfill disposal and combustion exemptions. For the purposes of meeting the landfill disposal and combustion condition set out in the K181 listing description, the generator shall maintain on site for three years documentation demonstrating that each shipment of waste was received by a landfill unit that is subject to or meets the landfill design standards set out in the listing description, or was treated in combustion units as specified in the listing description.

(5) Waste holding and handling. During the interim period, from the point of generation to completion of the hazardous waste determination, the generator is responsible for storing the wastes appropriately. If the wastes are determined to be hazardous and the generator has not complied with the hazardous waste requirements during the interim period, the generator could be subject to an enforcement action for improper management.

R315-261-33. Lists of Hazardous Wastes - Discarded Commercial Chemical Products, Off-Specification Species, Container Residues, and Spill Residues Thereof.

The following materials or items are hazardous wastes if and when they are discarded or intended to be discarded as described in Subsection R315-261-2(a)(2)(i), when they are mixed with waste oil or used oil or other material and applied to the land for dust suppression or road treatment, when they are otherwise applied to the land in lieu of their original intended use or when they are contained in products that are applied to the land in lieu of their original intended use, or when, in lieu of their original intended use, they are produced for use as, or a component of, a fuel, distributed for use as a fuel, or burned as a fuel.

(a) Any commercial chemical product, or manufacturing chemical intermediate having the generic name listed in Subsections R315-261-33(e) or (f).

(b) Any off-specification commercial chemical product or manufacturing chemical intermediate which, if it met specifications, would have the generic name listed in Subsection R315-261-33(e) or (f).

(c) Any residue remaining in a container or in an inner liner removed from a container that has held any commercial chemical product or manufacturing chemical intermediate having the generic name listed in Subsection R315-261-33(e) or (f), unless the container is empty as defined in Subsection R315-261-7(b). Unless the residue is being beneficially used or reused, or legitimately recycled or reclaimed; or being accumulated, stored, transported or treated prior to such use, re-use, recycling or reclamation, the Director considers the residue to be intended for discard, and thus, a hazardous waste. An example of a legitimate re-use of the residue would be where the residue remains in the container and the container is used to hold the same commercial chemical product or manufacturing chemical intermediate it previously held. An example of the discard of the residue would be where the drum is sent to a drum reconditioner who reconditions the drum but discards the residue.

(d) Any residue or contaminated soil, water or other debris resulting from the cleanup of a spill into or on any land or water of any commercial chemical product or manufacturing chemical intermediate having the generic name listed in Subsection R315-261-33(e) or (f), or any residue or contaminated soil, water or other debris resulting from the cleanup of a spill, into or on any land or water, of any off-specification chemical product and manufacturing chemical intermediate which, if it met specifications, would have the generic name listed in Subsection R315-261-33(e) or (f). The phrase "commercial chemical product or manufacturing chemical intermediate having the generic name listed in..." refers to a chemical substance which is manufactured or formulated for commercial or manufacturing use which consists of the commercially pure grade of the chemical, any technical grades of the chemical that are produced or marketed, and all formulations in which the chemical is the sole active ingredient. It does not refer to a material, such as a manufacturing process waste, that contains any of the substances listed in Subsection R315-261-33(e) or (f). Where a manufacturing process waste is deemed to be a hazardous waste because it contains a substance listed in Subsection R315-261-33(e) or (f), such waste shall be listed in either Sections R315-261-31 or 32 or shall be identified as a hazardous waste by the characteristics set forth in Sections R315-261-20 through 24.

(e) The commercial chemical products, manufacturing chemical intermediates or off-specification commercial chemical products or manufacturing chemical intermediates referred to in Subsections R315-261-33(a) through (d), are identified as acute hazardous wastes (H). For the convenience of the regulated community the primary hazardous properties of these materials have been indicated by the letters T (Toxicity), and R (Reactivity). Absence of a letter indicates that the compound only is listed for acute toxicity. Wastes are first listed in alphabetical order by substance and then listed again in numerical order by Hazardous Waste Number. These wastes and their corresponding EPA Hazardous Waste Numbers are:

TABLE

Hazardous waste No.	Chemical abstracts No.	Substance
P023	107-20-0	Acetaldehyde, chloro-
P002	591-08-2	Acetamide, N-(aminothioxomethyl)-
P057	640-19-7	Acetamide, 2-fluoro-

P058	62-74-8	Acetic acid, fluoro-, sodium salt
P002	591-08-2	1-Acetyl-2-thiourea
P003	107-02-8	Acrolein
P070	116-06-3	Aldicarb
P203	1646-88-4	Aldicarb sulfone.
P004	309-00-2	Aldrin
P005	107-18-6	Allyl alcohol
P006	20859-73-8	Aluminum phosphide (R,T)
P007	2763-96-4	5-(Aminomethyl)-3-isoxazolol
P008	504-24-5	4-Aminopyridine
P009	131-74-8	Ammonium picrate (R)
P119	7803-55-6	Ammonium vanadate
P099	506-61-6	Argentate(1-), bis(cyano-C)-, potassium
P010	7778-39-4	Arsenic acid H3 AsO4
P012	1327-53-3	Arsenic oxide As2 O3
P011	1303-28-2	Arsenic oxide As2 O5
P011	1303-28-2	Arsenic pentoxide
P012	1327-53-3	Arsenic trioxide
P038	692-42-2	Arsine, diethyl-
P036	696-28-6	Arsonous dichloride, phenyl-
P054	151-56-4	Aziridine
P067	75-55-8	Aziridine, 2-methyl-
P013	542-62-1	Barium cyanide
P024	106-47-8	Benzenamine, 4-chloro-
P077	100-01-6	Benzenamine, 4-nitro-
P028	100-44-7	Benzene, (chloromethyl)-
P042	51-43-4	1,2-Benzenediol, 4-(1-hydroxy-2-(methylamino)ethyl)-, (R)-
P046	122-09-8	Benzeneethanamine, alpha,alpha-dimethyl-
P014	108-98-5	Benzenethiol
P127	1563-66-2	7-Benzofuranol, 2,3-dihydro-2,2-dimethyl-,methylcarbamate.
P188	57-64-7	Benzoic acid, 2-hydroxy-, compd. with (3aS-cis)-1,2,3,3a,8,8a-hexahydro-1,3a,8-trimethylpyrrolo(2,3-b)indol-5-ylmethylcarbamate ester (1:1).
P001	(1)81-81-2	2H-1-Benzopyran-2-one, 4-hydroxy-3-(3-oxo-1-phenylbutyl)-, and salts, when present at concentrations greater than 0.3%
P028	100-44-7	Benzyl chloride
P015	7440-41-7	Beryllium powder
P017	598-31-2	Bromoacetone
P018	357-57-3	Brucine
P045	39196-18-4	2-Butanone, 3,3-dimethyl-1-(methylthio)-, O-methylamino)carbonyl) oxime
P021	592-01-8	Calcium cyanide
P021	592-01-8	Calcium cyanide Ca(CN)2
P189	55285-14-8	Carbamic acid, ((dibutylamino)-thio)methyl-, 2,3-dihydro-2,2-dimethyl- 7-benzofuranyl ester.
P191	644-64-4	Carbamic acid, dimethyl-, 1-((dimethyl-amino)carbonyl)-5-methyl-1H- pyrazol-3-yl ester.
P192	119-38-0	Carbamic acid, dimethyl-, 3-methyl-1- (1-methylethyl)-1H-pyrazol-5-yl ester.
P190	1129-41-5	Carbamic acid, methyl-, 3-methylphenyl ester.
P127	1563-66-2	Carbofuran.
P022	75-15-0	Carbon disulfide
P095	75-44-5	Carbonic dichloride
P189	55285-14-8	Carbosulfan.
P023	107-20-0	Chloroacetaldehyde
P024	106-47-8	p-Chloroaniline
P026	5344-82-1	1-(o-Chlorophenyl)thiourea
P027	542-76-7	3-Chloropropionitrile
P029	544-92-3	Copper cyanide
P029	544-92-3	Copper cyanide Cu(CN)
P202	64-00-6	m-Cumenyl methylcarbamate.
P030		Cyanides (soluble cyanide salts), not otherwise specified
P031	460-19-5	Cyanogen
P033	506-77-4	Cyanogen chloride
P033	506-77-4	Cyanogen chloride (CN)Cl
P034	131-89-5	2-Cyclohexyl-4,6-dinitrophenol
P016	542-88-1	Dichloromethyl ether
P036	696-28-6	Dichlorophenylarsine
P037	60-57-1	Dieldrin
P038	692-42-2	Diethylarsine
P041	311-45-5	Diethyl-p-nitrophenyl phosphate
P040	297-97-2	O,O-Diethyl O-pyrazinyl phosphorothioate
P043	55-91-4	Diisopropylfluorophosphate (DFP)
P004	309-00-2	1,4,5,8-Dimethanonaphthalene, 1,2,3,4,10,10-hexa- chloro- 1,4,4a,5,8,8a,- hexahydro-, (1alpha, 4alpha, 4abeta, 5alpha,8alpha,8abeta)-
P060	465-73-6	1,4,5,8-Dimethanonaphthalene, 1,2,3,4,10,10-hexa- chloro- 1,4,4a,5,8,8ahexahydro-, (1alpha, 4alpha, 4abeta, 5beta, 8beta,8abeta)-
P037	60-57-1	2,7:3,6-Dimethanonaphth(2,3-b)oxirene, 3,4,5,6,9,9-hexachloro- 1a,2,2a,3,6,6a,7,7a-octahydro-, (1aalpha, 2beta, 2aalpha, 3beta, 6beta, 6aalpha,7beta, 7aalpha)-
P051	(1)72-20-8	2,7:3,6-Dimethanonaphth (2,3-b)oxirene, 3,4,5,6,9,9-hexachloro- 1a,2,2a,3,6,6a,7,7a-octahydro-, (1aalpha, 2beta, 2abeta, 3alpha, 6alpha, 6abeta, 7beta, 7aalpha)-, and metabolites
P044	60-51-5	Dimethoate
P046	122-09-8	alpha,alpha-Dimethylphenethylamine
P191	644-64-4	Dimetilan.
P047	(1)534-52-1	4,6-Dinitro-o-cresol, and salts
P048	51-28-5	2,4-Dinitrophenol
P020	88-85-7	Dinoseb
P085	152-16-9	Diphosphoramide, octamethyl-
P111	107-49-3	Diphosphoric acid, tetraethyl ester
P039	298-04-4	Disulfoton
P049	541-53-7	Dithiobiuret
P185	26419-73-8	1,3-Dithiolane-2-carboxaldehyde, 2,4-dimethyl-, O- ((methylamino)-carbonyl)oxime.
P050	115-29-7	Endosulfan
P088	145-73-3	Endothall
P051	72-20-8	Endrin
P051	72-20-8	Endrin, and metabolites
P042	51-43-4	Epinephrine
P031	460-19-5	Ethanedinitrile
P194	23135-22-0	Ethanimidothioic acid, 2-(dimethylamino)-N-(((methylamino) carbonyl)oxy)-2-oxo-, methyl ester.
P066	16752-77-5	Ethanimidothioic acid, N-(((methylamino)carbonyl)oxy)-, methyl ester
P101	107-12-0	Ethyl cyanide
P054	151-56-4	Ethyleneimine
P097	52-85-7	Famphur
P056	7782-41-4	Fluorine
P057	640-19-7	Fluoroacetamide
P058	62-74-8	Fluoroacetic acid, sodium salt
P198	23422-53-9	Formetanate hydrochloride.
P197	17702-57-7	Formparanate.
P065	628-86-4	Fulminic acid, mercury(2+) salt (R,T)
P059	76-44-8	Heptachlor
P062	757-58-4	Hexaethyl tetraphosphate
P116	79-19-6	Hydrazinecarbothioamide
P068	60-34-4	Hydrazine, methyl-
P063	74-90-8	Hydrocyanic acid
P063	74-90-8	Hydrogen cyanide
P096	7803-51-2	Hydrogen phosphide
P060	465-73-6	Isodrin
P192	119-38-0	Isolan.
P202	64-00-6	3-Isopropylphenyl N-methylcarbamate.
P007	2763-96-4	3(2H)-Isoxazolone, 5-(aminomethyl)-
P196	15339-36-3	Manganese, bis(dimethylcarbamodithioato-S,S')-,
P196	15339-36-3	Manganese dimethyldithiocarbamate.
P092	62-38-4	Mercury, (acetato-O)phenyl-
P065	628-86-4	Mercury fulminate (R,T)
P082	62-75-9	Methanamine, N-methyl-N-nitroso-
P064	624-83-9	Methane, isocyanato-
P016	542-88-1	Methane, oxybis(chloro-
P112	509-14-8	Methane, tetranitro- (R)
P118	75-70-7	Methanethiol, trichloro-
P198	23422-53-9	Methanimidamide, N,N-dimethyl-N'-(3-(((methylamino)-carbonyl)oxy)phenyl)-, monohydrochloride.
P197	17702-57-7	Methanimidamide, N,N-dimethyl-N'-(2-methyl-4-(((methylamino)carbonyl)oxy)phenyl)-
P050	115-29-7	6,9-Methano-2,4,3-benzodioxathiepin, 6,7,8,9,10,10- hexachloro- 1,5,5a,6,9,9a-hexahydro-, 3-oxide
P059	76-44-8	4,7-Methano-1H-indene, 1,4,5,6,7,8,8-heptachloro- 3a,4,7,7a-tetrahydro-
P199	2032-65-7	Methiocarb.
P066	16752-77-5	Methomyl
P068	60-34-4	Methyl hydrazine

P064	624-83-9	Methyl isocyanate
P069	75-86-5	2-Methyllactonitrile
P071	298-00-0	Methyl parathion
P190	1129-41-5	Metolcarb.
P128	315-8-4	Mexacarbate.
P072	86-88-4	alpha-Naphthylthiourea
P073	13463-39-3	Nickel carbonyl
P073	13463-39-3	Nickel carbonyl Ni(CO)4, (T-4)-
P074	557-19-7	Nickel cyanide
P074	557-19-7	Nickel cyanide Ni(CN)2
P075	(1)54-11-5	Nicotine, and salts
P076	10102-43-9	Nitric oxide
P077	100-01-6	p-Nitroaniline
P078	10102-44-0	Nitrogen dioxide
P076	10102-43-9	Nitrogen oxide NO
P078	10102-44-0	Nitrogen oxide NO2
P081	55-63-0	Nitroglycerine (R)
P082	62-75-9	N-Nitrosodimethylamine
P084	4549-40-0	N-Nitrosomethylvinylamine
P085	152-16-9	Octamethylpyrophosphoramide
P087	20816-12-0	Osmium oxide OsO4, (T-4)-
P087	20816-12-0	Osmium tetroxide
P088	145-73-3	7-Oxabicyclo(2.2.1)heptane-2,3-dicarboxylic acid
P194	23135-22-0	Oxamyl.
P089	56-38-2	Parathion
P034	131-89-5	Phenol, 2-cyclohexyl-4,6-dinitro-
P048	51-28-5	Phenol, 2,4-dinitro-
P047	(1)534-52-1	Phenol, 2-methyl-4,6-dinitro-, and salts
P020	88-85-7	Phenol, 2-(1-methylpropyl)-4,6-dinitro-
P009	131-74-8	Phenol, 2,4,6-trinitro-, ammonium salt (R)
P128	315-18-4	Phenol, 4-(dimethylamino)-3,5-dimethyl-, methylcarbamate (ester).
P199	2032-65-7	Phenol, (3,5-dimethyl-4-(methylthio)-, methylcarbamate
P202	64-00-6	Phenol, 3-(1-methylethyl)-, methyl carbamate.
P201	2631-37-0	Phenol, 3-methyl-5-(1-methylethyl)-, methyl carbamate.
P092	62-38-4	Phenylmercury acetate
P093	103-85-5	Phenylthiourea
P094	298-02-2	Phorate
P095	75-44-5	Phosgene
P096	7803-51-2	Phosphine
P041	311-45-5	Phosphoric acid, diethyl 4-nitrophenyl ester
P039	298-04-4	Phosphorodithioic acid, O,O-diethyl S-(2- (ethylthio)ethyl) ester
P094	298-02-2	Phosphorodithioic acid, O,O-diethyl S-((ethylthio)methyl) ester
P044	60-51-5	Phosphorodithioic acid, O,O-dimethyl S-(2- (methylamino)-2-oxoethyl) ester
P043	55-91-4	Phosphorofluoridic acid, bis(1-methylethyl) ester
P089	56-38-2	Phosphorothioic acid, O,O-diethyl O-(4-nitrophenyl) ester
P040	297-97-2	Phosphorothioic acid, O,O-diethyl O-pyrazinyl ester
P097	52-85-7	Phosphorothioic acid, O-(4-((dimethylamino)sulfonyl)phenyl) O,O-dimethyl ester
P071	298-00-0	Phosphorothioic acid, O,O,-dimethyl O-(4-nitrophenyl) ester
P204	57-47-6	Physostigmine.
P188	57-64-7	Physostigmine salicylate.
P110	78-00-2	Plumbane, tetraethyl-
P098	151-50-8	Potassium cyanide
P098	151-50-8	Potassium cyanide K(CN)
P099	506-61-6	Potassium silver cyanide
P201	2631-37-0	Promecarb
P070	116-06-3	Propanal, 2-methyl-2-(methylthio)-, O-((methylamino)carbonyl)oxime
P203	1646-88-4	Propanal, 2-methyl-2-(methyl-sulfonyl)-, O- ((methylamino)carbonyl) oxime.
P101	107-12-0	Propanenitrile
P027	542-76-7	Propanenitrile, 3-chloro-
P069	75-86-5	Propanenitrile, 2-hydroxy-2-methyl-
P081	55-63-0	1,2,3-Propanetriol, trinitrate (R)
P017	598-31-2	2-Propanone, 1-bromo-
P102	107-19-7	Propargyl alcohol
P003	107-02-8	2-Propenal
P005	107-18-6	2-Propen-1-ol
P067	75-55-8	1,2-Propylenimine
P102	107-19-7	2-Propyn-1-ol
P008	504-24-5	4-Pyridinamine
P075	(1)54-11-5	Pyridine, 3-(1-methyl-2-pyrrolidinyl)-, (S)-, and salts
P204	57-47-6	Pyrrolo(2,3-b)indol-5-ol, 1,2,3,3a,8,8a-hexahydro-1,3a,8-trimethyl-, methylcarbamate (ester), (3aS-cis)-.
P114	12039-52-0	Selenious acid, dithallium(1+) salt
P103	630-10-4	Selenourea
P104	506-64-9	Silver cyanide
P104	506-64-9	Silver cyanide Ag(CN)
P105	26628-22-8	Sodium azide
P106	143-33-9	Sodium cyanide
P106	143-33-9	Sodium cyanide Na(CN)
P108	(1)57-24-9	Strychnidin-10-one, and salts
P018	357-57-3	Strychnidin-10-one, 2,3-dimethoxy-
P108	(1)57-24-9	Strychnine, and salts
P115	7446-18-6	Sulfuric acid, dithallium(1+) salt
P109	3689-24-5	Tetraethyldithiopyrophosphate
P110	78-00-2	Tetraethyl lead
P111	107-49-3	Tetraethyl pyrophosphate
P112	509-14-8	Tetranitromethane (R)
P062	757-58-4	Tetraphosphoric acid, hexaethyl ester
P113	1314-32-5	Thallic oxide
P113	1314-32-5	Thallium oxide Tl2 O3
P114	12039-52-0	Thallium(I) selenite
P115	7446-18-6	Thallium(I) sulfate
P109	3689-24-5	Thiodiphosphoric acid, tetraethyl ester
P045	39196-18-4	Thiofanox
P049	541-53-7	Thioimidodicarbonic diamide ((H2 N)C(S))2 NH
P014	108-98-5	Thiophenol
P116	79-19-6	Thiosemicarbazide
P026	5344-82-1	Thiourea, (2-chlorophenyl)-
P072	86-88-4	Thiourea, 1-naphthalenyl-
P093	103-85-5	Thiourea, phenyl-
P185	26419-73-8	Tirpate.
P123	8001-35-2	Toxaphene
P118	75-70-7	Trichloromethanethiol
P119	7803-55-6	Vanadic acid, ammonium salt
P120	1314-62-1	Vanadium oxide V2 O5
P120	1314-62-1	Vanadium pentoxide
P084	4549-40-0	Vinylamine, N-methyl-N-nitroso-
P001	(1)81-81-2	Warfarin, and salts, when present at concentrations greater than 0.3%
P205	137-30-4	Zinc, bis(dimethylcarbamodithioato-S,S')-,
P121	557-21-1	Zinc cyanide
P121	557-21-1	Zinc cyanide Zn(CN)2
P122	1314-84-7	Zinc phosphide Zn3 P2, when present at concentrations greater than 10% (R,T)
P205	137-30-4	Ziram.
P001	(1)81-81-2	2H-1-Benzopyran-2-one, 4-hydroxy-3-(3-oxo-1-phenylbutyl)-, and salts, when present at concentrations greater than 0.3%
P001	(1)81-81-2	Warfarin, and salts, when present at concentrations greater than 0.3%
P002	591-08-2	Acetamide, -(aminothioxomethyl)-
P002	591-08-2	1-Acetyl-2-thiourea
P003	107-02-8	Acrolein
P003	107-02-8	2-Propenal
P004	309-00-2	Aldrin
P004	309-00-2	1,4,5,8-Dimethanonaphthalene, 1,2,3,4,10,10-hexa-chloro-1,4,4a,5,8,8a,- hexahydro-, (1alpha, 4alpha, 4abeta, 5alpha, 8alpha,8abeta)-
P005	107-18-6	Allyl alcohol
P005	107-18-6	2-Propen-1-ol
P006	20859-73-8	Aluminum phosphide (R,T)
P007	2763-96-4	5-(Aminomethyl)-3-isoxazolol
P007	2763-96-4	3(2H)-Isoxazolone, 5-(aminomethyl)-
P008	504-24-5	4-Aminopyridine
P008	504-24-5	4-Pyridinamine
P009	131-74-8	Ammonium picrate (R)
P009	131-74-8	Phenol, 2,4,6-trinitro-, ammonium salt (R)
P010	7778-39-4	Arsenic acid H3 AsO4
P011	1303-28-2	Arsenic oxide As2 O5
P011	1303-28-2	Arsenic pentoxide
P012	1327-53-3	Arsenic oxide As2 O3
P012	1327-53-3	Arsenic trioxide
P013	542-62-1	Barium cyanide
P014	108-98-5	Benzenethiol
P014	108-98-5	Thiophenol
P015	7440-41-7	Beryllium powder
P016	542-88-1	Dichloromethyl ether

P016	542-88-1	Methane, oxybis(chloro-
P017	598-31-2	Bromoacetone
P017	598-31-2	2-Propanone, 1-bromo-
P018	357-57-3	Brucine
P018	357-57-3	Strychnidin-10-one, 2,3-dimethoxy-
P020	88-85-7	Dinoseb
P020	88-85-7	Phenol, 2-(1-methylpropyl)-4,6-dinitro-
P021	592-01-8	Calcium cyanide
P021	592-01-8	Calcium cyanide Ca(CN)2
P022	75-15-0	Carbon disulfide
P023	107-20-0	Acetaldehyde, chloro-
P023	107-20-0	Chloroacetaldehyde
P024	106-47-8	Benzenamine, 4-chloro-
P024	106-47-8	p-Chloroaniline
P026	5344-82-1	1-(o-Chlorophenyl)thiourea
P026	5344-82-1	Thiourea, (2-chlorophenyl)-
P027	542-76-7	3-Chloropropionitrile
P027	542-76-7	Propanenitrile, 3-chloro-
P028	100-44-7	Benzene, (chloromethyl)-
P028	100-44-7	Benzyl chloride
P029	544-92-3	Copper cyanide
P029	544-92-3	Copper cyanide Cu(CN)
P030		Cyanides (soluble cyanide salts), not otherwise specified
P031	460-19-5	Cyanogen
P031	460-19-5	Ethanedinitrile
P033	506-77-4	Cyanogen chloride
P033	506-77-4	Cyanogen chloride (CN)Cl
P034	131-89-5	2-Cyclohexyl-4,6-dinitrophenol
P034	131-89-5	Phenol, 2-cyclohexyl-4,6-dinitro-
P036	696-28-6	Arsonous dichloride, phenyl-
P036	696-28-6	Dichlorophenylarsine
P037	60-57-1	Dieldrin
P037	60-57-1	2,7:3,6-Dimethanonaphth(2,3-b)oxirene, 3,4,5,6,9,9-hexachloro-1a,2,2a,3,6,6a,7,7a-octahydro-, (1aalpha, 2beta, 2aalpha, 3beta, 6beta,6aalpha,7beta, 7aalpha)-
P038	692-42-2	Arsine, diethyl-
P038	692-42-2	Diethylarsine
P039	298-04-4	Disulfoton
P039	298-04-4	Phosphorodithioic acid, O,O-diethyl S-(2- (ethylthio)ethyl) ester
P040	297-97-2	O,O-Diethyl O-pyrazinyl phosphorothioate
P040	297-97-2	Phosphorothioic acid, O,O-diethyl O-pyrazinyl ester
P041	311-45-5	Diethyl-p-nitrophenyl phosphate
P041	311-45-5	Phosphoric acid, diethyl 4-nitrophenyl ester
P042	51-43-4	1,2-Benzenediol, 4-(1-hydroxy-2-(methylamino)ethyl)-, (R)-
P042	51-43-4	Epinephrine
P043	55-91-4	Diisopropylfluorophosphate (DFP)
P043	55-91-4	Phosphorofluoridic acid, bis(1-methylethyl) ester
P044	60-51-5	Dimethoate
P044	60-51-5	Phosphorodithioic acid, O,O-dimethyl S-(2-(methyl amino)-2-oxoethyl) ester
P045	39196-18-4	2-Butanone, 3,3-dimethyl-1-(methylthio)-, O-((methylamino)carbonyl) oxime
P045	39196-18-4	Thiofanox
P046	122-09-8	Benzeneethanamine, alpha,alpha-dimethyl-
P046	122-09-8	alpha,alpha-Dimethylphenethylamine
P047	(1)534-52-1	4,6-Dinitro-o-cresol, and salts
P047	(1)534-52-1	Phenol, 2-methyl-4,6-dinitro-, and salts
P048	51-28-5	2,4-Dinitrophenol
P048	51-28-5	Phenol, 2,4-dinitro-
P049	541-53-7	Dithiobiuret
P049	541-53-7	Thioimidodicarbonic diamide ((H2 N)C(S))2 NH
P050	115-29-7	Endosulfan
P050	115-29-7	6,9-Methano-2,4,3-benzodioxathiepin, 6,7,8,9,10,10-hexachloro-1,5,5a,6,9,9a-hexahydro-, 3-oxide
P051	(1)72-20-8	2,7:3,6-Dimethanonaphth (2,3-b)oxirene, 3,4,5,6,9,9-hexachloro-1a,2,2a,3,6,6a,7,7a-octahydro-, (1aalpha, 2beta,2abeta, 3alpha, 6alpha, 6abeta,7beta, 7aalpha)-, and metabolites
P051	72-20-8	Endrin
P051	72-20-8	Endrin, and metabolites
P054	151-56-4	Aziridine
P054	151-56-4	Ethyleneimine
P056	7782-41-4	Fluorine
P057	640-19-7	Acetamide, 2-fluoro-
P057	640-19-7	Fluoroacetamide
P058	62-74-8	Acetic acid, fluoro-, sodium salt
P058	62-74-8	Fluoroacetic acid, sodium salt
P059	76-44-8	Heptachlor
P059	76-44-8	4,7-Methano-1H-indene, 1,4,5,6,7,8,8-heptachloro-3a,4,7,7a-tetrahydro-
P060	465-73-6	1,4,5,8-Dimethanonaphthalene, 1,2,3,4,10,10-hexa-chloro-1,4,4a,5,8,8a-hexahydro-, (1alpha, 4alpha,4abeta,5beta, 8beta,8abeta)-
P060	465-73-6	Isodrin
P062	757-58-4	Hexaethyl tetraphosphate
P062	757-58-4	Tetraphosphoric acid, hexaethyl ester
P063	74-90-8	Hydrocyanic acid
P063	74-90-8	Hydrogen cyanide
P064	624-83-9	Methane, isocyanato-
P064	624-83-9	Methyl isocyanate
P065	628-86-4	Fulminic acid, mercury(2+) salt (R,T)
P065	628-86-4	Mercury fulminate (R,T)
P066	16752-77-5	Ethanimidothioic acid, N-(((methylamino)carbonyl)oxy)-, methyl ester
P066	16752-77-5	Methomyl
P067	75-55-8	Aziridine, 2-methyl-
P067	75-55-8	1,2-Propylenimine
P068	60-34-4	Hydrazine, methyl-
P068	60-34-4	Methyl hydrazine
P069	75-86-5	2-Methyllactonitrile
P069	75-86-5	Propanenitrile, 2-hydroxy-2-methyl-
P070	116-06-3	Aldicarb
P070	116-06-3	Propanal, 2-methyl-2-(methylthio)-, O-((methylamino)carbonyl)oxime
P071	298-00-0	Methyl parathion
P071	298-00-0	Phosphorothioic acid, O,O,-dimethyl O-(4-nitrophenyl) ester
P072	86-88-4	alpha-Naphthylthiourea
P072	86-88-4	Thiourea, 1-naphthalenyl-
P073	13463-39-3	Nickel carbonyl
P073	13463-39-3	Nickel carbonyl Ni(CO)4, (T-4)-
P074	557-19-7	Nickel cyanide
P074	557-19-7	Nickel cyanide Ni(CN)2
P075	(1)54-11-5	Nicotine, and salts
P075	(1)54-11-5	Pyridine, 3-(1-methyl-2-pyrrolidinyl)-, S)-, and salts
P076	10102-43-9	Nitric oxide
P076	10102-43-9	Nitrogen oxide NO
P077	100-01-6	Benzenamine, 4-nitro-
P077	100-01-6	p-Nitroaniline
P078	10102-44-0	Nitrogen dioxide
P078	10102-44-0	Nitrogen oxide NO2
P081	55-63-0	Nitroglycerine (R)
P081	55-63-0	1,2,3-Propanetriol, trinitrate (R)
P082	62-75-9	Methanamine, -methyl-N-nitroso-
P082	62-75-9	N-Nitrosodimethylamine
P084	4549-40-0	N-Nitrosomethylvinylamine
P084	4549-40-0	Vinylamine, -methyl-N-nitroso-
P085	152-16-9	Diphosphoramide, octamethyl-
P085	152-16-9	Octamethylpyrophosphoramide
P087	20816-12-0	Osmium oxide OsO4, (T-4)-
P087	20816-12-0	Osmium tetroxide
P088	145-73-3	Endothall
P088	145-73-3	7-Oxabicyclo(2.2.1)heptane-2,3-dicarboxylic acid
P089	56-38-2	Parathion
P089	56-38-2	Phosphorothioic acid, O,O-diethyl O-(4-nitrophenyl) ester
P092	62-38-4	Mercury, (acetato-O)phenyl-
P092	62-38-4	Phenylmercury acetate
P093	103-85-5	Phenylthiourea
P093	103-85-5	Thiourea, phenyl-
P094	298-02-2	Phorate
P094	298-02-2	Phosphorodithioic acid, O,O-diethyl S-((ethylthio)methyl) ester
P095	75-44-5	Carbonic dichloride
P095	75-44-5	Phosgene
P096	7803-51-2	Hydrogen phosphide
P096	7803-51-2	Phosphine
P097	52-85-7	Famphur
P097	52-85-7	Phosphorothioic acid, O-(4-((dimethylamino)sulfonyl)phenyl) O,O-dimethyl ester
P098	151-50-8	Potassium cyanide
P098	151-50-8	Potassium cyanide K(CN)
P099	506-61-6	Argentate(1-), bis(cyano-C)-, potassium
P099	506-61-6	Potassium silver cyanide
P101	107-12-0	Ethyl cyanide

P101	107-12-0	Propanenitrile
P102	107-19-7	Propargyl alcohol
P102	107-19-7	2-Propyn-1-ol
P103	630-10-4	Selenourea
P104	506-64-9	Silver cyanide
P104	506-64-9	Silver cyanide Ag(CN)
P105	26628-22-8	Sodium azide
P106	143-33-9	Sodium cyanide
P106	143-33-9	Sodium cyanide Na(CN)
P108	(1)157-24-9	Strychnidin-10-one, and salts
P108	(1)157-24-9	Strychnine, and salts
P109	3689-24-5	Tetraethyldithiopyrophosphate
P109	3689-24-5	Thiodiphosphoric acid, tetraethyl ester
P110	78-00-2	Plumbane, tetraethyl-
P110	78-00-2	Tetraethyl lead
P111	107-49-3	Diphosphoric acid, tetraethyl ester
P111	107-49-3	Tetraethyl pyrophosphate
P112	509-14-8	Methane, tetranitro-(R)
P112	509-14-8	Tetranitromethane (R)
P113	1314-32-5	Thallic oxide
P113	1314-32-5	Thallium oxide Tl2 O3
P114	12039-52-0	Selenious acid, dithallium(1+) salt
P114	12039-52-0	Tetraethyldithiopyrophosphate
P115	7446-18-6	Thiodiphosphoric acid, tetraethyl ester
P115	7446-18-6	Plumbane, tetraethyl-
P116	79-19-6	Tetraethyl lead
P116	79-19-6	Thiosemicarbazide
P118	75-70-7	Methanethiol, trichloro-
P118	75-70-7	Trichloromethanethiol
P119	7803-55-6	Ammonium vanadate
P119	7803-55-6	Vanadic acid, ammonium salt
P120	1314-62-1	Vanadium oxide V2O5
P120	1314-62-1	Vanadium pentoxide
P121	557-21-1	Zinc cyanide
P121	557-21-1	Zinc cyanide Zn(CN)2
P122	1314-84-7	Zinc phosphide Zn3 P2, when present at concentrations greater than 10% (R,T)
P123	8001-35-2	Toxaphene
P127	1563-66-2	7-Benzofuranol, 2,3-dihydro-2,2-dimethyl-, methylcarbamate.
P127	1563-66-2	Carbofuran
P128	315-8-4	Mexacarbate
P128	315-18-4	Phenol, 4-(dimethylamino)-3,5-dimethyl-, methylcarbamate (ester)
P185	26419-73-8	1,3-Dithiolane-2-carboxaldehyde, 2,4-dimethyl-, O-((methylamino)-carbonyl)oxime.
P185	26419-73-8	Tirpate
P188	57-64-7	Benzoic acid, 2-hydroxy-, compd. with (3aS-cis)-1,2,3,3a,8,8a-hexahydro-1,3a,8-trimethylpyrrolo(2,3-b)indol-5-yl methylcarbamate ester (1:1)
P188	57-64-7	Physostigmine salicylate
P189	55285-14-8	Carbamic acid, ((dibutylamino)-thio)methyl-, 2,3-dihydro-2,2-dimethyl-7-benzofuranyl ester
P189	55285-14-8	Carbosulfan
P190	1129-41-5	Carbamic acid, methyl-, 3-methylphenyl ester
P190	1129-41-5	Metolcarb
P191	644-64-4	Carbamic acid, dimethyl-, 1-((dimethyl-amino)carbonyl)-5-methyl-1H-pyrazol-3-yl ester
P191	644-64-4	Dimetilan
P192	119-38-0	Carbamic acid, dimethyl-, 3-methyl-1-(1-methylethyl)-1H-pyrazol-5-yl ester
P192	119-38-0	Isolan
P194	23135-22-0	Ethanimidthioic acid, 2-(dimethylamino)-N- (((methylamino) carbonyl)oxy)-2-oxo-, methyl ester
P194	23135-22-0	Oxamyl
P196	15339-36-3	Manganese, bis(dimethylcarbamodithioato-S,S')-,
P196	15339-36-3	Manganese dimethyldithiocarbamate
P197	17702-57-7	Formparanate
P197	17702-57-7	Methanimidamide, N,N-dimethyl-N'-(2-methyl-4-(((methylamino)carbonyl)oxy)phenyl)-
P198	23422-53-9	Formetanate hydrochloride
P198	23422-53-9	Methanimidamide, N,N-dimethyl-N'-(3-(((methylamino)-carbonyl)oxy)phenyl)-monohydrochloride
P199	2032-65-7	Methiocarb
P199	2032-65-7	Phenol, (3,5-dimethyl-4-(methylthio)-, methylcarbamate
P201	2631-37-0	Phenol, 3-methyl-5-(1-methylethyl)-, methyl carbamate
P201	2631-37-0	Promecarb
P202	64-00-6	m-Cumenyl methylcarbamate
P202	64-00-6	3-Isopropylphenyl N-methylcarbamate
P202	64-00-6	Phenol, 3-(1-methylethyl)-, methyl carbamate
P203	1646-88-4	Aldicarb sulfone
P203	1646-88-4	Propanal, 2-methyl-2-(methyl-sulfonyl)-, O- ((methylamino)carbonyl) oxime
P204	57-47-6	Physostigmine
P204	57-47-6	Pyrrolo(2,3-b)indol-5-ol, 1,2,3,3a,8,8a-hexahydro-1,3a,8-trimethyl-, methylcarbamate (ester), (3aS-cis)-
P205	137-30-4	Zinc, bis(dimethylcarbamodithioato-S,S')-,
P205	137-30-4	Ziram
P999		Nerve, Military, and Chemical Agents (i.e., CX, GA, GB, GD, H, HD, HL, HN-1, HN-2, HN-3, HT, L, T, and VX.)

Note (1) CAS Number given for parent compound only.

(f) The commercial chemical products, manufacturing chemical intermediates, or off-specification commercial chemical products referred to in Subsections R315-261-33(a) through (d), are identified as toxic wastes (T), unless otherwise designated. For the convenience of the regulated community, the primary hazardous properties of these materials have been indicated by the letters T (Toxicity), R (Reactivity), I (Ignitability) and C (Corrosivity). Absence of a letter indicates that the compound is only listed for toxicity. Wastes are first listed in alphabetical order by substance and then listed again in numerical order by Hazardous Waste Number. These wastes and their corresponding EPA Hazardous Waste Numbers are:

TABLE

Hazardous waste No.	Chemical abstracts No.	Substance
U394	30558-43-1	A2213.
U001	75-07-0	Acetaldehyde (I)
U034	75-87-6	Acetaldehyde, trichloro-
U187	62-44-2	Acetamide, N-(4-ethoxyphenyl)-
U005	53-96-3	Acetamide, N-9H-fluoren-2-yl-
U240	(1)94-75-7	Acetic acid, (2,4-dichlorophenoxy)-, salts and esters
U112	141-78-6	Acetic acid ethyl ester (I)
U144	301-04-2	Acetic acid, lead(2+) salt
U214	563-68-8	Acetic acid, thallium(1+) salt
see F027	93-76-5	Acetic acid, (2,4,5-trichlorophenoxy)-
U002	67-64-1	Acetone (I)
U003	75-05-8	Acetonitrile (I,T)
U004	98-86-2	Acetophenone
U005	53-96-3	2-Acetylaminofluorene
U006	75-36-5	Acetyl chloride (C,R,T)
U007	79-06-1	Acrylamide
U008	79-10-7	Acrylic acid (I)
U009	107-13-1	Acrylonitrile
U011	61-82-5	Amitrole
U012	62-53-3	Aniline (I,T)
U136	75-60-5	Arsinic acid, dimethyl-
U014	492-80-8	Auramine
U015	115-02-6	Azaserine
U010	50-07-7	Azirino(2',3':3,4)pyrrolo(1,2-a)indole-4,7-dione, 6-amino-8-(((aminocarbonyl)oxy) methyl)-1,1a,2,8,8a,8b-hexahydro-8a-methoxy-5-methyl-, (1aS-(1aalpha, 8beta, 8aalpha,8balpha))-
U280	101-27-9	Barban.
U278	22781-23-3	Bendiocarb.
U364	22961-82-6	Bendiocarb phenol.
U271	17804-35-2	Benomyl.
U157	56-49-5	Benz(j)aceanthrylene, 1,2-dihydro-3-methyl-
U016	225-51-4	Benz(c)acridine
U017	98-87-3	Benzal chloride
U192	23950-58-5	Benzamide, 3,5-dichloro-N-(1,1-dimethyl-2-propynyl)-
U018	56-55-3	Benz(a)anthracene
U094	57-97-6	Benz(a)anthracene, 7,12-dimethyl-

U012	62-53-3	Benzenamine (I,T)
U014	492-80-8	Benzenamine, 4,4'-carbonimidoylbis(N,N-dimethyl-
U049	3165-93-3	Benzenamine, 4-chloro-2-methyl-, hydrochloride
U093	60-11-7	Benzenamine, N,N-dimethyl-4-(phenylazo)-
U328	95-53-4	Benzenamine, 2-methyl-
U353	106-49-0	Benzenamine, 4-methyl-
U158	101-14-4	Benzenamine, 4,4'-methylenebis(2-chloro-
U222	636-21-5	Benzenamine, 2-methyl-, hydrochloride
U181	99-55-8	Benzenamine, 2-methyl-5-nitro-
U019	71-43-2	Benzene (I,T)
U038	510-15-6	Benzeneacetic acid, 4-chloro-alpha-(4-chlorophenyl)-alpha-hydroxy-, ethyl ester
U030	101-55-3	Benzene, 1-bromo-4-phenoxy-
U035	305-03-3	Benzenebutanoic acid, 4-(bis(2-chloroethyl)amino)-
U037	108-90-7	Benzene, chloro-
U221	25376-45-8	Benzenediamine, ar-methyl-
U028	117-81-7	1,2-Benzenedicarboxylic acid, bis(2-ethylhexyl) ester
U069	84-74-2	1,2-Benzenedicarboxylic acid, dibutyl ester
U088	84-66-2	1,2-Benzenedicarboxylic acid, diethyl ester
U102	131-11-3	1,2-Benzenedicarboxylic acid, dimethyl ester
U107	117-84-0	1,2-Benzenedicarboxylic acid, dioctyl ester
U070	95-50-1	Benzene, 1,2-dichloro-
U071	541-73-1	Benzene, 1,3-dichloro-
U072	106-46-7	Benzene, 1,4-dichloro-
U060	72-54-8	Benzene, 1,1'-(2,2-dichloroethylidene) bis(4-chloro-
U017	98-87-3	Benzene, (dichloromethyl)-
U223	26471-62-5	Benzene, 1,3-diisocyanatomethyl- (R,T)
U239	1330-20-7	Benzene, dimethyl- (I)
U201	108-46-3	1,3-Benzenediol
U127	118-74-1	Benzene, hexachloro-
U056	110-82-7	Benzene, hexahydro- (I)
U220	108-88-3	Benzene, methyl-
U105	121-14-2	Benzene, 1-methyl-2,4-dinitro-
U106	606-20-2	Benzene, 2-methyl-1,3-dinitro-
U055	98-82-8	Benzene, (1-methylethyl)- (I)
U169	98-95-3	Benzene, nitro-
U183	608-93-5	Benzene, pentachloro-
U185	82-68-8	Benzene, pentachloronitro-
U020	98-09-9	Benzenesulfonic acid chloride (C,R)
U020	98-09-9	Benzenesulfonyl chloride (C,R)
U207	95-94-3	Benzene, 1,2,4,5-tetrachloro-
U061	50-29-3	Benzene, 1,1'-(2,2,2-trichloroethylidene) bis(4-chloro-
U247	72-43-5	Benzene, 1,1'-(2,2,2-trichloroethylidene) bis(4- methoxy-
U023	98-07-7	Benzene, (trichloromethyl)-
U234	99-35-4	Benzene, 1,3,5-trinitro-
U021	92-87-5	Benzidine
U278	22781-23-3	1,3-Benzodioxol-4-ol, 2,2-dimethyl-, methyl carbamate.
U364	22961-82-6	1,3-Benzodioxol-4-ol, 2,2-dimethyl-,
U203	94-59-7	1,3-Benzodioxole, 5-(2-propenyl)-
U141	120-58-1	1,3-Benzodioxole, 5-(1-propenyl)-
U367	1563-38-8	7-Benzofuranol, 2,3-dihydro-2,2-dimethyl-
U090	94-58-6	1,3-Benzodioxole, 5-propyl-
U064	189-55-9	Benzo(rst)pentaphene
U248	(1)81-81-2	2H-1-Benzopyran-2-one, 4-hydroxy-3-(3-oxo-1-phenyl-butyl)-, and salts, when present at concentrations of 0.3% or less
U022	50-32-8	Benzo(a)pyrene
U197	106-51-4	p-Benzoquinone
U023	98-07-7	Benzotrichloride (C,R,T)
U085	1464-53-5	2,2'-Bioxirane
U021	92-87-5	(1,1'-Biphenyl)-4,4'-diamine
U073	91-94-1	(1,1'-Biphenyl)-4,4'-diamine, 3,3'-dichloro-
U091	119-90-4	(1,1'-Biphenyl)-4,4'-diamine, 3,3'-dimethoxy-
U095	119-93-7	(1,1'-Biphenyl)-4,4'-diamine, 3,3'-dimethyl-
U225	75-25-2	Bromoform
U030	101-55-3	4-Bromophenyl phenyl ether
U128	87-68-3	1,3-Butadiene, 1,1,2,3,4,4-hexachloro-
U172	924-16-3	1-Butanamine, N-butyl-N-nitroso-
U031	71-36-3	1-Butanol (I)
U159	78-93-3	2-Butanone (I,T)
U160	1338-23-4	2-Butanone, peroxide (R,T)
U053	4170-30-3	2-Butenal
U074	764-41-0	2-Butene, 1,4-dichloro- (I,T)
U143	303-34-4	2-Butenoic acid, 2-methyl-, 7-((2,3-dihydroxy- 2-(1-methoxyethyl)-3-methyl-1-oxobutoxy)methyl)- 2,3,5,7a-tetrahydro-1H-pyrrolizin-1-yl ester, (1S- (1alpha(Z),7(2S*,3R*),7aalpha))-
U031	71-36-3	n-Butyl alcohol (I)
U136	75-60-5	Cacodylic acid
U032	13765-19-0	Calcium chromate
U372	10605-21-7	Carbamic acid, 1H-benzimidazol-2-yl, methyl ester.
U271	17804-35-2	Carbamic acid, (1-((butylamino)carbonyl)-1H-benzimidazol-2-yl)-, methyl ester.
U280	101-27-9	Carbamic acid, (3-chlorophenyl)-, 4-chloro-2-butynyl ester.
U238	51-79-6	Carbamic acid, ethyl ester
U178	615-53-2	Carbamic acid, methylnitroso-, ethyl ester
U373	122-42-9	Carbamic acid, phenyl-, 1-methylethyl ester.
U409	23564-05-8	Carbamic acid, (1,2-phenylenebis (iminocarbonothioyl))bis-, dimethyl ester.
U097	79-44-7	Carbamic chloride, dimethyl-
U389	2303-17-5	Carbamothioic acid, bis(1-methylethyl)-, S-(2,3,3-trichloro-2-propenyl) ester.
U387	52888-80-9	Carbamothioic acid, dipropyl-, S-(phenylmethyl) ester.
U114	(1)111-54-6	Carbamodithioic acid, 1,2-ethanediylbis-, salts and esters
U062	2303-16-4	Carbamothioic acid, bis(1-methylethyl)-, S- (2,3-dichloro-2-propenyl) ester
U279	63-25-2	Carbaryl.
U372	10605-21-7	Carbendazim.
U367	1563-38-8	Carbofuran phenol.
U215	6533-73-9	Carbonic acid, dithallium(1+) salt
U033	353-50-4	Carbonic difluoride
U156	79-22-1	Carbonochloridic acid, methyl ester (I,T)
U033	353-50-4	Carbon oxyfluoride (R,T)
U211	56-23-5	Carbon tetrachloride
U034	75-87-6	Chloral
U035	305-03-3	Chlorambucil
U036	57-74-9	Chlordane, alpha and gamma isomers
U026	494-03-1	Chlornaphazin
U037	108-90-7	Chlorobenzene
U038	510-15-6	Chlorobenzilate
U039	59-50-7	p-Chloro-m-cresol
U042	110-75-8	2-Chloroethyl vinyl ether
U044	67-66-3	Chloroform
U046	107-30-2	Chloromethyl methyl ether
U047	91-58-7	beta-Chloronaphthalene
U048	95-57-8	o-Chlorophenol
U049	3165-93-3	4-Chloro-o-toluidine, hydrochloride
U032	13765-19-0	Chromic acid H2 CrO4, calcium salt
U050	218-01-9	Chrysene
U051		Creosote
U052	1319-77-3	Cresol (Cresylic acid)
U053	4170-30-3	Crotonaldehyde
U055	98-82-8	Cumene (I)
U246	506-68-3	Cyanogen bromide (CN)Br
U197	106-51-4	2,5-Cyclohexadiene-1,4-dione
U056	110-82-7	Cyclohexane (I)
U129	58-89-9	Cyclohexane, 1,2,3,4,5,6-hexachloro-, (1alpha,2alpha,3beta,4alpha, 5alpha, 6beta)-
U057	108-94-1	Cyclohexanone (I)
U130	77-47-4	1,3-Cyclopentadiene, 1,2,3,4,5,5-hexachloro-
U058	50-18-0	Cyclophosphamide
U240	(1)94-75-7	2,4-D, salts and esters
U059	20830-81-3	Daunomycin
U060	72-54-8	DDD
U061	50-29-3	DDT
U062	2303-16-4	Diallate
U063	53-70-3	Dibenz(a,h)anthracene
U064	189-55-9	Dibenzo(a,i)pyrene
U066	96-12-8	1,2-Dibromo-3-chloropropane
U069	84-74-2	Dibutyl phthalate
U070	95-50-1	o-Dichlorobenzene
U071	541-73-1	m-Dichlorobenzene

U072	106-46-7	p-Dichlorobenzene
U073	91-94-1	3,3'-Dichlorobenzidine
U074	764-41-0	1,4-Dichloro-2-butene (I,T)
U075	75-71-8	Dichlorodifluoromethane
U078	75-35-4	1,1-Dichloroethylene
U079	156-60-5	1,2-Dichloroethylene
U025	111-44-4	Dichloroethyl ether
U027	108-60-1	Dichloroisopropyl ether
U024	111-91-1	Dichloromethoxy ethane
U081	120-83-2	2,4-Dichlorophenol
U082	87-65-0	2,6-Dichlorophenol
U084	542-75-6	1,3-Dichloropropene
U085	1464-53-5	1,2:3,4-Diepoxybutane (I,T)
U108	123-91-1	1,4-Diethyleneoxide
U028	117-81-7	Diethylhexyl phthalate
U395	5952-26-1	Diethylene glycol, dicarbamate.
U086	1615-80-1	N,N'-Diethylhydrazine
U087	3288-58-2	O,O-Diethyl S-methyl dithiophosphate
U088	84-66-2	Diethyl phthalate
U089	56-53-1	Diethylstilbesterol
U090	94-58-6	Dihydrosafrole
U091	119-90-4	3,3'-Dimethoxybenzidine
U092	124-40-3	Dimethylamine (I)
U093	60-11-7	p-Dimethylaminoazobenzene
U094	57-97-6	7,12-Dimethylbenz(a)anthracene
U095	119-93-7	3,3'-Dimethylbenzidine
U096	80-15-9	alpha,alpha-Dimethylbenzylhydroperoxide (R)
U097	79-44-7	Dimethylcarbamoyl chloride
U098	57-14-7	1,1-Dimethylhydrazine
U099	540-73-8	1,2-Dimethylhydrazine
U101	105-67-9	2,4-Dimethylphenol
U102	131-11-3	Dimethyl phthalate
U103	77-78-1	Dimethyl sulfate
U105	121-14-2	2,4-Dinitrotoluene
U106	606-20-2	2,6-Dinitrotoluene
U107	117-84-0	Di-n-octyl phthalate
U108	123-91-1	1,4-Dioxane
U109	122-66-7	1,2-Diphenylhydrazine
U110	142-84-7	Dipropylamine (I)
U111	621-64-7	Di-n-propylnitrosamine
U041	106-89-8	Epichlorohydrin
U001	75-07-0	Ethanal (I)
U404	121-44-8	Ethanamine, N,N-diethyl-
U174	55-18-5	Ethanamine, N-ethyl-N-nitroso-
U155	91-80-5	1,2-Ethanediamine, N,N-dimethyl-N'-2-pyridinyl-N'-(2-thienylmethyl)-
U067	106-93-4	Ethane, 1,2-dibromo-
U076	75-34-3	Ethane, 1,1-dichloro-
U077	107-06-2	Ethane, 1,2-dichloro-
U131	67-72-1	Ethane, hexachloro-
U024	111-91-1	Ethane, 1,1'-(methylenebis(oxy))bis(2-chloro-
U117	60-29-7	Ethane, 1,1'-oxybis-(I)
U025	111-44-4	Ethane, 1,1'-oxybis(2-chloro-
U184	76-01-7	Ethane, pentachloro-
U208	630-20-6	Ethane, 1,1,1,2-tetrachloro-
U209	79-34-5	Ethane, 1,1,2,2-tetrachloro-
U218	62-55-5	Ethanethioamide
U226	71-55-6	Ethane, 1,1,1-trichloro-
U227	79-00-5	Ethane, 1,1,2-trichloro-
U410	59669-26-0	Ethanimidothioic acid, N,N'-(thiobis((methylimino)carbonyloxy))bis-, dimethyl ester
U394	30558-43-1	Ethanimidothioic acid, 2-(dimethylamino)-N-hydroxy-2-oxo-, methyl ester.
U359	110-80-5	Ethanol, 2-ethoxy-
U173	1116-54-7	Ethanol, 2,2'-(nitrosoimino)bis-
U395	5952-26-1	Ethanol, 2,2'-oxybis-, dicarbamate.
U004	98-86-2	Ethanone, 1-phenyl-
U043	75-01-4	Ethene, chloro-
U042	110-75-8	Ethene, (2-chloroethoxy)-
U078	75-35-4	Ethene, 1,1-dichloro-
U079	156-60-5	Ethene, 1,2-dichloro-, (E)-
U210	127-18-4	Ethene, tetrachloro-
U228	79-01-6	Ethene, trichloro-
U112	141-78-6	Ethyl acetate (I)
U113	140-88-5	Ethyl acrylate (I)
U238	51-79-6	Ethyl carbamate (urethane)
U117	60-29-7	Ethyl ether (I)
U114	(1)111-54-6	Ethylenebisdithiocarbamic acid, salts and esters
U067	106-93-4	Ethylene dibromide
U077	107-06-2	Ethylene dichloride
U359	110-80-5	Ethylene glycol monoethyl ether
U115	75-21-8	Ethylene oxide (I,T)
U116	96-45-7	Ethylenethiourea
U076	75-34-3	Ethylidene dichloride
U118	97-63-2	Ethyl methacrylate
U119	62-50-0	Ethyl methanesulfonate
U120	206-44-0	Fluoranthene
U122	50-00-0	Formaldehyde
U123	64-18-6	Formic acid (C,T)
U124	110-00-9	Furan (I)
U125	98-01-1	2-Furancarboxaldehyde (I)
U147	108-31-6	2,5-Furandione
U213	109-99-9	Furan, tetrahydro-(I)
U125	98-01-1	Furfural (I)
U124	110-00-9	Furfuran (I)
U206	18883-66-4	Glucopyranose, 2-deoxy-2-(3-methyl-3-nitrosoureido)-, D-
U206	18883-66-4	D-Glucose, 2-deoxy-2-(((methylnitrosoamino)-carbonyl)amino)-
U126	765-34-4	Glycidylaldehyde
U163	70-25-7	Guanidine, N-methyl-N'-nitro-N-nitroso-
U127	118-74-1	Hexachlorobenzene
U128	87-68-3	Hexachlorobutadiene
U130	77-47-4	Hexachlorocyclopentadiene
U131	67-72-1	Hexachloroethane
U132	70-30-4	Hexachlorophene
U243	1888-71-7	Hexachloropropene
U133	302-01-2	Hydrazine (R,T)
U086	1615-80-1	Hydrazine, 1,2-diethyl-
U098	57-14-7	Hydrazine, 1,1-dimethyl-
U099	540-73-8	Hydrazine, 1,2-dimethyl-
U109	122-66-7	Hydrazine, 1,2-diphenyl-
U134	7664-39-3	Hydrofluoric acid (C,T)
U134	7664-39-3	Hydrogen fluoride (C,T)
U135	7783-06-4	Hydrogen sulfide
U135	7783-06-4	Hydrogen sulfide H2 S
U096	80-15-9	Hydroperoxide, 1-methyl-1-phenylethyl-(R)
U116	96-45-7	2-Imidazolidinethione
U137	193-39-5	Indeno(1,2,3-cd)pyrene
U190	85-44-9	1,3-Isobenzofurandione
U140	78-83-1	Isobutyl alcohol (I,T)
U141	120-58-1	Isosafrole
U142	143-50-0	Kepone
U143	303-34-4	Lasiocarpine
U144	301-04-2	Lead acetate
U146	1335-32-6	Lead, bis(acetato-O)tetrahydroxytri-
U145	7446-27-7	Lead phosphate
U146	1335-32-6	Lead subacetate
U129	58-89-9	Lindane
U163	70-25-7	MNNG
U147	108-31-6	Maleic anhydride
U148	123-33-1	Maleic hydrazide
U149	109-77-3	Malononitrile
U150	148-82-3	Melphalan
U151	7439-97-6	Mercury
U152	126-98-7	Methacrylonitrile (I, T)
U092	124-40-3	Methanamine, N-methyl- (I)
U029	74-83-9	Methane, bromo-
U045	74-87-3	Methane, chloro- (I, T)
U046	107-30-2	Methane, chloromethoxy-
U068	74-95-3	Methane, dibromo-
U080	75-09-2	Methane, dichloro-
U075	75-71-8	Methane, dichlorodifluoro-
U138	74-88-4	Methane, iodo-
U119	62-50-0	Methanesulfonic acid, ethyl ester
U211	56-23-5	Methane, tetrachloro-
U153	74-93-1	Methanethiol (I, T)
U225	75-25-2	Methane, tribromo-
U044	67-66-3	Methane, trichloro-
U121	75-69-4	Methane, trichlorofluoro-
U036	57-74-9	4,7-Methano-1H-indene, 1,2,4,5,6,7,8,8-octachloro-2,3,3a,4,7,7a-hexahydro-
U154	67-56-1	Methanol (I)
U155	91-80-5	Methapyrilene
U142	143-50-0	1,3,4-Metheno-2H-cyclobuta(cd)pentalen-2-one, 1,1a,3,3a,4,5,5,5a,5b,6-decachlorooctahydro-
U247	72-43-5	Methoxychlor
U154	67-56-1	Methyl alcohol (I)
U029	74-83-9	Methyl bromide
U186	504-60-9	1-Methylbutadiene (I)
U045	74-87-3	Methyl chloride (I,T)
U156	79-22-1	Methyl chlorocarbonate (I,T)
U226	71-55-6	Methyl chloroform
U157	56-49-5	3-Methylcholanthrene
U158	101-14-4	4,4'-Methylenebis(2-chloroaniline)
U068	74-95-3	Methylene bromide
U080	75-09-2	Methylene chloride

U159	78-93-3	Methyl ethyl ketone (MEK) (I,T)
U160	1338-23-4	Methyl ethyl ketone peroxide (R,T)
U138	74-88-4	Methyl iodide
U161	108-10-1	Methyl isobutyl ketone (I)
U162	80-62-6	Methyl methacrylate (I,T)
U161	108-10-1	4-Methyl-2-pentanone (I)
U164	56-04-2	Methylthiouracil
U010	50-07-7	Mitomycin C
U059	20830-81-3	5,12-Naphthacenedione, 8-acetyl-10-((3-amino-2,3,6-trideoxy)-alpha-L-lyxo-hexopyranosyl)oxy)-7,8,9,10-tetrahydro-6,8,11-trihydroxy-1-methoxy-, (8S-cis)-
U167	134-32-7	1-Naphthalenamine
U168	91-59-8	2-Naphthalenamine
U026	494-03-1	Naphthalenamine, N,N'-bis(2-chloroethyl)-
U165	91-20-3	Naphthalene
U047	91-58-7	Naphthalene, 2-chloro-
U166	130-15-4	1,4-Naphthalenedione
U236	72-57-1	2,7-Naphthalenedisulfonic acid, 3,3'-((3,3'- dimethyl(1,1'-biphenyl)-4,4'-diyl)bis(azo)bis(5-amino-4-hydroxy)-, tetrasodium salt
U279	63-25-2	1-Naphthalenol, methylcarbamate.
U166	130-15-4	1,4-Naphthoquinone
U167	134-32-7	alpha-Naphthylamine
U168	91-59-8	beta-Naphthylamine
U217	10102-45-1	Nitric acid, thallium(1+) salt
U169	98-95-3	Nitrobenzene (I,T)
U170	100-02-7	p-Nitrophenol
U171	79-46-9	2-Nitropropane (I,T)
U172	924-16-3	N-Nitrosodi-n-butylamine
U173	1116-54-7	N-Nitrosodiethanolamine
U174	55-18-5	N-Nitrosodiethylamine
U176	759-73-9	N-Nitroso-N-ethylurea
U177	684-93-5	N-Nitroso-N-methylurea
U178	615-53-2	N-Nitroso-N-methylurethane
U179	100-75-4	N-Nitrosopiperidine
U180	930-55-2	N-Nitrosopyrrolidine
U181	99-55-8	5-Nitro-o-toluidine
U193	1120-71-4	1,2-Oxathiolane, 2,2-dioxide
U058	50-18-0	2H-1,3,2-Oxazaphosphorin-2-amine, N,N-bis(2-chloroethyl)tetrahydro-, 2-oxide
U115	75-21-8	Oxirane (I,T)
U126	765-34-4	Oxiranecarboxyaldehyde
U041	106-89-8	Oxirane, (chloromethyl)-
U182	123-63-7	Paraldehyde
U183	608-93-5	Pentachlorobenzene
U184	76-01-7	Pentachloroethane
U185	82-68-8	Pentachloronitrobenzene (PCNB)
See F027	87-86-5	Pentachlorophenol
U161	108-10-1	Pentanol, 4-methyl-
U186	504-60-9	1,3-Pentadiene (I)
U187	62-44-2	Phenacetin
U188	108-95-2	Phenol
U048	95-57-8	Phenol, 2-chloro-
U039	59-50-7	Phenol, 4-chloro-3-methyl-
U081	120-83-2	Phenol, 2,4-dichloro-
U082	87-65-0	Phenol, 2,6-dichloro-
U089	56-53-1	Phenol, 4,4'-(1,2-diethyl-1,2-ethenediyl)bis-, (E)-
U101	105-67-9	Phenol, 2,4-dimethyl-
U052	1319-77-3	Phenol, methyl-
U132	70-30-4	Phenol, 2,2'-methylenebis(3,4,6-trichloro-
U411	114-26-1	Phenol, 2-(1-methylethoxy)-, methylcarbamate.
U170	100-02-7	Phenol, 4-nitro-
See F027	87-86-5	Phenol, pentachloro-
See F027	58-90-2	Phenol, 2,3,4,6-tetrachloro-
See F027	95-95-4	Phenol, 2,4,5-trichloro-
See F027	88-06-2	Phenol, 2,4,6-trichloro-
U150	148-82-3	L-Phenylalanine, 4-(bis(2-chloroethyl)amino)-
U145	7446-27-7	Phosphoric acid, lead(2+) salt (2:3)
U087	3288-58-2	Phosphorodithioic acid, O,O-diethyl S-methyl ester
U189	1314-80-3	Phosphorus sulfide (R)
U190	85-44-9	Phthalic anhydride
U191	109-06-8	2-Picoline
U179	100-75-4	Piperidine, 1-nitroso-
U192	23950-58-5	Pronamide
U194	107-10-8	1-Propanamine (I,T)
U111	621-64-7	1-Propanamine, N-nitroso-N-propyl-
U110	142-84-7	1-Propanamine, N-propyl- (I)
U066	96-12-8	Propane, 1,2-dibromo-3-chloro-
U083	78-87-5	Propane, 1,2-dichloro-
U149	109-77-3	Propanedinitrile
U171	79-46-9	Propane, 2-nitro- (I,T)
U027	108-60-1	Propane, 2,2'-oxybis(2-chloro-
U193	1120-71-4	1,3-Propane sultone
See F027	93-72-1	Propanoic acid, 2-(2,4,5-trichlorophenoxy)-
U235	126-72-7	1-Propanol, 2,3-dibromo-, phosphate (3:1)
U140	78-83-1	1-Propanol, 2-methyl- (I,T)
U002	67-64-1	2-Propanone (I)
U007	79-06-1	2-Propenamide
U084	542-75-6	1-Propene, 1,3-dichloro-
U243	1888-71-7	1-Propene, 1,1,2,3,3,3-hexachloro-
U009	107-13-1	2-Propenenitrile
U152	126-98-7	2-Propenenitrile, 2-methyl- (I,T)
U008	79-10-7	2-Propenoic acid (I)
U113	140-88-5	2-Propenoic acid, ethyl ester (I)
U118	97-63-2	2-Propenoic acid, 2-methyl-, ethyl ester
U162	80-62-6	2-Propenoic acid, 2-methyl-, methyl ester (I,T)
U373	122-42-9	Propham.
U411	114-26-1	Propoxur.
U387	52888-80-9	Prosulfocarb.
U194	107-10-8	n-Propylamine (I,T)
U083	78-87-5	Propylene dichloride
U148	123-33-1	3,6-Pyridazinedione, 1,2-dihydro-
U196	110-86-1	Pyridine
U191	109-06-8	Pyridine, 2-methyl-
U237	66-75-1	2,4-(1H,3H)-Pyrimidinedione, 5-(bis(2-chloroethyl)amino)-
U164	56-04-2	4(1H)-Pyrimidinone, 2,3-dihydro-6-methyl-2-thioxo-
U180	930-55-2	Pyrrolidine, 1-nitroso-
U200	50-55-5	Reserpine
U201	108-46-3	Resorcinol
U203	94-59-7	Safrole
U204	7783-00-8	Selenious acid
U204	7783-00-8	Selenium dioxide
U205	7488-56-4	Selenium sulfide
U205	7488-56-4	Selenium sulfide SeS2 (R,T)
U015	115-02-6	L-Serine, diazoacetate (ester)
See F027	93-72-1	Silvex (2,4,5-TP)
U206	18883-66-4	Streptozotocin
U103	77-78-1	Sulfuric acid, dimethyl ester
U189	1314-80-3	Sulfur phosphide (R)
See F027	93-76-5	2,4,5-T
U207	95-94-3	1,2,4,5-Tetrachlorobenzene
U208	630-20-6	1,1,1,2-Tetrachloroethane
U209	79-34-5	1,1,2,2-Tetrachloroethane
U210	127-18-4	Tetrachloroethylene
See F027	58-90-2	2,3,4,6-Tetrachlorophenol
U213	109-99-9	Tetrahydrofuran (I)
U214	563-68-8	Thallium(I) acetate
U215	6533-73-9	Thallium(I) carbonate
U216	7791-12-0	Thallium(I) chloride
U216	7791-12-0	thallium chloride TlCl
U217	10102-45-1	Thallium(I) nitrate
U218	62-55-5	Thioacetamide
U410	59669-26-0	Thiodicarb.
U153	74-93-1	Thiomethanol (I,T)
U244	137-26-8	Thioperoxydicarbonic diamide ((H2 N)C(S))2 S2, tetramethyl-
U409	23564-05-8	Thiophanate-methyl.
U219	62-56-6	Thiourea
U244	137-26-8	Thiram
U220	108-88-3	Toluene
U221	25376-45-8	Toluenediamine
U223	26471-62-5	Toluene diisocyanate (R,T)
U328	95-53-4	o-Toluidine
U353	106-49-0	p-Toluidine
U222	636-21-5	o-Toluidine hydrochloride
U389	2303-17-5	Triallate.
U011	61-82-5	1H-1,2,4-Triazol-3-amine
U226	71-55-6	1,1,1-Trichloroethane
U227	79-00-5	1,1,2-Trichloroethane
U228	79-01-6	Trichloroethylene
U121	75-69-4	Trichloromonofluoromethane
See F027	95-95-4	2,4,5-Trichlorophenol
See F027	88-06-2	2,4,6-Trichlorophenol
U404	121-44-8	Triethylamine.
U234	99-35-4	1,3,5-Trinitrobenzene (R,T)
U182	123-63-7	1,3,5-Trioxane, 2,4,6-trimethyl-
U235	126-72-7	Tris(2,3-dibromopropyl) phosphate
U236	72-57-1	Trypan blue
U237	66-75-1	Uracil shallard
U176	759-73-9	Urea, N-ethyl-N-nitroso-
U177	684-93-5	Urea, N-methyl-N-nitroso-
U043	75-01-4	Vinyl chloride

U248	(1)81-81-2	Warfarin, and salts, when present at concentrations of 0.3% or less
U239	1330-20-7	Xylene (I)
U200	50-55-5	Yohimban-16-carboxylic acid, 11,17-dimethoxy-18-((3,4,5-trimethoxybenzoyl) oxy)-, methyl ester, (3beta,16beta, 17alpha,18beta, 20alpha)-
U249	1314-84-7	Zinc phosphide Zn3 P2, when present at concentrations of 10% or less
U001	75-07-0	Acetaldehyde (I)
U001	75-07-0	Ethanal (I)
U002	67-64-1	Acetone (I)
U002	67-64-1	2-Propanone (I)
U003	75-05-8	Acetonitrile (I,T)
U004	98-86-2	Acetophenone
U004	98-86-2	Ethanone, 1-phenyl-
U005	53-96-3	Acetamide, -9H-fluoren-2-yl-
U005	53-96-3	2-Acetylaminofluorene
U006	75-36-5	Acetyl chloride (C,R,T)
U007	79-06-1	Acrylamide
U007	79-06-1	2-Propenamide
U008	79-10-7	Acrylic acid (I)
U008	79-10-7	2-Propenoic acid (I)
U009	107-13-1	Acrylonitrile
U009	107-13-1	2-Propenenitrile
U010	50-07-7	Azirino(2',3':3,4)pyrrolo(1,2-a)indole-4,7-dione, 6-amino-8-(((aminocarbonyl) oxy)methyl)-1,1a,2,8,8a,8b-hexahydro-8a-methoxy-5-methyl-, (1aS-(1aalpha, 8beta, 8aalpha,8balpha))-
U010	50-07-7	Mitomycin C
U011	61-82-5	Amitrole
U011	61-82-5	1H-1,2,4-Triazol-3-amine
U012	62-53-3	Aniline (I,T)
U012	62-53-3	Benzenamine (I,T)
U014	492-80-8	Auramine
U014	492-80-8	Benzenamine, 4,4'-carbonimidoylbis(N,N-dimethyl-
U015	115-02-6	Azaserine
U015	115-02-6	L-Serine, diazoacetate (ester)
U016	225-51-4	Benz(c)acridine
U017	98-87-3	Benzal chloride
U017	98-87-3	Benzene, (dichloromethyl)-
U018	56-55-3	Benz(a)anthracene
U019	71-43-2	Benzene (I,T)
U020	98-09-9	Benzenesulfonic acid chloride (C,R)
U020	98-09-9	Benzenesulfonyl chloride (C,R)
U021	92-87-5	Benzidine
U021	92-87-5	(1,1'-Biphenyl)-4,4'-diamine
U022	50-32-8	Benzo(a)pyrene
U023	98-07-7	Benzene, (trichloromethyl)-
U023	98-07-7	Benzotrichloride (C,R,T)
U024	111-91-1	Dichloromethoxy ethane
U024	111-91-1	Ethane, 1,1'-(methylenebis(oxy))bis(2-chloro-
U025	111-44-4	Dichloroethyl ether
U025	111-44-4	Ethane, 1,1'-oxybis(2-chloro-
U026	494-03-1	Chlornaphazin
U026	494-03-1	Naphthalenamine, N,N'-bis(2-chloroethyl)-
U027	108-60-1	Dichloroisopropyl ether
U027	108-60-1	Propane, 2,2'-oxybis(2-chloro-
U028	117-81-7	1,2-Benzenedicarboxylic acid, bis(2-ethylhexyl) ester
U028	117-81-7	Diethylhexyl phthalate
U029	74-83-9	Methane, bromo-
U029	74-83-9	Methyl bromide
U030	101-55-3	Benzene, 1-bromo-4-phenoxy-
U030	101-55-3	4-Bromophenyl phenyl ether
U031	71-36-3	1-Butanol (I)
U031	71-36-3	n-Butyl alcohol (I)
U032	13765-19-0	Calcium chromate
U032	13765-19-0	Chromic acid H2 CrO4, calcium salt
U033	353-50-4	Carbonic difluoride
U033	353-50-4	Carbon oxyfluoride (R,T)
U034	75-87-6	Acetaldehyde, trichloro-
U034	75-87-6	Chloral
U035	305-03-3	Benzenebutanoic acid, 4-(bis(2-chloroethyl)amino)-
U035	305-03-3	Chlorambucil
U036	57-74-9	Chlordane, alpha and gamma isomers
U036	57-74-9	4,7-Methano-1H-indene, 1,2,4,5,6,7,8,8-octachloro-2,3,3a,4,7,7a-hexahydro-
U037	108-90-7	Benzene, chloro-
U037	108-90-7	Chlorobenzene
U038	510-15-6	Benzeneacetic acid, 4-chloro-alpha-(4-chlorophenyl)-alpha-hydroxy-, ethyl ester
U038	510-15-6	Chlorobenzilate
U039	59-50-7	p-Chloro-m-cresol
U039	59-50-7	Phenol, 4-chloro-3-methyl-
U041	106-89-8	Epichlorohydrin
U041	106-89-8	Oxirane, (chloromethyl)-
U042	110-75-8	2-Chloroethyl vinyl ether
U042	110-75-8	Ethene, (2-chloroethoxy)-
U043	75-01-4	Ethene, chloro-
U043	75-01-4	Vinyl chloride
U044	67-66-3	Chloroform
U044	67-66-3	Methane, trichloro-
U045	74-87-3	Methane, chloro- (I,T)
U045	74-87-3	Methyl chloride (I,T)
U046	107-30-2	Chloromethyl methyl ether
U046	107-30-2	Methane, chloromethoxy-
U047	91-58-7	beta-Chloronaphthalene
U047	91-58-7	Naphthalene, 2-chloro-
U048	95-57-8	o-Chlorophenol
U048	95-57-8	Phenol, 2-chloro-
U049	3165-93-3	Benzenamine, 4-chloro-2-methyl-, hydrochloride
U049	3165-93-3	4-Chloro-o-toluidine, hydrochloride
U050	218-01-9	Chrysene
U051		Creosote
U052	1319-77-3	Cresol (Cresylic acid)
U052	1319-77-3	Phenol, methyl-
U053	4170-30-3	2-Butenal
U053	4170-30-3	Crotonaldehyde
U055	98-82-8	Benzene, (1-methylethyl)-(I)
U055	98-82-8	Cumene (I)
U056	110-82-7	Benzene, hexahydro-(I)
U056	110-82-7	Cyclohexane (I)
U057	108-94-1	Cyclohexanone (I)
U058	50-18-0	Cyclophosphamide
U058	50-18-0	2H-1,3,2-Oxazaphosphorin-2-amine, N,N-bis(2-chloroethyl)tetrahydro-, 2-oxide
U059	20830-81-3	Daunomycin
U059	20830-81-3	5,12-Naphthacenedione, 8-acetyl-10-((3-amino-2,3,6-trideoxy)-alpha-L-lyxo-hexopyranosyl)oxy)-7,8,9,10-tetrahydro-6,8,11-trihydroxy-1-methoxy-, (8S-cis)-
U060	72-54-8	Benzene, 1,1'-(2,2-dichloroethylidene)bis(4-chloro-
U060	72-54-8	DDD
U061	50-29-3	Benzene, 1,1'-(2,2,2-trichloroethylidene)bis(4-chloro-
U061	50-29-3	DDT
U062	2303-16-4	Carbamothioic acid, bis(1-methylethyl)-, S- (2,3-di chloro-2-propenyl) ester
U062	2303-16-4	Diallate
U063	53-70-3	Dibenz(a,h)anthracene
U064	189-55-9	Benzo(rst)pentaphene
U064	189-55-9	Dibenzo(a,i)pyrene
U066	96-12-8	1,2-Dibromo-3-chloropropane
U066	96-12-8	Propane, 1,2-dibromo-3-chloro-
U067	106-93-4	Ethane, 1,2-dibromo-
U067	106-93-4	Ethylene dibromide
U068	74-95-3	Methane, dibromo-
U068	74-95-3	Methylene bromide
U069	84-74-2	1,2-Benzenedicarboxylic acid, dibutyl ester
U069	84-74-2	Dibutyl phthalate
U070	95-50-1	Benzene, 1,2-dichloro-
U070	95-50-1	o-Dichlorobenzene
U071	541-73-1	Benzene, 1,3-dichloro-
U071	541-73-1	m-Dichlorobenzene
U072	106-46-7	Benzene, 1,4-dichloro-
U072	106-46-7	p-Dichlorobenzene
U073	91-94-1	(1,1'-Biphenyl)-4,4'-diamine, 3,3'-dichloro-
U073	91-94-1	3,3'-Dichlorobenzidine
U074	764-41-0	2-Butene, 1,4-dichloro-(I,T)
U074	764-41-0	1,4-Dichloro-2-butene (I,T)
U075	75-71-8	Dichlorodifluoromethane
U075	75-71-8	Methane, dichlorodifluoro-
U076	75-34-3	Ethane, 1,1-dichloro-
U076	75-34-3	Ethylidene dichloride
U077	107-06-2	Ethane, 1,2-dichloro-
U077	107-06-2	Ethylene dichloride
U078	75-35-4	1,1-Dichloroethylene
U078	75-35-4	Ethene, 1,1-dichloro-
U079	156-60-5	1,2-Dichloroethylene
U079	156-60-5	Ethene, 1,2-dichloro-, (E)-
U080	75-09-2	Methane, dichloro-

U080	75-09-2	Methylene chloride
U081	120-83-2	2,4-Dichlorophenol
U081	120-83-2	Phenol, 2,4-dichloro-
U082	87-65-0	2,6-Dichlorophenol
U082	87-65-0	Phenol, 2,6-dichloro-
U083	78-87-5	Propane, 1,2-dichloro-
U083	78-87-5	Propylene dichloride
U084	542-75-6	1,3-Dichloropropene
U084	542-75-6	1-Propene, 1,3-dichloro-
U085	1464-53-5	2,2'-Bioxirane
U085	1464-53-5	1,2:3,4-Diepoxybutane (I,T)
U086	1615-80-1	N,N'-Diethylhydrazine
U086	1615-80-1	Hydrazine, 1,2-diethyl-
U087	3288-58-2	O,O-Diethyl S-methyl dithiophosphate
U087	3288-58-2	Phosphorodithioic acid, O,O-diethyl S-methyl ester
U088	84-66-2	1,2-Benzenedicarboxylic acid, diethyl ester
U088	84-66-2	Diethyl phthalate
U089	56-53-1	Diethylstilbesterol
U089	56-53-1	Phenol, 4,4'-(1,2-diethyl-1,2-ethenediyl)bis-, (E)-
U090	94-58-6	1,3-Benzodioxole, 5-propyl-
U090	94-58-6	Dihydrosafrole
U091	119-90-4	(1,1'-Biphenyl)-4,4'-diamine, 3,3'-dimethoxy-
U091	119-90-4	3,3'-Dimethoxybenzidine
U092	124-40-3	Dimethylamine (I)
U092	124-40-3	Methanamine, -methyl-(I)
U093	60-11-7	Benzenamine, N,N-dimethyl-4-(phenylazo)-
U093	60-11-7	p-Dimethylaminoazobenzene
U094	57-97-6	Benz(a)anthracene, 7,12-dimethyl-
U094	57-97-6	7,12-Dimethylbenz(a)anthracene
U095	119-93-7	(1,1'-Biphenyl)-4,4'-diamine, 3,3'-dimethyl-
U095	119-93-7	3,3'-Dimethylbenzidine
U096	80-15-9	alpha,alpha-Dimethylbenzylhydroperoxide (R)
U096	80-15-9	Hydroperoxide, 1-methyl-1-phenylethyl-(R)
U097	79-44-7	Carbamic chloride, dimethyl-
U097	79-44-7	Dimethylcarbamoyl chloride
U098	57-14-7	1,1-Dimethylhydrazine
U098	57-14-7	Hydrazine, 1,1-dimethyl-
U099	540-73-8	1,2-Dimethylhydrazine
U099	540-73-8	Hydrazine, 1,2-dimethyl-
U101	105-67-9	2,4-Dimethylphenol
U101	105-67-9	Phenol, 2,4-dimethyl-
U102	131-11-3	1,2-Benzenedicarboxylic acid, dimethyl ester
U102	131-11-3	Dimethyl phthalate
U103	77-78-1	Dimethyl sulfate
U103	77-78-1	Sulfuric acid, dimethyl ester
U105	121-14-2	Benzene, 1-methyl-2,4-dinitro-
U105	121-14-2	2,4-Dinitrotoluene
U106	606-20-2	Benzene, 2-methyl-1,3-dinitro-
U106	606-20-2	2,6-Dinitrotoluene
U107	117-84-0	1,2-Benzenedicarboxylic acid, dioctyl ester
U107	117-84-0	Di-n-octyl phthalate
U108	123-91-1	1,4-Diethyleneoxide
U108	123-91-1	1,4-Dioxane
U109	122-66-7	1,2-Diphenylhydrazine
U109	122-66-7	Hydrazine, 1,2-diphenyl-
U110	142-84-7	Dipropylamine (I)
U110	142-84-7	1-Propanamine, N-propyl-(I)
U111	621-64-7	Di-n-propylnitrosamine
U111	621-64-7	1-Propanamine, N-nitroso-N-propyl-
U112	141-78-6	Acetic acid ethyl ester (I)
U112	141-78-6	Ethyl acetate (I)
U113	140-88-5	Ethyl acrylate (I)
U113	140-88-5	2-Propenoic acid, ethyl ester (I)
U114	(1)111-54-6	Carbamodithioic acid, 1,2-ethanediylbis-, salts and esters
U114	(1)111-54-6	Ethylenebisdithiocarbamic acid, salts and esters
U115	75-21-8	Ethylene oxide (I,T)
U115	75-21-8	Oxirane (I,T)
U116	96-45-7	Ethylenethiourea
U116	96-45-7	2-Imidazolidinethione
U117	60-29-7	Ethane, 1,1'-oxybis-(I)
U117	60-29-7	Ethyl ether (I)
U118	97-63-2	Ethyl methacrylate
U118	97-63-2	2-Propenoic acid, 2-methyl-, ethyl ester
U119	62-50-0	Ethyl methanesulfonate
U119	62-50-0	Methanesulfonic acid, ethyl ester
U120	206-44-0	Fluoranthene
U121	75-69-4	Methane, trichlorofluoro-
U121	75-69-4	Trichloromonofluoromethane
U122	50-00-0	Formaldehyde
U123	64-18-6	Formic acid (C,T)
U124	110-00-9	Furan (I)
U124	110-00-9	Furfuran (I)
U125	98-01-1	2-Furancarboxaldehyde (I)
U125	98-01-1	Furfural (I)
U126	765-34-4	Glycidylaldehyde
U126	765-34-4	Oxiranecarboxyaldehyde
U127	118-74-1	Benzene, hexachloro-
U127	118-74-1	Hexachlorobenzene
U128	87-68-3	1,3-Butadiene, 1,1,2,3,4,4-hexachloro-
U128	87-68-3	Hexachlorobutadiene
U129	58-89-9	Cyclohexane, 1,2,3,4,5,6-hexachloro-, (1alpha,2alpha,3beta,4alpha,5alpha,6beta)-
U129	58-89-9	Lindane
U130	77-47-4	1,3-Cyclopentadiene, 1,2,3,4,5,5-hexachloro-
U130	77-47-4	Hexachlorocyclopentadiene
U131	67-72-1	Ethane, hexachloro-
U131	67-72-1	Hexachloroethane
U132	70-30-4	Hexachlorophene
U132	70-30-4	Phenol, 2,2'-methylenebis(3,4,6-trichloro-
U133	302-01-2	Hydrazine (R,T)
U134	7664-39-3	Hydrofluoric acid (C,T)
U134	7664-39-3	Hydrogen fluoride (C,T)
U135	7783-06-4	Hydrogen sulfide
U135	7783-06-4	Hydrogen sulfide H2S
U136	75-60-5	Arsinic acid, dimethyl-
U136	75-60-5	Cacodylic acid
U137	193-39-5	Indeno(1,2,3-cd)pyrene
U138	74-88-4	Methane, iodo-
U138	74-88-4	Methyl iodide
U140	78-83-1	Isobutyl alcohol (I,T)
U140	78-83-1	1-Propanol, 2-methyl- (I,T)
U141	120-58-1	1,3-Benzodioxole, 5-(1-propenyl)-
U141	120-58-1	Isosafrole
U142	143-50-0	Kepone
U142	143-50-0	1,3,4-Metheno-2H-cyclobuta(cd)pentalen-2-one, 1,1a,3,3a,4,5,5,5a,5b,6-decachlorooctahydro-
U143	303-34-4	2-Butenoic acid, 2-methyl-, 7-((2,3-dihydroxy-2-(1-methoxyethyl)-3-methyl-1-oxobutoxy)methyl)-2,3,5,7a-tetrahydro-1H-pyrrolizin-1-yl ester, (1S- (1alpha(Z),7(2S*,3R*),7aalpha))-
U143	303-34-4	Lasiocarpine
U144	301-04-2	Acetic acid, lead(2+) salt
U144	301-04-2	Lead acetate
U145	7446-27-7	Lead phosphate
U145	7446-27-7	Phosphoric acid, lead(2+) salt (2:3)
U146	1335-32-6	Lead, bis(acetato-O)tetrahydroxytri-
U146	1335-32-6	Lead subacetate
U147	108-31-6	2,5-Furandione
U147	108-31-6	Maleic anhydride
U148	123-33-1	Maleic hydrazide
U148	123-33-1	3,6-Pyridazinedione, 1,2-dihydro-
U149	109-77-3	Malononitrile
U149	109-77-3	Propanedinitrile
U150	148-82-3	Melphalan
U150	148-82-3	L-Phenylalanine, 4-(bis(2-chloroethyl)amino)-
U151	7439-97-6	Mercury
U152	126-98-7	Methacrylonitrile (I,T)
U152	126-98-7	2-Propenenitrile, 2-methyl- (I,T)
U153	74-93-1	Methanethiol (I,T)
U153	74-93-1	Thiomethanol (I,T)
U154	67-56-1	Methanol (I)
U154	67-56-1	Methyl alcohol (I)
U155	91-80-5	1,2-Ethanediamine, N,N-dimethyl-N'-2-pyridinyl-N'-(2-thienylmethyl)-
U155	91-80-5	Methapyrilene
U156	79-22-1	Carbonochloridic acid, methyl ester (I,T)
U156	79-22-1	Methyl chlorocarbonate (I,T)
U157	56-49-5	Benz(j)aceanthrylene, 1,2-dihydro-3-methyl-
U157	56-49-5	3-Methylcholanthrene
U158	101-14-4	Benzenamine, 4,4'-methylenebis(2-chloro-
U158	101-14-4	4,4'-Methylenebis(2-chloroaniline)
U159	78-93-3	2-Butanone (I,T)
U159	78-93-3	Methyl ethyl ketone (MEK) (I,T)
U160	1338-23-4	2-Butanone, peroxide (R,T)

U160	1338-23-4	Methyl ethyl ketone peroxide (R,T)
U161	108-10-1	Methyl isobutyl ketone (I)
U161	108-10-1	4-Methyl-2-pentanone (I)
U161	108-10-1	Pentanol, 4-methyl-
U162	80-62-6	Methyl methacrylate (I,T)
U162	80-62-6	2-Propenoic acid, 2-methyl-, methyl ester (I,T)
U163	70-25-7	Guanidine, -methyl-N'-nitro-N-nitroso-
U163	70-25-7	MNNG
U164	56-04-2	Methylthiouracil
U164	56-04-2	4(1H)-Pyrimidinone, 2,3-dihydro-6-methyl-2-thioxo-
U165	91-20-3	Naphthalene
U166	130-15-4	1,4-Naphthalenedione
U166	130-15-4	1,4-Naphthoquinone
U167	134-32-7	1-Naphthalenamine
U167	134-32-7	alpha-Naphthylamine
U168	91-59-8	2-Naphthalenamine
U168	91-59-8	beta-Naphthylamine
U169	98-95-3	Benzene, nitro-
U169	98-95-3	Nitrobenzene (I,T)
U170	100-02-7	p-Nitrophenol
U170	100-02-7	Phenol, 4-nitro-
U171	79-46-9	2-Nitropropane (I,T)
U171	79-46-9	Propane, 2-nitro- (I,T)
U172	924-16-3	1-Butanamine, N-butyl-N-nitroso-
U172	924-16-3	N-Nitrosodi-n-butylamine
U173	1116-54-7	Ethanol, 2,2'-(nitrosoimino)bis-
U173	1116-54-7	N-Nitrosodiethanolamine
U174	55-18-5	Ethanamine, -ethyl-N-nitroso-
U174	55-18-5	N-Nitrosodiethylamine
U176	759-73-9	N-Nitroso-N-ethylurea
U176	759-73-9	Urea, N-ethyl-N-nitroso-
U177	684-93-5	N-Nitroso-N-methylurea
U177	684-93-5	Urea, N-methyl-N-nitroso-
U178	615-53-2	Carbamic acid, methylnitroso-, ethyl ester
U178	615-53-2	N-Nitroso-N-methylurethane
U179	100-75-4	N-Nitrosopiperidine
U179	100-75-4	Piperidine, 1-nitroso-
U180	930-55-2	N-Nitrosopyrrolidine
U180	930-55-2	Pyrrolidine, 1-nitroso-
U181	99-55-8	Benzenamine, 2-methyl-5-nitro-
U181	99-55-8	5-Nitro-o-toluidine
U182	123-63-7	1,3,5-Trioxane, 2,4,6-trimethyl-
U182	123-63-7	Paraldehyde
U183	608-93-5	Benzene, pentachloro-
U183	608-93-5	Pentachlorobenzene
U184	76-01-7	Ethane, pentachloro-
U184	76-01-7	Pentachloroethane
U185	82-68-8	Benzene, pentachloronitro-
U185	82-68-8	Pentachloronitrobenzene (PCNB)
U186	504-60-9	1-Methylbutadiene (I)
U186	504-60-9	1,3-Pentadiene (I)
U187	62-44-2	Acetamide, -(4-ethoxyphenyl)-
U187	62-44-2	Phenacetin
U188	108-95-2	Phenol
U189	1314-80-3	Phosphorus sulfide (R)
U189	1314-80-3	Sulfur phosphide (R)
U190	85-44-9	1,3-Isobenzofurandione
U190	85-44-9	Phthalic anhydride
U191	109-06-8	2-Picoline
U191	109-06-8	Pyridine, 2-methyl-
U192	23950-58-5	Benzamide, 3,5-dichloro-N-(1,1-dimethyl-2-propynyl)-
U192	23950-58-5	Pronamide
U193	1120-71-4	1,2-Oxathiolane, 2,2-dioxide
U193	1120-71-4	1,3-Propane sultone
U194	107-10-8	1-Propanamine (I,T)
U194	107-10-8	n-Propylamine (I,T)
U196	110-86-1	Pyridine
U197	106-51-4	p-Benzoquinone
U197	106-51-4	2,5-Cyclohexadiene-1,4-dione
U200	50-55-5	Reserpine
U200	50-55-5	Yohimban-16-carboxylic acid, 11,17-dimethoxy-18-((3,4,5-trimethoxybenzoyl)oxy)-, methyl ester,(3beta,16beta,17alpha,18beta,20alpha)-
U201	108-46-3	1,3-Benzenediol
U201	108-46-3	Resorcinol
U203	94-59-7	1,3-Benzodioxole, 5-(2-propenyl)-
U203	94-59-7	Safrole
U204	7783-00-8	Selenious acid
U204	7783-00-8	Selenium dioxide
U205	7488-56-4	Selenium sulfide
U205	7488-56-4	Selenium sulfide SeS2 (R,T)
U206	18883-66-4	Glucopyranose, 2-deoxy-2-(3-methyl-3-nitrosoureido)-, D-
U206	18883-66-4	D-Glucose, 2-deoxy-2-(((methylnitrosoamino)-carbonyl)amino)-
U206	18883-66-4	Streptozotocin
U207	95-94-3	Benzene, 1,2,4,5-tetrachloro-
U207	95-94-3	1,2,4,5-Tetrachlorobenzene
U208	630-20-6	Ethane, 1,1,1,2-tetrachloro-
U208	630-20-6	1,1,1,2-Tetrachloroethane
U209	79-34-5	Ethane, 1,1,2,2-tetrachloro-
U209	79-34-5	1,1,2,2-Tetrachloroethane
U210	127-18-4	Ethene, tetrachloro-
U210	127-18-4	Tetrachloroethylene
U211	56-23-5	Carbon tetrachloride
U211	56-23-5	Methane, tetrachloro-
U213	109-99-9	Furan, tetrahydro-(I)
U213	109-99-9	Tetrahydrofuran (I)
U214	563-68-8	Acetic acid, thallium(1+) salt
U214	563-68-8	Thallium(I) acetate
U215	6533-73-9	Carbonic acid, dithallium(1+) salt
U215	6533-73-9	Thallium(I) carbonate
U216	7791-12-0	Thallium(I) chloride
U216	7791-12-0	Thallium chloride TlCl
U217	10102-45-1	Nitric acid, thallium(1+) salt
U217	10102-45-1	Thallium(I) nitrate
U218	62-55-5	Ethanethioamide
U218	62-55-5	Thioacetamide
U219	62-56-6	Thiourea
U220	108-88-3	Benzene, methyl-
U220	108-88-3	Toluene
U221	25376-45-8	Benzenediamine, ar-methyl-
U221	25376-45-8	Toluenediamine
U222	636-21-5	Benzenamine, 2-methyl-, hydrochloride
U222	636-21-5	o-Toluidine hydrochloride
U223	26471-62-5	Benzene, 1,3-diisocyanatomethyl- (R,T)
U223	26471-62-5	Toluene diisocyanate (R,T)
U225	75-25-2	Bromoform
U225	75-25-2	Methane, tribromo-
U226	71-55-6	Ethane, 1,1,1-trichloro-
U226	71-55-6	Methyl chloroform
U226	71-55-6	1,1,1-Trichloroethane
U227	79-00-5	Ethane, 1,1,2-trichloro-
U227	79-00-5	1,1,2-Trichloroethane
U228	79-01-6	Ethene, trichloro-
U228	79-01-6	Trichloroethylene
U234	99-35-4	Benzene, 1,3,5-trinitro-
U234	99-35-4	1,3,5-Trinitrobenzene (R,T)
U235	126-72-7	1-Propanol, 2,3-dibromo-, phosphate (3:1)
U235	126-72-7	Tris(2,3-dibromopropyl) phosphate
U236	72-57-1	2,7-Naphthalenedisulfonic acid, 3,3'-((3,3'-dimethyl(1,1'-biphenyl)-4,4'-diyl)bis(azo)bis(5-amino-4-hydroxy)-, tetrasodium salt
U236	72-57-1	Trypan blue
U237	66-75-1	2,4-(1H,3H)-Pyrimidinedione, 5-(bis(2-chloroethyl)amino)-
U237	66-75-1	Uracil shallard
U238	51-79-6	Carbamic acid, ethyl ester
U238	51-79-6	Ethyl carbamate (urethane)
U239	1330-20-7	Benzene, dimethyl- (I,T)
U239	1330-20-7	Xylene (I)
U240	(1)94-75-7	Acetic acid, (2,4-dichlorophenoxy)-, salts and esters
U240	(1)94-75-7	2,4-D, salts and esters
U243	1888-71-7	Hexachloropropene
U243	1888-71-7	1-Propene, 1,1,2,3,3,3-hexachloro-
U244	137-26-8	Thioperoxydicarbonic diamide ((H2N)C(S))2 S2, tetramethyl-
U244	137-26-8	Thiram
U246	506-68-3	Cyanogen bromide (CN)Br
U247	72-43-5	Benzene, 1,1'-(2,2,2-trichloroethylidene)bis(4- methoxy-
U247	72-43-5	Methoxychlor
U248	(1)81-81-2	2H-1-Benzopyran-2-one, 4-hydroxy-3-(3-oxo-1-phenyl-butyl)-, and salts, when present at concentrations of 0.3% or less
U248	(1)81-81-2	Warfarin, and salts, when present at concentrations of 0.3% or less
U249	1314-84-7	Zinc phosphide Zn3 P2, when present at concentrations of 10% or less
U271	17804-35-2	Benomyl
U271	17804-35-2	Carbamic acid, (1-((butylamino)carbonyl)-1H-benzimidazol-2-yl)-, methyl ester
U278	22781-23-3	Bendiocarb
U278	22781-23-3	1,3-Benzodioxol-4-ol, 2,2-dimethyl-, methyl carbamate
U279	63-25-2	Carbaryl

U279	63-25-2	1-Naphthalenol, methylcarbamate
U280	101-27-9	Barban
U280	101-27-9	Carbamic acid, (3-chlorophenyl)-, 4-chloro-2-butynyl ester
U328	95-53-4	Benzenamine, 2-methyl-
U328	95-53-4	o-Toluidine
U353	106-49-0	Benzenamine, 4-methyl-
U353	106-49-0	p-Toluidine
U359	110-80-5	Ethanol, 2-ethoxy-
U359	110-80-5	Ethylene glycol monoethyl ether
U364	22961-82-6	Bendiocarb phenol
U364	22961-82-6	1,3-Benzodioxol-4-ol, 2,2-dimethyl-,
U367	1563-38-8	7-Benzofuranol, 2,3-dihydro-2,2-dimethyl-
U367	1563-38-8	Carbofuran phenol
U372	10605-21-7	Carbamic acid, 1H-benzimidazol-2-yl, methyl ester
U372	10605-21-7	Carbendazim
U373	122-42-9	Carbamic acid, phenyl-, 1-methylethyl ester
U373	122-42-9	Propham
U387	52888-80-9	Carbamothioic acid, dipropyl-, S-(phenylmethyl) ester
U387	52888-80-9	Prosulfocarb
U389	2303-17-5	Carbamothioic acid, bis(1-methylethyl)-, S- (2,3,3-trichloro-2-propenyl) ester
U389	2303-17-5	Triallate
U394	30558-43-1	A2213
U394	30558-43-1	Ethanimidothioic acid, 2-(dimethylamino)-N-hydroxy-2-oxo-, methyl ester
U395	5952-26-1	Diethylene glycol, dicarbamate
U395	5952-26-1	Ethanol, 2,2'-oxybis-, dicarbamate
U404	121-44-8	Ethanamine, N,N-diethyl-
U404	121-44-8	Triethylamine
U409	23564-05-8	Carbamic acid, (1,2-phenylenebis (iminocarbonothioyl))bis-, dimethyl ester
U409	23564-05-8	Thiophanate-methyl
U410	59669-26-0	Ethanimidothioic acid, N,N'-(thiobis((methylimino)carbonyloxy)) bis-, dimethyl ester
U410	59669-26-0	Thiodicarb
U411	114-26-1	Phenol, 2-(1-methylethoxy)-, methylcarbamate
U411	114-26-1	Propoxur
See F027	93-76-5	Acetic acid, (2,4,5-trichlorophenoxy)-
See F027	7-86-5	Pentachlorophenol
See F027	87-86-5	Phenol, pentachloro-
See F027	58-90-2	Phenol, 2,3,4,6-tetrachloro-
See F027	95-95-4	Phenol, 2,4,5-trichloro-
See F027	88-06-2	Phenol, 2,4,6-trichloro-
See F027	93-72-1	Propanoic acid, 2-(2,4,5-trichlorophenoxy)-
See F027	93-72-1	Silvex (2,4,5-TP)
See F027	93-76-5	2,4,5-T
See F027	58-90-2	2,3,4,6-Tetrachlorophenol
See F027	95-95-4	2,4,5-Trichlorophenol
See F027	88-06-2	2,4,6-Trichlorophenol

R315-261-35. Lists of Hazardous Wastes - Deletion of Certain Hazardous Waste Codes Following Equipment Cleaning and Replacement.

(a) Wastes from wood preserving processes at plants that do not resume or initiate use of chlorophenolic preservatives will not meet the listing definition of F032 once the generator has met all of the requirements of Subsections R315-261-35(b) and (c). These wastes may, however, continue to meet another hazardous waste listing description or may exhibit one or more of the hazardous waste characteristics.

(b) Generators shall either clean or replace all process equipment that may have come into contact with chlorophenolic formulations or constituents thereof, including, but not limited to, treatment cylinders, sumps, tanks, piping systems, drip pads, fork lifts, and trams, in a manner that minimizes or eliminates the escape of hazardous waste or constituents, leachate, contaminated drippage, or hazardous waste decomposition products to the ground water, surface water, or atmosphere.

(1) Generators shall do one of the following:

(i) Prepare and follow an equipment cleaning plan and clean equipment in accordance with Section R315-261-35;

(ii) Prepare and follow an equipment replacement plan and replace equipment in accordance with Section R315-261-35; or

(iii) Document cleaning and replacement in accordance with Section R315-261-35, carried out after termination of use of chlorophenolic preservations.

(2) Cleaning Requirements.

(i) Prepare and sign a written equipment cleaning plan that describes:

(A) The equipment to be cleaned;

(B) How the equipment will be cleaned;

(C) The solvent to be used in cleaning;

(D) How solvent rinses will be tested; and

(E) How cleaning residues will be disposed.

(ii) Equipment shall be cleaned as follows:

(A) Remove all visible residues from process equipment;

(B) Rinse process equipment with an appropriate solvent until dioxins and dibenzofurans are not detected in the final solvent rinse.

(iii) Analytical requirements.

(A) Rinses shall be tested by using an appropriate method.

(B) "Not detected" means at or below the following lower method calibration limits (MCLs): The 2,3,7,8-TCDD-based MCL-0.01 parts per trillion (ppt), sample weight of 1000 g, IS spiking level of 1 ppt, final extraction volume of 10-50 microliters. For other congeners-multiply the values by 1 for TCDF/PeCDD/PeCDF, by 2.5 for HxCDD/HxCDF/HpCDD/HpCDF, and by 5 for OCDD/OCDF.

(iv) The generator shall manage all residues from the cleaning process as F032 waste.

(3) Replacement requirements.

(i) Prepare and sign a written equipment replacement plan that describes:

(A) The equipment to be replaced;

(B) How the equipment will be replaced; and

(C) How the equipment will be disposed.

(ii) The generator shall manage the discarded equipment as F032 waste.

(4) Documentation requirements.

(i) Document that previous equipment cleaning and/or replacement was performed in accordance with Section R315-261-35 and occurred after cessation of use of chlorophenolic preservatives.

(c) The generator shall maintain the following records documenting the cleaning and replacement as part of the facility's operating record:

(1) The name and address of the facility;

(2) Formulations previously used and the date on which their use ceased in each process at the plant;

(3) Formulations currently used in each process at the plant;

(4) The equipment cleaning or replacement plan;

(5) The name and address of any persons who conducted the cleaning and replacement;

(6) The dates on which cleaning and replacement were accomplished;

(7) The dates of sampling and testing;

(8) A description of the sample handling and preparation techniques, including techniques used for extraction, containerization, preservation, and chain-of-custody of the samples;

(9) A description of the tests performed, the date the tests were performed, and the results of the tests;

(10) The name and model numbers of the instrument(s) used in performing the tests;

(11) QA/QC documentation; and

(12) The following statement signed by the generator or his authorized representative: I certify under penalty of law that all process equipment required to be cleaned or replaced under Section R315-261-35 was cleaned or replaced as represented in the equipment cleaning and replacement plan and accompanying

documentation. I am aware that there are significant penalties for providing false information, including the possibility of fine or imprisonment.

R315-261-39. Exclusions and Exemptions - Conditional Exclusion for Used, Broken Cathode Ray Tubes (CRTs) and Processed CRT Glass Undergoing Recycling.

Used, broken CRTs are not solid wastes if they meet the following conditions:

(a) Prior to processing: These materials are not solid wastes if they are destined for recycling and if they meet the following requirements:

(1) Storage. The broken CRTs shall be either:

(i) Stored in a building with a roof, floor, and walls, or

(ii) Placed in a container, i.e., a package or a vehicle, that is constructed, filled, and closed to minimize releases to the environment of CRT glass, including fine solid materials.

(2) Labeling. Each container in which the used, broken CRT is contained shall be labeled or marked clearly with one of the following phrases: "Used cathode ray tube(s)-contains leaded glass " or "Leaded glass from televisions or computers." It shall also be labeled: "Do not mix with other glass materials."

(3) Transportation. The used, broken CRTs shall be transported in a container meeting the requirements of Subsections R315-261-39(a)(1)(ii) and (2).

(4) Speculative accumulation and use constituting disposal. The used, broken CRTs are subject to the limitations on speculative accumulation as defined in Subsection R315-261-39(c)(8). If they are used in a manner constituting disposal, they shall comply with the applicable requirements of Sections R315-266-20 through 23 instead of the requirements of Section R315-261-39.

(5) Exports. In addition to the applicable conditions specified in Subsections R315-261-39(a)(1)through (4), exporters of used, broken CRTs shall comply with the following requirements:

(i) Notify EPA of an intended export before the CRTs are scheduled to leave the United States. A complete notification should be submitted sixty days before the initial shipment is intended to be shipped off-site. This notification may cover export activities extending over a twelve month or lesser period. The notification shall be in writing, signed by the exporter, and include the following information:

(A) Name, mailing address, telephone number and EPA ID number, if applicable, of the exporter of the CRTs.

(B) The estimated frequency or rate at which the CRTs are to be exported and the period of time over which they are to be exported.

(C) The estimated total quantity of CRTs specified in kilograms.

(D) All points of entry to and departure from each foreign country through which the CRTs will pass.

(E) A description of the means by which each shipment of the CRTs will be transported; e.g., mode of transportation vehicle, air, highway, rail, water, etc.; type(s) of container, drums, boxes, tanks, etc.

(F) The name and address of the recycler or recyclers and the estimated quantity of used CRTs to be sent to each facility, as well as the names of any alternate recyclers.

(G) A description of the manner in which the CRTs will be recycled in the foreign country that will be receiving the CRTs.

(H) The name of any transit country through which the CRTs will be sent and a description of the approximate length of time the CRTs will remain in such country and the nature of their handling while there.

(ii) Notifications must be submitted electronically using EPA's Waste Import Export Tracking System (WIETS), or its successor system.

(iii) Upon request by EPA, the exporter shall furnish to EPA any additional information which a receiving country requests in order to respond to a notification.

(iv) EPA shall provide a complete notification to the receiving country and any transit countries. A notification is complete when EPA receives a notification which EPA determines satisfies the requirements of Subsection R315-261-39(a)(5)(i).

(v) The export of CRTs is prohibited unless all of the following occur:

(A) The receiving country consents to the intended export. When the receiving country consents in writing to the receipt of the CRTs, EPA will forward an Acknowledgment of Consent to Export CRTs to the exporter. Where the receiving country objects to receipt of the CRTs or withdraws a prior consent, EPA will notify the exporter in writing. EPA will also notify the exporter of any responses from transit countries.

(B) On or after the AES filing compliance date, the exporter or a U.S. authorized agent must:

(I) Submit Electronic Export Information (EEI) for each shipment to the Automated Export System (AES) or its successor system, under the International Trade Data System (ITDS) platform, in accordance with 15 CFR 30.4(b).

(II) Include the following items in the EEI, along with the other information required under 15 CFR 30.6: EPA license code; Commodity classification code per 15 CFR 30.6(a)(12); EPA consent number; Country of ultimate destination per 15 CFR 30.6(a)(5); Date of export per 15 CFR 30.6(a)(2); Quantity of waste in shipment and units for reported quantity, if required reporting units established by value for the reported commodity classification number are in units of weight or volume per 15 CFR 30.6(a)(15); or EPA net quantity reported in units of kilograms, if required reporting units established by value for the reported commodity classification number are not in units of weight or volume.

(vi) When the conditions specified on the original notification change, the exporter must provide EPA with a written renotification of the change using the allowable methods listed in Subsection R315-261-39(a)(5)(ii), except for changes to the telephone number in Subsection R315-261-39(a)(5)(i)(A) and decreases in the quantity indicated pursuant to Subsection R315-261-39(a)(5)(i)(C). The shipment cannot take place until consent of the receiving country to the changes has been obtained (except for changes to information about points of entry and departure and transit countries pursuant to Subsections R315-261-39(a)(5)(i)(D) and (H) and the exporter of CRTs receives from EPA a copy of the Acknowledgment of Consent to Export CRTs reflecting the receiving country's consent to the changes.

(vii) A copy of the Acknowledgment of Consent to Export CRTs shall accompany the shipment of CRTs. The shipment shall conform to the terms of the Acknowledgment.

(viii) If a shipment of CRTs cannot be delivered for any reason to the recycler or the alternate recycler, the exporter of CRTs shall renotify EPA of a change in the conditions of the original notification to allow shipment to a new recycler in accordance with Subsection R315-261-39(a)(5)(vi) and obtain another Acknowledgment of Consent to Export CRTs.

(ix) Exporters must keep copies of notifications and Acknowledgments of Consent to Export CRTs for a period of three years following receipt of the Acknowledgment. Exporters may satisfy this recordkeeping requirement by retaining electronically submitted notifications or electronically generated Acknowledgements in the CRT exporter's account on EPA's Waste Import Export Tracking System (WIETS), or its successor system, provided that such copies are readily available for viewing and production if requested by any EPA or authorized state inspector. No CRT exporter may be held liable for the inability to produce a notification or Acknowledgement for inspection under Section R315-261-39 if the CRT exporter

can demonstrate that the inability to produce such copies are due exclusively to technical difficulty with EPA's Waste Import Export Tracking System (WIETS), or its successor system for which the CRT exporter bears no responsibility.

(x) CRT exporters shall file with EPA no later than March 1 of each year, an annual report summarizing the quantities, in kilograms; frequency of shipment; and ultimate destination(s), i.e., the facility or facilities where the recycling occurs, of all used CRTs exported during the previous calendar year. Such reports shall also include the following:

(A) The name; EPA ID number, if applicable; and mailing and site address of the exporter;

(B) The calendar year covered by the report;

(C) A certification signed by the CRT exporter that states: "I certify under penalty of law that I have personally examined and am familiar with the information submitted in this and all attached documents and that, based on my inquiry of those individuals immediately responsible for obtaining this information, I believe that the submitted information is true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment."

(xi) Prior to one year after the AES filing compliance date, annual reports must be sent to the following mailing address: Office of Enforcement and Compliance Assurance, Office of Federal Activities, International Compliance Assurance Division, (Mail Code 2254A), Environmental Protection Agency, 1200 Pennsylvania Ave. NW., Washington, DC 20460. Hand-delivered annual reports on used CRTs exported during 2016 should be sent to: Office of Enforcement and Compliance Assurance, Office of Federal Activities, International Compliance Assurance Division, (Mail Code 2254A), Environmental Protection Agency, Ariel Rios Bldg., Room 6144, 1200 Pennsylvania Ave. NW., Washington, DC. Subsequently, annual reports must be submitted to the office listed using the allowable methods specified in Subsection R315-261-39(a)(5)(ii). Exporters must keep copies of each annual report for a period of at least three years from the due date of the report. Exporters may satisfy this recordkeeping requirement by retaining electronically submitted annual reports in the CRT exporter's account on EPA's Waste Import Export Tracking System (WIETS), or its successor system, provided that a copy is readily available for viewing and production if requested by any EPA or authorized Utah inspector. No CRT exporter may be held liable for the inability to produce an annual report for inspection under Section R315-261-39 if the CRT exporter can demonstrate that the inability to produce the annual report is due exclusively to technical difficulty with EPA's Waste Import Export Tracking System (WIETS), or its successor system for which the CRT Exporter bears no responsibility.

(b) Requirements for used CRT processing: Used, broken CRTs undergoing CRT processing as defined in Section R315-260-10 are not solid wastes if they meet the following requirements:

(1) Storage. Used, broken CRTs undergoing processing are subject to the requirement of Subsection R315-261-39(a)(4).

(2) Processing.

(i) All activities specified in Subsections (ii) and (iii) of the definition of CRT Processing in Section R315-260-10 shall be performed within a building with a roof, floor, and walls; and

(ii) No activities may be performed that use temperatures high enough to volatilize lead from CRTs.

(c) Processed CRT glass sent to CRT glass making or lead smelting: Glass from used CRTs that is destined for recycling at a CRT glass manufacturer or a lead smelter after processing is not a solid waste unless it is speculatively accumulated as defined in Subsection R315-261-1(c)(8).

(d) Use constituting disposal: Glass from used CRTs that is used in a manner constituting disposal shall comply with the requirements of Section R315-266-20 through 23 instead of the requirements of Section R315-261-39.

R315-261-40. Exclusions and Exemptions - Conditional Exclusion for Used, Intact Cathode Ray Tubes (CRTs) Exported for Recycling.

Used, intact CRTs exported for recycling are not solid wastes if they meet the notice and consent conditions of Subsection R315-261-39(a)(5), and if they are not speculatively accumulated as defined in Subsection R315-261-1(c)(8).

R315-261-41. Exclusions and Exemptions - Notification and Recordkeeping for Used, Intact Cathode Ray Tubes (CRTs) Exported for Reuse.

(a) CRT exporters who export used, intact CRTs for reuse shall send a notification to EPA. This notification may cover export activities extending over a 12 month or lesser period.

(1) The notification shall be in writing, signed by the exporter, and include the following information:

(i) Name, mailing address, telephone number, and EPA ID number, if applicable, of the exporter of the used, intact CRTs;

(ii) The estimated frequency or rate at which the used, intact CRTs are to be exported for reuse and the period of time over which they are to be exported;

(iii) The estimated total quantity of used, intact CRTs specified in kilograms;

(iv) All points of entry to and departure from each transit country through which the used, intact CRTs will pass, a description of the approximate length of time the used, intact CRTs will remain in such country, and the nature of their handling while there;

(v) A description of the means by which each shipment of the used, intact CRTs will be transported; e.g., mode of transportation vehicle, air, highway, rail, water, etc.; type(s) of container, drums, boxes, tanks, etc.;

(vi) The name and address of the ultimate destination facility or facilities where the used, intact CRTs will be reused, refurbished, distributed, or sold for reuse and the estimated quantity of used, intact CRTs to be sent to each facility, as well as the name of any alternate destination facility or facilities;

(vii) A description of the manner in which the used, intact CRTs will be reused, including reuse after refurbishment, in the foreign country that will be receiving the used, intact CRTs; and

(viii) A certification signed by the CRT exporter that states: "I certify under penalty of law that the CRTs described in this notice are intact and fully functioning or capable of being functional after refurbishment and that the used CRTs will be reused or refurbished and reused. I certify under penalty of law that I have personally examined and am familiar with the information submitted in this and all attached documents and that, based on my inquiry of those individuals immediately responsible for obtaining the information, I believe that the submitted information is true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment."

(2) Notifications submitted by mail should be sent to the following mailing address: Office of Enforcement and Compliance Assurance, Office of Federal Activities, International Compliance Assurance Division, (Mail Code 2254A), Environmental Protection Agency, 1200 Pennsylvania Ave. NW., Washington, DC 20460. Hand-delivered notifications should be sent to: Office of Enforcement and Compliance Assurance, Office of Federal Activities, International Compliance Assurance Division, (Mail Code 2254A), Environmental Protection Agency, William Jefferson Clinton Building, Room 6144, 1200 Pennsylvania Ave. NW., Washington, DC 20004. In both cases, the following shall be

prominently displayed on the front of the envelope: "Attention: Notification of Intent to Export CRTs."

(b) CRT exporters of used, intact CRTs sent for reuse shall keep copies of normal business records, such as contracts, demonstrating that each shipment of exported used, intact CRTs will be reused. This documentation shall be retained for a period of at least three years from the date the CRTs were exported. If the documents are written in a language other than English, CRT exporters of used, intact CRTs sent for reuse shall provide both the original, non-English version of the normal business records as well as a third-party translation of the normal business records into English within 30 days upon request by EPA.

R315-261-140. Financial Requirements for Management of Excluded Hazardous Secondary Materials - Applicability.

(a) The requirements of Sections R315-261-140 through 143 and R315-261-147 through 151 and Appendix I to R315-261 apply to owners or operators of reclamation and intermediate facilities managing hazardous secondary materials excluded under Subsection R315-261-4(a)(24), except as provided otherwise in Subsection R315-261-140(b).

(b) States and the Federal government are exempt from the financial assurance requirements of Sections R315-261-140 through 143and R315-261-147 through 151.

R315-261-141. Financial Requirements for Management of Excluded Hazardous Secondary Materials - Definitions of Terms as Used in Sections R315-261-140 Through 151.

The terms defined in 40 CFR 265.141(d), (f), (g), and (h), which are adopted by reference, have the same meaning in Sections R315-140 through 143 and R315-261-147 through 151 as they do in 40 CFR 265.141, which is adopted by reference.

R315-261-142. Financial Requirements for Management of Excluded Hazardous Secondary Materials - Cost Estimate.

(a) The owner or operator shall have a detailed written estimate, in current dollars, of the cost of disposing of any hazardous secondary material as listed or characteristic hazardous waste, and the potential cost of closing the facility as a treatment, storage, and disposal facility.

(1) The estimate shall equal the cost of conducting the activities described in Subsection R315-261-142(a) at the point when the extent and manner of the facility's operation would make these activities the most expensive; and

(2) The cost estimate shall be based on the costs to the owner or operator of hiring a third party to conduct these activities. A third party is a party who is neither a parent nor a subsidiary of the owner or operator. See definition of parent corporation in 40 CFR 265.141(d), which is adopted by reference. The owner or operator may use costs for on-site disposal in accordance with applicable requirements if he can demonstrate that on-site disposal capacity will exist at all times over the life of the facility.

(3) The cost estimate may not incorporate any salvage value that may be realized with the sale of hazardous secondary materials, or hazardous or non-hazardous wastes if applicable under 40 CFR 265.113(d), which is adopted by reference; facility structures or equipment, land, or other assets associated with the facility.

(4) The owner or operator may not incorporate a zero cost for hazardous secondary materials, or hazardous or non-hazardous wastes if applicable under 40 CFR 265.113(d), which is adopted by reference, that might have economic value.

(b) During the active life of the facility, the owner or operator shall adjust the cost estimate for inflation within 60 days prior to the anniversary date of the establishment of the financial instrument(s) used to comply with Section R315-261-143. For owners and operators using the financial test or corporate guarantee, the cost estimate shall be updated for inflation within 30 days after the close of the firm's fiscal year and before submission of updated information to the Director as specified in Subsection R315-261-143(e)(3). The adjustment may be made by recalculating the cost estimate in current dollars, or by using an inflation factor derived from the most recent Implicit Price Deflator for Gross National Product published by the U.S. Department of Commerce in its Survey of Current Business, as specified in Subsections R315-261-142(b)(1) and (2). The inflation factor is the result of dividing the latest published annual Deflator by the Deflator for the previous year.

(1) The first adjustment is made by multiplying the cost estimate by the inflation factor. The result is the adjusted cost estimate.

(2) Subsequent adjustments are made by multiplying the latest adjusted cost estimate by the latest inflation factor.

(c) During the active life of the facility, the owner or operator shall revise the cost estimate no later than 30 days after a change in a facility's operating plan or design that would increase the costs of conducting the activities described in Subsection R315-261-142(a) or no later than 60 days after an unexpected event which increases the cost of conducting the activities described in Subsection R315-261-142(a). The revised cost estimate shall be adjusted for inflation as specified in Subsection R315-261-142(b).

(d) The owner or operator shall keep the following at the facility during the operating life of the facility: The latest cost estimate prepared in accordance with Subsections R315-261-142(a) and (c) and, when this estimate has been adjusted in accordance with Subsection R315-261-142(b), the latest adjusted cost estimate.

R315-261-143. Financial Requirements for Management of Excluded Hazardous Secondary Materials - Financial Assurance Condition.

As provided in Subsection R315-261-4(a)(24)(vi)(F), an owner or operator of a reclamation or intermediate facility shall have financial assurance as a condition of the exclusion as required under Subsection R315-261-4(a)(24). He shall choose from the options as specified in Subsections R315-261-143(a) through (e).

(a) Trust fund.

(1) An owner or operator may satisfy the requirements of Section R315-261-143 by establishing a trust fund which conforms to the requirements of Subsection R315-261-143(a) and submitting an originally signed duplicate of the trust agreement to the Director. The trustee shall be an entity which has the authority to act as a trustee and whose trust operations are regulated and examined by a Federal or State agency.

(2) The wording of the trust agreement shall be identical to the wording specified in Subsection R315-261-151(a)(1), and the trust agreement shall be accompanied by a formal certification of acknowledgment, for example, see Subsection R315-261-151(a)(2). Schedule A of the trust agreement shall be updated within 60 days after a change in the amount of the current cost estimate covered by the agreement.

(3) The trust fund shall be funded for the full amount of the current cost estimate before it may be relied upon to satisfy the requirements of Section R315-261-143.

(4) Whenever the current cost estimate changes, the owner or operator shall compare the new estimate with the trustee's most recent annual valuation of the trust fund. If the value of the fund is less than the amount of the new estimate, the owner or operator, within 60 days after the change in the cost estimate, shall either deposit an amount into the fund so that its value after this deposit at least equals the amount of the current cost estimate, or obtain other financial assurance as specified in Section R315-261-143 to cover the difference.

(5) If the value of the trust fund is greater than the total amount of the current cost estimate, the owner or operator may submit a written request to the Director for release of the amount in excess of the current cost estimate.

(6) If an owner or operator substitutes other financial assurance as specified in Section R315-261-143 for all or part of the trust fund, he may submit a written request to the Director for release of the amount in excess of the current cost estimate covered by the trust fund.

(7) Within 60 days after receiving a request from the owner or operator for release of funds as specified in Subsections R315-261-143(a)(5) or (6), the Director shall instruct the trustee to release to the owner or operator such funds as the Director specifies in writing. If the owner or operator begins final closure under Sections R315-264-110 through 120 or 40 CFR 265.110 through 121, which is adopted by reference; an owner or operator may request reimbursements for partial or final closure expenditures by submitting itemized bills to the Director. The owner or operator may request reimbursements for partial closure only if sufficient funds are remaining in the trust fund to cover the maximum costs of closing the facility over its remaining operating life. No later than 60 days after receiving bills for partial or final closure activities, the Director shall instruct the trustee to make reimbursements in those amounts as the Director specifies in writing, if the Director determines that the partial or final closure expenditures are in accordance with the approved closure plan, or otherwise justified. If the Director has reason to believe that the maximum cost of closure over the remaining life of the facility will be significantly greater than the value of the trust fund, he may withhold reimbursements of such amounts as he deems prudent until he determines, in accordance with 40 CFR 265.143(i), which is adopted by reference, that the owner or operator is no longer required to maintain financial assurance for final closure of the facility. If the Director does not instruct the trustee to make such reimbursements, he shall provide to the owner or operator a detailed written statement of reasons.

(8) The Director shall agree to termination of the trust when:

(i) An owner or operator substitutes alternate financial assurance as specified in Section R315-261-143; or

(ii) The Director releases the owner or operator from the requirements of Section R315-261-143 in accordance with Subsection R315-261-143(i).

(b) Surety bond guaranteeing payment into a trust fund.

(1) An owner or operator may satisfy the requirements of Section R315-261-143 by obtaining a surety bond which conforms to the requirements of Subsection R315-261-143(b) and submitting the bond to the Director. The surety company issuing the bond shall, at a minimum, be among those listed as acceptable sureties on Federal bonds in Circular 570 of the U.S. Department of the Treasury.

(2) The wording of the surety bond shall be identical to the wording specified in Subsection R315-261-151(b).

(3) The owner or operator who uses a surety bond to satisfy the requirements of Section R315-261-143 shall also establish a standby trust fund. Under the terms of the bond, all payments made thereunder shall be deposited by the surety directly into the standby trust fund in accordance with instructions from the Director. This standby trust fund shall meet the requirements specified in Subsection R315-261-143(a), except that:

(i) An originally signed duplicate of the trust agreement shall be submitted to the Director with the surety bond; and

(ii) Until the standby trust fund is funded pursuant to the requirements of Section R315-261-143, the following are not required by these regulations:

(A) Payments into the trust fund as specified in Subsection R315-261-143(a);

(B) Updating of Schedule A of the trust agreement, see Subsection R315-261-151(a), to show current cost estimates;

(C) Annual valuations as required by the trust agreement; and

(D) Notices of nonpayment as required by the trust agreement.

(4) The bond shall guarantee that the owner or operator shall:

(i) Fund the standby trust fund in an amount equal to the penal sum of the bond before loss of the exclusion under Subsection R315-261-4(a)(24) or

(ii) Fund the standby trust fund in an amount equal to the penal sum within 15 days after an administrative order to begin closure issued by the Director becomes final, or within 15 days after an order to begin closure is issued by a U.S. district court or other court of competent jurisdiction; or

(iii) Provide alternate financial assurance as specified in Section R315-261-143, and obtain the Director's written approval of the assurance provided, within 90 days after receipt by both the owner or operator and the Director of a notice of cancellation of the bond from the surety.

(5) Under the terms of the bond, the surety shall become liable on the bond obligation when the owner or operator fails to perform as guaranteed by the bond.

(6) The penal sum of the bond shall be in an amount at least equal to the current cost estimate, except as provided in Subsection R315-261-143(f).

(7) Whenever the current cost estimate increases to an amount greater than the penal sum, the owner or operator, within 60 days after the increase, shall either cause the penal sum to be increased to an amount at least equal to the current cost estimate and submit evidence of such increase to the Director, or obtain other financial assurance as specified in Section R315-261-143 to cover the increase. Whenever the current cost estimate decreases, the penal sum may be reduced to the amount of the current cost estimate following written approval by the Director.

(8) Under the terms of the bond, the surety may cancel the bond by sending notice of cancellation by certified mail to the owner or operator and to the Director. Cancellation may not occur, however, during the 120 days beginning on the date of receipt of the notice of cancellation by both the owner or operator and the Director, as evidenced by the return receipts.

(9) The owner or operator may cancel the bond if the Director has given prior written consent based on his receipt of evidence of alternate financial assurance as specified in Section R315-261-143.

(c) Letter of credit.

(1) An owner or operator may satisfy the requirements of Section R315-261-143 by obtaining an irrevocable standby letter of credit which conforms to the requirements of Subsection R315-261-143(c) and submitting the letter to the Director. The issuing institution shall be an entity which has the authority to issue letters of credit and whose letter-of-credit operations are regulated and examined by a Federal or State agency.

(2) The wording of the letter of credit shall be identical to the wording specified in Subsection R315-261-151(c).

(3) An owner or operator who uses a letter of credit to satisfy the requirements of Section R315-261-143 shall also establish a standby trust fund. Under the terms of the letter of credit, all amounts paid pursuant to a draft by the Director shall be deposited by the issuing institution directly into the standby trust fund in accordance with instructions from the Director. This standby trust fund shall meet the requirements of the trust fund specified in Subsection R315-261-143(a), except that:

(i) An originally signed duplicate of the trust agreement shall be submitted to the Director with the letter of credit; and

(ii) Unless the standby trust fund is funded pursuant to the

requirements of Section R315-261-143, the following are not required by these regulations:

(A) Payments into the trust fund as specified in Subsection R315-261-143(a);

(B) Updating of Schedule A of the trust agreement, see Subsection R315-261-151(a), to show current cost estimates;

(C) Annual valuations as required by the trust agreement; and

(D) Notices of nonpayment as required by the trust agreement.

(4) The letter of credit shall be accompanied by a letter from the owner or operator referring to the letter of credit by number, issuing institution, and date, and providing the following information: The EPA Identification Number, if any issued; name; and address of the facility; and the amount of funds assured for the facility by the letter of credit.

(5) The letter of credit shall be irrevocable and issued for a period of at least 1 year. The letter of credit shall provide that the expiration date shall be automatically extended for a period of at least 1 year unless, at least 120 days before the current expiration date, the issuing institution notifies both the owner or operator and the Director by certified mail of a decision not to extend the expiration date. Under the terms of the letter of credit, the 120 days will begin on the date when both the owner or operator and the Director have received the notice, as evidenced by the return receipts.

(6) The letter of credit shall be issued in an amount at least equal to the current cost estimate, except as provided in Subsection R315-261-143(f).

(7) Whenever the current cost estimate increases to an amount greater than the amount of the credit, the owner or operator, within 60 days after the increase, shall either cause the amount of the credit to be increased so that it at least equals the current cost estimate and submit evidence of such increase to the Director, or obtain other financial assurance as specified in Section R315-261-143 to cover the increase. Whenever the current cost estimate decreases, the amount of the credit may be reduced to the amount of the current cost estimate following written approval by the Director.

(8) Following a determination by the Director that the hazardous secondary materials do not meet the conditions of the exclusion under Subsection R315-261-4(a)(24), the Director may draw on the letter of credit.

(9) If the owner or operator does not establish alternate financial assurance as specified in Section R315-261-143 and obtain written approval of such alternate assurance from the Director within 90 days after receipt by both the owner or operator and the Director of a notice from the issuing institution that it has decided not to extend the letter of credit beyond the current expiration date, the Director shall draw on the letter of credit. The Director may delay the drawing if the issuing institution grants an extension of the term of the credit. During the last 30 days of any such extension the Director shall draw on the letter of credit if the owner or operator has failed to provide alternate financial assurance as specified in Section R315-261-143 and obtain written approval of such assurance from the Director.

(10) The Director shall return the letter of credit to the issuing institution for termination when:

(i) An owner or operator substitutes alternate financial assurance as specified in Section R315-261-143; or

(ii) The Director releases the owner or operator from the requirements of Section R315-261-143 in accordance with Subsection R315-261-143(i).

(d) Insurance.

(1) An owner or operator may satisfy the requirements of Section R315-261-143 by obtaining insurance which conforms to the requirements of Subsection R315-261-143(d) and submitting a certificate of such insurance to the Director. At a minimum, the insurer shall be licensed to transact the business of insurance, or eligible to provide insurance as an excess or surplus lines insurer, in Utah. (2) The wording of the certificate of insurance shall be identical to the wording specified in Subsection R315-261-151(d).

(3) The insurance policy shall be issued for a face amount at least equal to the current cost estimate, except as provided in subsection R315-261-143(f). The term "face amount" means the total amount the insurer is obligated to pay under the policy. Actual payments by the insurer will not change the face amount, although the insurer's future liability shall be lowered by the amount of the payments.

(4) The insurance policy shall guarantee that funds shall be available whenever needed to pay the cost of removal of all hazardous secondary materials from the unit, to pay the cost of decontamination of the unit, to pay the costs of the performance of activities required under Sections R315-264-110 through 120 or 40 CFR 265.110 through 121, which is adopted by reference; as applicable, for the facilities covered by this policy. The policy shall also guarantee that once funds are needed, the insurer shall be responsible for paying out funds, up to an amount equal to the face amount of the policy, upon the direction of the Director, to such party or parties as the Director specifies.

(5) After beginning partial or final closure under Rules R315-264 or 265, as applicable, an owner or operator or any other authorized person may request reimbursements for closure expenditures by submitting itemized bills to the Director. The owner or operator may request reimbursements only if the remaining value of the policy is sufficient to cover the maximum costs of closing the facility over its remaining operating life. Within 60 days after receiving bills for closure activities, the Director shall instruct the insurer to make reimbursements in such amounts as the Director specifies in writing if the Director determines that the expenditures are in accordance with the approved plan or otherwise justified. If the Director has reason to believe that the maximum cost over the remaining life of the facility will be significantly greater than the face amount of the policy, he may withhold reimbursement of such amounts as he deems prudent until he determines, in accordance with Subsection R315-261-143(h), that the owner or operator is no longer required to maintain financial assurance for the particular facility. If the Director does not instruct the insurer to make such reimbursements, he shall provide to the owner or operator a detailed written statement of reasons.

(6) The owner or operator shall maintain the policy in full force and effect until the Director consents to termination of the policy by the owner or operator as specified in Subsection R315-261-143(i)(10). Failure to pay the premium, without substitution of alternate financial assurance as specified in Section R315-261-143, shall constitute a significant violation of these regulations warranting such remedy as the Director deems necessary. Such violation shall be deemed to begin upon receipt by the Director of a notice of future cancellation, termination, or failure to renew due to nonpayment of the premium, rather than upon the date of expiration.

(7) Each policy shall contain a provision allowing assignment of the policy to a successor owner or operator. Such assignment may be conditional upon consent of the insurer, provided such consent is not unreasonably refused.

(8) The policy shall provide that the insurer may not cancel, terminate, or fail to renew the policy except for failure to pay the premium. The automatic renewal of the policy shall, at a minimum, provide the insured with the option of renewal at the face amount of the expiring policy. If there is a failure to pay the premium, the insurer may elect to cancel, terminate, or fail to renew the policy by sending notice by certified mail to the owner or operator and the Director. Cancellation, termination, or failure to renew may not occur, however, during the 120 days beginning with the date of receipt of the notice by both the

Director and the owner or operator, as evidenced by the return receipts. Cancellation, termination, or failure to renew may not occur and the policy shall remain in full force and effect in the event that on or before the date of expiration:

(i) The Director deems the facility abandoned; or

(ii) Conditional exclusion or interim status is lost, terminated, or revoked; or

(iii) Closure is ordered by the Director or a U.S. district court or other court of competent jurisdiction; or

(iv) The owner or operator is named as debtor in a voluntary or involuntary proceeding under Title 11 (Bankruptcy), U.S. Code; or

(v) The premium due is paid.

(9) Whenever the current cost estimate increases to an amount greater than the face amount of the policy, the owner or operator, within 60 days after the increase, shall either cause the face amount to be increased to an amount at least equal to the current cost estimate and submit evidence of such increase to the Director, or obtain other financial assurance as specified in Section R315-261-143 to cover the increase. Whenever the current cost estimate decreases, the face amount may be reduced to the amount of the current cost estimate following written approval by the Director.

(10) The Director shall give written consent to the owner or operator that he may terminate the insurance policy when:

(i) An owner or operator substitutes alternate financial assurance as specified in Section R315-261-143; or

(ii) The Director releases the owner or operator from the requirements of Section R315-261-143 in accordance with Subsection R315-261-143(i).

(e) Financial test and corporate guarantee.

(1) An owner or operator may satisfy the requirements of Section R315-261-143 by demonstrating that he passes a financial test as specified in Subsection R315-261-143(e). To pass this test the owner or operator shall meet the criteria of either Subsections R315-261-143(e)(1)(i) or (ii):

(i) The owner or operator shall have:

(A) Two of the following three ratios: A ratio of total liabilities to net worth less than 2.0; a ratio of the sum of net income plus depreciation, depletion, and amortization to total liabilities greater than 0.1; and a ratio of current assets to current liabilities greater than 1.5; and

(B) Net working capital and tangible net worth each at least six times the sum of the current cost estimates and the current plugging and abandonment cost estimates; and

(C) Tangible net worth of at least $10 million; and

(D) Assets located in the United States amounting to at least 90 percent of total assets or at least six times the sum of the current cost estimates and the current plugging and abandonment cost estimates.

(ii) The owner or operator shall have:

(A) A current rating for his most recent bond issuance of AAA, AA, A, or BBB as issued by Standard and Poor's or Aaa, Aa, A, or Baa as issued by Moody's; and

(B) Tangible net worth at least six times the sum of the current cost estimates and the current plugging and abandonment cost estimates; and

(C) Tangible net worth of at least $10 million; and

(D) Assets located in the United States amounting to at least 90 percent of total assets or at least six times the sum of the current cost estimates and the current plugging and abandonment cost estimates.

(2) The phrase "current cost estimates" as used in Subsection R315-261-143(e)(1) refers to the cost estimates required to be shown in paragraphs 1-4 of the letter from the owner's or operator's chief financial officer, Subsection R315-261-151(e). The phrase "current plugging and abandonment cost estimates" as used in Subsection R315-261-143(e)(1) refers to the cost estimates required to be shown in paragraphs 1-4 of the letter from the owner's or operator's chief financial officer, 40 CFR 144.70(f).

(3) To demonstrate that he meets this test, the owner or operator shall submit the following items to the Director:

(i) A letter signed by the owner's or operator's chief financial officer and worded as specified in Subsection R315-261-151(e); and

(ii) A copy of the independent certified public accountant's report on examination of the owner's or operator's financial statements for the latest completed fiscal year; and

(iii) If the chief financial officer's letter providing evidence of financial assurance includes financial data showing that the owner or operator satisfies Subsection R315-261-143(e)(1)(i) that are different from the data in the audited financial statements referred to in Subsection R315-261-143(e)(3)(ii) or any other audited financial statement or data filed with the SEC, then a special report from the owner's or operator's independent certified public accountant to the owner or operator is required. The special report shall be based upon an agreed upon procedures engagement in accordance with professional auditing standards and shall describe the procedures performed in comparing the data in the chief financial officer's letter derived from the independently audited, year-end financial statements for the latest fiscal year with the amounts in such financial statements, the findings of the comparison, and the reasons for any differences.

(4) The owner or operator may obtain an extension of the time allowed for submission of the documents specified in Subsection R315-261-143(e)(3) if the fiscal year of the owner or operator ends during the 90 days prior to the effective date of these regulations and if the year-end financial statements for that fiscal year shall be audited by an independent certified public accountant. The extension shall end no later than 90 days after the end of the owner's or operator's fiscal year. To obtain the extension, the owner's or operator's chief financial officer shall send, by the effective date of these regulations, a letter to the Director. This letter from the chief financial officer shall:

(i) Request the extension;

(ii) Certify that he has grounds to believe that the owner or operator meets the criteria of the financial test;

(iii) Specify for each facility to be covered by the test the EPA Identification Number, if any are issued; name; address; and current cost estimates to be covered by the test;

(iv) Specify the date ending the owner's or operator's last complete fiscal year before the effective date of Sections R315-261-140 through 143 and R315-261-147 through 151;

(v) Specify the date, no later than 90 days after the end of such fiscal year, when he shall submit the documents specified in Subsection R315-261-143 (e)(3); and

(vi) Certify that the year-end financial statements of the owner or operator for such fiscal year shall be audited by an independent certified public accountant.

(5) After the initial submission of items specified in Subsection R315-261-143(e)(3), the owner or operator shall send updated information to the Director within 90 days after the close of each succeeding fiscal year. This information shall consist of all three items specified in Subsection R315-261-143(e)(3).

(6) If the owner or operator no longer meets the requirements of Subsection R315-261-143(e)(1), he shall send notice to the Director of intent to establish alternate financial assurance as specified in Section R315-261-143. The notice shall be sent by certified mail within 90 days after the end of the fiscal year for which the year-end financial data show that the owner or operator no longer meets the requirements. The owner or operator shall provide the alternate financial assurance within 120 days after the end of such fiscal year.

(7) The Director may, based on a reasonable belief that the owner or operator may no longer meet the requirements of

Subsection R315-261-143(e)(1), require reports of financial condition at any time from the owner or operator in addition to those specified in Subsection R315-261-143(e)(3). If the Director finds, on the basis of such reports or other information, that the owner or operator no longer meets the requirements of Subsection R315-261-143(e)(1), the owner or operator shall provide alternate financial assurance as specified in Section R315-261-143 within 30 days after notification of such a finding.

(8) The Director may disallow use of this test on the basis of qualifications in the opinion expressed by the independent certified public accountant in his report on examination of the owner's or operator's financial statements, see Subsection R315-261-143(e)(3)(ii). An adverse opinion or a disclaimer of opinion shall be cause for disallowance. The Director shall evaluate other qualifications on an individual basis. The owner or operator shall provide alternate financial assurance as specified in Section R315-261-143 within 30 days after notification of the disallowance.

(9) The owner or operator is no longer required to submit the items specified in Subsection R315-261-143(e)(3) when:

(i) An owner or operator substitutes alternate financial assurance as specified in Section R315-261-143; or

(ii) The Director releases the owner or operator from the requirements of Section R315-261-143 in accordance with Subsection R315-261-143(i).

(10) An owner or operator may meet the requirements of Section R315-261-143 by obtaining a written guarantee. The guarantor shall be the direct or higher-tier parent corporation of the owner or operator, a firm whose parent corporation is also the parent corporation of the owner or operator, or a firm with a "substantial business relationship" with the owner or operator. The guarantor shall meet the requirements for owners or operators in Subsections R315-261-143(e)(1) through (8) and shall comply with the terms of the guarantee. The wording of the guarantee shall be identical to the wording specified in Subsection R315-261-151(g)(1). A certified copy of the guarantee shall accompany the items sent to the Director as specified in Subsection R315-261-143(e)(3). One of these items shall be the letter from the guarantor's chief financial officer. If the guarantor's parent corporation is also the parent corporation of the owner or operator, the letter shall describe the value received in consideration of the guarantee. If the guarantor is a firm with a "substantial business relationship" with the owner or operator, this letter shall describe this "substantial business relationship" and the value received in consideration of the guarantee. The terms of the guarantee shall provide that:

(i) Following a determination by the Director that the hazardous secondary materials at the owner or operator's facility covered by this guarantee do not meet the conditions of the exclusion under Subsection R315-261-4(a)(24), the guarantor shall dispose of any hazardous secondary material as hazardous waste and close the facility in accordance with closure requirements found in Rules R315-264 or 265, as applicable, or establish a trust fund as specified in Subsection R315-261-143(a) in the name of the owner or operator in the amount of the current cost estimate.

(ii) The corporate guarantee shall remain in force unless the guarantor sends notice of cancellation by certified mail to the owner or operator and to the Director. Cancellation may not occur, however, during the 120 days beginning on the date of receipt of the notice of cancellation by both the owner or operator and the Director, as evidenced by the return receipts.

(iii) If the owner or operator fails to provide alternate financial assurance as specified in Section R315-261-143 and obtain the written approval of such alternate assurance from the Director within 90 days after receipt by both the owner or operator and the Director of a notice of cancellation of the corporate guarantee from the guarantor, the guarantor shall provide such alternate financial assurance in the name of the owner or operator.

(f) Use of multiple financial mechanisms. An owner or operator may satisfy the requirements of Section R315-261-143 by establishing more than one financial mechanism per facility. These mechanisms are limited to trust funds, surety bonds, letters of credit, and insurance. The mechanisms shall be as specified in Subsection R315-261-143(a) through (d), except that it is the combination of mechanisms, rather than the single mechanism, which shall provide financial assurance for an amount at least equal to the current cost estimate. If an owner or operator uses a trust fund in combination with a surety bond or a letter of credit, he may use the trust fund as the standby trust fund for the other mechanisms. A single standby trust fund may be established for two or more mechanisms. The Director may use any or all of the mechanisms to provide for the facility.

(g) Use of a financial mechanism for multiple facilities. An owner or operator may use a financial assurance mechanism specified in Section R315-261-143 to meet the requirements of Section R315-261-143 for more than one facility. Evidence of financial assurance submitted to the Director shall include a list showing, for each facility, the EPA Identification Number, if any issued; name; address; and the amount of funds assured by the mechanism. In directing funds available through the mechanism for any of the facilities covered by the mechanism, the Director may direct only the amount of funds designated for that facility, unless the owner or operator agrees to the use of additional funds available under the mechanism.

(h) Removal and Decontamination Plan for Release

(1) An owner or operator of a reclamation facility or an intermediate facility who wishes to be released from his financial assurance obligations under Subsection R315-261-4(a)(24)(vi)(F) shall submit a plan for removing all hazardous secondary material residues to the Director at least 180 days prior to the date on which he expects to cease to operate under the exclusion.

(2) The plan shall include, at least:

(A) For each hazardous secondary materials storage unit subject to financial assurance requirements under Subsection R315-261-4(a)(24)(vi)(F), a description of how all excluded hazardous secondary materials shall be recycled or sent for recycling, and how all residues, contaminated containment systems, liners, etc; contaminated soils; subsoils; structures; and equipment shall be removed or decontaminated as necessary to protect human health and the environment, and

(B) A detailed description of the steps necessary to remove or decontaminate all hazardous secondary material residues and contaminated containment system components, equipment, structures, and soils including, but not limited to, procedures for cleaning equipment and removing contaminated soils, methods for sampling and testing surrounding soils, and criteria for determining the extent of decontamination necessary to protect human health and the environment; and

(C) A detailed description of any other activities necessary to protect human health and the environment during this timeframe, including, but not limited to, leachate collection, run-on and run-off control, etc; and

(D) A schedule for conducting the activities described which, at a minimum, includes the total time required to remove all excluded hazardous secondary materials for recycling and decontaminate all units subject to financial assurance under Subsection R315-261-4(a)(24)(vi)(F) and the time required for intervening activities which will allow tracking of the progress of decontamination.

(3) The Director shall provide the owner or operator and the public, through a newspaper notice, the opportunity to submit written comments on the plan and request modifications to the plan no later than 30 days from the date of the notice. He shall also, in response to a request or at his discretion, hold a

public hearing whenever such a hearing might clarify one or more issues concerning the plan. The Director shall give public notice of the hearing at least 30 days before it occurs. Public notice of the hearing may be given at the same time as notice of the opportunity for the public to submit written comments, and the two notices may be combined. The Director shall approve, modify, or disapprove the plan within 90 days of its receipt. If the Director does not approve the plan, he shall provide the owner or operator with a detailed written statement of reasons for the refusal and the owner or operator shall modify the plan or submit a new plan for approval within 30 days after receiving such written statement. The Director shall approve or modify this plan in writing within 60 days. If the Director modifies the plan, this modified plan becomes the approved plan. The Director shall assure that the approved plan is consistent with Subsection R315-261-143(h). A copy of the modified plan with a detailed statement of reasons for the modifications shall be mailed to the owner or operator.

(4) Within 60 days of completion of the activities described for each hazardous secondary materials management unit, the owner or operator shall submit to the Director, by registered mail, a certification that all hazardous secondary materials have been removed from the unit and the unit has been decontaminated in accordance with the specifications in the approved plan. The certification shall be signed by the owner or operator and by a qualified Professional Engineer. Documentation supporting the Professional Engineer's certification shall be furnished to the Director, upon request, until he releases the owner or operator from the financial assurance requirements for Subsection R315-261-4(a)(24)(vi)(F).

(i) Release of the owner or operator from the requirements of Section R315-261-143. Within 60 days after receiving certifications from the owner or operator and a qualified Professional Engineer that all hazardous secondary materials have been removed from the facility or a unit at the facility and the facility or a unit has been decontaminated in accordance with the approved plan as required in Subsection R315-261-143(h), the Director shall notify the owner or operator in writing that he is no longer required under Subsection R315-261-4(a)(24)(vi)(F) to maintain financial assurance for that facility or a unit at the facility, unless the Director has reason to believe that all hazardous secondary materials have not been removed from the facility or unit at a facility or that the facility or unit has not been decontaminated in accordance with the approved plan. The Director shall provide the owner or operator a detailed written statement of any such reason to believe that all hazardous secondary materials have not been removed from the unit or that the unit has not been decontaminated in accordance with the approved plan.

R315-261-147. Financial Requirements for Management of Excluded Hazardous Secondary Materials - Liability Requirements.

(a) Coverage for sudden accidental occurrences. An owner or operator of a hazardous secondary material reclamation facility or an intermediate facility subject to financial assurance requirements under Subsection R315-261-4(a)(24)(vi)(F), or a group of such facilities, shall demonstrate financial responsibility for bodily injury and property damage to third parties caused by sudden accidental occurrences arising from operations of the facility or group of facilities. The owner or operator shall have and maintain liability coverage for sudden accidental occurrences in the amount of at least $1 million per occurrence with an annual aggregate of at least $2 million, exclusive of legal defense costs. This liability coverage may be demonstrated as specified in Subsections R315-261-147(a)(1), (2), (3), (4), (5), or (6):

(1) An owner or operator may demonstrate the required liability coverage by having liability insurance as specified in Subsection R315-261-147(a).

(i) Each insurance policy shall be amended by attachment of the Hazardous Secondary Material Facility Liability Endorsement, or evidenced by a Certificate of Liability Insurance. The wording of the endorsement shall be identical to the wording specified in Subsection R315-261-151(h). The wording of the certificate of insurance shall be identical to the wording specified in Subsection R315-261-151(i). The owner or operator shall submit a signed duplicate original of the endorsement or the certificate of insurance to the Director. If requested by a Director, the owner or operator shall provide a signed duplicate original of the insurance policy.

(ii) Each insurance policy shall be issued by an insurer which, at a minimum, is licensed to transact the business of insurance, or eligible to provide insurance as an excess or surplus lines insurer in Utah.

(2) An owner or operator may meet the requirements of Section R315-261-147 by passing a financial test or using the guarantee for liability coverage as specified in Subsections R315-261-147(f) and (g).

(3) An owner or operator may meet the requirements of Subsection R315-261-147 by obtaining a letter of credit for liability coverage as specified in Subsection R315-261-147(h).

(4) An owner or operator may meet the requirements of Subsection R315-261-147 by obtaining a surety bond for liability coverage as specified in Subsection R315-261-147(i).

(5) An owner or operator may meet the requirements of Subsection R315-261-147 by obtaining a trust fund for liability coverage as specified in Subsection R315-261-147(j).

(6) An owner or operator may demonstrate the required liability coverage through the use of combinations of insurance, financial test, guarantee, letter of credit, surety bond, and trust fund, except that the owner or operator may not combine a financial test covering part of the liability coverage requirement with a guarantee unless the financial statement of the owner or operator is not consolidated with the financial statement of the guarantor. The amounts of coverage demonstrated shall total at least the minimum amounts required by Subsection R315-261-147. If the owner or operator demonstrates the required coverage through the use of a combination of financial assurances under this paragraph, the owner or operator shall specify at least one such assurance as "primary" coverage and shall specify other assurance as "excess" coverage.

(7) An owner or operator shall notify the Director in writing within 30 days whenever:

(i) A claim results in a reduction in the amount of financial assurance for liability coverage provided by a financial instrument authorized in Subsections R315-261-147(a)(1) through (a)(6); or

(ii) A Certification of Valid Claim for bodily injury or property damages caused by a sudden or non-sudden accidental occurrence arising from the operation of a hazardous secondary material reclamation facility or intermediate facility is entered between the owner or operator and third-party claimant for liability coverage under Subsections R315-261-147(a)(1) through (a)(6); or

(iii) A final court order establishing a judgment for bodily injury or property damage caused by a sudden or non-sudden accidental occurrence arising from the operation of a hazardous secondary material reclamation facility or intermediate facility is issued against the owner or operator or an instrument that is providing financial assurance for liability coverage under Subsections R315-261-147(a)(1) through (a)(6).

(b) Coverage for nonsudden accidental occurrences. An owner or operator of a hazardous secondary material reclamation facility or intermediate facility with land-based units, as defined in Section R315-260-10, which are used to manage hazardous secondary materials excluded under

Subsection R315-261-4(a)(24) or a group of such facilities, shall demonstrate financial responsibility for bodily injury and property damage to third parties caused by nonsudden accidental occurrences arising from operations of the facility or group of facilities. The owner or operator shall have and maintain liability coverage for nonsudden accidental occurrences in the amount of at least $3 million per occurrence with an annual aggregate of at least $6 million, exclusive of legal defense costs. An owner or operator who shall meet the requirements of Section R315-261-147 may combine the required per-occurrence coverage levels for sudden and nonsudden accidental occurrences into a single per-occurrence level, and combine the required annual aggregate coverage levels for sudden and nonsudden accidental occurrences into a single annual aggregate level. Owners or operators who combine coverage levels for sudden and nonsudden accidental occurrences shall maintain liability coverage in the amount of at least $4 million per occurrence and $8 million annual aggregate. This liability coverage may be demonstrated as specified in Subsections R315-261-147(b)(1), (2), (3), (4), (5), or (6):

(1) An owner or operator may demonstrate the required liability coverage by having liability insurance as specified in Subsection R315-261-147.

(i) Each insurance policy shall be amended by attachment of the Hazardous Secondary Material Facility Liability Endorsement or evidenced by a Certificate of Liability Insurance. The wording of the endorsement shall be identical to the wording specified in Subsection R315-261-151(h). The wording of the certificate of insurance shall be identical to the wording specified in Subsection R315-261-151(i). The owner or operator shall submit a signed duplicate original of the endorsement or the certificate of insurance to the Director.

(ii) Each insurance policy shall be issued by an insurer which, at a minimum, is licensed to transact the business of insurance, or eligible to provide insurance as an excess or surplus lines insurer in Utah.

(2) An owner or operator may meet the requirements of Section R315-261-147 by passing a financial test or using the guarantee for liability coverage as specified in Subsections R315-261-147(f) and (g).

(3) An owner or operator may meet the requirements of Subsection R315-261-147 by obtaining a letter of credit for liability coverage as specified in Subsection R315-261-147(h).

(4) An owner or operator may meet the requirements of Section R315-261-147 by obtaining a surety bond for liability coverage as specified in Subsection R315-261-147(i).

(5) An owner or operator may meet the requirements of Subsection R315-261-147 by obtaining a trust fund for liability coverage as specified in Subsection R315-261-147(j).

(6) An owner or operator may demonstrate the required liability coverage through the use of combinations of insurance, financial test, guarantee, letter of credit, surety bond, and trust fund, except that the owner or operator may not combine a financial test covering part of the liability coverage requirement with a guarantee unless the financial statement of the owner or operator is not consolidated with the financial statement of the guarantor. The amounts of coverage demonstrated shall total at least the minimum amounts required by Section R315-261-147. If the owner or operator demonstrates the required coverage through the use of a combination of financial assurances under Subsection R315-261-147(b), the owner or operator shall specify at least one such assurance as "primary" coverage and shall specify other assurance as "excess" coverage.

(7) An owner or operator shall notify the Director in writing within 30 days whenever:

(i) A claim results in a reduction in the amount of financial assurance for liability coverage provided by a financial instrument authorized in Subsections R315-261-147(b)(1) through (b)(6); or

(ii) A Certification of Valid Claim for bodily injury or property damages caused by a sudden or non-sudden accidental occurrence arising from the operation of a hazardous secondary material treatment and/or storage facility is entered between the owner or operator and third-party claimant for liability coverage under Subsection R315-261-147(b)(1) through (b)(6); or

(iii) A final court order establishing a judgment for bodily injury or property damage caused by a sudden or non-sudden accidental occurrence arising from the operation of a hazardous secondary material treatment and/or storage facility is issued against the owner or operator or an instrument that is providing financial assurance for liability coverage under Subsections R315-261-147(b)(1) through (b)(6).

(c) Request for alternative. If an owner or operator can demonstrate to the satisfaction of the Director that the levels of financial responsibility required by Subsection R315-261-147(a) or (b) are not consistent with the degree and duration of risk associated with treatment and/or storage at the facility or group of facilities, the owner or operator may obtain an alternative financial liability requirement from the Director. The request for an alternative financial liability requirement shall be submitted in writing to the Director. If granted, the alternative financial liability requirement shall take the form of an adjusted level of required liability coverage, such level to be based on the Director's assessment of the degree and duration of risk associated with the ownership or operation of the facility or group of facilities. The Director may require an owner or operator who requests an alternative financial liability requirement to provide such technical and engineering information as is deemed necessary by the Director to determine a level of financial responsibility other than that required by Subsection R315-261-147(a) or (b).

(d) Adjustments by the Director. If the Director determines that the levels of financial responsibility required by Subsections R315-261-147(a) or (b) are not consistent with the degree and duration of risk associated with treatment and/or storage at the facility or group of facilities, the Director may adjust the level of financial responsibility required under Subsections R315-261-147(a) or (b) as may be necessary to protect human health and the environment. This adjusted level shall be based on the Director's assessment of the degree and duration of risk associated with the ownership or operation of the facility or group of facilities. In addition, if the Director determines that there is a significant risk to human health and the environment from nonsudden accidental occurrences resulting from the operations of a facility that is not a surface impoundment, pile, or land treatment facility, he may require that an owner or operator of the facility comply with Subsection R315-261-147(b). An owner or operator shall furnish to the Director, within a reasonable time, any information which the Director requests to determine whether cause exists for such adjustments of level or type of coverage.

(e) Period of coverage. Within 60 days after receiving certifications from the owner or operator and a qualified Professional Engineer that all hazardous secondary materials have been removed from the facility or a unit at the facility and the facility or a unit has been decontaminated in accordance with the approved plan per Subsection R315-261-143(h), the Director shall notify the owner or operator in writing that he is no longer required under Subsection R315-261-4(a)(24)(vi)(F) to maintain liability coverage for that facility or a unit at the facility, unless the Director has reason to believe that that all hazardous secondary materials have not been removed from the facility or unit at a facility or that the facility or unit has not been decontaminated in accordance with the approved plan.

(f) Financial test for liability coverage.

(1) An owner or operator may satisfy the requirements of Section R315-261-147 by demonstrating that he passes a financial test as specified in this paragraph. To pass this test the

owner or operator shall meet the criteria of Subsections R315-261-147(f)(1)(i) or (ii):

(i) The owner or operator shall have:

(A) Net working capital and tangible net worth each at least six times the amount of liability coverage to be demonstrated by this test; and

(B) Tangible net worth of at least $10 million; and

(C) Assets in the United States amounting to either:

(I) At least 90 percent of his total assets; or

(II) at least six times the amount of liability coverage to be demonstrated by this test.

(ii) The owner or operator shall have:

(A) A current rating for his most recent bond issuance of AAA, AA, A, or BBB as issued by Standard and Poor's, or Aaa, Aa, A, or Baa as issued by Moody's; and

(B) Tangible net worth of at least $10 million; and

(C) Tangible net worth at least six times the amount of liability coverage to be demonstrated by this test; and

(D) Assets in the United States amounting to either:

(I) At least 90 percent of his total assets; or

(II) at least six times the amount of liability coverage to be demonstrated by this test.

(2) The phrase "amount of liability coverage" as used in Subsection R315-261-147(f)(1) refers to the annual aggregate amounts for which coverage is required under Subsections R315-261-147(a) and (b) and the annual aggregate amounts for which coverage is required under Subsections R315-264-147(a) and (b) and 40 CFR 265.147(a) and(b), which are adopted by reference,.

(3) To demonstrate that he meets this test, the owner or operator shall submit the following three items to the Director:

(i) A letter signed by the owner's or operator's chief financial officer and worded as specified in Subsection R315-261-151(f). If an owner or operator is using the financial test to demonstrate both assurance as specified by Subsection R315-261-143(e), and liability coverage, he shall submit the letter specified in Subsection R315-261-151(f) to cover both forms of financial responsibility; a separate letter as specified in Subsection R315-261-151(e) is not required.

(ii) A copy of the independent certified public accountant's report on examination of the owner's or operator's financial statements for the latest completed fiscal year.

(iii) If the chief financial officer's letter providing evidence of financial assurance includes financial data showing that the owner or operator satisfies Subsection R315-261-147(f)(1)(i) that are different from the data in the audited financial statements referred to in Subsection R315-261-147(f)(3)(ii) or any other audited financial statement or data filed with the SEC, then a special report from the owner's or operator's independent certified public accountant to the owner or operator is required. The special report shall be based upon an agreed upon procedures engagement in accordance with professional auditing standards and shall describe the procedures performed in comparing the data in the chief financial officer's letter derived from the independently audited, year-end financial statements for the latest fiscal year with the amounts in such financial statements, the findings of the comparison, and the reasons for any difference.

(4) The owner or operator may obtain a one-time extension of the time allowed for submission of the documents specified in Subsection R315-261-147(f)(3) if the fiscal year of the owner or operator ends during the 90 days prior to the effective date of these regulations and if the year-end financial statements for that fiscal year shall be audited by an independent certified public accountant. The extension shall end no later than 90 days after the end of the owner's or operator's fiscal year. To obtain the extension, the owner's or operator's chief financial officer shall send, by the effective date of these regulations, a letter to the Director. This letter from the chief financial officer shall:

(i) Request the extension;

(ii) Certify that he has grounds to believe that the owner or operator meets the criteria of the financial test;

(iii) Specify for each facility to be covered by the test the EPA Identification Number, name, address, the amount of liability coverage and, when applicable, current closure and post-closure cost estimates to be covered by the test;

(iv) Specify the date ending the owner's or operator's last complete fiscal year before the effective date of these regulations;

(v) Specify the date, no later than 90 days after the end of such fiscal year, when he will submit the documents specified in Subsection R315-261-147(f)(3); and

(vi) Certify that the year-end financial statements of the owner or operator for such fiscal year will be audited by an independent certified public accountant.

(5) After the initial submission of items specified in Subsection R315-261-147(f)(3), the owner or operator shall send updated information to the Director within 90 days after the close of each succeeding fiscal year. This information shall consist of all three items specified in Subsection R315-261-147(f)(3).

(6) If the owner or operator no longer meets the requirements of Subsection R315-261-147(f)(1), he shall obtain insurance, a letter of credit, a surety bond, a trust fund, or a guarantee for the entire amount of required liability coverage as specified in Section R315-261-147. Evidence of liability coverage shall be submitted to the Director within 90 days after the end of the fiscal year for which the year-end financial data show that the owner or operator no longer meets the test requirements.

(7) The Director may disallow use of this test on the basis of qualifications in the opinion expressed by the independent certified public accountant in his report on examination of the owner's or operator's financial statements, see Subsection R315-261-147(f)(3)(ii). An adverse opinion or a disclaimer of opinion shall be cause for disallowance. The Director shall evaluate other qualifications on an individual basis. The owner or operator shall provide evidence of insurance for the entire amount of required liability coverage as specified in Section R315-261-147 within 30 days after notification of disallowance.

(g) Guarantee for liability coverage.

(1) Subject to Subsection R315-261-147(g)(2), an owner or operator may meet the requirements of Section R315-261-147 by obtaining a written guarantee, hereinafter referred to as "guarantee." The guarantor shall be the direct or higher-tier parent corporation of the owner or operator, a firm whose parent corporation is also the parent corporation of the owner or operator, or a firm with a "substantial business relationship" with the owner or operator. The guarantor shall meet the requirements for owners or operators in Subsection R315-261-147(f)(1) through (f)(6). The wording of the guarantee shall be identical to the wording specified in Subsection R315-261-151(g)(2). A certified copy of the guarantee shall accompany the items sent to the Director as specified in Subsection R315-261-147(f)(3). One of these items shall be the letter from the guarantor's chief financial officer. If the guarantor's parent corporation is also the parent corporation of the owner or operator, this letter shall describe the value received in consideration of the guarantee. If the guarantor is a firm with a "substantial business relationship" with the owner or operator, this letter shall describe this "substantial business relationship" and the value received in consideration of the guarantee.

(i) If the owner or operator fails to satisfy a judgment based on a determination of liability for bodily injury or property damage to third parties caused by sudden or nonsudden accidental occurrences, or both as the case may be, arising from the operation of facilities covered by this corporate guarantee, or fails to pay an amount agreed to in settlement of claims

arising from or alleged to arise from such injury or damage, the guarantor shall do so up to the limits of coverage.

(2)(i) In the case of corporations incorporated outside the United States, a guarantee may be used to satisfy the requirements of Section R315-261-147 only if the non-U.S. corporation has identified a registered agent for service of process in Utah.

(h) Letter of credit for liability coverage.

(1) An owner or operator may satisfy the requirements of Section R315-261-147 by obtaining an irrevocable standby letter of credit that conforms to the requirements of Subsection R315-261-147(h) and submits a copy of the letter of credit to the Director.

(2) The financial institution issuing the letter of credit shall be an entity that has the authority to issue letters of credit and whose letter of credit operations are regulated and examined by a Federal or Utah agency.

(3) The wording of the letter of credit shall be identical to the wording specified in Subsection R315-261-151(j).

(4) An owner or operator who uses a letter of credit to satisfy the requirements of Section R315-261-147 may also establish a standby trust fund. Under the terms of such a letter of credit, all amounts paid pursuant to a draft by the trustee of the standby trust shall be deposited by the issuing institution into the standby trust in accordance with instructions from the trustee. The trustee of the standby trust fund shall be an entity which has the authority to act as a trustee and whose trust operations are regulated and examined by a Federal or Utah agency.

(5) The wording of the standby trust fund shall be identical to the wording specified in Subsection R315-261-151(m).

(i) Surety bond for liability coverage.

(1) An owner or operator may satisfy the requirements of Section R315-261-147 by obtaining a surety bond that conforms to the requirements of Subsection R315-261-147(i) and submitting a copy of the bond to the Director.

(2) The surety company issuing the bond shall be among those listed as acceptable sureties on Federal bonds in the most recent Circular 570 of the U.S. Department of the Treasury.

(3) The wording of the surety bond shall be identical to the wording specified in Subsection R315-261-151(k).

(j) Trust fund for liability coverage.

(1) An owner or operator may satisfy the requirements of Section R315-261-147 by establishing a trust fund that conforms to the requirements of Subsection R315-261-147(j) and submitting an originally signed duplicate of the trust agreement to the Director.

(2) The trustee shall be an entity which has the authority to act as a trustee and whose trust operations are regulated and examined by a Federal or Utah agency.

(3) The trust fund for liability coverage shall be funded for the full amount of the liability coverage to be provided by the trust fund before it may be relied upon to satisfy the requirements of Section R315-261-147. If at any time after the trust fund is created the amount of funds in the trust fund is reduced below the full amount of the liability coverage to be provided, the owner or operator, by the anniversary date of the establishment of the Fund, shall either add sufficient funds to the trust fund to cause its value to equal the full amount of liability coverage to be provided, or obtain other financial assurance as specified in Section R315-261-147 to cover the difference. For purposes of Subsection R315-261-147(j), "the full amount of the liability coverage to be provided" means the amount of coverage for sudden and/or nonsudden occurrences required to be provided by the owner or operator by Section R315-261-147, less the amount of financial assurance for liability coverage that is being provided by other financial assurance mechanisms being used to demonstrate financial assurance by the owner or operator.

(4) The wording of the trust fund shall be identical to the wording specified in Subsection R315-261-151(l).

R315-261-148. Financial Requirements for Management of Excluded Hazardous Secondary Materials - Incapacity of Owners or Operators, Guarantors, or Financial Institutions.

(a) An owner or operator shall notify the Director by certified mail of the commencement of a voluntary or involuntary proceeding under Title 11 (Bankruptcy), U.S. Code, naming the owner or operator as debtor, within 10 days after commencement of the proceeding. A guarantor of a corporate guarantee as specified in Subsection R315-261-143(e) shall make such a notification if he is named as debtor, as required under the terms of the corporate guarantee.

(b) An owner or operator who fulfills the requirements of Sections R315-261-143 or R315-261-147 by obtaining a trust fund, surety bond, letter of credit, or insurance policy shall be deemed to be without the required financial assurance or liability coverage in the event of bankruptcy of the trustee or issuing institution, or a suspension or revocation of the authority of the trustee institution to act as trustee or of the institution issuing the surety bond, letter of credit, or insurance policy to issue such instruments. The owner or operator shall establish other financial assurance or liability coverage within 60 days after such an event.

R315-261-151. Financial Requirements for Management of Excluded Hazardous Secondary Materials -- Wording of the Instruments.

(a)(1) A trust agreement for a trust fund, as specified in Subsection R315-261-143(a) shall be worded as follows, except that instructions in parentheses are to be replaced with the relevant information and the parentheses deleted:

Trust Agreement

Trust Agreement, the "Agreement," entered into as of (date) by and between (name of the owner or operator), a (name of State) (insert "corporation," "partnership," "association," or "proprietorship"), the "Grantor," and (name of corporate trustee), (insert "incorporated in the State of ___-----" or "a national bank"), the "Trustee."

Whereas, the Utah Waste Management and Radiation Control Board of the State of Utah, (the "BOARD") has established certain regulations applicable to the Grantor, requiring that an owner or operator of a facility regulated under Rules R315-264, or 265, or satisfying the conditions of the exclusion under Subsection R315-261-4(a)(24) shall provide assurance that funds shall be available if needed for care of the facility under Sections R315-264-110 through 120 or 40 CFR 265.110 through 121, which are adopted by reference; as applicable,

Whereas, the Grantor has elected to establish a trust to provide all or part of such financial assurance for the facilities identified herein,

Whereas, the Grantor, acting through its duly authorized officers, has selected the Trustee to be the trustee under this agreement, and the Trustee is willing to act as trustee,

Now, Therefore, the Grantor and the Trustee agree as follows:

Section 1. Definitions. As used in this Agreement:

(a) The term "Grantor" means the owner or operator who enters into this Agreement and any successors or assigns of the Grantor.

(b) The term "Trustee" means the Trustee who enters into this Agreement and any successor Trustee.

(c) The term "BOARD", "Waste Management and Radiation Control Board" created pursuant to Utah Code Annotated 19-1-106.

(d) The term "DIRECTOR" means the Director, Division of Waste Management and Radiation Control his successors,

designees, and any subsequent entity of the State of Utah upon whom the duties of regulation and enforcement of regulations governing hazardous waste.

Section 2. Identification of Facilities and Cost Estimates. This Agreement pertains to the facilities and cost estimates identified on attached Schedule A (on Schedule A, for each facility list the EPA Identification Number, if available; name; address; and the current cost estimates, or portions thereof; for which financial assurance is demonstrated by this Agreement).

Section 3. Establishment of Fund. The Grantor and the Trustee hereby establish a trust fund, the "Fund," for the benefit of the Director in the event that the hazardous secondary materials of the grantor no longer meet the conditions of the exclusion under Subsection R315-261-4(a)(24). The Grantor and the Trustee intend that no third party have access to the Fund except as herein provided. The Fund is established initially as consisting of the property, which is acceptable to the Trustee, described in Schedule B attached hereto. Such property and any other property subsequently transferred to the Trustee is referred to as the Fund, together with all earnings and profits thereon, less any payments or distributions made by the Trustee pursuant to this Agreement. The Fund shall be held by the Trustee, IN TRUST, as hereinafter provided. The Trustee shall not be responsible nor shall it undertake any responsibility for the amount or adequacy of, nor any duty to collect from the Grantor, any payments necessary to discharge any liabilities of the Grantor established by Director.

Section 4. Payments from the Fund. The Trustee shall make payments from the Fund as the Director shall direct, in writing, to provide for the payment of the costs of the performance of activities required under Sections R315-264-110 through 120 or 40 CFR 265.110 through 121, which are adopted by reference, for the facilities covered by this Agreement. The Trustee shall reimburse the Grantor or other persons as specified by the Director from the Fund for expenditures for such activities in such amounts as the beneficiary shall direct in writing. In addition, the Trustee shall refund to the Grantor such amounts as the Director specifies in writing. Upon refund, such funds shall no longer constitute part of the Fund as defined herein.

Section 5. Payments Comprising the Fund. Payments made to the Trustee for the Fund shall consist of cash or securities acceptable to the Trustee.

Section 6. Trustee Management. The Trustee shall invest and reinvest the principal and income of the Fund and keep the Fund invested as a single fund, without distinction between principal and income, in accordance with general investment policies and guidelines which the Grantor may communicate in writing to the Trustee from time to time, subject, however, to the provisions of this section. In investing, reinvesting, exchanging, selling, and managing the Fund, the Trustee shall discharge his duties with respect to the trust fund solely in the interest of the beneficiary and with the care, skill, prudence, and diligence under the circumstances then prevailing which persons of prudence, acting in a like capacity and familiar with such matters, would use in the conduct of an enterprise of a like character and with like aims; except that:

(i) Securities or other obligations of the Grantor, or any other owner or operator of the facilities, or any of their affiliates as defined in the Investment Company Act of 1940, as amended, 15 U.S.C. 80a-2.(a), shall not be acquired or held, unless they are securities or other obligations of the Federal or a State government;

(ii) The Trustee is authorized to invest the Fund in time or demand deposits of the Trustee, to the extent insured by an agency of the Federal or State government; and

(iii) The Trustee is authorized to hold cash awaiting investment or distribution uninvested for a reasonable time and without liability for the payment of interest thereon.

Section 7. Commingling and Investment. The Trustee is expressly authorized in its discretion:

(a) To transfer from time to time any or all of the assets of the Fund to any common, commingled, or collective trust fund created by the Trustee in which the Fund is eligible to participate, subject to all of the provisions thereof, to be commingled with the assets of other trusts participating therein; and

(b) To purchase shares in any investment company registered under the Investment Company Act of 1940, 15 U.S.C. 80a-1 et seq., including one which may be created, managed, underwritten, or to which investment advice is rendered or the shares of which are sold by the Trustee. The Trustee may vote such shares in its discretion.

Section 8. Express Powers of Trustee. Without in any way limiting the powers and discretions conferred upon the Trustee by the other provisions of this Agreement or by law, the Trustee is expressly authorized and empowered:

(a) To sell, exchange, convey, transfer, or otherwise dispose of any property held by it, by public or private sale. No person dealing with the Trustee shall be bound to see to the application of the purchase money or to inquire into the validity or expediency of any such sale or other disposition;

(b) To make, execute, acknowledge, and deliver any and all documents of transfer and conveyance and any and all other instruments that may be necessary or appropriate to carry out the powers herein granted;

(c) To register any securities held in the Fund in its own name or in the name of a nominee and to hold any security in bearer form or in book entry, or to combine certificates representing such securities with certificates of the same issue held by the Trustee in other fiduciary capacities, or to deposit or arrange for the deposit of such securities in a qualified central depositary even though, when so deposited, such securities may be merged and held in bulk in the name of the nominee of such depositary with other securities deposited therein by another person, or to deposit or arrange for the deposit of any securities issued by the United States Government, or any agency or instrumentality thereof, with a Federal Reserve bank, but the books and records of the Trustee shall at all times show that all such securities are part of the Fund;

(d) To deposit any cash in the Fund in interest-bearing accounts maintained or savings certificates issued by the Trustee, in its separate corporate capacity, or in any other banking institution affiliated with the Trustee, to the extent insured by an agency of the Federal or State government; and

(e) To compromise or otherwise adjust all claims in favor of or against the Fund.

Section 9. Taxes and Expenses. All taxes of any kind that may be assessed or levied against or in respect of the Fund and all brokerage commissions incurred by the Fund shall be paid from the Fund. All other expenses incurred by the Trustee in connection with the administration of this Trust, including fees for legal services rendered to the Trustee, the compensation of the Trustee to the extent not paid directly by the Grantor, and all other proper charges and disbursements of the Trustee shall be paid from the Fund.

Section 10. Annual Valuation. The Trustee shall annually, at least 30 days prior to the anniversary date of establishment of the Fund, furnish to the Grantor and to the Director a statement confirming the value of the Trust. Any securities in the Fund shall be valued at market value as of no more than 60 days prior to the anniversary date of establishment of the Fund. The failure of the Grantor to object in writing to the Trustee within 90 days after the statement has been furnished to the Grantor and the Director shall constitute a conclusively binding assent by the Grantor, barring the Grantor from asserting any claim or liability against the Trustee with respect to matters disclosed in the statement.

Section 11. Advice of Counsel. The Trustee may from time to time consult with counsel, who may be counsel to the Grantor, with respect to any question arising as to the construction of this Agreement or any action to be taken hereunder. The Trustee shall be fully protected, to the extent permitted by law, in acting upon the advice of counsel.

Section 12. Trustee Compensation. The Trustee shall be entitled to reasonable compensation for its services as agreed upon in writing from time to time with the Grantor.

Section 13. Successor Trustee. The Trustee may resign or the Grantor may replace the Trustee, but such resignation or replacement shall not be effective until the Grantor has appointed a successor trustee and this successor accepts the appointment. The successor trustee shall have the same powers and duties as those conferred upon the Trustee hereunder. Upon the successor trustee's acceptance of the appointment, the Trustee shall assign, transfer, and pay over to the successor trustee the funds and properties then constituting the Fund. If for any reason the Grantor cannot or does not act in the event of the resignation of the Trustee, the Trustee may apply to a court of competent jurisdiction for the appointment of a successor trustee or for instructions. The successor trustee shall specify the date on which it assumes administration of the trust in a writing sent to the Grantor, the Diector, and the present Trustee by certified mail 10 days before such change becomes effective. Any expenses incurred by the Trustee as a result of any of the acts contemplated by this Section shall be paid as provided in Section 9.

Section 14. Instructions to the Trustee. All orders, requests, and instructions by the Grantor to the Trustee shall be in writing, signed by such persons as are designated in the attached Exhibit A or such other designees as the Grantor may designate by amendment to Exhibit A. The Trustee shall be fully protected in acting without inquiry in accordance with the Grantor's orders, requests, and instructions. All orders, requests, and instructions by the Director to the Trustee shall be in writing, signed by the Director, and the Trustee shall act and shall be fully protected in acting in accordance with such orders, requests, and instructions. The Trustee shall have the right to assume, in the absence of written notice to the contrary, that no event constituting a change or a termination of the authority of any person to act on behalf of the Grantor or the Director hereunder has occurred. The Trustee shall have no duty to act in the absence of such orders, requests, and instructions from the Grantor and/or the Director, except as provided for herein.

Section 15. Amendment of Agreement. This Agreement may be amended by an instrument in writing executed by the Grantor, the Trustee, and the Director, or by the Trustee and the Director if the Grantor ceases to exist.

Section 16. Irrevocability and Termination. Subject to the right of the parties to amend this Agreement as provided in Section 16, this Trust shall be irrevocable and shall continue until terminated at the written agreement of the Grantor, the Trustee, and the Director, or by the Trustee and the Direcotr, if the Grantor ceases to exist. Upon termination of the Trust, all remaining trust property, less final trust administration expenses, shall be delivered to the Grantor.

Section 17. Immunity and Indemnification. The Trustee shall not incur personal liability of any nature in connection with any act or omission, made in good faith, in the administration of this Trust, or in carrying out any directions by the Grantor or the Director issued in accordance with this Agreement. The Trustee shall be indemnified and saved harmless by the Grantor or from the Trust Fund, or both, from and against any personal liability to which the Trustee may be subjected by reason of any act or conduct in its official capacity, including all expenses reasonably incurred in its defense in the event the Grantor fails to provide such defense.

Section 18. Choice of Law. This Agreement shall be administered, construed, and enforced according to the laws of the State of (insert name of State).

Section 19. Interpretation. As used in this Agreement, words in the singular include the plural and words in the plural include the singular. The descriptive headings for each Section of this Agreement shall not affect the interpretation or the legal efficacy of this Agreement.

In Witness Whereof the parties have caused this Agreement to be executed by their respective officers duly authorized and their corporate seals to be hereunto affixed and attested as of the date first above written: The parties below certify that the wording of this Agreement is identical to the wording specified in Subsection R315-261-151(a)(1) as such regulations were constituted on the date first above written.

(Signature of Grantor)

(Title)

Attest:

(Title)

(Seal)

(Signature of Trustee)

Attest:

(Title)

(Seal)

(2) The following is an example of the certification of acknowledgment which shall accompany the trust agreement for a trust fund as specified in Subsection R315-261-143(a). State of Utah requirements may differ on the proper content of this acknowledgment.

State of County of On this (date), before me personally came (owner or operator) to me known, who, being by me duly sworn, did depose and say that she/he resides at (address), that she/he is (title) of (corporation), the corporation described in and which executed the above instrument; that she/he knows the seal of said corporation; that the seal affixed to such instrument is such corporate seal; that it was so affixed by order of the Board of Directors of said corporation, and that she/he signed her/his name thereto by like order.

(Signature of Notary Public)

(b) A surety bond guaranteeing payment into a trust fund, as specified in Subsection R315-261-143(b), shall be worded as follows, except that instructions in parentheses are to be replaced with the relevant information and the parentheses deleted:

Financial Guarantee Bond

Date bond executed:

Effective date:

Principal: (legal name and business address of owner or operator)

Type of Organization: (insert "individual," "joint venture," "partnership," or "corporation")

State of incorporation:

Surety(ies): (name(s) and business address(es))

EPA and State Identification Numbers, name, address and amount(s) for each facility guaranteed by this bond:

Total penal sum of bond: $

Surety's bond number:

Know All Persons By These Presents, That we, the Principal and Surety(ies) are firmly bound to the Director of the Division of Waste management and Radiation Control of the State of Utah (hereinafter called the Director) in the event that the hazardous secondary materials at the reclamation or intermediate facility listed below no longer meet the conditions of the exclusion under Subsection R315-261-4(a)(24), in the above penal sum for the payment of which we bind ourselves, our heirs, executors, administrators, successors, and assigns jointly and severally; provided that, where the Surety(ies) are corporations acting as co-sureties, we, the Sureties, bind ourselves in such sum "jointly and severally" only for the purpose of allowing a joint action or actions against any or all

of us, and for all other purposes each Surety binds itself, jointly and severally with the Principal, for the payment of such sum only as is set forth opposite the name of such Surety, but if no limit of liability is indicated, the limit of liability shall be the full amount of the penal sum.

Whereas said Principal is required, under the Utah Solid and Hazardous Waste Act as amended, to have a permit or interim status in order to own or operate each facility identified above, or to meet conditions under Subsection R315-261-4(a)(24), and

Whereas said Principal is required to provide financial assurance as a condition of permit or interim status or as a condition of an exclusion under Subsection R315-261-4(a)(24) and

Whereas said Principal shall establish a standby trust fund as is required when a surety bond is used to provide such financial assurance;

Now, Therefore, the conditions of the obligation are such that if the Principal shall faithfully, before the beginning of final closure of each facility identified above, fund the standby trust fund in the amount(s) identified above for the facility,

Or, if the Principal shall satisfy all the conditions established for exclusion of hazardous secondary materials from coverage as solid waste under Subsection R315-261-4(a)(24),

Or, if the Principal shall fund the standby trust fund in such amount(s) within 15 days after a final order to begin closure is issued by the Director or a U.S. district court or other court of competent jurisdiction,

Or, if the Principal shall provide alternate financial assurance, as specified in Sections R315-261-140 through 143 and R315-261-147 through 151, as applicable, and obtain the Director's written approval of such assurance, within 90 days after the date notice of cancellation is received by both the Principal and the Director from the Surety(ies), then this obligation shall be null and void; otherwise it is to remain in full force and effect.

The Surety(ies) shall become liable on this bond obligation only when the Principal has failed to fulfill the conditions described above. Upon notification by the Director that the Principal has failed to perform as guaranteed by this bond, the Surety(ies) shall place funds in the amount guaranteed for the facility(ies) into the standby trust fund as directed by the Director.

The liability of the Surety(ies) shall not be discharged by any payment or succession of payments hereunder, unless and until such payment or payments shall amount in the aggregate to the penal sum of the bond, but in no event shall the obligation of the Surety(ies) hereunder exceed the amount of said penal sum.

The Surety(ies) may cancel the bond by sending notice of cancellation by certified mail to the Principal and to the Director, provided, however, that cancellation shall not occur during the 120 days beginning on the date of receipt of the notice of cancellation by both the Principal and the Director, as evidenced by the return receipts.

The Principal may terminate this bond by sending written notice to the Surety(ies), provided, however, that no such notice shall become effective until the Surety(ies) receive(s) written authorization for termination of the bond by the Director.

(The following paragraph is an optional rider that may be included but is not required.)

Principal and Surety(ies) hereby agree to adjust the penal sum of the bond yearly so that it guarantees a new amount, provided that the penal sum does not increase by more than 20 percent in any one year, and no decrease in the penal sum takes place without the written permission of the Director.

In Witness Whereof, the Principal and Surety(ies) have executed this Financial Guarantee Bond and have affixed their seals on the date set forth above.

The persons whose signatures appear below hereby certify that they are authorized to execute this surety bond on behalf of the Principal and Surety(ies) and that the wording of this surety bond is identical to the wording specified in Subsection R315-261-151(b) as such regulations were constituted on the date this bond was executed.

Principal
(Signature(s))
(Name(s))
(Title(s))
(Corporate seal)Corporate Surety(ies)
(Name and address)
State of incorporation:Liability limit:
$(Signature(s))
(Name(s) and title(s))
(Corporate seal)
(For every co-surety, provide signature(s), corporate seal, and other information in the same manner as for Surety above.)
Bond premium: $

(c) A letter of credit, as specified in Subsection R315-261-143(c), shall be worded as follows, except that instructions in parentheses are to be replaced with the relevant information and the parentheses deleted:

Irrevocable Standby Letter of Credit
(Director name), Director,
Division of Waste Management and Radiation Control
195 North 1950 West
P.O Box 144880
Salt Lake City, Utah 84114-4880

Dear Director: We hereby establish our Irrevocable Standby Letter of Credit No.____ in your favor, in the event that the hazardous secondary materials at the covered reclamation or intermediary facility(ies) no longer meet the conditions of the exclusion under Subsection R315-261-4(a)(24), at the request and for the account of (owner's or operator's name and address) up to the aggregate amount of (in words) U.S. dollars $____, available upon presentation of

(1) your sight draft, bearing reference to this letter of credit No.__, and

(2) your signed statement reading as follows: "I certify that the amount of the draft is payable pursuant to regulations issued under authority of the Utah Solid and Hazardous Waste Act as amended."

This letter of credit is effective as of (date) and shall expire on (date at least 1 year later), but such expiration date shall be automatically extended for a period of (at least 1 year) on (date) and on each successive expiration date, unless, at least 120 days before the current expiration date, we notify both you, the Director, and (owner's or operator's name) by certified mail that we have decided not to extend this letter of credit beyond the current expiration date. In the event you are so notified, any unused portion of the credit shall be available upon presentation of your sight draft for 120 days after the date of receipt by both you and (owner's or operator's name), as shown on the signed return receipts.

Whenever this letter of credit is drawn on under and in compliance with the terms of this credit, we shall duly honor such draft upon presentation to us, and we shall deposit the amount of the draft directly into the standby trust fund of (owner's or operator's name) in accordance with your instructions.

We certify that the wording of this letter of credit is identical to the wording specified in Subsection R315-261-151(c) as such regulations were constituted on the date shown immediately below.

(Signature(s) and title(s) of official(s) of issuing institution)
(Date)

This credit is subject to (insert "the most recent edition of the Uniform Customs and Practice for Documentary Credits,

published and copyrighted by the International Chamber of Commerce," or "the Uniform Commercial Code").

(d) A certificate of insurance, as specified in Subsection R315-261-143(d), shall be worded as follows, except that instructions in parentheses are to be replaced with the relevant information and the parentheses deleted:

Certificate of Insurance

Name and Address of Insurer (herein called the "Insurer"):

Name and Address of Insured (herein called the "Insured"):

Facilities Covered: (List for each facility: The EPA and State Identification Numbers (if any issued), name, address, and the amount of insurance for all facilities covered, which shall total the face amount shown below.)

Face Amount:

Policy Number:

Effective Date:

The Insurer hereby certifies that it has issued to the Insured the policy of insurance identified above to provide financial assurance so that in accordance with applicable regulations all hazardous secondary materials can be removed from the facility or any unit at the facility and the facility or any unit at the facility can be decontaminated at the facilities identified above. The Insurer further warrants that such policy conforms in all respects with the requirements of Subsection R315-261-143(d) as applicable and as such regulations were constituted on the date shown immediately below. It is agreed that any provision of the policy inconsistent with such regulations is hereby amended to eliminate such inconsistency.

Whenever requested by the Director of the Division of Waste Management and Radiation Control, the Insurer agrees to furnish to the Director a duplicate original of the policy listed above, including all endorsements thereon.

I hereby certify that the wording of this certificate is identical to the wording specified in Subsection R315-261-151(d) such regulations were constituted on the date shown immediately below.

(Authorized signature for Insurer)

(Name of person signing)

(Title of person signing)

Signature of witness or notary:(Date)

(e) A letter from the chief financial officer, as specified in Subsection R315-261-143(e), shall be worded as follows, except that instructions in parentheses are to be replaced with the relevant information and the parentheses deleted:

Letter From Chief Financial Officer

Director

Division of Waste Management and Radiation Control

195 North 1950 West

P.O. Box 144880

Salt Lake City, UT 84114-4880

I am the chief financial officer of (name and address of firm). This letter is in support of this firm's use of the financial test to demonstrate financial assurance, as specified in Sections R315-261-140 through 143 and R315-261-147 through 151.

(Fill out the following nine paragraphs regarding facilities and associated cost estimates. If your firm has no facilities that belong in a particular paragraph, write "None" in the space indicated. For each facility, include its EPA and State Identification Numbers (if any issued), name, address, and current cost estimates.)

1. This firm is the owner or operator of the following facilities for which financial assurance is demonstrated through the financial test specified in Sections R315-261-140 through 143 and R315-261-147 through 151. The current cost estimates covered by the test are shown for each facility: ____.

2. This firm guarantees, through the guarantee specified in Sections R315-261-140 through 143 and R315-261-147 through 151, the following facilities owned or operated by the guaranteed party. The current cost estimates so guaranteed are shown for each facility: ____. The firm identified above is (insert one or more: (1) The direct or higher-tier parent corporation of the owner or operator; (2) owned by the same parent corporation as the parent corporation of the owner or operator, and receiving the following value in consideration of this guarantee____, or (3) engaged in the following substantial business relationship with the owner or operator ____, and receiving the following value in consideration of this guarantee____). (Attach a written description of the business relationship or a copy of the contract establishing such relationship to this letter).

3. In all other states this firm, as owner or operator or guarantor, is demonstrating financial assurance for the following facilities through the use of a test equivalent or substantially equivalent to the financial test specified in Sections R315-261-140 through 143 and R315-261-147 through 151. The current cost estimates covered by such a test are shown for each facility:____.

4. This firm is the owner or operator of the following hazardous secondary materials management facilities for which financial assurance is not demonstrated either to EPA or a State through the financial test or any other financial assurance mechanism specified in Sections R315-261-140 through 143 and R315-261-147 through 151 or equivalent or substantially equivalent State mechanisms. The current cost estimates not covered by such financial assurance are shown for each facility:____.

5. This firm is the owner or operator of the following UIC facilities for which financial assurance for plugging and abandonment is required under 40 CFR 144. The current closure cost estimates as required by 40 CFR 144.62 are shown for each facility:____.

6. This firm is the owner or operator of the following facilities for which financial assurance for closure or post-closure care is demonstrated through the financial test specified in Sections R315-264-140 through 151 or 40 CFR 265.140 through 150, which are adopted by reference. The current closure and/or post-closure cost estimates covered by the test are shown for each facility: ____.

7. This firm guarantees, through the guarantee specified in Sections R315-264-140 through 151 or 40 CFR 265.140 through 150, which are adopted by reference; the closure or post-closure care of the following facilities owned or operated by the guaranteed party. The current cost estimates for the closure or post-closure care so guaranteed are shown for each facility: ____. The firm identified above is (insert one or more: (1) The direct or higher-tier parent corporation of the owner or operator; (2) owned by the same parent corporation as the parent corporation of the owner or operator, and receiving the following value in consideration of this guarantee ___; or (3) engaged in the following substantial business relationship with the owner or operator __, and receiving the following value in consideration of this guarantee __). (Attach a written description of the business relationship or a copy of the contract establishing such relationship to this letter).

8. In other jurisdictions and states where the Director is not authorized to administer the financial requirements of R315-264-140 through 151 or 40 CFR 265.140 through 150, which are adopted by reference, this firm, as owner or operator or guarantor, is demonstrating financial assurance for the closure or post-closure care of the following facilities through the use of a test equivalent or substantially equivalent to the financial test specified in Sections R315-264-140 through 151 or 40 CFR 265.140 through 150, which are adopted by reference. The current closure and/or post-closure cost estimates covered by such a test are shown for each facility: __.

9. This firm is the owner or operator of the following hazardous waste management facilities for which financial assurance for closure or, if a disposal facility, post-closure care,

is not demonstrated either to EPA or a State through the financial test or any other financial assurance mechanism specified in Sections R315-264-140 through 151 or 40 CFR 265.140 through 150, which are adopted by reference, or equivalent or substantially equivalent State mechanisms. The current closure and/or post-closure cost estimates not covered by such financial assurance are shown for each facility: __.

This firm (insert "is required" or "is not required") to file a Form 10K with the Securities and Exchange Commission (SEC) for the latest fiscal year.

The fiscal year of this firm ends on (month, day). The figures for the following items marked with an asterisk are derived from this firm's independently audited, year-end financial statements for the latest completed fiscal year, ended (date).

(Fill in Alternative I if the criteria of Subsection R315-261-143(e)(1)(i) are used. Fill in Alternative II if the criteria of Subsection R315-261-143(e)(1)(ii) are used.)

Alternative I

1. Sum of current cost estimates (total of all cost estimates shown in the nine paragraphs above) $__

*2. Total liabilities (if any portion of the cost estimates is included in total liabilities, you may deduct the amount of that portion from this line and add that amount to lines 3 and 4) $__

*3. Tangible net worth $____

*4. Net worth $____-

*5. Current assets $____

*6. Current liabilities $____

7. Net working capital (line 5 minus line 6) $____

*8. The sum of net income plus depreciation, depletion, and amortization $____-

*9. Total assets in U.S. (required only if less than 90% of firm's assets are located in the U.S.) $____-

10. Is line 3 at least $10 million? (Yes/No) ____

11. Is line 3 at least 6 times line 1? (Yes/No) ____-

12. Is line 7 at least 6 times line 1? (Yes/No) ____-

*13. Are at least 90% of firm's assets located in the U.S.? If not, complete line 14 (Yes/No) ____

14. Is line 9 at least 6 times line 1? (Yes/No) ____-

15. Is line 2 divided by line 4 less than 2.0? (Yes/No) ____-

16. Is line 8 divided by line 2 greater than 0.1? (Yes/No) ____-

17. Is line 5 divided by line 6 greater than 1.5? (Yes/No) ____-

Alternative II

1. Sum of current cost estimates (total of all cost estimates shown in the eight paragraphs above) $____-

2. Current bond rating of most recent issuance of this firm and name of rating service ____-

3. Date of issuance of bond ____-

4. Date of maturity of bond ____-

*5. Tangible net worth (if any portion of the cost estimates is included in "total liabilities" on your firm's financial statements, you may add the amount of that portion to this line) $____-

*6. Total assets in U.S. (required only if less than 90% of firm's assets are located in the U.S.) $____-

7. Is line 5 at least $10 million? (Yes/No) ____

8. Is line 5 at least 6 times line 1? (Yes/No) ____

*9. Are at least 90% of firm's assets located in the U.S.? If not, complete line 10 (Yes/No) ____

10. Is line 6 at least 6 times line 1? (Yes/No) ____-

I hereby certify that the wording of this letter is identical to the wording specified in Subsection R315-261-151(e) as such regulations were constituted on the date shown immediately below.

(Signature) (Name) (Title) (Date)

(f) A letter from the chief financial officer, as specified in Subsection R315-261-147(f), shall be worded as follows, except that instructions in parentheses are to be replaced with the relevant information and the parentheses deleted.

Letter From Chief Financial Officer

Director

Division of Waste Management and Radiation Control

P.O. 144880

Salt Lake City, Utah 84114-4880

I am the chief financial officer of (firm's name and address). This letter is in support of the use of the financial test to demonstrate financial responsibility for liability coverage under Section R315-261-147(insert "and costs assured Subsection R315-261-143(e)" if applicable) as specified in Sections R315-261-140 through 143 and R315-261-147 through 151.

(Fill out the following paragraphs regarding facilities and liability coverage. If there are no facilities that belong in a particular paragraph, write "None" in the space indicated. For each facility, include its EPA Identification Number (if any issued), name, and address).

The firm identified above is the owner or operator of the following facilities for which liability coverage for (insert "sudden" or "nonsudden" or "both sudden and nonsudden") accidental occurrences is being demonstrated through the financial test specified in Sections R315-261-140 through 143 and R315-261-147 through 151:____

The firm identified above guarantees, through the guarantee specified in Sections R315-261-140 through 143 and R315-261-147 through 151, liability coverage for (insert "sudden" or "nonsudden" or "both sudden and nonsudden") accidental occurrences at the following facilities owned or operated by the following: ____-. The firm identified above is (insert one or more: (1) The direct or higher-tier parent corporation of the owner or operator; (2) owned by the same parent corporation as the parent corporation of the owner or operator, and receiving the following value in consideration of this guarantee -____; or (3) engaged in the following substantial business relationship with the owner or operator ____-, and receiving the following value in consideration of this guarantee ____-). (Attach a written description of the business relationship or a copy of the contract establishing such relationship to this letter.)

The firm identified above is the owner or operator of the following facilities for which liability coverage for (insert "sudden" or "nonsudden" or "both sudden and nonsudden") accidental occurrences is being demonstrated through the financial test specified in Sections R315-264-140 through 151 and 40 CFR 265.140 through 150, which are adopted by reference,:____

The firm identified above guarantees, through the guarantee specified in Sections R315-264-140 through 151 and 40 CFR 265.140 through 150, which are adopted by reference; liability coverage for (insert "sudden" or "nonsudden" or "both sudden and nonsudden") accidental occurrences at the following facilities owned or operated by the following: __. The firm identified above is (insert one or more: (1) The direct or higher-tier parent corporation of the owner or operator; (2) owned by the same parent corporation as the parent corporation of the owner or operator, and receiving the following value in consideration of this guarantee __; or (3) engaged in the following substantial business relationship with the owner or operator __, and receiving the following value in consideration of this guarantee __). (Attach a written description of the business relationship or a copy of the contract establishing such relationship to this letter.)

(If you are using the financial test to demonstrate coverage of both liability and costs assured under Subsection R315-261-143(e) or closure or post-closure care costs under Sections R315-264-143; R315-264-145; 40 CFR 265.143 or 145, which

are adopted by reference; fill in the following nine paragraphs regarding facilities and associated cost estimates. If there are no facilities that belong in a particular paragraph, write "None" in the space indicated. For each facility, include its EPA and State identification number (if any issued), name, address, and current cost estimates.)

1. This firm is the owner or operator of the following facilities for which financial assurance is demonstrated through the financial test specified in Sections R315-261-140 through 143 and R315-261-147 through 151. The current cost estimates covered by the test are shown for each facility:____.

2. This firm guarantees, through the guarantee specified in Sections R315-261-140 through 143 and R315-261-147 through 151, the following facilities owned or operated by the guaranteed party. The current cost estimates so guaranteed are shown for each facility:____. The firm identified above is (insert one or more: (1) The direct or higher-tier parent corporation of the owner or operator; (2) owned by the same parent corporation as the parent corporation of the owner or operator, and receiving the following value in consideration of this guarantee____, or (3) engaged in the following substantial business relationship with the owner or operator ____, and receiving the following value in consideration of this guarantee____). (Attach a written description of the business relationship or a copy of the contract establishing such relationship to this letter).

3. In all other states this firm, as owner or operator or guarantor, is demonstrating financial assurance for the following facilities through the use of a test equivalent or substantially equivalent to the financial test specified in Sections R315-261-140 through 143 and R315-261-147 through 151. The current cost estimates covered by such a test are shown for each facility:____.

4. This firm is the owner or operator of the following hazardous secondary materials management facilities for which financial assurance is not demonstrated either to EPA or a State through the financial test or any other financial assurance mechanism specified in Sections R315-261-140 through 143 and R315-261-147 through 151 or equivalent or substantially equivalent State mechanisms. The current cost estimates not covered by such financial assurance are shown for each facility:____.

5. This firm is the owner or operator of the following UIC facilities for which financial assurance for plugging and abandonment is required under 40 CFR 144. The current closure cost estimates as required by 40 CFR 144.62 are shown for each facility:____.

6. This firm is the owner or operator of the following facilities for which financial assurance for closure or post-closure care is demonstrated through the financial test specified in Sections R315-264-140 through 151 and 40 CFR 265.140 through 150, which are adopted by reference. The current closure and/or post-closure cost estimates covered by the test are shown for each facility: ____.

7. This firm guarantees, through the guarantee specified in Sections R315-264-140 through 151 and 40 CFR 265.140 through 150, which are adopted by reference; the closure or post-closure care of the following facilities owned or operated by the guaranteed party. The current cost estimates for the closure or post-closure care so guaranteed are shown for each facility: ____. The firm identified above is (insert one or more: (1) The direct or higher-tier parent corporation of the owner or operator; (2) owned by the same parent corporation as the parent corporation of the owner or operator, and receiving the following value in consideration of this guarantee ____; or (3) engaged in the following substantial business relationship with the owner or operator ____, and receiving the following value in consideration of this guarantee ____).

(Attach a written description of the business relationship or a copy of the contract establishing such relationship to this letter).

8. In other jurisdictions, and states where the Director is not authorized to administer the financial requirements of R315-264.264-140 through 151 or 40 CFR 265.140 through 150, which are adopted by reference, this firm, as owner or operator or guarantor, is demonstrating financial assurance for the closure or post-closure care of the following facilities through the use of a test equivalent or substantially equivalent to the financial test specified in Sections R315-264-140 through 151 and 40 CFR 265.140 through 150, which are adopted by reference. The current closure and/or post-closure cost estimates covered by such a test are shown for each facility: ____.

9. This firm is the owner or operator of the following hazardous waste management facilities for which financial assurance for closure or, if a disposal facility, post-closure care, is not demonstrated either to EPA or a State through the financial test or any other financial assurance mechanism specified in Sections R315-264-140 through 151 and 40 CFR 265.140 through 150, which are adopted by reference, or equivalent or substantially equivalent State mechanisms. The current closure and/or post-closure cost estimates not covered by such financial assurance are shown for each facility: ____.

This firm (insert "is required" or "is not required") to file a Form 10K with the Securities and Exchange Commission (SEC) for the latest fiscal year.

The fiscal year of this firm ends on (month, day). The figures for the following items marked with an asterisk are derived from this firm's independently audited, year-end financial statements for the latest completed fiscal year, ended (date).

Part A. Liability Coverage for Accidental Occurrences

(Fill in Alternative I if the criteria of Subsection R315-261-147(f)(1)(i) are used. Fill in Alternative II if the criteria of Subsection R315-261-147(f)(1)(ii) are used.)

Alternative I

1. Amount of annual aggregate liability coverage to be demonstrated $____-.

*2. Current assets $____-.

*3. Current liabilities $____-.

4. Net working capital (line 2 minus line 3) $____-.

*5. Tangible net worth $____-.

*6. If less than 90% of assets are located in the U.S., give total U.S. assets $____-.

7. Is line 5 at least $10 million? (Yes/No) ____-.

8. Is line 4 at least 6 times line 1? (Yes/No) ____-.

9. Is line 5 at least 6 times line 1? (Yes/No) ____-.

*10. Are at least 90% of assets located in the U.S.? (Yes/No) ____. If not, complete line 11.

11. Is line 6 at least 6 times line 1? (Yes/No) ____.

Alternative II

1. Amount of annual aggregate liability coverage to be demonstrated $____-.

2. Current bond rating of most recent issuance and name of rating service ____-____-.

3. Date of issuance of bond _____---.

4. Date of maturity of bond _____---.

*5. Tangible net worth $____-.

*6. Total assets in U.S. (required only if less than 90% of assets are located in the U.S.) $____-.

7. Is line 5 at least $10 million? (Yes/No) ____-.

8. Is line 5 at least 6 times line 1? ____-.

9. Are at least 90% of assets located in the U.S.? If not, complete line 10. (Yes/No) __.

10. Is line 6 at least 6 times line 1? ____-.

(Fill in part B if you are using the financial test to demonstrate assurance of both liability coverage and costs assured under Subsection R315-261-143(e) or closure or post-

closure care costs under Sections R315-264-143; R315-264-145; 40 CFR 265.143 or 145, which is adopted by reference.)

Part B. Facility Care and Liability Coverage

(Fill in Alternative I if the criteria of Subsection R315-261-143(e)(1)(i) and Subsection R315-261-147(f)(1)(i) are used. Fill in Alternative II if the criteria of Subsection R315-261-143(e)(1)(ii) and Subsection R315-261-147(f)(1)(ii) are used.)

Alternative I

1. Sum of current cost estimates (total of all cost estimates listed above) $____-

2. Amount of annual aggregate liability coverage to be demonstrated $____-

3. Sum of lines 1 and 2 $____

*4. Total liabilities (if any portion of your cost estimates is included in your total liabilities, you may deduct that portion from this line and add that amount to lines 5 and 6) $____-

*5. Tangible net worth $____

*6. Net worth $____-

*7. Current assets $____

*8. Current liabilities $____

9. Net working capital (line 7 minus line 8) $____

*10. The sum of net income plus depreciation, depletion, and amortization $____-

*11. Total assets in U.S. (required only if less than 90% of assets are located in the U.S.) $____

12. Is line 5 at least $10 million? (Yes/No)

13. Is line 5 at least 6 times line 3? (Yes/No)

14. Is line 9 at least 6 times line 3? (Yes/No)

*15. Are at least 90% of assets located in the U.S.? (Yes/No) If not, complete line 16.

16. Is line 11 at least 6 times line 3? (Yes/No)

17. Is line 4 divided by line 6 less than 2.0? (Yes/No)

18. Is line 10 divided by line 4 greater than 0.1? (Yes/No)

19. Is line 7 divided by line 8 greater than 1.5? (Yes/No)

Alternative II

1. Sum of current cost estimates (total of all cost estimates listed above) $____-

2. Amount of annual aggregate liability coverage to be demonstrated $____-

3. Sum of lines 1 and 2 $____

4. Current bond rating of most recent issuance and name of rating service _____-

5. Date of issuance of bond _____---

6. Date of maturity of bond _____---

*7. Tangible net worth (if any portion of the cost estimates is included in "total liabilities" on your financial statements you may add that portion to this line) $____-

*8. Total assets in the U.S. (required only if less than 90% of assets are located in the U.S.) $____-

9. Is line 7 at least $10 million? (Yes/No)

10. Is line 7 at least 6 times line 3? (Yes/No)

*11. Are at least 90% of assets located in the U.S.? (Yes/No) If not complete line 12.

12. Is line 8 at least 6 times line 3? (Yes/No)

I hereby certify that the wording of this letter is identical to the wording specified in Subsection R315-261-151(f) as such regulations were constituted on the date shown immediately below.

(Signature)

(Name)

(Title)

(Date)

(g)(1) A corporate guarantee, as specified in Subsection R315-261-143(e), shall be worded as follows, except that instructions in parentheses are to be replaced with the relevant information and the parentheses deleted:

Corporate Guarantee for Facility Care

Guarantee made this (date) by (name of guaranteeing entity), a business corporation organized under the laws of the State of (insert name of State), herein referred to as guarantor. This guarantee is made on behalf of the (owner or operator) of (business address), which is (one of the following: "our subsidiary"; "a subsidiary of (name and address of common parent corporation), of which guarantor is a subsidiary"; or "an entity with which guarantor has a substantial business relationship, as defined in Subsections R315-264-141(h) and 40 CFR 265.141(h), which is adopted by reference," to the Director of the Utah Division of Waste Management and Radiation Control (the Director).

Recitals

1. Guarantor meets or exceeds the financial test criteria and agrees to comply with the reporting requirements for guarantors as specified in Subsection R315-261-143(e).

2. (Owner or operator) owns or operates the following facility(ies) covered by this guarantee: (List for each facility: EPA and State Identification Number (if any issued), name, and address.

3. "Closure plans" as used below refer to the plans maintained as required by Sections R315-261-140 through 143 and R315-261-147 through 151 for the care of facilities as identified above.

4. For value received from (owner or operator), guarantor guarantees that in the event of a determination by the Director that the hazardous secondary materials at the owner or operator's facility covered by this guarantee do not meet the conditions of the exclusion under Subsection R315-261-4(a)(24), the guarantor shall dispose of any hazardous secondary material as hazardous waste, and close the facility in accordance with closure requirements found in Sections R315-264-110 through 120 or 40 CFR 265-110 through 121 which are adopted by reference, as applicable, or establish a trust fund as specified in Subsection R315-261-143(a) in the name of the owner or operator in the amount of the current cost estimate.

5. Guarantor agrees that if, at the end of any fiscal year before termination of this guarantee, the guarantor fails to meet the financial test criteria, guarantor shall send within 90 days, by certified mail, notice to the Director and to (owner or operator) that he intends to provide alternate financial assurance as specified in Sections R315-261-140 through 143 and R315-261-147 though 151, as applicable, in the name of (owner or operator). Within 120 days after the end of such fiscal year, the guarantor shall establish such financial assurance unless (owner or operator) has done so.

6. The guarantor agrees to notify the Director by certified mail, of a voluntary or involuntary proceeding under Title 11 (Bankruptcy), U.S. Code, naming guarantor as debtor, within 10 days after commencement of the proceeding.

7. Guarantor agrees that within 30 days after being notified by the Director of a determination that guarantor no longer meets the financial test criteria or that he is disallowed from continuing as a guarantor, he shall establish alternate financial assurance as specified in of Sections R315-264-140 through 151 or 40 CFR 265-140 through 150 that are adopted by reference, or Sections R315-261-140 through 143 and R315-261-147 though 151, as applicable, in the name of (owner or operator) unless (owner or operator) has done so.

8. Guarantor agrees to remain bound under this guarantee notwithstanding any or all of the following: amendment or modification of the closure plan, the extension or reduction of the time of performance, or any other modification or alteration of an obligation of the owner or operator pursuant to Rules R315-264, 265, or Sections R315-261-140 through 143 and R315-261-147 though 151.

9. Guarantor agrees to remain bound under this guarantee for as long as (owner or operator) shall comply with the applicable financial assurance requirements of Sections R315-264-140 through 151 or 40 CFR 265-140 through 150 that are adopted by reference, or the financial assurance condition of

Subsection R315-261-4(a)(24)(vi)(F) for the above-listed facilities, except as provided in paragraph 10 of this agreement.

10. (Insert the following language if the guarantor is (a) a direct or higher-tier corporate parent, or (b) a firm whose parent corporation is also the parent corporation of the owner or operator):

Guarantor may terminate this guarantee by sending notice by certified mail to the Director and to (owner or operator), provided that this guarantee may not be terminated unless and until (the owner or operator) obtains, and the Director approves, alternate coverage complying with Section R315-261-143.

(Insert the following language if the guarantor is a firm qualifying as a guarantor due to its "substantial business relationship" with the owner or operator)

Guarantor may terminate this guarantee 120 days following the receipt of notification, through certified mail, by the Director and by (the owner or operator).

11. Guarantor agrees that if (owner or operator) fails to provide alternate financial assurance as specified in Sections R315-264-140 through 151 or 40 CFR 265-140 through 150 that are adopted by reference, or Sections R315-261-140 through 143 and R315-261-147 though 151, as applicable, and obtain written approval of such assurance from the Director within 90 days after a notice of cancellation by the guarantor is received by theDirector from guarantor, guarantor shall provide such alternate financial assurance in the name of (owner or operator).

12. Guarantor expressly waives notice of acceptance of this guarantee by the Director or by (owner or operator). Guarantor also expressly waives notice of amendments or modifications of the closure plan and of amendments or modifications of the applicable requirements of Sections R315-264-140 through 151 or 40 CFR 265-140 through 150 that are adopted by reference, or Sections R315-261-140 through 143 and R315-261-147 though 151.

I hereby certify that the wording of this guarantee is identical to the wording specified in Subsection R315-261-151(g)(1) as such regulations were constituted on the date first above written.

Effective date: (Name of guarantor) (Authorized signature for guarantor) (Name of person signing) (Title of person signing) Signature of witness or notary:

(2) A guarantee, as specified in Subsection R315-261-147(g), shall be worded as follows, except that instructions in parentheses are to be replaced with the relevant information and the parentheses deleted:

Guarantee for Liability Coverage

Guarantee made this (date) by (name of guaranteeing entity), a business corporation organized under the laws of (if incorporated within the United States insert "the State of ____-" and insert name of State; if incorporated outside the United States insert the name of the country in which incorporated, the principal place of business within the United States, and the name and address of the registered agent in the State of the principal place of business), herein referred to as guarantor. This guarantee is made on behalf of (owner or operator) of (business address), which is one of the following: "our subsidiary;" "a subsidiary of (name and address of common parent corporation), of which guarantor is a subsidiary;" or "an entity with which guarantor has a substantial business relationship, as defined in (either Subsection R315-264-141(h) or 40 CFR 265.141(h), which is adopted by reference)", to any and all third parties who have sustained or may sustain bodily injury or property damage caused by (sudden and/or nonsudden) accidental occurrences arising from operation of the facility(ies) covered by this guarantee.

Recitals

1. Guarantor meets or exceeds the financial test criteria and agrees to comply with the reporting requirements for guarantors as specified in Subsection R315-261-147(g).

2. (Owner or operator) owns or operates the following facility(ies) covered by this guarantee: (List for each facility: EPA and state identification number (if any issued), name, and address; and if guarantor is incorporated outside the United States list the name and address of the guarantor's registered agent in each State.) This corporate guarantee satisfies RCRA third-party liability requirements for (insert "sudden" or "nonsudden" or "both sudden and nonsudden") accidental occurrences in above-named owner or operator facilities for coverage in the amount of (insert dollar amount) for each occurrence and (insert dollar amount) annual aggregate.

3. For value received from (owner or operator), guarantor guarantees to any and all third parties who have sustained or may sustain bodily injury or property damage caused by (sudden and/or nonsudden) accidental occurrences arising from operations of the facility(ies) covered by this guarantee that in the event that (owner or operator) fails to satisfy a judgment or award based on a determination of liability for bodily injury or property damage to third parties caused by (sudden and/or nonsudden) accidental occurrences, arising from the operation of the above-named facilities, or fails to pay an amount agreed to in settlement of a claim arising from or alleged to arise from such injury or damage, the guarantor shall satisfy such judgment(s), award(s) or settlement agreement(s) up to the limits of coverage identified above.

4. Such obligation does not apply to any of the following:

(a) Bodily injury or property damage for which (insert owner or operator) is obligated to pay damages by reason of the assumption of liability in a contract or agreement. This exclusion does not apply to liability for damages that (insert owner or operator) would be obligated to pay in the absence of the contract or agreement.

(b) Any obligation of (insert owner or operator) under a workers' compensation, disability benefits, or unemployment compensation law or any similar law.

(c) Bodily injury to:

(1) An employee of (insert owner or operator) arising from, and in the course of, employment by (insert owner or operator); or

(2) The spouse, child, parent, brother, or sister of that employee as a consequence of, or arising from, and in the course of employment by (insert owner or operator). This exclusion applies:

(A) Whether (insert owner or operator) may be liable as an employer or in any other capacity; and

(B) To any obligation to share damages with or repay another person who shall pay damages because of the injury to persons identified in paragraphs (1) and (2).

(d) Bodily injury or property damage arising out of the ownership, maintenance, use, or entrustment to others of any aircraft, motor vehicle or watercraft.

(e) Property damage to:

(1) Any property owned, rented, or occupied by (insert owner or operator);

(2) Premises that are sold, given away or abandoned by (insert owner or operator) if the property damage arises out of any part of those premises;

(3) Property loaned to (insert owner or operator);

(4) Personal property in the care, custody or control of (insert owner or operator);

(5) That particular part of real property on which (insert owner or operator) or any contractors or subcontractors working directly or indirectly on behalf of (insert owner or operator) are performing operations, if the property damage arises out of these operations.

5. Guarantor agrees that if, at the end of any fiscal year before termination of this guarantee, the guarantor fails to meet the financial test criteria, guarantor shall send within 90 days, by

certified mail, notice to the Director and to (owner or operator) that he intends to provide alternate liability coverage as specified in Section R315-261-147, as applicable, in the name of (owner or operator). Within 120 days after the end of such fiscal year, the guarantor shall establish such liability coverage unless (owner or operator) has done so.

6. The guarantor agrees to notify the Director by certified mail of a voluntary or involuntary proceeding under title 11 (Bankruptcy), U.S. Code, naming guarantor as debtor, within 10 days after commencement of the proceeding. Guarantor agrees that within 30 days after being notified by the Director of a determination that guarantor no longer meets the financial test criteria or that he is disallowed from continuing as a guarantor, he shall establish alternate liability coverage as specified in Section R315-261-147 in the name of (owner or operator), unless (owner or operator) has done so.

7. Guarantor reserves the right to modify this agreement to take into account amendment or modification of the liability requirements set by Section R315-261-147, provided that such modification shall become effective only if the Director does not disapprove the modification within 30 days of receipt of notification of the modification.

8. Guarantor agrees to remain bound under this guarantee for so long as (owner or operator) shall comply with the applicable requirements of Section R315-261-147 for the above-listed facility(ies), except as provided in paragraph 10 of this agreement.

9. (Insert the following language if the guarantor is (a) a direct or higher-tier corporate parent, or (b) a firm whose parent corporation is also the parent corporation of the owner or operator):

10. Guarantor may terminate this guarantee by sending notice by certified mail to the Director and to (owner or operator), provided that this guarantee may not be terminated unless and until (the owner or operator) obtains, and the Director approves, alternate liability coverage complying with Section R315-261-147.

(Insert the following language if the guarantor is a firm qualifying as a guarantor due to its "substantial business relationship" with the owner or operator):

Guarantor may terminate this guarantee 120 days following receipt of notification, through certified mail, by the Director and by (the owner or operator).

11. Guarantor hereby expressly waives notice of acceptance of this guarantee by any party.

12. Guarantor agrees that this guarantee is in addition to and does not affect any other responsibility or liability of the guarantor with respect to the covered facilities.

13. The Guarantor shall satisfy a third-party liability claim only on receipt of one of the following documents:

(a) Certification from the Principal and the third-party claimant(s) that the liability claim should be paid. The certification shall be worded as follows, except that instructions in parentheses are to be replaced with the relevant information and the parentheses deleted:

Certification of Valid Claim

The undersigned, as parties (insert Principal) and (insert name and address of third-party claimant(s)), hereby certify that the claim of bodily injury and/or property damage caused by a (sudden or nonsudden) accidental occurrence arising from operating (Principal's) facility should be paid in the amount of $.

(Signatures) Principal (Notary) Date (Signatures) Claimant(s) (Notary) Date

(b) A valid final court order establishing a judgment against the Principal for bodily injury or property damage caused by sudden or nonsudden accidental occurrences arising from the operation of the Principal's facility or group of facilities.

14. In the event of combination of this guarantee with another mechanism to meet liability requirements, this guarantee shall be considered (insert "primary" or "excess") coverage.

I hereby certify that the wording of the guarantee is identical to the wording specified in Subsection R315-261-151(g)(2) as such regulations were constituted on the date shown immediately below.

Effective date:

(Name of guarantor) (Authorized signature for guarantor)

(Name of person signing) (Title of person signing) Signature of witness or notary:

(h) A hazardous waste facility liability endorsement as required by Section R315-261-147 shall be worded as follows, except that instructions in parentheses are to be replaced with the relevant information and the parentheses deleted:

Hazardous Secondary Material Reclamation/Intermediate Facility Liability Endorsement

1. This endorsement certifies that the policy to which the endorsement is attached provides liability insurance covering bodily injury and property damage in connection with the insured's obligation to demonstrate financial responsibility under Section R35-261-147. The coverage applies at (list EPA and state Identification Number (if any issued), name, and address for each facility) for (insert "sudden accidental occurrences," "nonsudden accidental occurrences," or "sudden and nonsudden accidental occurrences"; if coverage is for multiple facilities and the coverage is different for different facilities, indicate which facilities are insured for sudden accidental occurrences, which are insured for nonsudden accidental occurrences, and which are insured for both). The limits of liability are (insert the dollar amount of the "each occurrence" and "annual aggregate" limits of the Insurer's liability), exclusive of legal defense costs.

2. The insurance afforded with respect to such occurrences is subject to all of the terms and conditions of the policy; provided, however, that any provisions of the policy inconsistent with subsections (a) through (e) of this Paragraph 2 are hereby amended to conform with subsections (a) through (e):

(a) Bankruptcy or insolvency of the insured shall not relieve the Insurer of its obligations under the policy to which this endorsement is attached.

(b) The Insurer is liable for the payment of amounts within any deductible applicable to the policy, with a right of reimbursement by the insured for any such payment made by the Insurer. This provision does not apply with respect to that amount of any deductible for which coverage is demonstrated as specified in Subsection R315-261-147(f).

(c) Whenever requested by the Director of the Utah Division of Waste Management and Radiation Control (the Director), the Insurer agrees to furnish to the Director a signed duplicate original of the policy and all endorsements.

(d) Cancellation of this endorsement, whether by the Insurer, the insured, a parent corporation providing insurance coverage for its subsidiary, or by a firm having an insurable interest in and obtaining liability insurance on behalf of the owner or operator of the facility, shall be effective only upon written notice and only after the expiration of 60 days after a copy of such written notice is received by the Director.

(e) Any other termination of this endorsement shall be effective only upon written notice and only after the expiration of thirty (30) days after a copy of such written notice is received by the Director.

Attached to and forming part of policy No. __ issued by (name of Insurer), herein called the Insurer, of (address of Insurer) to (name of insured) of (address) this _____ day of _____, 20__. The effective date of said policy is _____ day of _____, 20__.

I hereby certify that the wording of this endorsement is identical to the wording specified in Subsection R315-261-

151(h) as such regulation was constituted on the date first above written, and that the Insurer is licensed to transact the business of insurance, or eligible to provide insurance as an excess or surplus lines insurer, in one or more States.

(Signature of Authorized Representative of Insurer)

(Type name)

(Title), Authorized Representative of (name of Insurer)

(Address of Representative)

(i) A certificate of liability insurance as required in Section R315-261-147 shall be worded as follows, except that the instructions in parentheses are to be replaced with the relevant information and the parentheses deleted:

Hazardous Secondary Material Reclamation/Intermediate Facility Certificate of Liability Insurance

1. (Name of Insurer), (the "Insurer"), of (address of Insurer) hereby certifies that it has issued liability insurance covering bodily injury and property damage to (name of insured), (the "insured"), of (address of insured) in connection with the insured's obligation to demonstrate financial responsibility under Rules R315-264 and 265, and the financial assurance condition of Subsection R315-261-4(a)(24)(vi)(F). The coverage applies at (list EPA and state Identification Number (if any issued), name, and address for each facility) for (insert "sudden accidental occurrences," "nonsudden accidental occurrences," or "sudden and nonsudden accidental occurrences"; if coverage is for multiple facilities and the coverage is different for different facilities, indicate which facilities are insured for sudden accidental occurrences, which are insured for nonsudden accidental occurrences, and which are insured for both). The limits of liability are (insert the dollar amount of the "each occurrence" and "annual aggregate" limits of the Insurer's liability), exclusive of legal defense costs. The coverage is provided under policy number, issued on (date). The effective date of said policy is (date).

2. The Insurer further certifies the following with respect to the insurance described in Paragraph 1:

(a) Bankruptcy or insolvency of the insured shall not relieve the Insurer of its obligations under the policy.

(b) The Insurer is liable for the payment of amounts within any deductible applicable to the policy, with a right of reimbursement by the insured for any such payment made by the Insurer. This provision does not apply with respect to that amount of any deductible for which coverage is demonstrated as specified in Section R315-261-147.

(c) Whenever requested by the Director of the Utah Division of Waste Management and Radiation Control (the Director), the Insurer agrees to furnish to the Director a signed duplicate original of the policy and all endorsements.

(d) Cancellation of the insurance, whether by the insurer, the insured, a parent corporation providing insurance coverage for its subsidiary, or by a firm having an insurable interest in and obtaining liability insurance on behalf of the owner or operator of the hazardous waste management facility, shall be effective only upon written notice and only after the expiration of 60 days after a copy of such written notice is received by the Director.

(e) Any other termination of the insurance shall be effective only upon written notice and only after the expiration of thirty (30) days after a copy of such written notice is received by the Director.

I hereby certify that the wording of this instrument is identical to the wording specified in Subsection R315-261-151(i) as such regulation was constituted on the date first above written, and that the Insurer is licensed to transact the business of insurance, or eligible to provide insurance as an excess or surplus lines insurer, in one or more States.

(Signature of authorized representative of Insurer)

(Type name)

(Title), Authorized Representative of (name of Insurer)

(Address of Representative)

(j) A letter of credit, as specified in Subsection R315-261-147(h) of this chapter, shall be worded as follows, except that instructions in parentheses are to be replaced with the relevant information and the parentheses deleted:

Irrevocable Standby Letter of Credit

(Name and Address of Issuing Institution)

(Director name), Director,

Division of Waste Management and Radiation Control

195 North 1950 West

P.O Box 144880

Salt Lake City, Utah 84114-4880

Dear Sir or Madam:

We hereby establish our Irrevocable Standby Letter of Credit No. ____----- in the favor of ("any and all third-party liability claimants" or insert name of trustee of the standby trust fund), at the request and for the account of (owner or operator's name and address) for third-party liability awards or settlements up to (in words) U.S. dollars $____----- per occurrence and the annual aggregate amount of (in words) U.S. dollars $_---, for sudden accidental occurrences and/or for third-party liability awards or settlements up to the amount of (in words) U.S. dollars $____----- per occurrence, and the annual aggregate amount of (in words) U.S. dollars $____-----, for nonsudden accidental occurrences available upon presentation of a sight draft bearing reference to this letter of credit No. ____-----, and (insert the following language if the letter of credit is being used without a standby trust fund: (1) a signed certificate reading as follows:

Certificate of Valid Claim

The undersigned, as parties (insert principal) and (insert name and address of third party claimant(s)), hereby certify that the claim of bodily injury and/or property damage caused by a (sudden or nonsudden) accidental occurrence arising from operations of (principal's) facility should be paid in the amount of $( ). We hereby certify that the claim does not apply to any of the following:

(a) Bodily injury or property damage for which (insert principal) is obligated to pay damages by reason of the assumption of liability in a contract or agreement. This exclusion does not apply to liability for damages that (insert principal) would be obligated to pay in the absence of the contract or agreement.

(b) Any obligation of (insert principal) under a workers' compensation, disability benefits, or unemployment compensation law or any similar law.

(c) Bodily injury to:

(1) An employee of (insert principal) arising from, and in the course of, employment by (insert principal); or

(2) The spouse, child, parent, brother or sister of that employee as a consequence of, or arising from, and in the course of employment by (insert principal).

This exclusion applies:

(A) Whether (insert principal) may be liable as an employer or in any other capacity; and

(B) To any obligation to share damages with or repay another person who shall pay damages because of the injury to persons identified in paragraphs (1) and (2).

(d) Bodily injury or property damage arising out of the ownership, maintenance, use, or entrustment to others of any aircraft, motor vehicle or watercraft.

(e) Property damage to:

(1) Any property owned, rented, or occupied by (insert principal);

(2) Premises that are sold, given away or abandoned by (insert principal) if the property damage arises out of any part of those premises;

(3) Property loaned to (insert principal);

(4) Personal property in the care, custody or control of (insert principal);

(5) That particular part of real property on which (insert principal) or any contractors or subcontractors working directly or indirectly on behalf of (insert principal) are performing operations, if the property damage arises out of these operations.

(Signatures)

Grantor

(Signatures)

Claimant(s)

or (2) a valid final court order establishing a judgment against the Grantor for bodily injury or property damage caused by sudden or nonsudden accidental occurrences arising from the operation of the Grantor's facility or group of facilities.)

This letter of credit is effective as of (date) and shall expire on (date at least one year later), but such expiration date shall be automatically extended for a period of (at least one year) on (date and on each successive expiration date, unless, at least 120 days before the current expiration date, we notify you, the Director, and (owner's or operator's name) by certified mail that we have decided not to extend this letter of credit beyond the current expiration date.

Whenever this letter of credit is drawn on under and in compliance with the terms of this credit, we shall duly honor such draft upon presentation to us.

(Insert the following language if a standby trust fund is not being used: "In the event that this letter of credit is used in combination with another mechanism for liability coverage, this letter of credit shall be considered (insert "primary" or "excess" coverage)."

We certify that the wording of this letter of credit is identical to the wording specified in Subsection R315-261-151(j) as such regulations were constituted on the date shown immediately below.

(Signature(s)

and title(s) of official(s) of issuing institution)

(Date).

This credit is subject to (insert "the most recent edition of the Uniform Customs and Practice for Documentary Credits, published and copyrighted by the International Chamber of Commerce," or "the Uniform Commercial Code").

(k) A surety bond, as specified in Subsection R315-261-147(i), shall be worded as follows: except that instructions in parentheses are to be replaced with the relevant information and the parentheses deleted:

Payment Bond

Surety Bond No. (Insert number)

Parties (Insert name and address of owner or operator), Principal, incorporated in (Insert State of incorporation) of (Insert city and State of principal place of business) and (Insert name and address of surety company(ies)), Surety Company(ies), of (Insert surety(ies) place of business).

(EPA and State Identification Number (if any issued), name, and address for each facility guaranteed by this bond:) __

TABLE

	Nonsudden accidental occurrences	Sudden accidental occurrences
Penal Sum Per Occurrence	(insert amount)	(insert amount)
Annual Aggregate	(insert amount)	(insert amount)

Purpose: This is an agreement between the Surety(ies) and the Principal under which the Surety(ies), its(their) successors and assignees, agree to be responsible for the payment of claims against the Principal for bodily injury and/or property damage to third parties caused by ("sudden" and/or "nonsudden") accidental occurrences arising from operations of the facility or group of facilities in the sums prescribed herein; subject to the governing provisions and the following conditions.

Governing Provisions:

(1) Section 3004 of the Resource Conservation and Recovery Act of 1976, as amended.

(2) Rules adopted by the Utah Waste Management and Radiation Control Board, particularly Rules R315-264; 265, that is adopted by reference; and Sections R315-261-140 through 143 and R315-261-147 through 151 (if applicable).

Conditions:

(1) The Principal is subject to the applicable governing provisions that require the Principal to have and maintain liability coverage for bodily injury and property damage to third parties caused by ("sudden" and/or "nonsudden") accidental occurrences arising from operations of the facility or group of facilities. Such obligation does not apply to any of the following:

(a) Bodily injury or property damage for which (insert Principal) is obligated to pay damages by reason of the assumption of liability in a contract or agreement. This exclusion does not apply to liability for damages that (insert Principal) would be obligated to pay in the absence of the contract or agreement.

(b) Any obligation of (insert Principal) under a workers' compensation, disability benefits, or unemployment compensation law or similar law.

(c) Bodily injury to:

(1) An employee of (insert Principal) arising from, and in the course of, employment by (insert principal); or

(2) The spouse, child, parent, brother or sister of that employee as a consequence of, or arising from, and in the course of employment by (insert Principal). This exclusion applies:

(A) Whether (insert Principal) may be liable as an employer or in any other capacity; and

(B) To any obligation to share damages with or repay another person who shall pay damages because of the injury to persons identified in paragraphs (1) and (2).

(d) Bodily injury or property damage arising out of the ownership, maintenance, use, or entrustment to others of any aircraft, motor vehicle or watercraft.

(e) Property damage to:

(1) Any property owned, rented, or occupied by (insert Principal);

(2) Premises that are sold, given away or abandoned by (insert Principal) if the property damage arises out of any part of those premises;

(3) Property loaned to (insert Principal);

(4) Personal property in the care, custody or control of (insert Principal);

(5) That particular part of real property on which (insert Principal) or any contractors or subcontractors working directly or indirectly on behalf of (insert Principal) are performing operations, if the property damage arises out of these operations.

(2) This bond assures that the Principal will satisfy valid third party liability claims, as described in condition 1.

(3) If the Principal fails to satisfy a valid third party liability claim, as described above, the Surety(ies) becomes liable on this bond obligation.

(4) The Surety(ies) shall satisfy a third party liability claim only upon the receipt of one of the following documents:

(a) Certification from the Principal and the third party claimant(s) that the liability claim should be paid. The certification shall be worded as follows, except that instructions in parentheses are to be replaced with the relevant information and the parentheses deleted:

Certification of Valid Claim

The undersigned, as parties (insert name of Principal) and (insert name and address of third party claimant(s)), hereby certify that the claim of bodily injury and/or property damage caused by a (sudden or nonsudden) accidental occurrence arising from operating (Principal's) facility should be paid in the amount of $( ).

(Signature)
Principal
(Notary) Date
(Signature(s))
Claimant(s)
(Notary) Date

or (b) A valid final court order establishing a judgment against the Principal for bodily injury or property damage caused by sudden or nonsudden accidental occurrences arising from the operation of the Principal's facility or group of facilities.

(5) In the event of combination of this bond with another mechanism for liability coverage, this bond shall be considered (insert "primary" or "excess") coverage.

(6) The liability of the Surety(ies) shall not be discharged by any payment or succession of payments hereunder, unless and until such payment or payments shall amount in the aggregate to the penal sum of the bond. In no event shall the obligation of the Surety(ies) hereunder exceed the amount of said annual aggregate penal sum, provided that the Surety(ies) furnish(es) notice to the Director forthwith of all claims filed and payments made by the Surety(ies) under this bond.

(7) The Surety(ies) may cancel the bond by sending notice of cancellation by certified mail to the Principal and the Director, provided, however, that cancellation shall not occur during the 120 days beginning on the date of receipt of the notice of cancellation by the Principal and the Director, as evidenced by the return receipt.

(8) The Principal may terminate this bond by sending written notice to the Surety(ies) and to the Director.

(9) The Surety(ies) hereby waive(s) notification of amendments to applicable laws, statutes, rules and regulations and agree(s) that no such amendment shall in any way alleviate its (their) obligation on this bond.

(10) This bond is effective from (insert date) (12:01 a.m., standard time, at the address of the Principal as stated herein) and shall continue in force until terminated as described above.

In Witness Whereof, the Principal and Surety(ies) have executed this Bond and have affixed their seals on the date set forth above.

The persons whose signatures appear below hereby certify that they are authorized to execute this surety bond on behalf of the Principal and Surety(ies) and that the wording of this surety bond is identical to the wording specified in Subsection R315-261-151(k), as such regulations were constituted on the date this bond was executed.

PRINCIPAL
(Signature(s))
(Name(s))
(Title(s))
(Corporate Seal)
CORPORATE SURETY(IES)
(Name and address)
State of incorporation: Liability Limit: $(Signature(s))
(Name(s) and title(s))
(Corporate seal)

(For every co-surety, provide signature(s), corporate seal, and other information in the same manner as for Surety above.)

Bond premium: $

(l)(1) A trust agreement, as specified in Subsection R315-261-147(j), shall be worded as follows, except that instructions in parentheses are to be replaced with the relevant information and the parentheses deleted:

Trust Agreement

Trust Agreement, the "Agreement," entered into as of (date) by and between (name of the owner or operator) a (name of State) (insert "corporation," "partnership," "association," or "proprietorship"), the "Grantor," and (name of corporate trustee), (insert, "incorporated in the State of ____" or "a national bank"), the "trustee."

Whereas, the Waste Management and Radiation Control Board of the State of Utah, "the Board", has established certain regulations applicable to the Grantor, requiring that an owner or operator shall demonstrate financial responsibility for bodily injury and property damage to third parties caused by sudden accidental and/or nonsudden accidental occurrences arising from operations of the facility or group of facilities.

Whereas, the Grantor has elected to establish a trust to assure all or part of such financial responsibility for the facilities identified herein.

Whereas, the Grantor, acting through its duly authorized officers, has selected the Trustee to be the trustee under this agreement, and the Trustee is willing to act as trustee.

Now, therefore, the Grantor and the Trustee agree as follows:

Section 1. Definitions. As used in this Agreement:

(a) The term "BOARD", "Utah Waste Management and Radiation Control Board" created pursuant to Utah Code Annotated 19-1-106.

(b) The term "Director" means the Director, of the Division of Waste Management and Radiation Control his successors, designees, and any subsequent entity of the State of Utah upon whom the duties of regulation and enforcement of regulations governing hazardous waste.

(c) The term "Grantor" means the owner or operator who enters into this Agreement and any successors or assigns of the Grantor.

(d) The term "Trustee" means the Trustee who enters into this Agreement and any successor Trustee.

Section 2. Identification of Facilities. This agreement pertains to the facilities identified on attached schedule A (on schedule A, for each facility list the EPA and State Identification Number (if any issued), name, and address of the facility(ies) and the amount of liability coverage, or portions thereof, if more than one instrument affords combined coverage as demonstrated by this Agreement).

Section 3. Establishment of Fund. The Grantor and the Trustee hereby establish a trust fund, hereinafter the "Fund," for the benefit of any and all third parties injured or damaged by (sudden and/or nonsudden) accidental occurrences arising from operation of the facility(ies) covered by this guarantee, in the amounts of ____-(up to $1 million) per occurrence and (up to $2 million) annual aggregate for sudden accidental occurrences and ____ (up to $3 million) per occurrence and ____-(up to $6 million) annual aggregate for nonsudden occurrences, except that the Fund is not established for the benefit of third parties for the following:

(a) Bodily injury or property damage for which (insert Grantor) is obligated to pay damages by reason of the assumption of liability in a contract or agreement. This exclusion does not apply to liability for damages that (insert Grantor) would be obligated to pay in the absence of the contract or agreement.

(b) Any obligation of (insert Grantor) under a workers' compensation, disability benefits, or unemployment compensation law or any similar law.

(c) Bodily injury to:

(1) An employee of (insert Grantor) arising from, and in the course of, employment by (insert Grantor); or

(2) The spouse, child, parent, brother or sister of that employee as a consequence of, or arising from, and in the course of employment by (insert Grantor). This exclusion applies:

(A) Whether (insert Grantor) may be liable as an employer or in any other capacity; and

(B) To any obligation to share damages with or repay another person who shall pay damages because of the injury to persons identified in paragraphs (1) and (2).

(d) Bodily injury or property damage arising out of the

ownership, maintenance, use, or entrustment to others of any aircraft, motor vehicle or watercraft.

(e) Property damage to:

(1) Any property owned, rented, or occupied by (insert Grantor);

(2) Premises that are sold, given away or abandoned by (insert Grantor) if the property damage arises out of any part of those premises;

(3) Property loaned to (insert Grantor);

(4) Personal property in the care, custody or control of (insert Grantor);

(5) That particular part of real property on which (insert Grantor) or any contractors or subcontractors working directly or indirectly on behalf of (insert Grantor) are performing operations, if the property damage arises out of these operations.

In the event of combination with another mechanism for liability coverage, the Fund shall be considered (insert "primary" or "excess") coverage.

The Fund is established initially as consisting of the property, which is acceptable to the Trustee, described in Schedule B attached hereto. Such property and any other property subsequently transferred to the Trustee is referred to as the Fund, together with all earnings and profits thereon, less any payments or distributions made by the Trustee pursuant to this Agreement. The Fund shall be held by the Trustee, IN TRUST, as hereinafter provided. The Trustee shall not be responsible nor shall it undertake any responsibility for the amount or adequacy of, nor any duty to collect from the Grantor, any payments necessary to discharge any liabilities of the Grantor established by Director.

Section 4. Payment for Bodily Injury or Property Damage. The Trustee shall satisfy a third party liability claim by making payments from the Fund only upon receipt of one of the following documents;

(a) Certification from the Grantor and the third party claimant(s) that the liability claim should be paid. The certification shall be worded as follows, except that instructions in parentheses are to be replaced with the relevant information and the parentheses deleted:

Certification of Valid Claim

The undersigned, as parties (insert Grantor) and (insert name and address of third party claimant(s)), hereby certify that the claim of bodily injury and/or property damage caused by a (sudden or nonsudden) accidental occurrence arising from operating (Grantor's) facility or group of facilities should be paid in the amount of $( ).

(Signatures)

Grantor

(Signatures)

Claimant(s)

(b) A valid final court order establishing a judgment against the Grantor for bodily injury or property damage caused by sudden or nonsudden accidental occurrences arising from the operation of the Grantor's facility or group of facilities.

Section 5. Payments Comprising the Fund. Payments made to the Trustee for the Fund shall consist of cash or securities acceptable to the Trustee.

Section 6. Trustee Management. The Trustee shall invest and reinvest the principal and income, in accordance with general investment policies and guidelines which the Grantor may communicate in writing to the Trustee from time to time, subject, however, to the provisions of this section. In investing, reinvesting, exchanging, selling, and managing the Fund, the Trustee shall discharge his duties with respect to the trust fund solely in the interest of the beneficiary and with the care, skill, prudence, and diligence under the circumstance then prevailing which persons of prudence, acting in a like capacity and familiar with such matters, would use in the conduct of an enterprise of a like character and with like aims; except that:

(i) Securities or other obligations of the Grantor, or any other owner or operator of the facilities, or any of their affiliates as defined in the Investment Company Act of 1940, as amended, 15 U.S.C. 80a-2.(a), shall not be acquired or held unless they are securities or other obligations of the Federal or a State government;

(ii) The Trustee is authorized to invest the Fund in time or demand deposits of the Trustee, to the extent insured by an agency of the Federal or State government; and

(iii) The Trustee is authorized to hold cash awaiting investment or distribution uninvested for a reasonable time and without liability for the payment of interest thereon.

Section 7. Commingling and Investment. The Trustee is expressly authorized in its discretion:

(a) To transfer from time to time any or all of the assets of the Fund to any common commingled, or collective trust fund created by the Trustee in which the fund is eligible to participate, subject to all of the provisions thereof, to be commingled with the assets of other trusts participating therein; and

(b) To purchase shares in any investment company registered under the Investment Company Act of 1940, 15 U.S.C. 81a-1 et seq., including one which may be created, managed, underwritten, or to which investment advice is rendered or the shares of which are sold by the Trustee. The Trustee may vote such shares in its discretion.

Section 8. Express Powers of Trustee. Without in any way limiting the powers and discretions conferred upon the Trustee by the other provisions of this Agreement or by law, the Trustee is expressly authorized and empowered:

(a) To sell, exchange, convey, transfer, or otherwise dispose of any property held by it, by public or private sale. No person dealing with the Trustee shall be bound to see to the application of the purchase money or to inquire into the validity or expediency of any such sale or other disposition;

(b) To make, execute, acknowledge, and deliver any and all documents of transfer and conveyance and any and all other instruments that may be necessary or appropriate to carry out the powers herein granted;

(c) To register any securities held in the Fund in its own name or in the name of a nominee and to hold any security in bearer form or in book entry, or to combine certificates representing such securities with certificates of the same issue held by the Trustee in other fiduciary capacities, or to deposit or arrange for the deposit of such securities in a qualified central depository even though, when so deposited, such securities may be merged and held in bulk in the name of the nominee of such depository with other securities deposited therein by another person, or to deposit or arrange for the deposit of any securities issued by the United States Government, or any agency or instrumentality thereof, with a Federal Reserve bank, but the books and records of the Trustee shall at all times show that all such securities are part of the Fund;

(d) To deposit any cash in the Fund in interest-bearing accounts maintained or savings certificates issued by the Trustee, in its separate corporate capacity, or in any other banking institution affiliated with the Trustee, to the extent insured by an agency of the Federal or State government; and

(e) To compromise or otherwise adjust all claims in favor of or against the Fund.

Section 9. Taxes and Expenses. All taxes of any kind that may be assessed or levied against or in respect of the Fund and all brokerage commissions incurred by the Fund shall be paid from the Fund. All other expenses incurred by the Trustee in connection with the administration of this Trust, including fees for legal services rendered to the Trustee, the compensation of the Trustee to the extent not paid directly by the Grantor, and all other proper charges and disbursements of the Trustee shall be paid from the Fund.

Section 10. Annual Valuations. The Trustee shall annually, at least 30 days prior to the anniversary date of establishment of the Fund, furnish to the Grantor and to the Director a statement confirming the value of the Trust. Any securities in the Fund shall be valued at market value as of no more than 60 days prior to the anniversary date of establishment of the Fund. The failure of the Grantor to object in writing to the Trustee within 90 days after the statement has been furnished to the Grantor and the Director shall constitute a conclusively binding assent by the Grantor barring the Grantor from asserting any claim or liability against the Trustee with respect to matters disclosed in the statement.

Section 11. Advice of Counsel. The Trustee may from time to time consult with counsel, who may be counsel to the Grantor with respect to any question arising as to the construction of this Agreement or any action to be taken hereunder. The Trustee shall be fully protected, to the extent permitted by law, in acting upon the advice of counsel.

Section 12. Trustee Compensation. The Trustee shall be entitled to reasonable compensation for its services as agreed upon in writing from time to time with the Grantor.

Section 13. Successor Trustee. The Trustee may resign or the Grantor may replace the Trustee, but such resignation or replacement shall not be effective until the Grantor has appointed a successor trustee and this successor accepts the appointment. The successor trustee shall have the same powers and duties as those conferred upon the Trustee hereunder. Upon the successor trustee's acceptance of the appointment, the Trustee shall assign, transfer, and pay over to the successor trustee the funds and properties then constituting the Fund. If for any reason the Grantor cannot or does not act in the event of the resignation of the Trustee, the Trustee may apply to a court of competent jurisdiction for the appointment of a successor trustee or for instructions. The successor trustee shall specify the date on which it assumes administration of the trust in a writing sent to the Grantor, the Director, and the present Trustee by certified mail 10 days before such change becomes effective. Any expenses incurred by the Trustee as a result of any of the acts contemplated by this section shall be paid as provided in Section 9.

Section 14. Instructions to the Trustee. All orders, requests, and instructions by the Grantor to the Trustee shall be in writing, signed by such persons as are designated in the attached Exhibit A or such other designees as the Grantor may designate by amendments to Exhibit A. The Trustee shall be fully protected in acting without inquiry in accordance with the Grantor's orders, requests, and instructions. All orders, requests, and instructions by the Director to the Trustee shall be in writing, signed by the Director, or their designees, and the Trustee shall act and shall be fully protected in acting in accordance with such orders, requests, and instructions. The Trustee shall have the right to assume, in the absence of written notice to the contrary, that no event constituting a change or a termination of the authority of any person to act on behalf of the Grantor or the Director hereunder has occurred. The Trustee shall have no duty to act in the absence of such orders, requests, and instructions from the Grantor and/or the Direcotr, except as provided for herein.

Section 15. Notice of Nonpayment. If a payment for bodily injury or property damage is made under Section 4 of this trust, the Trustee shall notify the Grantor of such payment and the amount(s) thereof within five (5) working days. The Grantor shall, on or before the anniversary date of the establishment of the Fund following such notice, either make payments to the Trustee in amounts sufficient to cause the trust to return to its value immediately prior to the payment of claims under Section 4, or shall provide written proof to the Trustee that other financial assurance for liability coverage has been obtained equaling the amount necessary to return the trust to its value prior to the payment of claims. If the Grantor does not either make payments to the Trustee or provide the Trustee with such proof, the Trustee shall within 10 working days after the anniversary date of the establishment of the Fund provide a written notice of nonpayment to the Director.

Section 16. Amendment of Agreement. This Agreement may be amended by an instrument in writing executed by the Grantor, the Trustee, and the Director, or by the Trustee and the Director if the Grantor ceases to exist.

Section 17. Irrevocability and Termination. Subject to the right of the parties to amend this Agreement as provided in Section 16, this Trust shall be irrevocable and shall continue until terminated at the written agreement of the Grantor, the Trustee, and the Director, or by the Trustee and the Director, if the Grantor ceases to exist. Upon termination of the Trust, all remaining trust property, less final trust administration expenses, shall be delivered to the Grantor.

The Director shall agree to termination of the Trust when the owner or operator substitutes alternate financial assurance as specified in this section.

Section 18. Immunity and Indemnification. The Trustee shall not incur personal liability of any nature in connection with any act or omission, made in good faith, in the administration of this Trust, or in carrying out any directions by the Grantor or the Director issued in accordance with this Agreement. The Trustee shall be indemnified and saved harmless by the Grantor or from the Trust Fund, or both, from and against any personal liability to which the Trustee may be subjected by reason of any act or conduct in its official capacity, including all expenses reasonably incurred in its defense in the event the Grantor fails to provide such defense.

Section 19. Choice of Law. This Agreement shall be administered, construed, and enforced according to the laws of the State of Utah.

Section 20. Interpretation. As used in this Agreement, words in the singular include the plural and words in the plural include the singular. The descriptive headings for each section of this Agreement shall not affect the interpretation or the legal efficacy of this Agreement.

In Witness Whereof the parties have caused this Agreement to be executed by their respective officers duly authorized and their corporate seals to be hereunto affixed and attested as of the date first above written. The parties below certify that the wording of this Agreement is identical to the wording specified in Subsection R315-261-151(l) as such regulations were constituted on the date first above written.

(Signature of Grantor)
(Title)
Attest:
(Title)
(Seal)
(Signature of Trustee)
Attest:
(Title)
(Seal)

(2) The following is an example of the certification of acknowledgement which shall accompany the trust agreement for a trust fund as specified in Subsection R315-261-147(j). State requirements may differ on the proper

State of
County of

On this (date), before me personally came (owner or operator) to me known, who, being by me duly sworn, did depose and say that she/he resides at (address), that she/he is (title) of (corporation), the corporation described in and which executed the above instrument; that she/he knows the seal of said corporation; that the seal affixed to such instrument is such corporate seal; that it was so affixed by order of the Board of Directors of said corporation, and that she/he signed her/ his

name thereto by like order.

(Signature of Notary Public)

(m)(1) A standby trust agreement, as specified in Subsection R315-261-147(h), shall be worded as follows, except that instructions in parentheses are to be replaced with the relevant information and the parentheses deleted:

Standby Trust Agreement

Trust Agreement, the "Agreement," entered into as of (date) by and between (name of the owner or operator) a (name of a State) (insert "corporation," "partnership," "association," or "proprietorship"), the "Grantor," and (name of corporate trustee), (insert, "incorporated in the State of _____" or "a national bank"), the "trustee."

Whereas the Utah Waste Management and Radiation Control Board (Board), has established certain regulations applicable to the Grantor, requiring that an owner or operator shall demonstrate financial responsibility for bodily injury and property damage to third parties caused by sudden accidental and/or nonsudden accidental occurrences arising from operations of the facility or group of facilities.

Whereas, the Grantor has elected to establish a standby trust into which the proceeds from a letter of credit may be deposited to assure all or part of such financial responsibility for the facilities identified herein.

Whereas, the Grantor, acting through its duly authorized officers, has selected the Trustee to be the trustee under this agreement, and the Trustee is willing to act as trustee.

Now, therefore, the Grantor and the Trustee agree as follows:

Section 1. Definitions. As used in this Agreement:

(a) The term "Board", "Utah Waste Management and Radiation Control Board" created pursuant to Utah Code Annotated 19-1-106.

(b) The term "Director" means the Director,of the Division of Waste Management and Radiation Control his successors, designees, and any subsequent entity of the State of Utah upon whom the duties of regulation and enforcement of regulations governing hazardous waste.

(c) The term Grantor means the owner or operator who enters into this Agreement and any successors or assigns of the Grantor.

(d) The term Trustee means the Trustee who enters into this Agreement and any successor Trustee.

Section 2. Identification of Facilities. This Agreement pertains to the facilities identified on attached schedule A (on schedule A, for each facility list the EPA and State Identification Number (if any issued), name, and address of the facility(ies) and the amount of liability coverage, or portions thereof, if more than one instrument affords combined coverage as demonstrated by this Agreement).

Section 3. Establishment of Fund. The Grantor and the Trustee hereby establish a standby trust fund, hereafter the "Fund," for the benefit of any and all third parties injured or damaged by (sudden and/or nonsudden) accidental occurrences arising from operation of the facility(ies) covered by this guarantee, in the amounts of ____-(up to $1 million) per occurrence and ____-(up to $2 million) annual aggregate for sudden accidental occurrences and ____-(up to $3 million) per occurrence and ____-(up to $6 million) annual aggregate for nonsudden occurrences, except that the Fund is not established for the benefit of third parties for the following:

(a) Bodily injury or property damage for which (insert Grantor) is obligated to pay damages by reason of the assumption of liability in a contract or agreement. This exclusion does not apply to liability for damages that (insert Grantor) would be obligated to pay in the absence of the contract or agreement.

(b) Any obligation of (insert Grantor) under a workers' compensation, disability benefits, or unemployment compensation law or any similar law.

(c) Bodily injury to:

(1) An employee of (insert Grantor) arising from, and in the course of, employment by (insert Grantor); or

(2) The spouse, child, parent, brother or sister of that employee as a consequence of, or arising from, and in the course of employment by (insert Grantor).

This exclusion applies:

(A) Whether (insert Grantor) may be liable as an employer or in any other capacity; and

(B) To any obligation to share damages with or repay another person who shall pay damages because of the injury to persons identified in paragraphs (1) and (2).

(d) Bodily injury or property damage arising out of the ownership, maintenance, use, or entrustment to others of any aircraft, motor vehicle or watercraft.

(e) Property damage to:

(1) Any property owned, rented, or occupied by (insert Grantor);

(2) Premises that are sold, given away or abandoned by (insert Grantor) if the property damage arises out of any part of those premises;

(3) Property loaned by (insert Grantor);

(4) Personal property in the care, custody or control of (insert Grantor);

(5) That particular part of real property on which (insert Grantor) or any contractors or subcontractors working directly or indirectly on behalf of (insert Grantor) are performing operations, if the property damage arises out of these operations.

In the event of combination with another mechanism for liability coverage, the Fund shall be considered (insert "primary" or "excess") coverage.

The Fund is established initially as consisting of the proceeds of the letter of credit deposited into the Fund. Such proceeds and any other property subsequently transferred to the Trustee is referred to as the Fund, together with all earnings and profits thereon, less any payments or distributions made by the Trustee pursuant to this Agreement. The Fund shall be held by the Trustee, IN TRUST, as hereinafter provided. The Trustee shall not be responsible nor shall it undertake any responsibility for the amount or adequacy of, nor any duty to collect from the Grantor, any payments necessary to discharge any liabilities of the Grantor established by the Director.

Section 4. Payment for Bodily Injury or Property Damage. The Trustee shall satisfy a third party liability claim by drawing on the letter of credit described in Schedule B and by making payments from the Fund only upon receipt of one of the following documents:

(a) Certification from the Grantor and the third party claimant(s) that the liability claim should be paid. The certification shall be worded as follows, except that instructions in parentheses are to be replaced with the relevant information and the parentheses deleted:

Certification of Valid Claim

The undersigned, as parties (insert Grantor) and (insert name and address of third party claimant(s)), hereby certify that the claim of bodily injury and/or property damage caused by a (sudden or nonsudden) accidental occurrence arising from operating (Grantor's) facility should be paid in the amount of $( )

(Signature)

Grantor

(Signatures)

Claimant(s)

(b) A valid final court order establishing a judgment against the Grantor for bodily injury or property damage caused by sudden or nonsudden accidental occurrences arising from the operation of the Grantor's facility or group of facilities.

Section 5. Payments Comprising the Fund. Payments

made to the Trustee for the Fund shall consist of the proceeds from the letter of credit drawn upon by the Trustee in accordance with the requirements of Subsection R315-261-151(k) and Section 4 of this Agreement.

Section 6. Trustee Management. The Trustee shall invest and reinvest the principal and income, in accordance with general investment policies and guidelines which the Grantor may communicate in writing to the Trustee from time to time, subject, however, to the provisions of this Section. In investing, reinvesting, exchanging, selling, and managing the Fund, the Trustee shall discharge his duties with respect to the trust fund solely in the interest of the beneficiary and with the care, skill, prudence, and diligence under the circumstances then prevailing which persons of prudence, acting in a like capacity and familiar with such matters, would use in the conduct of an enterprise of a like character and with like aims; except that:

(i) Securities or other obligations of the Grantor, or any other owner or operator of the facilities, or any of their affiliates as defined in the Investment Company Act of 1940, as amended, 15 U.S.C. 80a-2(a), shall not be acquired or held, unless they are securities or other obligations of the Federal or a State government;

(ii) The Trustee is authorized to invest the Fund in time or demand deposits of the Trustee, to the extent insured by an agency of the Federal or a State government; and

(iii) The Trustee is authorized to hold cash awaiting investment or distribution uninvested for a reasonable time and without liability for the payment of interest thereon.

Section 7. Commingling and Investment. The Trustee is expressly authorized in its discretion:

(a) To transfer from time to time any or all of the assets of the Fund to any common, commingled, or collective trust fund created by the Trustee in which the Fund is eligible to participate, subject to all of the provisions thereof, to be commingled with the assets of other trusts participating therein; and

(b) To purchase shares in any investment company registered under the Investment Company Act of 1940, 15 U.S.C. 80a-1 et seq., including one which may be created, managed, underwritten, or to which investment advice is rendered or the shares of which are sold by the Trustee. The Trustee may vote such shares in its discretion.

Section 8. Express Powers of Trustee. Without in any way limiting the powers and discretions conferred upon the Trustee by the other provisions of this Agreement or by law, the Trustee is expressly authorized and empowered:

(a) To sell, exchange, convey, transfer, or otherwise dispose of any property held by it, by public or private sale. No person dealing with the Trustee shall be bound to see to the application of the purchase money or to inquire into the validity or expediency of any such sale or other disposition;

(b) To make, execute, acknowledge, and deliver any and all documents of transfer and conveyance and any and all other instruments that may be necessary or appropriate to carry out the powers herein granted;

(c) To register any securities held in the Fund in its own name or in the name of a nominee and to hold any security in bearer form or in book entry, or to combine certificates representing such securities with certificates of the same issue held by the Trustee in other fiduciary capacities, or to deposit or arrange for the deposit of such securities in a qualified central depositary even though, when so deposited, such securities may be merged and held in bulk in the name of the nominee of such depositary with other securities deposited therein by another person, or to deposit or arrange for the deposit of any securities issued by the United States Government, or any agency or instrumentality thereof, with a Federal Reserve Bank, but the books and records of the Trustee shall at all times show that all such securities are part of the Fund;

(d) To deposit any cash in the Fund in interest-bearing accounts maintained or savings certificates issued by the Trustee, in its separate corporate capacity, or in any other banking institution affiliated with the Trustee, to the extent insured by an agency of the Federal or State government; and

(e) To compromise or otherwise adjust all claims in favor of or against the Fund.

Section 9. Taxes and Expenses. All taxes of any kind that may be assessed or levied against or in respect of the Fund and all brokerage commissions incurred by the Fund shall be paid from the Fund. All other expenses incurred by the Trustee in connection with the administration of this Trust, including fees for legal services rendered to the Trustee, the compensation of the Trustee to the extent not paid directly by the Grantor, and all other proper charges and disbursements to the Trustee shall be paid from the Fund.

Section 10. Advice of Counsel. The Trustee may from time to time consult with counsel, who may be counsel to the Grantor, with respect to any question arising as to the construction of this Agreement or any action to be taken hereunder. The Trustee shall be fully protected, to the extent permitted by law, in acting upon the advice of counsel.

Section 11. Trustee Compensation. The Trustee shall be entitled to reasonable compensation for its services as agreed upon in writing from time to time with the Grantor.

Section 12. Successor Trustee. The Trustee may resign or the Grantor may replace the Trustee, but such resignation or replacement shall not be effective until the Grantor has appointed a successor trustee and this successor accepts the appointment. The successor trustee shall have the same powers and duties as those conferred upon the Trustee hereunder. Upon the successor trustee's acceptance of the appointment, the Trustee shall assign, transfer, and pay over to the successor trustee the funds and properties then constituting the Fund. If for any reason the Grantor cannot or does not act in the event of the resignation of the Trustee, the Trustee may apply to a court of competent jurisdiction for the appointment of a successor trustee or for instructions. The successor trustee shall specify the date on which it assumes administration of the trust in a writing sent to the Grantor, the Director and the present Trustee by certified mail 10 days before such change becomes effective. Any expenses incurred by the Trustee as a result of any of the acts contemplated by this Section shall be paid as provided in Section 9.

Section 13. Instructions to the Trustee. All orders, requests, certifications of valid claims, and instructions to the Trustee shall be in writing, signed by such persons as are designated in the attached Exhibit A or such other designees as the Grantor may designate by amendments to Exhibit A. The Trustee shall be fully protected in acting without inquiry in accordance with the Grantor's orders, requests, and instructions. The Trustee shall have the right to assume, in the absence of written notice to the contrary, that no event constituting a change or a termination of the authority of any person to act on behalf of the Grantor or the Director hereunder has occurred. The Trustee shall have no duty to act in the absence of such orders, requests, and instructions from the Grantor and/or the Director, except as provided for herein.

Section 14. Amendment of Agreement. This Agreement may be amended by an instrument in writing executed by the Grantor, the Trustee, and the Director, or by the Trustee and the Director if the Grantor ceases to exist.

Section 15. Irrevocability and Termination. Subject to the right of the parties to amend this Agreement as provided in Section 14, this Trust shall be irrevocable and shall continue until terminated at the written agreement of the Grantor, the Trustee, and the Director, or by the Trustee and the Director, if the Grantor ceases to exist. Upon termination of the Trust, all remaining trust property, less final trust administration

expenses, shall be paid to the Grantor.

The Director shall agree to termination of the Trust when the owner or operator substitutes alternative financial assurance as specified in this section.

Section 16. Immunity and indemnification. The Trustee shall not incur personal liability of any nature in connection with any act or omission, made in good faith, in the administration of this Trust, or in carrying out any directions by the Grantor and the Director issued in accordance with this Agreement. The Trustee shall be indemnified and saved harmless by the Grantor or from the Trust Fund, or both, from and against any personal liability to which the Trustee may be subjected by reason of any act or conduct in its official capacity, including all expenses reasonably incurred in its defense in the event the Grantor fails to provide such defense.

Section 17. Choice of Law. This Agreement shall be administered, construed, and enforced according to the laws of the State of Utah.

Section 18. Interpretation. As used in this Agreement, words in the singular include the plural and words in the plural include the singular. The descriptive headings for each Section of this Agreement shall not affect the interpretation of the legal efficacy of this Agreement.

In Witness Whereof the parties have caused this Agreement to be executed by their respective officers duly authorized and their corporate seals to be hereunto affixed and attested as of the date first above written. The parties below certify that the wording of this Agreement is identical to the wording specified in Subsection R315-261-151(m) as such regulations were constituted on the date first above written.

(Signature of Grantor)

(Title)

Attest:

(Title)

(Seal)

(Signature of Trustee)

Attest:

(Title)

(Seal)

(2) The following is an example of the certification of acknowledgement which shall accompany the trust agreement for a standby trust fund as specified in Subsection R315-261-147(h).

State of

County of

On this (date), before me personally came (owner or operator) to me known, who, being by me duly sworn, did depose and say that she/he resides at (address), that she/he is (title) of (corporation), the corporation described in and which executed the above instrument; that she/he knows the seal of said corporation; that the seal affixed to such instrument is such corporate seal; that it was so affixed by order of the Board of Directors of said corporation, and that she/he signed her/ his name thereto by like order.

(Signature of Notary Public)

R315-261-170. Use and Management of Containers - Applicability.

Sections R315-261-170 through 179 apply to hazardous secondary materials excluded under the remanufacturing exclusion at Subsection R315-261-4(a)(27) and stored in containers.

R315-261-171. Use and Management of Containers - Condition of Containers.

If a container holding hazardous secondary material is not in good condition, e.g., severe rusting, apparent structural defects, or if it begins to leak, the hazardous secondary material shall be transferred from this container to a container that is in good condition or managed in some other way that complies with the requirements of Rule R315-261.

R315-261-172. Use and Management of Containers - Compatibility Of Hazardous Secondary Materials With Containers.

The container shall be made of or lined with materials which will not react with, and are otherwise compatible with, the hazardous secondary material to be stored, so that the ability of the container to contain the material is not impaired.

R315-261-173. Use and Management of Containers - Management of Containers.

(a) A container holding hazardous secondary material shall always be closed during storage, except when it is necessary to add or remove the hazardous secondary material.

(b) A container holding hazardous secondary material shall not be opened, handled, or stored in a manner which may rupture the container or cause it to leak.

R315-261-175. Use and Management of Containers - Containment.

(a) Container storage areas shall have a containment system that is designed and operated in accordance with Subsection R315-261-175(b).

(b) A containment system shall be designed and operated as follows:

(1) A base shall underlie the containers which is free of cracks or gaps and is sufficiently impervious to contain leaks, spills, and accumulated precipitation until the collected material is detected and removed;

(2) The base shall be sloped or the containment system shall be otherwise designed and operated to drain and remove liquids resulting from leaks, spills, or precipitation, unless the containers are elevated or are otherwise protected from contact with accumulated liquids;

(3) The containment system shall have sufficient capacity to contain 10% of the volume of containers or the volume of the largest container, whichever is greater.

(4) Run-on into the containment system shall be prevented unless the collection system has sufficient excess capacity in addition to that required in Subsection R315-261-175(b)(3) to contain any run-on which might enter the system; and

(5) Spilled or leaked material and accumulated precipitation shall be removed from the sump or collection area in as timely a manner as is necessary to prevent overflow of the collection system.

R315-261-176. Use and Management of Containers - Special Requirements for Ignitable or Reactive Hazardous Secondary Material.

Containers holding ignitable or reactive hazardous secondary material shall be located at least 15 meters (50 feet) from the facility's property line.

R315-261-177. Use and Management of Containers - Special Requirements for Incompatible Materials.

(a) Incompatible materials shall not be placed in the same container.

(b) Hazardous secondary material shall not be placed in an unwashed container that previously held an incompatible material.

(c) A storage container holding a hazardous secondary material that is incompatible with any other materials stored nearby shall be separated from the other materials or protected from them by means of a dike, berm, wall, or other device.

R315-261-179. Use and Management of Containers - Air Emission Standards.

The remanufacturer or other person that stores or treats the hazardous secondary material shall manage all hazardous secondary material placed in a container in accordance with the applicable requirements of Sections R315-261-1030 through 1035, 1050 through 1064 and 1080 through 1089.

R315-261-190. Tank Systems - Applicability.

(a) The requirements of Sections R315-261-190 through 200 apply to tank systems for storing or treating hazardous secondary material excluded under the remanufacturing exclusion at Subsection R315-261-4(a)(27).

(b) Tank systems, including sumps, as defined in Section R315-260-10, that serve as part of a secondary containment system to collect or contain releases of hazardous secondary materials are exempted from the requirements in Subsection R315-261-193(a).

R315-261-191. Tank Systems - Assessment of Existing Tank System's Integrity.

(a) Tank systems shall meet the secondary containment requirements of Section R315-261-193, or the remanufacturer or other person that handles the hazardous secondary material shall determine that the tank system is not leaking or is unfit for use. Except as provided in Subsection R315-261-191(c), a written assessment reviewed and certified by a qualified Professional Engineer shall be kept on file at the remanufacturer's facility or other facility that stores or treats the hazardous secondary material that attests to the tank system's integrity.

(b) This assessment shall determine that the tank system is adequately designed and has sufficient structural strength and compatibility with the material(s) to be stored or treated, to ensure that it will not collapse, rupture, or fail. At a minimum, this assessment shall consider the following:

(1) Design standard(s), if available, according to which the tank and ancillary equipment were constructed;

(2) Hazardous characteristics of the material(s) that have been and will be handled;

(3) Existing corrosion protection measures;

(4) Documented age of the tank system, if available, otherwise, an estimate of the age; and

(5) Results of a leak test, internal inspection, or other tank integrity examination such that:

(i) For non-enterable underground tanks, the assessment shall include a leak test that is capable of taking into account the effects of temperature variations, tank end deflection, vapor pockets, and high water table effects, and

(ii) For other than non-enterable underground tanks and for ancillary equipment, this assessment shall include either a leak test, as described above, or other integrity examination that is certified by a qualified Professional Engineer that addresses cracks, leaks, corrosion, and erosion.

Note to Subsection R315-261-191(b)(5)(ii): The practices described in the American Petroleum Institute (API) Publication, Guide for Inspection of Refinery Equipment, Chapter XIII, "Atmospheric and Low-Pressure Storage Tanks," 4th edition, 1981, may be used, where applicable, as guidelines in conducting other than a leak test.

(c) If, as a result of the assessment conducted in accordance with Subsection R315-261-191(a), a tank system is found to be leaking or unfit for use, the remanufacturer or other person that stores or treats the hazardous secondary material shall comply with the requirements of Section R315-261-196.

R315-261-193. Tank Systems - Containment and Detection of Releases.

(a) Secondary containment systems shall be:

(1) Designed, installed, and operated to prevent any migration of materials or accumulated liquid out of the system to the soil, ground water, or surface water at any time during the use of the tank system; and

(2) Capable of detecting and collecting releases and accumulated liquids until the collected material is removed.

Note to Subsection R315-261-193(a): If the collected material is a hazardous waste under Rule R315-261, it is subject to management as a hazardous waste in accordance with all applicable requirements of Rules R315-262 through 265, 266, and 268. If the collected material is discharged through a point source to waters of the United States, it is subject to the requirements of sections 301, 304, and 402 of the Clean Water Act, as amended. If discharged to a Publicly Owned Treatment Works (POTW), it is subject to the requirements of section 307 of the Clean Water Act, as amended. If the collected material is released to the environment, it may be subject to the reporting requirements of 40 CFR part 302.

(b) To meet the requirements of Subsection R315-261-193(a), secondary containment systems shall be at a minimum:

(1) Constructed of or lined with materials that are compatible with the materials(s) to be placed in the tank system and shall have sufficient strength and thickness to prevent failure owing to pressure gradients, including static head and external hydrological forces, physical contact with the material to which it is exposed, climatic conditions, and the stress of daily operation, (including stresses from nearby vehicular traffic;

(2) Placed on a foundation or base capable of providing support to the secondary containment system, resistance to pressure gradients above and below the system, and capable of preventing failure due to settlement, compression, or uplift;

(3) Provided with a leak-detection system that is designed and operated so that it will detect the failure of either the primary or secondary containment structure or the presence of any release of hazardous secondary material or accumulated liquid in the secondary containment system at the earliest practicable time; and

(4) Sloped or otherwise designed or operated to drain and remove liquids resulting from leaks, spills, or precipitation. Spilled or leaked material and accumulated precipitation shall be removed from the secondary containment system within 24 hours, or in as timely a manner as is possible to prevent harm to human health and the environment.

(c) Secondary containment for tanks shall include one or more of the following devices:

(1) A liner, external to the tank;

(2) A vault; or

(3) A double-walled tank.

(d) In addition to the requirements of Subsections R315-261-193(a), (b), and (c), secondary containment systems shall satisfy the following requirements:

(1) External liner systems shall be:

(i) Designed or operated to contain 100 percent of the capacity of the largest tank within its boundary;

(ii) Designed or operated to prevent run-on or infiltration of precipitation into the secondary containment system unless the collection system has sufficient excess capacity to contain run-on or infiltration. Such additional capacity shall be sufficient to contain precipitation from a 25-year, 24-hour rainfall event.

(iii) Free of cracks or gaps; and

(iv) Designed and installed to surround the tank completely and to cover all surrounding earth likely to come into contact with the material if the material is released from the tank(s), i.e., capable of preventing lateral as well as vertical migration of the material.

(2) Vault systems shall be:

(i) Designed or operated to contain 100 percent of the capacity of the largest tank within its boundary;

(ii) Designed or operated to prevent run-on or infiltration

of precipitation into the secondary containment system unless the collection system has sufficient excess capacity to contain run-on or infiltration. Such additional capacity shall be sufficient to contain precipitation from a 25-year, 24-hour rainfall event;

(iii) Constructed with chemical-resistant water stops in place at all joints, if any;

(iv) Provided with an impermeable interior coating or lining that is compatible with the stored material and that will prevent migration of material into the concrete;

(v) Provided with a means to protect against the formation of and ignition of vapors within the vault, if the material being stored or treated is ignitable or reactive; and

(vi) Provided with an exterior moisture barrier or be otherwise designed or operated to prevent migration of moisture into the vault if the vault is subject to hydraulic pressure.

(3) Double-walled tanks shall be:

(i) Designed as an integral structure, i.e., an inner tank completely enveloped within an outer shell, so that any release from the inner tank is contained by the outer shell;

(ii) Protected, if constructed of metal, from both corrosion of the primary tank interior and of the external surface of the outer shell; and

(iii) Provided with a built-in continuous leak detection system capable of detecting a release within 24 hours, or at the earliest practicable time.

Note to Subsection R315-261-193(d)(3): The provisions outlined in the Steel Tank Institute's (STI) "Standard for Dual Wall Underground Steel Storage Tanks" may be used as guidelines for aspects of the design of underground steel double-walled tanks.

(e) Reserved

(f) Ancillary equipment shall be provided with secondary containment, e.g., trench, jacketing, double-walled piping, that meets the requirements of Subsections R315-261-193(a) and (b) except for:

(1) Aboveground piping, exclusive of flanges, joints, valves, and other connections, that are visually inspected for leaks on a daily basis;

(2) Welded flanges, welded joints, and welded connections that are visually inspected for leaks on a daily basis;

(3) Sealless or magnetic coupling pumps and sealless valves that are visually inspected for leaks on a daily basis; and

(4) Pressurized aboveground piping systems with automatic shut-off devices, e.g., excess flow check valves, flow metering shutdown devices, loss of pressure actuated shut-off devices, that are visually inspected for leaks on a daily basis.

R315-261-194. Tank Systems - General Operating Requirements.

(a) Hazardous secondary materials or treatment reagents shall not be placed in a tank system if they could cause the tank, its ancillary equipment, or the containment system to rupture, leak, corrode, or otherwise fail.

(b) The remanufacturer or other person that stores or treats the hazardous secondary material shall use appropriate controls and practices to prevent spills and overflows from tank or containment systems. These include at a minimum:

(1) Spill prevention controls, e.g., check valves, dry disconnect couplings;

(2) Overfill prevention controls, e.g., level sensing devices, high level alarms, automatic feed cutoff, or bypass to a standby tank; and

(3) Maintenance of sufficient freeboard in uncovered tanks to prevent overtopping by wave or wind action or by precipitation.

(c) The remanufacturer or other person that stores or treats the hazardous secondary material shall comply with the requirements of Section R315-261-196 if a leak or spill occurs in the tank system.

R315-261-196. Tank Systems - Response To Leaks or Spills and Disposition of Leaking or Unfit-For-Use Tank Systems.

A tank system or secondary containment system from which there has been a leak or spill, or which is unfit for use, shall be removed from service immediately, and the remanufacturer or other person that stores or treats the hazardous secondary material shall satisfy the following requirements:

(a) Cessation of use; prevent flow or addition of materials. The remanufacturer or other person that stores or treats the hazardous secondary material shall immediately stop the flow of hazardous secondary material into the tank system or secondary containment system and inspect the system to determine the cause of the release.

(b) Removal of material from tank system or secondary containment system.

(1) If the release was from the tank system, the remanufacturer or other person that stores or treats the hazardous secondary material shall, within 24 hours after detection of the leak or, if the remanufacturer or other person that stores or treats the hazardous secondary material demonstrates that it is not possible, at the earliest practicable time, remove as much of the material as is necessary to prevent further release of hazardous secondary material to the environment and to allow inspection and repair of the tank system to be performed.

(2) If the material released was to a secondary containment system, all released materials shall be removed within 24 hours or in as timely a manner as is possible to prevent harm to human health and the environment.

(c) Containment of visible releases to the environment. The remanufacturer or other person that stores or treats the hazardous secondary material shall immediately conduct a visual inspection of the release and, based upon that inspection:

(1) Prevent further migration of the leak or spill to soils or surface water; and

(2) Remove, and properly dispose of, any visible contamination of the soil or surface water.

(d) Notifications, reports.

(1) Any release to the environment, except as provided in Subsection R315-261-196(d)(2), shall be reported to the Director within 24 hours of its detection. If the release has been reported pursuant to 40 CFR part 302, that report will satisfy this requirement.

(2) A leak or spill of hazardous secondary material is exempted from the requirements of Subsection R315-261-196(d) if it is:

(i) Less than or equal to a quantity of 1 pound, and

(ii) Immediately contained and cleaned up.

(3) Within 30 days of detection of a release to the environment, a report containing the following information shall be submitted to the Director:

(i) Likely route of migration of the release;

(ii) Characteristics of the surrounding soil, soil composition, geology, hydrogeology, climate;

(iii) Results of any monitoring or sampling conducted in connection with the release, if available. If sampling or monitoring data relating to the release are not available within 30 days, these data shall be submitted to the Director as soon as they become available.

(iv) Proximity to downgradient drinking water, surface water, and populated areas; and

(v) Description of response actions taken or planned.

(e) Provision of secondary containment, repair, or closure.

(1) Unless the remanufacturer or other person that stores or treats the hazardous secondary material satisfies the requirements of Subsections R315-261-196(e)(2) through (4),

the tank system shall cease to operate under the remanufacturing exclusion at Subsection R315-261-4(a)(27).

(2) If the cause of the release was a spill that has not damaged the integrity of the system, the remanufacturer or other person that stores or treats the hazardous secondary material may return the system to service as soon as the released material is removed and repairs, if necessary, are made.

(3) If the cause of the release was a leak from the primary tank system into the secondary containment system, the system shall be repaired prior to returning the tank system to service.

(4) If the source of the release was a leak to the environment from a component of a tank system without secondary containment, the remanufacturer or other person that stores or treats the hazardous secondary material shall provide the component of the system from which the leak occurred with secondary containment that satisfies the requirements of Section R315-261-193 before it can be returned to service, unless the source of the leak is an aboveground portion of a tank system that can be inspected visually. If the source is an aboveground component that can be inspected visually, the component shall be repaired and may be returned to service without secondary containment as long as the requirements of Subsection R315-261-196(f) are satisfied. Additionally, if a leak has occurred in any portion of a tank system component that is not readily accessible for visual inspection, e.g., the bottom of an inground or onground tank, the entire component shall be provided with secondary containment in accordance with Section R315-261-193 prior to being returned to use.

(f) Certification of major repairs. If the remanufacturer or other person that stores or treats the hazardous secondary material has repaired a tank system in accordance with Subsection R315-261-196(e), and the repair has been extensive, e.g., installation of an internal liner; repair of a ruptured primary containment or secondary containment vessel, the tank system shall not be returned to service unless the remanufacturer or other person that stores or treats the hazardous secondary material has obtained a certification by a qualified Professional Engineer that the repaired system is capable of handling hazardous secondary materials without release for the intended life of the system. This certification shall be kept on file at the facility and maintained until closure of the facility.

Note 1 to Section R315-261-196: The Director may, on the basis of any information received that there is or has been a release of hazardous secondary material or hazardous constituents into the environment, issue an order under RCRA section 7003(a) requiring corrective action or such other response as deemed necessary to protect human health or the environment.

Note 2 to Section R315-261-196: 40 CFR part 302 may require the owner or operator to notify the National Response Center of certain releases.

R315-261-197. Tank Systems - Termination of Remanufacturing Exclusion.

Hazardous secondary material stored in units more than 90 days after the unit ceases to operate under the remanufacturing exclusion at Subsection R315-261-4(a)(27) or otherwise ceases to be operated for manufacturing, or for storage of a product or a raw material, then becomes subject to regulation as hazardous waste under Rules R315-261 through 266, 268, 270, and 124, as applicable.

R315-261-198. Tank Systems - Special Requirements for Ignitable or Reactive Materials.

(a) Ignitable or reactive material shall not be placed in tank systems, unless the material is stored or treated in such a way that it is protected from any material or conditions that may cause the material to ignite or react.

(b) The remanufacturer or other person that stores or treats hazardous secondary material which is ignitable or reactive shall store or treat the hazardous secondary material in a tank that is in compliance with the requirements for the maintenance of protective distances between the material management area and any public ways, streets, alleys, or an adjoining property line that can be built upon as required in Tables 2-1 through 2-6 of the National Fire Protection Association's "Flammable and Combustible Liquids Code," (1977 or 1981), incorporated by reference, see Section R315-260-11.

R315-261-199. Tank Systems - Special Requirements for Incompatible Materials.

(a) Incompatible materials shall not be placed in the same tank system.

(b) Hazardous secondary material shall not be placed in a tank system that has not been decontaminated and that previously held an incompatible material.

R315-261-200. Tank Systems - Air Emission Standards.

The remanufacturer or other person that stores or treats the hazardous secondary material shall manage all hazardous secondary material placed in a tank in accordance with the applicable requirements of Sections R315-261-1030 through 1035, 1050 through 1064, and 1080 through 1089.

R315-261-400. Emergency Preparedness and Response for Management of Excluded Hazardous Secondary Materials - Applicability.

The requirements of Sections R315-261-400, 410, 411, and 420 apply to those areas of an entity managing hazardous secondary materials excluded under Subsection R315-261-4(a)(23) and/or (24) where hazardous secondary materials are generated or accumulated on site.

(a) A generator of hazardous secondary material, or an intermediate or reclamation facility, that accumulates 6000 kg or less of hazardous secondary material at any time shall comply with Sections R315-261-410 and 411.

(b) A generator of hazardous secondary material, or an intermediate or reclamation facility that accumulates more than 6000 kg of hazardous secondary material at any time shall comply with Sections R315-261-410 and 420.

R315-261-410. Emergency Preparedness and Response for Management of Excluded Hazardous Secondary Materials - Preparedness and Prevention.

(a) Maintenance and operation of facility. Facilities generating or accumulating hazardous secondary material shall be maintained and operated to minimize the possibility of a fire, explosion, or any unplanned sudden or non-sudden release of hazardous secondary materials or hazardous secondary material constituents to air, soil, or surface water which could threaten human health or the environment.

(b) Required equipment. All facilities generating or accumulating hazardous secondary material shall be equipped with the following, unless none of the hazards posed by hazardous secondary material handled at the facility could require a particular kind of equipment specified below:

(1) An internal communications or alarm system capable of providing immediate emergency instruction, voice or signal, to facility personnel;

(2) A device, such as a telephone, immediately available at the scene of operations, or a hand-held two-way radio, capable of summoning emergency assistance from local police departments, fire departments, or state or local emergency response teams;

(3) Portable fire extinguishers, fire control equipment, including special extinguishing equipment, such as that using foam, inert gas, or dry chemicals, spill control equipment, and decontamination equipment; and

(4) Water at adequate volume and pressure to supply water hose streams, or foam producing equipment, or automatic sprinklers, or water spray systems.

(c) Testing and maintenance of equipment. All facility communications or alarm systems, fire protection equipment, spill control equipment, and decontamination equipment, where required, shall be tested and maintained as necessary to assure its proper operation in time of emergency.

(d) Access to communications or alarm system.

(1) Whenever hazardous secondary material is being poured, mixed, spread, or otherwise handled, all personnel involved in the operation shall have immediate access to an internal alarm or emergency communication device, either directly or through visual or voice contact with another employee, unless such a device is not required under Subsection R315-261-410(b).

(2) If there is ever just one employee on the premises while the facility is operating, he shall have immediate access to a device, such as a telephone, immediately available at the scene of operation, or a hand-held two-way radio, capable of summoning external emergency assistance, unless such a device is not required under Subsection R315-261-410(b).

(e) Required aisle space. The hazardous secondary material generator or intermediate or reclamation facility shall maintain aisle space to allow the unobstructed movement of personnel, fire protection equipment, spill control equipment, and decontamination equipment to any area of facility operation in an emergency, unless aisle space is not needed for any of these purposes.

(f) Arrangements with local authorities.

(1) The hazardous secondary material generator or an intermediate or reclamation facility shall attempt to make the following arrangements, as appropriate for the type of waste handled at his facility and the potential need for the services of these organizations:

(i) Arrangements to familiarize police, fire departments, and emergency response teams with the layout of the facility, properties of hazardous secondary material handled at the facility and associated hazards, places where facility personnel would normally be working, entrances to roads inside the facility, and possible evacuation routes;

(ii) Where more than one police and fire department might respond to an emergency, agreements designating primary emergency authority to a specific police and a specific fire department, and agreements with any others to provide support to the primary emergency authority;

(iii) Agreements with state emergency response teams, emergency response contractors, and equipment suppliers; and

(iv) Arrangements to familiarize local hospitals with the properties of hazardous secondary material handled at the facility and the types of injuries or illnesses which could result from fires, explosions, or releases at the facility.

(2) Where state or local authorities decline to enter into such arrangements, the hazardous secondary material generator or an intermediate or reclamation facility shall document the refusal in the operating record.

R315-261-411. Emergency Preparedness and Response for Management of Excluded Hazardous Secondary Materials - Emergency Procedures for Facilities Generating or Accumulating 6000 Kg or Less of Hazardous Secondary Material.

A generator or an intermediate or reclamation facility that generates or accumulates 6000 kg or less of hazardous secondary material shall comply with the following requirements:

(a) At all times there shall be at least one employee either on the premises or on call, i.e., available to respond to an emergency by reaching the facility within a short period of time, with the responsibility for coordinating all emergency response measures specified in Subsection R315-261-411(d). This employee is the emergency coordinator.

(b) The generator or intermediate or reclamation facility shall post the following information next to the telephone:

(1) The name and telephone number of the emergency coordinator;

(2) Location of fire extinguishers and spill control material, and, if present, fire alarm; and

(3) The telephone number of the fire department, unless the facility has a direct alarm.

(c) The generator or an intermediate or reclamation facility shall ensure that all employees are thoroughly familiar with proper waste handling and emergency procedures, relevant to their responsibilities during normal facility operations and emergencies;

(d) The emergency coordinator or his designee shall respond to any emergencies that arise. The applicable responses are as follows:

(1) In the event of a fire, call the fire department or attempt to extinguish it using a fire extinguisher;

(2) In the event of a spill, contain the flow of hazardous waste to the extent possible, and as soon as is practicable, clean up the hazardous waste and any contaminated materials or soil;

(3) In the event of a fire, explosion, or other release which could threaten human health outside the facility or when the generator or an intermediate or reclamation facility has knowledge that a spill has reached surface water, the generator or an intermediate or reclamation facility shall immediately notify the National Response Center, using their 24-hour toll free number 800/424-8802 and follow the requirements Section R315-263-33. The report shall include the following information:

(i) The name, address, and U.S. EPA Identification Number of the facility;

(ii) Date, time, and type of incident, e.g., spill or fire;

(iii) Quantity and type of hazardous waste involved in the incident;

(iv) Extent of injuries, if any; and

(v) Estimated quantity and disposition of recovered materials, if any.

R315-261-420. Emergency Preparedness and Response for Management of Excluded Hazardous Secondary Materials - Contingency Planning and Emergency Procedures for Facilities Generating or Accumulating More Than 6000 Kg of Hazardous Secondary Material.

A generator or an intermediate or reclamation facility that generates or accumulates more than 6000 kg of hazardous secondary material shall comply with the following requirements:

(a) Purpose and implementation of contingency plan.

(1) Each generator or an intermediate or reclamation facility that accumulates more than 6000 kg of hazardous secondary material shall have a contingency plan for his facility. The contingency plan shall be designed to minimize hazards to human health or the environment from fires, explosions, or any unplanned sudden or non-sudden release of hazardous secondary material or hazardous secondary material constituents to air, soil, or surface water.

(2) The provisions of the plan shall be carried out immediately whenever there is a fire, explosion, or release of hazardous secondary material or hazardous secondary material constituents which could threaten human health or the environment.

(b) Content of contingency plan.

(1) The contingency plan shall describe the actions facility personnel shall take to comply with Subsection R315-261-420(a) and (f) in response to fires, explosions, or any unplanned

sudden or non-sudden release of hazardous secondary material or hazardous secondary material constituents to air, soil, or surface water at the facility.

(2) If the generator or an intermediate or reclamation facility accumulating more than 6000 kg of hazardous secondary material has already prepared a Spill Prevention, Control, and Countermeasures (SPCC) Plan in accordance with 40 CFR 112, or some other emergency or contingency plan, he need only amend that plan to incorporate hazardous waste management provisions that are sufficient to comply with the requirements of Rule R315-261. The hazardous secondary material generator or an intermediate or reclamation facility may develop one contingency plan which meets all regulatory requirements. The Director recommends that the plan be based on the National Response Team's Integrated Contingency Plan Guidance ("One Plan"). When modifications are made to non-hazardous waste provisions in an integrated contingency plan, the changes do not trigger the need for a hazardous waste permit modification.

(3) The plan shall describe arrangements agreed to by local police departments, fire departments, hospitals, contractors, and State and local emergency response teams to coordinate emergency services, pursuant to Subsection R315-261-410(f).

(4) The plan shall list names, addresses, and phone numbers, office and home, of all persons qualified to act as emergency coordinator, see Subsection R315-261-420(e), and this list shall be kept up-to-date. Where more than one person is listed, one shall be named as primary emergency coordinator and others shall be listed in the order in which they shall assume responsibility as alternates.

(5) The plan shall include a list of all emergency equipment at the facility, such as fire extinguishing systems, spill control equipment, communications and alarm systems, internal and external, and decontamination equipment, where this equipment is required. This list shall be kept up to date. In addition, the plan shall include the location and a physical description of each item on the list, and a brief outline of its capabilities.

(6) The plan shall include an evacuation plan for facility personnel where there is a possibility that evacuation could be necessary. This plan shall describe signal(s) to be used to begin evacuation, evacuation routes, and alternate evacuation routes, in cases where the primary routes could be blocked by releases of hazardous waste or fires.

(c) Copies of contingency plan. A copy of the contingency plan and all revisions to the plan shall be:

(1) Maintained at the facility; and

(2) Submitted to all local police departments, fire departments, hospitals, and State and local emergency response teams that may be called upon to provide emergency services.

(d) Amendment of contingency plan. The contingency plan shall be reviewed, and immediately amended, if necessary, whenever:

(1) Applicable regulations are revised;

(2) The plan fails in an emergency;

(3) The facility changes-in its design, construction, operation, maintenance, or other circumstances-in a way that materially increases the potential for fires, explosions, or releases of hazardous secondary material or hazardous secondary material constituents, or changes the response necessary in an emergency;

(4) The list of emergency coordinators changes; or

(5) The list of emergency equipment changes.

(e) Emergency coordinator. At all times, there shall be at least one employee either on the facility premises or on call, i.e., available to respond to an emergency by reaching the facility within a short period of time, with the responsibility for coordinating all emergency response measures. This emergency coordinator shall be thoroughly familiar with all aspects of the facility's contingency plan, all operations and activities at the facility, the location and characteristics of hazardous secondary material handled, the location of all records within the facility, and the facility layout. In addition, this person shall have the authority to commit the resources needed to carry out the contingency plan. The emergency coordinator's responsibilities are more fully spelled out in Subsection R315-261-420(f). Applicable responsibilities for the emergency coordinator vary, depending on factors such as type and variety of hazardous secondary material(s) handled by the facility, and type and complexity of the facility.

(f) Emergency procedures.

(1) Whenever there is an imminent or actual emergency situation, the emergency coordinator, or his designee when the emergency coordinator is on call, shall immediately:

(i) Activate internal facility alarms or communication systems, where applicable, to notify all facility personnel; and

(ii) Notify appropriate State or local agencies with designated response roles if their help is needed.

(2) Whenever there is a release, fire, or explosion, the emergency coordinator shall immediately identify the character, exact source, amount, and areal extent of any released materials. The emergency coordinator may do this by observation or review of facility records or manifests and, if necessary, by chemical analysis.

(3) Concurrently, the emergency coordinator shall assess possible hazards to human health or the environment that may result from the release, fire, or explosion. This assessment shall consider both direct and indirect effects of the release, fire, or explosion, e.g., the effects of any toxic, irritating, or asphyxiating gases that are generated, or the effects of any hazardous surface water run-offs from water or chemical agents used to control fire and heat-induced explosions.

(4) If the emergency coordinator determines that the facility has had a release, fire, or explosion which could threaten human health, or the environment, outside the facility, he shall report his findings as follows:

(i) If his assessment indicates that evacuation of local areas may be advisable, the emergency coordinator shall immediately notify appropriate local authorities. The emergency coordinator shall be available to help appropriate officials decide whether local areas should be evacuated; and

(ii) The emergency coordinator shall immediately notify the Utah Department of Environmental Quality 24 hour answering service at 801/536-4123, and the National Response Center, using their 24-hour toll free number 800/424-8802. The report shall include:

(A) Name and telephone number of reporter;

(B) Name and address of facility;

(C) Time and type of incident, e.g., release, fire;

(D) Name and quantity of material(s) involved, to the extent known;

(E) The extent of injuries, if any; and

(F) The possible hazards to human health, or the environment, outside the facility.

(5) During an emergency, the emergency coordinator shall take all reasonable measures necessary to ensure that fires, explosions, and releases do not occur, recur, or spread to other hazardous secondary material at the facility. These measures shall include, where applicable, stopping processes and operations, collecting and containing released material, and removing or isolating containers.

(6) If the facility stops operations in response to a fire, explosion or release, the emergency coordinator shall monitor for leaks, pressure buildup, gas generation, or ruptures in valves, pipes, or other equipment, wherever this is appropriate.

(7) Immediately after an emergency, the emergency coordinator shall provide for treating, storing, or disposing of recovered secondary material, contaminated soil or surface water, or any other material that results from a release, fire, or

explosion at the facility. Unless the hazardous secondary material generator can demonstrate, in accordance with Subsections R315-261-3(c) or (d), that the recovered material is not a hazardous waste, the owner or operator becomes a generator of hazardous waste and shall manage it in accordance with all applicable requirements of Rules R315-262, 263, and 265.

(8) The emergency coordinator shall ensure that, in the affected area(s) of the facility:

(i) No secondary material that may be incompatible with the released material is treated, stored, or disposed of until cleanup procedures are completed; and

(ii) All emergency equipment listed in the contingency plan is cleaned and fit for its intended use before operations are resumed.

(9) The hazardous secondary material generator shall note in the operating record the time, date, and details of any incident that requires implementing the contingency plan. Within 15 days after the incident, he shall submit a written report on the incident to the Director. The report shall include:

(i) Name, address, and telephone number of the hazardous secondary material generator;

(ii) Name, address, and telephone number of the facility;

(iii) Date, time, and type of incident, e.g., fire, explosion;

(iv) Name and quantity of material(s) involved;

(v) The extent of injuries, if any;

(vi) An assessment of actual or potential hazards to human health or the environment, where this is applicable; and

(vii) Estimated quantity and disposition of recovered material that resulted from the incident.

(g) Personnel training. All employees must be thoroughly familiar with proper waste handling and emergency procedures relevant to their responsibilities during normal facility operations and emergencies.

R315-261-1030. Air Emission Standards for Process Vents - Applicability.

The regulations in Sections R315-261-1030 through 1035 apply to process vents associated with distillation, fractionation, thin-film evaporation, solvent extraction, or air or stream stripping operations that manage hazardous secondary materials excluded under the remanufacturing exclusion at Subsection R315-261-4(a)(27) with concentrations of at least 10 ppmw, unless the process vents are equipped with operating air emission controls in accordance with the requirements of an applicable Clean Air Act regulation codified under 40 CFR part 60, part 61, or part 63.

R315-261-1031. Air Emission Standards for Process Vents - Definitions.

(a) As used in Sections R315-261-1030 through 1035, all terms not defined herein shall have the meaning given them in the Resource Conservation and Recovery Act, the Utah Solid and Hazardous Waste Act, and Rules R315-260 through 266.

(1) "Air stripping operation" is a desorption operation employed to transfer one or more volatile components from a liquid mixture into a gas either with or without the application of heat to the liquid. Packed towers, spray towers, and bubble-cap, sieve, or valve-type plate towers are among the process configurations used for contacting the air and a liquid.

(2) "Bottoms receiver" means a container or tank used to receive and collect the heavier bottoms fractions of the distillation feed stream that remain in the liquid phase.

(3) "Closed-vent system" means a system that is not open to the atmosphere and that is composed of piping, connections, and, if necessary, flow-inducing devices that transport gas or vapor from a piece or pieces of equipment to a control device.

(4) "Condenser" means a heat-transfer device that reduces a thermodynamic fluid from its vapor phase to its liquid phase.

(5) "Connector" means flanged, screwed, welded, or other joined fittings used to connect two pipelines or a pipeline and a piece of equipment. For the purposes of reporting and recordkeeping, connector means flanged fittings that are not covered by insulation or other materials that prevent location of the fittings.

(6) "Continuous recorder" means a data-recording device recording an instantaneous data value at least once every 15 minutes.

(7) "Control device" means an enclosed combustion device, vapor recovery system, or flare. Any device the primary function of which is the recovery or capture of solvents or other organics for use, reuse, or sale, e.g., a primary condenser on a solvent recovery unit, is not a control device.

(8) "Control device shutdown" means the cessation of operation of a control device for any purpose.

(9) "Distillate receiver" means a container or tank used to receive and collect liquid material, condensed, from the overhead condenser of a distillation unit and from which the condensed liquid is pumped to larger storage tanks or other process units.

(10) "Distillation operation" means an operation, either batch or continuous, separating one or more feed stream(s) into two or more exit streams, each exit stream having component concentrations different from those in the feed stream(s). The separation is achieved by the redistribution of the components between the liquid and vapor phase as they approach equilibrium within the distillation unit.

(11) "Double block and bleed system" means two block valves connected in series with a bleed valve or line that can vent the line between the two block valves.

(12) "Equipment" means each valve, pump, compressor, pressure relief device, sampling connection system, open-ended valve or line, or flange or other connector, and any control devices or systems required by Sections R315-261-1030 through 1035.

(13) "Flame zone" means the portion of the combustion chamber in a boiler occupied by the flame envelope.

(14) "Flow indicator" means a device that indicates whether gas flow is present in a vent stream.

(15) "First attempt at repair" means to take rapid action for the purpose of stopping or reducing leakage of organic material to the atmosphere using best practices.

(16) "Fractionation operation" means a distillation operation or method used to separate a mixture of several volatile components of different boiling points in successive stages, each stage removing from the mixture some proportion of one of the components.

(17) "Hazardous secondary material management unit shutdown" means a work practice or operational procedure that stops operation of a hazardous secondary material management unit or part of a hazardous secondary material management unit. An unscheduled work practice or operational procedure that stops operation of a hazardous secondary material management unit or part of a hazardous secondary material management unit for less than 24 hours is not a hazardous secondary material management unit shutdown. The use of spare equipment and technically feasible bypassing of equipment without stopping operation are not hazardous secondary material management unit shutdowns.

(18) "Hot well" means a container for collecting condensate as in a steam condenser serving a vacuum-jet or steam-jet ejector.

(19) "In gas/vapor service" means that the piece of equipment contains or contacts a hazardous secondary material stream that is in the gaseous state at operating conditions.

(20) "In heavy liquid service" means that the piece of equipment is not in gas/vapor service or in light liquid service.

(21) "In light liquid service" means that the piece of

equipment contains or contacts a material stream where the vapor pressure of one or more of the organic components in the stream is greater than 0.3 kilopascals (kPa) at 20 degrees C, the total concentration of the pure organic components having a vapor pressure greater than 0.3 kilopascals (kPa) at 20 degrees C is equal to or greater than 20 percent by weight, and the fluid is a liquid at operating conditions.

(22) "In situ sampling systems" means nonextractive samplers or in-line samplers.

(23) "In vacuum service" means that equipment is operating at an internal pressure that is at least 5 kPa below ambient pressure.

(24) "Malfunction" means any sudden failure of a control device or a hazardous secondary material management unit or failure of a hazardous secondary material management unit to operate in a normal or usual manner, so that organic emissions are increased.

(25) "Open-ended valve or line" means any valve, except pressure relief valves, having one side of the valve seat in contact with hazardous secondary material and one side open to the atmosphere, either directly or through open piping.

(26) "Pressure release" means the emission of materials resulting from the system pressure being greater than the set pressure of the pressure relief device.

(27) "Process heater" means a device that transfers heat liberated by burning fuel to fluids contained in tubes, including all fluids except water that are heated to produce steam.

(28) "Process vent" means any open-ended pipe or stack that is vented to the atmosphere either directly, through a vacuum-producing system, or through a tank, e.g., distillate receiver, condenser, bottoms receiver, surge control tank, separator tank, or hot well, associated with hazardous secondary material distillation, fractionation, thin-film evaporation, solvent extraction, or air or steam stripping operations.

(29) "Repaired" means that equipment is adjusted, or otherwise altered, to eliminate a leak.

(30) "Sampling connection system" means an assembly of equipment within a process or material management unit used during periods of representative operation to take samples of the process or material fluid. Equipment used to take non-routine grab samples is not considered a sampling connection system.

(31) "Sensor" means a device that measures a physical quantity or the change in a physical quantity, such as temperature, pressure, flow rate, pH, or liquid level.

(32) "Separator tank" means a device used for separation of two immiscible liquids.

(33) "Solvent extraction operation" means an operation or method of separation in which a solid or solution is contacted with a liquid solvent, the two being mutually insoluble, to preferentially dissolve and transfer one or more components into the solvent.

(34) "Startup" means the setting in operation of a hazardous secondary material management unit or control device for any purpose.

(35) "Steam stripping operation" means a distillation operation in which vaporization of the volatile constituents of a liquid mixture takes place by the introduction of steam directly into the charge.

(36) "Surge control tank" means a large-sized pipe or storage reservoir sufficient to contain the surging liquid discharge of the process tank to which it is connected.

(37) "Thin-film evaporation operation" means a distillation operation that employs a heating surface consisting of a large diameter tube that may be either straight or tapered, horizontal or vertical. Liquid is spread on the tube wall by a rotating assembly of blades that maintain a close clearance from the wall or actually ride on the film of liquid on the wall.

(38) "Vapor incinerator" means any enclosed combustion device that is used for destroying organic compounds and does not extract energy in the form of steam or process heat.

(39) "Vented" means discharged through an opening, typically an open-ended pipe or stack, allowing the passage of a stream of liquids, gases, or fumes into the atmosphere. The passage of liquids, gases, or fumes is caused by mechanical" means such as compressors or vacuum-producing systems or by process-related" means such as evaporation produced by heating and not caused by tank loading and unloading, working losses, or by natural" means such as diurnal temperature changes.

R315-261-1032. Air Emission Standards for Process Vents - Process Vents.

(a) The remanufacturer or other person that stores or treats hazardous secondary materials in hazardous secondary material management units with process vents associated with distillation, fractionation, thin-film evaporation, solvent extraction, or air or steam stripping operations managing hazardous secondary material with organic concentrations of at least 10 ppmw shall either:

(1) Reduce total organic emissions from all affected process vents at the facility below 1.4 kg/h (3 lb/h) and 2.8 Mg/yr (3.1 tons/yr), or

(2) Reduce, by use of a control device, total organic emissions from all affected process vents at the facility by 95 weight percent.

(b) If the remanufacturer or other person that stores or treats the hazardous secondary material installs a closed-vent system and control device to comply with the provisions of Subsection R315-261-1032(a) the closed-vent system and control device shall meet the requirements of Section R315-261-1033.

(c) Determinations of vent emissions and emission reductions or total organic compound concentrations achieved by add-on control devices may be based on engineering calculations or performance tests. If performance tests are used to determine vent emissions, emission reductions, or total organic compound concentrations achieved by add-on control devices, the performance tests shall conform with the requirements of Subsection R315-261-1034(c).

(d) When a remanufacturer or other person that stores or treats the hazardous secondary material and the Director do not agree on determinations of vent emissions and/or emission reductions or total organic compound concentrations achieved by add-on control devices based on engineering calculations, the procedures in Subsection R315-261-1034(c) shall be used to resolve the disagreement.

R315-261-1033. Air Emission Standards for Process Vents - Closed-Vent Systems and Control Devices.

(a)(1) The remanufacturer or other person that stores or treats the hazardous secondary materials in hazardous secondary material management units using closed-vent systems and control devices used to comply with provisions of Rule R315-261 shall comply with the provisions of Sections R315-261-1033.

(2) Reserved

(b) A control device involving vapor recovery, e.g., a condenser or adsorber, shall be designed and operated to recover the organic vapors vented to it with an efficiency of 95 weight percent or greater unless the total organic emission limits of Subsection R315-261-1032(a)(1) for all affected process vents can be attained at an efficiency less than 95 weight percent.

(c) An enclosed combustion device, e.g., a vapor incinerator, boiler, or process heater, shall be designed and operated to reduce the organic emissions vented to it by 95 weight percent or greater; to achieve a total organic compound concentration of 20 ppmv, expressed as the sum of the actual compounds, not carbon equivalents, on a dry basis corrected to

3 percent oxygen; or to provide a minimum residence time of 0.50 seconds at a minimum temperature of 760 deg. C. If a boiler or process heater is used as the control device, then the vent stream shall be introduced into the flame zone of the boiler or process heater.

(d)(1) A flare shall be designed for and operated with no visible emissions as determined by the methods specified in Subsection R315-261-1033(e)(1), except for periods not to exceed a total of 5 minutes during any 2 consecutive hours.

(2) A flare shall be operated with a flame present at all times, as determined by the methods specified in Subsection R315-261-1033(f)(2)(iii).

(3) A flare shall be used only if the net heating value of the gas being combusted is 11.2 MJ/scm (300 Btu/scf) or greater if the flare is steam-assisted or air-assisted; or if the net heating value of the gas being combusted is 7.45 MJ/scm (200 Btu/scf) or greater if the flare is nonassisted. The net heating value of the gas being combusted shall be determined by the methods specified in Subsection R315-261-1033(e)(2).

(4)(i) A steam-assisted or nonassisted flare shall be designed for and operated with an exit velocity, as determined by the methods specified in Subsection R315-261-1033(e)(3), less than 18.3 m/s (60 ft/s), except as provided in Subsections R315-261-1033(d)(4)(ii) and (iii).

(ii) A steam-assisted or nonassisted flare designed for and operated with an exit velocity, as determined by the methods specified in Subsection R315-261-1033(e)(3), equal to or greater than 18.3 m/s (60 ft/s) but less than 122 m/s (400 ft/s) is allowed if the net heating value of the gas being combusted is greater than 37.3 MJ/scm (1,000 Btu/scf).

(iii) A steam-assisted or nonassisted flare designed for and operated with an exit velocity, as determined by the methods specified in Subsection R315-261-1033(e)(3), less than the velocity, V_{max}, as determined by the method specified in Subsection R315-261-1033(e)(4) and less than 122 m/s (400 ft/s) is allowed.

(5) An air-assisted flare shall be designed and operated with an exit velocity less than the velocity, V_{max}, as determined by the method specified in Subsection R315-261-1033(e)(5).

(6) A flare used to comply with Section R315-261-1033 shall be steam-assisted, air-assisted, or nonassisted.

(e)(1) Reference Method 22 in 40 CFR part 60 shall be used to determine the compliance of a flare with the visible emission provisions of Sections R315-261-1030 through 1035. The observation period is 2 hours and shall be used according to Method 22.

(2) The net heating value of the gas being combusted in a flare shall be calculated using the following equation: The equation found in 40 CFR261.1033(e)(2) 2015 ed is adopted and incorporated by reference.

Where:

H_T = Net heating value of the sample, MJ/scm; where the net enthalpy per mole of offgas is based on combustion at 25 degrees C and 760 mm Hg, but the standard temperature for determining the volume corresponding to 1 mol is 20 degrees C;

K = Constant, 1.74×10^{-7} (1/ppm) (g mol/scm) (MJ/kcal) where standard temperature for (g mol/scm) is 20 deg. C;

C_i = Concentration of sample component i in ppm on a wet basis, as measured for organics by Reference Method 18 in 40 CFR part 60 and measured for hydrogen and carbon monoxide by ASTM D 1946-82, incorporated by reference as specified in Section R315-260-11; and

H_i = Net heat of combustion of sample component i, kcal/9 mol at 25 degrees C and 760 mm Hg. The heats of combustion may be determined using ASTM D 2382-83, incorporated by reference as specified in Section R315-260-11, if published values are not available or cannot be calculated.

(3) The actual exit velocity of a flare shall be determined by dividing the volumetric flow rate, in units of standard temperature and pressure, as determined by Reference Methods 2, 2A, 2C, or 2D in 40 CFR part 60 as appropriate, by the unobstructed , free, cross-sectional area of the flare tip.

(4) The maximum allowed velocity in m/s, V_{max}, for a flare complying with Subsection R315-261-1033(d)(4)(iii) shall be determined by the following equation:

$Log_{10}(V_{max}) = (H_T + 28.8)/31.7$

Where:

28.8 = Constant,

31.7 = Constant,

H_T = The net heating value as determined in Subsection R315-261-1033(e)(2).

(5) The maximum allowed velocity in m/s, V_{max}, for an air-assisted flare shall be determined by the following equation:

$V_{max} = 8.706 + 0.7084 (H_T)$

Where:

8.706 = Constant,

0.7084 = Constant,

H_T = The net heating value as determined in Subsection R315-261-1033(e)(2).

(f) The remanufacturer or other person that stores or treats the hazardous secondary material shall monitor and inspect each control device required to comply with Section R315-261-1033 to ensure proper operation and maintenance of the control device by implementing the following requirements:

(1) Install, calibrate, maintain, and operate according to the manufacturer's specifications a flow indicator that provides a record of vent stream flow from each affected process vent to the control device at least once every hour. The flow indicator sensor shall be installed in the vent stream at the nearest feasible point to the control device inlet but before the point at which the vent streams are combined.

(2) Install, calibrate, maintain, and operate according to the manufacturer's specifications a device to continuously monitor control device operation as specified below:

(i) For a thermal vapor incinerator, a temperature monitoring device equipped with a continuous recorder. The device shall have an accuracy of plus/minus 1 percent of the temperature being monitored in degrees C or plus/minus 0.5 degrees C, whichever is greater. The temperature sensor shall be installed at a location in the combustion chamber downstream of the combustion zone.

(ii) For a catalytic vapor incinerator, a temperature monitoring device equipped with a continuous recorder. The device shall be capable of monitoring temperature at two locations and have an accuracy of plus/minus 1 percent of the temperature being monitored in degrees C or plus/minus 0.5 degrees C, whichever is greater. One temperature sensor shall be installed in the vent stream at the nearest feasible point to the catalyst bed inlet and a second temperature sensor shall be installed in the vent stream at the nearest feasible point to the catalyst bed outlet.

(iii) For a flare, a heat sensing monitoring device equipped with a continuous recorder that indicates the continuous ignition of the pilot flame.

(iv) For a boiler or process heater having a design heat input capacity less than 44 MW, a temperature monitoring device equipped with a continuous recorder. The device shall have an accuracy of plus/minus 1 percent of the temperature being monitored in degrees C or plus/minus 0.5 degrees C, whichever is greater. The temperature sensor shall be installed at a location in the furnace downstream of the combustion zone.

(v) For a boiler or process heater having a design heat input capacity greater than or equal to 44 MW, a monitoring device equipped with a continuous recorder to measure a parameter(s) that indicates good combustion operating practices are being used.

(vi) For a condenser, either:

(A) A monitoring device equipped with a continuous

recorder to measure the concentration level of the organic compounds in the exhaust vent stream from the condenser, or

(B) A temperature monitoring device equipped with a continuous recorder. The device shall be capable of monitoring temperature with an accuracy of plus/minus 1 percent of the temperature being monitored in degrees Celsius (deg. C) or plus/minus 0.5 deg. C, whichever is greater. The temperature sensor shall be installed at a location in the exhaust vent stream from the condenser exit, i.e., product side.

(vii) For a carbon adsorption system that regenerates the carbon bed directly in the control device such as a fixed-bed carbon adsorber, either:

(A) A monitoring device equipped with a continuous recorder to measure the concentration level of the organic compounds in the exhaust vent stream from the carbon bed, or

(B) A monitoring device equipped with a continuous recorder to measure a parameter that indicates the carbon bed is regenerated on a regular, predetermined time cycle.

(3) Inspect the readings from each monitoring device required by Subsections R315-261-1033(f)(1) and (2) at least once each operating day to check control device operation and, if necessary, immediately implement the corrective measures necessary to ensure the control device operates in compliance with the requirements of Section R315-261-1033.

(g) A remanufacturer or other person that stores or treats hazardous secondary material in a hazardous secondary material management unit using a carbon adsorption system such as a fixed-bed carbon adsorber that regenerates the carbon bed directly onsite in the control device shall replace the existing carbon in the control device with fresh carbon at a regular, predetermined time interval that is no longer than the carbon service life established as a requirement of Subsection R315-261-1035(b)(4)(iii)(F).

(h) A remanufacturer or other person that stores or treats hazardous secondary material in a hazardous secondary material management unit using a carbon adsorption system such as a carbon canister that does not regenerate the carbon bed directly onsite in the control device shall replace the existing carbon in the control device with fresh carbon on a regular basis by using one of the following procedures:

(1) Monitor the concentration level of the organic compounds in the exhaust vent stream from the carbon adsorption system on a regular schedule, and replace the existing carbon with fresh carbon immediately when carbon breakthrough is indicated. The monitoring frequency shall be daily or at an interval no greater than 20 percent of the time required to consume the total carbon working capacity established as a requirement of Subsection R315-261-1035(b)(4)(iii)(G), whichever is longer.

(2) Replace the existing carbon with fresh carbon at a regular, predetermined time interval that is less than the design carbon replacement interval established as a requirement of Subsection R315-261-1035(b)(4)(iii)(G).

(i) An alternative operational or process parameter may be monitored if it can be demonstrated that another parameter shall ensure that the control device is operated in conformance with these standards and the control device's design specifications.

(j) A remanufacturer or other person that stores or treats hazardous secondary material at an affected facility seeking to comply with the provisions of Rule R315-261 by using a control device other than a thermal vapor incinerator, catalytic vapor incinerator, flare, boiler, process heater, condenser, or carbon adsorption system is required to develop documentation including sufficient information to describe the control device operation and identify the process parameter or parameters that indicate proper operation and maintenance of the control device.

(k) A closed-vent system shall meet either of the following design requirements:

(1) A closed-vent system shall be designed to operate with no detectable emissions, as indicated by an instrument reading of less than 500 ppmv above background as determined by the procedure in Subsection R315-261-1034(b), and by visual inspections; or

(2) A closed-vent system shall be designed to operate at a pressure below atmospheric pressure. The system shall be equipped with at least one pressure gauge or other pressure measurement device that can be read from a readily accessible location to verify that negative pressure is being maintained in the closed-vent system when the control device is operating.

(l) The remanufacturer or other person that stores or treats the hazardous secondary material shall monitor and inspect each closed-vent system required to comply with Section R315-261-1033 to ensure proper operation and maintenance of the closed-vent system by implementing the following requirements:

(1) Each closed-vent system that is used to comply with Subsection R315-261-1033(k)(1) shall be inspected and monitored in accordance with the following requirements:

(i) An initial leak detection monitoring of the closed-vent system shall be conducted by the remanufacturer or other person that stores or treats the hazardous secondary material on or before the date that the system becomes subject to Section R315-261-1033. The remanufacturer or other person that stores or treats the hazardous secondary material shall monitor the closed-vent system components and connections using the procedures specified in Subsection R315-261-1034(b) to demonstrate that the closed-vent system operates with no detectable emissions, as indicated by an instrument reading of less than 500 ppmv above background.

(ii) After initial leak detection monitoring required in Subsection R315-261-1033(l)(1)(i), the remanufacturer or other person that stores or treats the hazardous secondary material shall inspect and monitor the closed-vent system as follows:

(A) Closed-vent system joints, seams, or other connections that are permanently or semi-permanently sealed, e.g., a welded joint between two sections of hard piping or a bolted and gasketed ducting flange, shall be visually inspected at least once per year to check for defects that could result in air pollutant emissions. The remanufacturer or other person that stores or treats the hazardous secondary material shall monitor a component or connection using the procedures specified in Subsection R315-261-1034(b) to demonstrate that it operates with no detectable emissions following any time the component is repaired or replaced, e.g., a section of damaged hard piping is replaced with new hard piping, or the connection is unsealed, e.g., a flange is unbolted.

(B) Closed-vent system components or connections other than those specified in Subsection R315-261-1033(l)(1)(ii)(A) shall be monitored annually and at other times as requested by the Director, except as provided for in Subsection R315-261-1033(o), using the procedures specified in Subsection R315-261-1034(b) to demonstrate that the components or connections operate with no detectable emissions.

(iii) In the event that a defect or leak is detected, the remanufacturer or other person that stores or treats the hazardous secondary material shall repair the defect or leak in accordance with the requirements of Subsection R315-261-1033(l)(3).

(iv) The remanufacturer or other person that stores or treats the hazardous secondary material shall maintain a record of the inspection and monitoring in accordance with the requirements specified in Section R315-261-1035.

(2) Each closed-vent system that is used to comply with Subsection R315-261-1033(k)(2) shall be inspected and monitored in accordance with the following requirements:

(i) The closed-vent system shall be visually inspected by the remanufacturer or other person that stores or treats the hazardous secondary material to check for defects that could result in air pollutant emissions. Defects include, but are not

limited to, visible cracks, holes, or gaps in ductwork or piping or loose connections.

(ii) The remanufacturer or other person that stores or treats the hazardous secondary material shall perform an initial inspection of the closed-vent system on or before the date that the system becomes subject to Section R315-261-1033. Thereafter, the remanufacturer or other person that stores or treats the hazardous secondary material shall perform the inspections at least once every year.

(iii) In the event that a defect or leak is detected, the remanufacturer or other person that stores or treats the hazardous secondary material shall repair the defect in accordance with the requirements of Subsection R315-261-1033(l)(3).

(iv) The remanufacturer or other person that stores or treats the hazardous secondary material shall maintain a record of the inspection and monitoring in accordance with the requirements specified in Section R315-261-1035.

(3) The remanufacturer or other person that stores or treats the hazardous secondary material shall repair all detected defects as follows:

(i) Detectable emissions, as indicated by visual inspection, or by an instrument reading greater than 500 ppmv above background, shall be controlled as soon as practicable, but not later than 15 calendar days after the emission is detected, except as provided for in Subsection R315-261-1033(l)(3)(iii).

(ii) A first attempt at repair shall be made no later than 5 calendar days after the emission is detected.

(iii) Delay of repair of a closed-vent system for which leaks have been detected is allowed if the repair is technically infeasible without a process unit shutdown, or if the remanufacturer or other person that stores or treats the hazardous secondary material determines that emissions resulting from immediate repair would be greater than the fugitive emissions likely to result from delay of repair. Repair of such equipment shall be completed by the end of the next process unit shutdown.

(iv) The remanufacturer or other person that stores or treats the hazardous secondary material shall maintain a record of the defect repair in accordance with the requirements specified in Section R315-261-1035.

(m) Closed-vent systems and control devices used to comply with provisions of Sections R315-261-1030 through 1035 shall be operated at all times when emissions may be vented to them.

(n) The owner or operator using a carbon adsorption system to control air pollutant emissions shall document that all carbon that is a hazardous waste and that is removed from the control device is managed in one of the following manners, regardless of the average volatile organic concentration of the carbon:

(1) Regenerated or reactivated in a thermal treatment unit that meets one of the following:

(i) The owner or operator of the unit has been issued a final permit under Rule R315-270 which implements the requirements of Sections R315-264-600 through 603; or

(ii) The unit is equipped with and operating air emission controls in accordance with the applicable requirements of Sections R315-261-1030 through 1035 and 1080 through 1089 or subparts AA and CC of 40 CFR 265 which is incorporated in R315-265; or

(iii) The unit is equipped with and operating air emission controls in accordance with a national emission standard for hazardous air pollutants under 40 CFR part 61 or 40 CFR part 63.

(2) Incinerated in a hazardous waste incinerator for which the owner or operator either:

(i) Has been issued a final permit under Rule R315-270 which implements the requirements of Sections R315-264-340 through 351; or

(ii) Has designed and operates the incinerator in accordance with the interim status requirements of 40 CFR part 265, subpart O, which is incorporated by Rule R315-265.

(3) Burned in a boiler or industrial furnace for which the owner or operator either:

(i) Has been issued a final permit under Rule R315-270 which implements the requirements of Sections R315-266-100 through 112; or

(ii) Has designed and operates the boiler or industrial furnace in accordance with the interim status requirements of Sections R315-266-100 through 112.

(o) Any components of a closed-vent system that are designated, as described in Subsection R315-261-1035(c)(9), as unsafe to monitor are exempt from the requirements of Subsection R315-261-1033(l)(1)(ii)(B) if:

(1) The remanufacturer or other person that stores or treats the hazardous secondary material in a hazardous secondary material management unit using a closed-vent system determines that the components of the closed-vent system are unsafe to monitor because monitoring personnel would be exposed to an immediate danger as a consequence of complying with Subsection R315-261-1033(l)(1)(ii)(B); and

(2) The remanufacturer or other person that stores or treats the hazardous secondary material in a hazardous secondary material management unit using a closed-vent system adheres to a written plan that requires monitoring the closed-vent system components using the procedure specified in Subsection R315-261-1033(l)(1)(ii)(B) as frequently as practicable during safe-to-monitor times.

R315-261-1034. Air Emission Standards for Process Vents - Test Methods and Procedures.

(a) Each remanufacturer or other person that stores or treats the hazardous secondary material subject to the provisions of Sections R315-261-1030 through 1035 shall comply with the test methods and procedural requirements provided in Section R315-261-1034.

(b) When a closed-vent system is tested for compliance with no detectable emissions, as required in Subsection R315-261-1033(l), the test shall comply with the following requirements:

(1) Monitoring shall comply with Reference Method 21 in 40 CFR part 60.

(2) The detection instrument shall meet the performance criteria of Reference Method 21.

(3) The instrument shall be calibrated before use on each day of its use by the procedures specified in Reference Method 21.

(4) Calibration gases shall be:

(i) Zero air, less than 10 ppm of hydrocarbon in air.

(ii) A mixture of methane or n-hexane and air at a concentration of approximately, but less than, 10,000 ppm methane or n-hexane.

(5) The background level shall be determined as set forth in Reference Method 21.

(6) The instrument probe shall be traversed around all potential leak interfaces as close to the interface as possible as described in Reference Method 21.

(7) The arithmetic difference between the maximum concentration indicated by the instrument and the background level is compared with 500 ppm for determining compliance.

(c) Performance tests to determine compliance with Subsection R315-261-1032(a) and with the total organic compound concentration limit of Subsection R315-261-1033(c) shall comply with the following:

(1) Performance tests to determine total organic compound concentrations and mass flow rates entering and exiting control devices shall be conducted and data reduced in accordance with

the following reference methods and calculation procedures:

(i) Method 2 in 40 CFR part 60 for velocity and volumetric flow rate.

(ii) Method 18 or Method 25A in 40 CFR part 60, appendix A, for organic content. If Method 25A is used, the organic HAP used as the calibration gas shall be the single organic HAP representing the largest percent by volume of the emissions. The use of Method 25A is acceptable if the response from the high-level calibration gas is at least 20 times the standard deviation of the response from the zero calibration gas when the instrument is zeroed on the most sensitive scale.

(iii) Each performance test shall consist of three separate runs; each run conducted for at least 1 hour under the conditions that exist when the hazardous secondary material management unit is operating at the highest load or capacity level reasonably expected to occur. For the purpose of determining total organic compound concentrations and mass flow rates, the average of results of all runs shall apply. The average shall be computed on a time-weighted basis.

(iv) Total organic mass flow rates shall be determined by the following equation:

(A) For sources utilizing Method 18.

The equation found in 40 CFR 261.1034(c)(1)(iv)(A), 2015 ed. is adopted and incorporated by reference

Where:

E_h= Total organic mass flow rate, kg/h;

Q_{2sd}= Volumetric flow rate of gases entering or exiting control device, as determined by Method 2, dscm/h;

n = Number of organic compounds in the vent gas;

C_i= Organic concentration in ppm, dry basis, of compound i in the vent gas, as determined by Method 18;

MW_i= Molecular weight of organic compound i in the vent gas, kg/kg-mol;

0.0416 = Conversion factor for molar volume, kg-mol/m3 (at 293 K and 760 mm Hg);

10^{-6} = Conversion from ppm

(B) For sources utilizing Method 25A.

$E_h = (Q)(C)(MW)(0.0416)(10^{-6})$

Where:

E_h= Total organic mass flow rate, kg/h;

Q = Volumetric flow rate of gases entering or exiting control device, as determined by Method 2, dscm/h;

C = Organic concentration in ppm, dry basis, as determined by Method 25A;

MW = Molecular weight of propane, 44;

0.0416 = Conversion factor for molar volume, kg-mol/m3 (at 293 K and 760 mm Hg);

10^{-6} = Conversion from ppm.

(v) The annual total organic emission rate shall be determined by the following equation:

$E_A=(E_h)(H)$

Where:

E_A=Total organic mass emission rate, kg/y;

E_h=Total organic mass flow rate for the process vent, kg/h;

H=Total annual hours of operations for the affected unit, h.

(vi) Total organic emissions from all affected process vents at the facility shall be determined by summing the hourly total organic mass emission rates, E_h, as determined in Subsection R315-261-1034(c)(1)(iv), and by summing the annual total organic mass emission rates, E_A, as determined in Subsection R315-261-1034(c)(1)(v), for all affected process vents at the facility.

(2) The remanufacturer or other person that stores or treats the hazardous secondary material shall record such process information as may be necessary to determine the conditions of the performance tests. Operations during periods of startup, shutdown, and malfunction shall not constitute representative conditions for the purpose of a performance test.

(3) The remanufacturer or other person that stores or treats the hazardous secondary material at an affected facility shall provide, or cause to be provided, performance testing facilities as follows:

(i) Sampling ports adequate for the test methods specified in Subsection R315-261-1034(c)(1).

(ii) Safe sampling platform(s).

(iii) Safe access to sampling platform(s).

(iv) Utilities for sampling and testing equipment.

(4) For the purpose of making compliance determinations, the time-weighted average of the results of the three runs shall apply. In the event that a sample is accidentally lost or conditions occur in which one of the three runs shall be discontinued because of forced shutdown, failure of an irreplaceable portion of the sample train, extreme meteorological conditions, or other circumstances beyond the remanufacturer's or other person's that stores or treats the hazardous secondary material control, compliance may, upon the Director's approval, be determined using the average of the results of the two other runs.

(d) To show that a process vent associated with a hazardous secondary material distillation, fractionation, thin-film evaporation, solvent extraction, or air or steam stripping operation is not subject to the requirements of Sections R315-261-1030 through 1035, the remanufacturer or other person that stores or treats the hazardous secondary material shall make an initial determination that the time-weighted, annual average total organic concentration of the material managed by the hazardous secondary material management unit is less than 10 ppmw using one of the following two methods:

(1) Direct measurement of the organic concentration of the material using the following procedures:

(i) The remanufacturer or other person that stores or treats the hazardous secondary material shall take a minimum of four grab samples of material for each material stream managed in the affected unit under process conditions expected to cause the maximum material organic concentration.

(ii) For material generated onsite, the grab samples shall be collected at a point before the material is exposed to the atmosphere such as in an enclosed pipe or other closed system that is used to transfer the material after generation to the first affected distillation, fractionation, thin-film evaporation, solvent extraction, or air or steam stripping operation. For material generated offsite, the grab samples shall be collected at the inlet to the first material management unit that receives the material provided the material has been transferred to the facility in a closed system such as a tank truck and the material is not diluted or mixed with other material.

(iii) Each sample shall be analyzed and the total organic concentration of the sample shall be computed using Method 9060A, incorporated by reference under Section R315-260-11, of "Test Methods for Evaluating Solid Waste, Physical/Chemical Methods," EPA Publication SW-846, or analyzed for its individual organic constituents.

(iv) The arithmetic mean of the results of the analyses of the four samples shall apply for each material stream managed in the unit in determining the time-weighted, annual average total organic concentration of the material. The time-weighted average is to be calculated using the annual quantity of each material stream processed and the mean organic concentration of each material stream managed in the unit.

(2) Using knowledge of the material to determine that its total organic concentration is less than 10 ppmw. Documentation of the material determination is required. Examples of documentation that shall be used to support a determination under this provision include production process information documenting that no organic compounds are used, information that the material is generated by a process that is identical to a process at the same or another facility that has previously been demonstrated by direct measurement to

generate a material stream having a total organic content less than 10 ppmw, or prior speciation analysis results on the same material stream where it can also be documented that no process changes have occurred since that analysis that could affect the material total organic concentration.

(e) The determination that distillation, fractionation, thin-film evaporation, solvent extraction, or air or steam stripping operations manage hazardous secondary materials with time-weighted, annual average total organic concentrations less than 10 ppmw shall be made as follows:

(1) By the effective date that the facility becomes subject to the provisions of Sections R315-261-1030 through 1035 or by the date when the material is first managed in a hazardous secondary material management unit, whichever is later, and

(2) For continuously generated material, annually, or

(3) Whenever there is a change in the material being managed or a change in the process that generates or treats the material.

(f) When a remanufacturer or other person that stores or treats the hazardous secondary material and the Director do not agree on whether a distillation, fractionation, thin-film evaporation, solvent extraction, or air or steam stripping operation manages a hazardous secondary material with organic concentrations of at least 10 ppmw based on knowledge of the material, the dispute may be resolved by using direct measurement as specified at Subsection R315-261-1034(d)(1).

R315-261-1035. Air Emission Standards for Process Vents - Recordkeeping Requirements.

(a)(1) Each remanufacturer or other person that stores or treats the hazardous secondary material subject to the provisions of Sections R315-261-1030 through 1035 shall comply with the recordkeeping requirements of Section R315-261-1035.

(2) A remanufacturer or other person that stores or treats the hazardous secondary material of more than one hazardous secondary material management unit subject to the provisions of Sections R315-261-1030 through 1035 may comply with the recordkeeping requirements for these hazardous secondary material management units in one recordkeeping system if the system identifies each record by each hazardous secondary material management unit.

(b) The remanufacturer or other person that stores or treats the hazardous secondary material shall keep the following records on-site:

(1) For facilities that comply with the provisions of Subsection R315-261-1033(a)(2), an implementation schedule that includes dates by which the closed-vent system and control device shall be installed and in operation. The schedule shall also include a rationale of why the installation cannot be completed at an earlier date. The implementation schedule shall be kept on-site at the facility by the effective date that the facility becomes subject to the provisions of Sections R315-261-1030 through 1035.

(2) Up-to-date documentation of compliance with the process vent standards in Subsection R315-261-1032, including:

(i) Information and data identifying all affected process vents, annual throughput and operating hours of each affected unit, estimated emission rates for each affected vent and for the overall facility, i.e., the total emissions for all affected vents at the facility, and the approximate location within the facility of each affected unit, e.g., identify the hazardous secondary material management units on a facility plot plan.

(ii) Information and data supporting determinations of vent emissions and emission reductions achieved by add-on control devices based on engineering calculations or source tests. For the purpose of determining compliance, determinations of vent emissions and emission reductions shall be made using operating parameter values, e.g., temperatures, flow rates, or vent stream organic compounds and concentrations, that represent the conditions that result in maximum organic emissions, such as when the hazardous secondary material management unit is operating at the highest load or capacity level reasonably expected to occur. If the remanufacturer or other person that stores or treats the hazardous secondary material takes any action, e.g., managing a material of different composition or increasing operating hours of affected hazardous secondary material management units, that would result in an increase in total organic emissions from affected process vents at the facility, then a new determination is required.

(3) Where a remanufacturer or other person that stores or treats the hazardous secondary material chooses to use test data to determine the organic removal efficiency or total organic compound concentration achieved by the control device, a performance test plan shall be developed and include:

(i) A description of how it is determined that the planned test is going to be conducted when the hazardous secondary material management unit is operating at the highest load or capacity level reasonably expected to occur. This shall include the estimated or design flow rate and organic content of each vent stream and define the acceptable operating ranges of key process and control device parameters during the test program.

(ii) A detailed engineering description of the closed-vent system and control device including:

(A) Manufacturer's name and model number of control device.

(B) Type of control device.

(C) Dimensions of the control device.

(D) Capacity.

(E) Construction materials.

(iii) A detailed description of sampling and monitoring procedures, including sampling and monitoring locations in the system, the equipment to be used, sampling and monitoring frequency, and planned analytical procedures for sample analysis.

(4) Documentation of compliance with Subsection R315-261-1033 shall include the following information:

(i) A list of all information references and sources used in preparing the documentation.

(ii) Records, including the dates, of each compliance test required by Subsection R315-261-1033(k).

(iii) If engineering calculations are used, a design analysis, specifications, drawings, schematics, and piping and instrumentation diagrams based on the appropriate sections of "APTI Course 415: Control of Gaseous Emissions," incorporated by reference as specified in R315-260-11, or other engineering texts acceptable to the Director that present basic control device design information. Documentation provided by the control device manufacturer or vendor that describes the control device design in accordance with Subsections R315-261-1035(b)(4)(iii)(A) through (G) may be used to comply with this requirement. The design analysis shall address the vent stream characteristics and control device operation parameters as specified below.

(A) For a thermal vapor incinerator, the design analysis shall consider the vent stream composition, constituent concentrations, and flow rate. The design analysis shall also establish the design minimum and average temperature in the combustion zone and the combustion zone residence time.

(B) For a catalytic vapor incinerator, the design analysis shall consider the vent stream composition, constituent concentrations, and flow rate. The design analysis shall also establish the design minimum and average temperatures across the catalyst bed inlet and outlet.

(C) For a boiler or process heater, the design analysis shall consider the vent stream composition, constituent concentrations, and flow rate. The design analysis shall also establish the design minimum and average flame zone temperatures, combustion zone residence time, and description

of method and location where the vent stream is introduced into the combustion zone.

(D) For a flare, the design analysis shall consider the vent stream composition, constituent concentrations, and flow rate. The design analysis shall also consider the requirements specified in Subsection R315-261-1033(d).

(E) For a condenser, the design analysis shall consider the vent stream composition, constituent concentrations, flow rate, relative humidity, and temperature. The design analysis shall also establish the design outlet organic compound concentration level, design average temperature of the condenser exhaust vent stream, and design average temperatures of the coolant fluid at the condenser inlet and outlet.

(F) For a carbon adsorption system such as a fixed-bed adsorber that regenerates the carbon bed directly onsite in the control device, the design analysis shall consider the vent stream composition, constituent concentrations, flow rate, relative humidity, and temperature. The design analysis shall also establish the design exhaust vent stream organic compound concentration level, number and capacity of carbon beds, type and working capacity of activated carbon used for carbon beds, design total steam flow over the period of each complete carbon bed regeneration cycle, duration of the carbon bed steaming and cooling/drying cycles, design carbon bed temperature after regeneration, design carbon bed regeneration time, and design service life of carbon.

(G) For a carbon adsorption system such as a carbon canister that does not regenerate the carbon bed directly onsite in the control device, the design analysis shall consider the vent stream composition, constituent concentrations, flow rate, relative humidity, and temperature. The design analysis shall also establish the design outlet organic concentration level, capacity of carbon bed, type and working capacity of activated carbon used for carbon bed, and design carbon replacement interval based on the total carbon working capacity of the control device and source operating schedule.

(iv) A statement signed and dated by the remanufacturer or other person that stores or treats the hazardous secondary material certifying that the operating parameters used in the design analysis reasonably represent the conditions that exist when the hazardous secondary material management unit is or would be operating at the highest load or capacity level reasonably expected to occur.

(v) A statement signed and dated by the remanufacturer or other person that stores or treats the hazardous secondary material certifying that the control device is designed to operate at an efficiency of 95 percent or greater unless the total organic concentration limit of Subsection R315-261-1032(a) is achieved at an efficiency less than 95 weight percent or the total organic emission limits of Subsection R315-261-1032(a) for affected process vents at the facility can be attained by a control device involving vapor recovery at an efficiency less than 95 weight percent. A statement provided by the control device manufacturer or vendor certifying that the control equipment meets the design specifications may be used to comply with this requirement.

(vi) If performance tests are used to demonstrate compliance, all test results.

(c) Design documentation and monitoring, operating, and inspection information for each closed-vent system and control device required to comply with the provisions of Rule R315-261 shall be recorded and kept up-to-date at the facility. The information shall include:

(1) Description and date of each modification that is made to the closed-vent system or control device design.

(2) Identification of operating parameter, description of monitoring device, and diagram of monitoring sensor location or locations used to comply with Subsections R315-261-1033 (f)(1) and (2).

(3) Monitoring, operating, and inspection information required by Subsections R315-261-1033(f) through (k).

(4) Date, time, and duration of each period that occurs while the control device is operating when any monitored parameter exceeds the value established in the control device design analysis as specified below:

(i) For a thermal vapor incinerator designed to operate with a minimum residence time of 0.50 second at a minimum temperature of 760 deg. C, period when the combustion temperature is below 760 deg. C.

(ii) For a thermal vapor incinerator designed to operate with an organic emission reduction efficiency of 95 weight percent or greater, period when the combustion zone temperature is more than 28 degrees C below the design average combustion zone temperature established as a requirement of Subsection R315-261-1035(b)(4)(iii)(A).

(iii) For a catalytic vapor incinerator, period when:

(A) Temperature of the vent stream at the catalyst bed inlet is more than 28 degrees C below the average temperature of the inlet vent stream established as a requirement of Subsection R315-261-1035(b)(4)(iii)(B), or

(B) Temperature difference across the catalyst bed is less than 80 percent of the design average temperature difference established as a requirement of Subsection R315-261-1035(b)(4)(iii)(B).

(iv) For a boiler or process heater, period when:

(A) Flame zone temperature is more than 28 degrees C below the design average flame zone temperature established as a requirement of Subsection R315-261-1035(b)(4)(iii)(C), or

(B) Position changes where the vent stream is introduced to the combustion zone from the location established as a requirement of Subsection R315-261-1035(b)(4)(iii)(C).

(v) For a flare, period when the pilot flame is not ignited.

(vi) For a condenser that complies with Subsection R315-261-1033(f)(2)(vi)(A), period when the organic compound concentration level or readings of organic compounds in the exhaust vent stream from the condenser are more than 20 percent greater than the design outlet organic compound concentration level established as a requirement of Subsection R315-261-1035(b)(4)(iii)(E).

(vii) For a condenser that complies with Subsection R315-261-1033(f)(2)(vi)(B), period when:

(A) Temperature of the exhaust vent stream from the condenser is more than 6 degrees C above the design average exhaust vent stream temperature established as a requirement of Subsection R315-261-1035(b)(4)(iii)(E); or

(B) Temperature of the coolant fluid exiting the condenser is more than 6 degrees C above the design average coolant fluid temperature at the condenser outlet established as a requirement of Subsection R315-261-1035(b)(4)(iii)(E).

(viii) For a carbon adsorption system such as a fixed-bed carbon adsorber that regenerates the carbon bed directly on-site in the control device and complies with Subsection R315-261-1033(f)(2)(vii)(A), period when the organic compound concentration level or readings of organic compounds in the exhaust vent stream from the carbon bed are more than 20 percent greater than the design exhaust vent stream organic compound concentration level established as a requirement of Subsection R315-261-1035(b)(4)(iii)(F).

(ix) For a carbon adsorption system such as a fixed-bed carbon adsorber that regenerates the carbon bed directly on-site in the control device and complies with Subsection R315-261-1033(f)(2)(vii)(B), period when the vent stream continues to flow through the control device beyond the predetermined carbon bed regeneration time established as a requirement of Subsection R315-261-1035(b)(4)(iii)(F).

(5) Explanation for each period recorded under Subsection R315-261-1035(c)(4) of the cause for control device operating parameter exceeding the design value and the measures

implemented to correct the control device operation.

(6) For a carbon adsorption system operated subject to requirements specified in Subsections R315-261-1033(g) or (h)(2), date when existing carbon in the control device is replaced with fresh carbon.

(7) For a carbon adsorption system operated subject to requirements specified in Subsection R315-261-1033(h)(1), a log that records:

(i) Date and time when control device is monitored for carbon breakthrough and the monitoring device reading.

(ii) Date when existing carbon in the control device is replaced with fresh carbon.

(8) Date of each control device startup and shutdown.

(9) A remanufacturer or other person that stores or treats the hazardous secondary material designating any components of a closed-vent system as unsafe to monitor pursuant to Subsection R315-261-1033(o) shall record in a log that is kept at the facility the identification of closed-vent system components that are designated as unsafe to monitor in accordance with the requirements of Subsection R315-261-1033(o), an explanation for each closed-vent system component stating why the closed-vent system component is unsafe to monitor, and the plan for monitoring each closed-vent system component.

(10) When each leak is detected as specified in Subsection R315-261-1033(l), the following information shall be recorded:

(i) The instrument identification number, the closed-vent system component identification number, and the operator name, initials, or identification number.

(ii) The date the leak was detected and the date of first attempt to repair the leak.

(iii) The date of successful repair of the leak.

(iv) Maximum instrument reading measured by Method 21 of 40 CFR part 60, appendix A after it is successfully repaired or determined to be nonrepairable.

(v) "Repair delayed" and the reason for the delay if a leak is not repaired within 15 calendar days after discovery of the leak.

(A) The remanufacturer or other person that stores or treats the hazardous secondary material may develop a written procedure that identifies the conditions that justify a delay of repair. In such cases, reasons for delay of repair may be documented by citing the relevant sections of the written procedure.

(B) If delay of repair was caused by depletion of stocked parts, there shall be documentation that the spare parts were sufficiently stocked on-site before depletion and the reason for depletion.

(d) Records of the monitoring, operating, and inspection information required by Subsections R315-261-1035(c)(3) through (10) shall be maintained by the owner or operator for at least 3 years following the date of each occurrence, measurement, maintenance, corrective action, or record.

(e) For a control device other than a thermal vapor incinerator, catalytic vapor incinerator, flare, boiler, process heater, condenser, or carbon adsorption system, the Director shall specify the appropriate recordkeeping requirements.

(f) Up-to-date information and data used to determine whether or not a process vent is subject to the requirements in Subsection R315-261-1032 including supporting documentation as required by Subsection R315-261-1034(d)(2) when application of the knowledge of the nature of the hazardous secondary material stream or the process by which it was produced is used, shall be recorded in a log that is kept at the facility.

R315-261-1050. Air Emission Standards for Equipment Leaks - Applicability.

(a) The regulations in Sections R315-261-1050 through 1064 apply to equipment that contains hazardous secondary materials excluded under the remanufacturing exclusion at Subsection R315-261-4(a)(27), unless the equipment operations are subject to the requirements of an applicable Clean Air Act regulation codified under 40 CFR part 60, part 61, or part 63.

R315-261-1051. Air Emission Standards for Equipment Leaks - Definitions.

As used in Sections R315-261-1050 through 1064, all terms shall have the meaning given them in Section R315-261-1031, the Resource Conservation and Recovery Act, the Utah Solid and Hazardous Waste Act, and Rules R315-260 through 266.

R315-261-1052. Air Emission Standards: Pumps in Light Liquid Service.

(a)(1) Each pump in light liquid service shall be monitored monthly to detect leaks by the methods specified in Section R315-261-1063(b), except as provided in Subsections R315-261-1052(d), (e), and (f).

(2) Each pump in light liquid service shall be checked by visual inspection each calendar week for indications of liquids dripping from the pump seal.

(b)(1) If an instrument reading of 10,000 ppm or greater is measured, a leak is detected.

(2) If there are indications of liquids dripping from the pump seal, a leak is detected.

(c)(1) When a leak is detected, it shall be repaired as soon as practicable, but not later than 15 calendar days after it is detected, except as provided in Section R315-261-1059.

(2) A first attempt at repair, e.g., tightening the packing gland, shall be made no later than five calendar days after each leak is detected.

(d) Each pump equipped with a dual mechanical seal system that includes a barrier fluid system is exempt from the requirements of Subsection R315-261-1052(a), provided the following requirements are met:

(1) Each dual mechanical seal system shall be:

(i) Operated with the barrier fluid at a pressure that is at all times greater than the pump stuffing box pressure, or

(ii) Equipped with a barrier fluid degassing reservoir that is connected by a closed-vent system to a control device that complies with the requirements of Section R315-261-1060, or

(iii) Equipped with a system that purges the barrier fluid into a hazardous secondary material stream with no detectable emissions to the atmosphere.

(2) The barrier fluid system shall not be a hazardous secondary material with organic concentrations 10 percent or greater by weight.

(3) Each barrier fluid system shall be equipped with a sensor that will detect failure of the seal system, the barrier fluid system, or both.

(4) Each pump shall be checked by visual inspection, each calendar week, for indications of liquids dripping from the pump seals.

(5)(i) Each sensor as described in Subsection R315-261-1052(d)(3) shall be checked daily or be equipped with an audible alarm that shall be checked monthly to ensure that it is functioning properly.

(ii) The remanufacturer or other person that stores or treats the hazardous secondary material shall determine, based on design considerations and operating experience, a criterion that indicates failure of the seal system, the barrier fluid system, or both.

(6)(i) If there are indications of liquids dripping from the pump seal or the sensor indicates failure of the seal system, the barrier fluid system, or both based on the criterion determined in Subsection R315-261-1052(d)(5)(ii), a leak is detected.

(ii) When a leak is detected, it shall be repaired as soon as

practicable, but not later than 15 calendar days after it is detected, except as provided in Section R315-261-1059.

(iii) A first attempt at repair, e.g., relapping the seal, shall be made no later than five calendar days after each leak is detected.

(e) Any pump that is designated, as described in Section R315-261-1064(g)(2), for no detectable emissions, as indicated by an instrument reading of less than 500 ppm above background, is exempt from the requirements of Subsections R315-261-1052(a), (c), and (d) if the pump meets the following requirements:

(1) Shall have no externally actuated shaft penetrating the pump housing.

(2) Shall operate with no detectable emissions as indicated by an instrument reading of less than 500 ppm above background as measured by the methods specified in Section R315-261-1063(c).

(3) Shall be tested for compliance with Subsection R315-261-1052(e)(2) initially upon designation, annually, and at other times as requested by the Director.

(f) If any pump is equipped with a closed-vent system capable of capturing and transporting any leakage from the seal or seals to a control device that complies with the requirements of Section R315-261-1060, it is exempt from the requirements of Subsections R315-261-1052(a) through (e).

R315-261-1053. Air Emission Standards: Compressors.

(a) Each compressor shall be equipped with a seal system that includes a barrier fluid system and that prevents leakage of total organic emissions to the atmosphere, except as provided in Subsections R315-261-1053(h) and (i).

(b) Each compressor seal system as required in Subsection R315-261-1053(a) shall be:

(1) Operated with the barrier fluid at a pressure that is at all times greater than the compressor stuffing box pressure, or

(2) Equipped with a barrier fluid system that is connected by a closed-vent system to a control device that complies with the requirements of Section R315-261-1060, or

(3) Equipped with a system that purges the barrier fluid into a hazardous secondary material stream with no detectable emissions to atmosphere.

(c) The barrier fluid shall not be a hazardous secondary material with organic concentrations 10 percent or greater by weight.

(d) Each barrier fluid system as described in Subsections R315-261-1053(a) through (c) shall be equipped with a sensor that will detect failure of the seal system, barrier fluid system, or both.

(e)(1) Each sensor as required in Subsection R315-261-1053(d) shall be checked daily or shall be equipped with an audible alarm that shall be checked monthly to ensure that it is functioning properly unless the compressor is located within the boundary of an unmanned plant site, in which case the sensor shall be checked daily.

(2) The remanufacturer or other person that stores or treats the hazardous secondary material shall determine, based on design considerations and operating experience, a criterion that indicates failure of the seal system, the barrier fluid system, or both.

(f) If the sensor indicates failure of the seal system, the barrier fluid system, or both based on the criterion determined under Subsection R315-261-1053(e)(2), a leak is detected.

(g)(1) When a leak is detected, it shall be repaired as soon as practicable, but not later than 15 calendar days after it is detected, except as provided in Section R315-261-1059.

(2) A first attempt at repair, e.g., tightening the packing gland, shall be made no later than 5 calendar days after each leak is detected.

(h) A compressor is exempt from the requirements of Subsections R315-261-1053(a) and (b) if it is equipped with a closed-vent system capable of capturing and transporting any leakage from the seal to a control device that complies with the requirements of Section R315-261-1060, except as provided in Subsection R315-261-1053(i).

(i) Any compressor that is designated, as described in Section R315-261-1064(g)(2), for no detectable emissions as indicated by an instrument reading of less than 500 ppm above background is exempt from the requirements of Subsections R315-261-1053(a) through (h) if the compressor:

(1) Is determined to be operating with no detectable emissions, as indicated by an instrument reading of less than 500 ppm above background, as measured by the method specified in Section R315-261-1063(c).

(2) Is tested for compliance with Subsection R315-261-1053(i)(1) initially upon designation, annually, and at other times as requested by the Director.

R315-261-1054. Air Emission Standards: Pressure Relief Devices in Gas/Vapor Service.

(a) Except during pressure releases, each pressure relief device in gas/vapor service shall be operated with no detectable emissions, as indicated by an instrument reading of less than 500 ppm above background, as measured by the method specified in Subsection R315-261-1063(c).

(b)(1) After each pressure release, the pressure relief device shall be returned to a condition of no detectable emissions, as indicated by an instrument reading of less than 500 ppm above background, as soon as practicable, but no later than 5 calendar days after each pressure release, except as provided in Section R315-261-1059.

(2) No later than 5 calendar days after the pressure release, the pressure relief device shall be monitored to confirm the condition of no detectable emissions, as indicated by an instrument reading of less than 500 ppm above background, as measured by the method specified in Subsection R315-261-1063(c).

(c) Any pressure relief device that is equipped with a closed-vent system capable of capturing and transporting leakage from the pressure relief device to a control device as described in Section R315-261-1060 is exempt from the requirements of Subsection R315-261-1054(a) and (b).

R315-261-1055. Air Emission Standards: Sampling Connection Systems.

(a) Each sampling connection system shall be equipped with a closed-purge, closed-loop, or closed-vent system. This system shall collect the sample purge for return to the process or for routing to the appropriate treatment system. Gases displaced during filling of the sample container are not required to be collected or captured.

(b) Each closed-purge, closed-loop, or closed-vent system as required in Subsection R315-261-1055(a) shall meet one of the following requirements:

(1) Return the purged process fluid directly to the process line;

(2) Collect and recycle the purged process fluid; or

(3) Be designed and operated to capture and transport all the purged process fluid to a material management unit that complies with the applicable requirements of Sections R315-261-1084 through1086 or a control device that complies with the requirements of Section R315-261-1060.

(c) In-situ sampling systems and sampling systems without purges are exempt from the requirements of Subsections R315-261-1055(a) and (b).

R315-261-1056. Air Emission Standards: Open-Ended Valves or Lines.

(a)(1) Each open-ended valve or line shall be equipped

with a cap, blind flange, plug, or a second valve.

(2) The cap, blind flange, plug, or second valve shall seal the open end at all times except during operations requiring hazardous secondary material stream flow through the open-ended valve or line.

(b) Each open-ended valve or line equipped with a second valve shall be operated in a manner such that the valve on the hazardous secondary material stream end is closed before the second valve is closed.

(c) When a double block and bleed system is being used, the bleed valve or line may remain open during operations that require venting the line between the block valves but shall comply with Subsection R315-261-1056(a) at all other times.

R315-261-1057. Air Emission Standards: Valves in Gas/Vapor Service or in Light Liquid Service.

(a) Each valve in gas/vapor or light liquid service shall be monitored monthly to detect leaks by the methods specified in Subsection R315-261-1063(b) and shall comply with Subsections R315-261-1057(b) through (e), except as provided in Subsections R315-261-1057(f), (g), and (h) and Sections R315-261-1061 and 1062.

(b) If an instrument reading of 10,000 ppm or greater is measured, a leak is detected.

(c)(1) Any valve for which a leak is not detected for two successive months may be monitored the first month of every succeeding quarter, beginning with the next quarter, until a leak is detected.

(2) If a leak is detected, the valve shall be monitored monthly until a leak is not detected for two successive months,

(d)(1) When a leak is detected, it shall be repaired as soon as practicable, but no later than 15 calendar days after the leak is detected, except as provided in Section R315-261-1059.

(2) A first attempt at repair shall be made no later than 5 calendar days after each leak is detected.

(e) First attempts at repair include, but are not limited to, the following best practices where practicable:

(1) Tightening of bonnet bolts.

(2) Replacement of bonnet bolts.

(3) Tightening of packing gland nuts.

(4) Injection of lubricant into lubricated packing.

(f) Any valve that is designated, as described in Subsection R315-261-1064(g)(2), for no detectable emissions, as indicated by an instrument reading of less than 500 ppm above background, is exempt from the requirements of Subsection R315-261-1057(a) if the valve:

(1) Has no external actuating mechanism in contact with the hazardous secondary material stream.

(2) Is operated with emissions less than 500 ppm above background as determined by the method specified in Subsection R315-261-1063(c).

(3) Is tested for compliance with Subsection R315-261-1057(f)(2) initially upon designation, annually, and at other times as requested by the Director.

(g) Any valve that is designated, as described in Subsection R315-261-1064(h)(1), as an unsafe-to-monitor valve is exempt from the requirements of Subsection R315-261-1057(a) if:

(1) The remanufacturer or other person that stores or treats the hazardous secondary material determines that the valve is unsafe to monitor because monitoring personnel would be exposed to an immediate danger as a consequence of complying with Subsection R315-261-1057(a).

(2) The remanufacturer or other person that stores or treats the hazardous secondary material adheres to a written plan that requires monitoring of the valve as frequently as practicable during safe-to-monitor times.

(h) Any valve that is designated, as described in Subsection R315-261-1064(h)(2), as a difficult-to-monitor valve is exempt from the requirements of Subsection R315-261-1057(a) if:

(1) The remanufacturer or other person that stores or treats the hazardous secondary material determines that the valve cannot be monitored without elevating the monitoring personnel more than 2 meters above a support surface.

(2) The hazardous secondary material management unit within which the valve is located was in operation before the effective date of Rule R315-261.

(3) The owner or operator of the valve follows a written plan that requires monitoring of the valve at least once per calendar year.

R315-261-1058. Air Emission Standards: Pumps and Valves in Heavy Liquid Service, Pressure Relief Devices in Light Liquid or Heavy Liquid Service, and Flanges and Other Connectors.

(a) Pumps and valves in heavy liquid service, pressure relief devices in light liquid or heavy liquid service, and flanges and other connectors shall be monitored within five days by the method specified in subsection R315-261-1063(b) if evidence of a potential leak is found by visual, audible, olfactory, or any other detection method.

(b) If an instrument reading of 10,000 ppm or greater is measured, a leak is detected.

(c)(1) When a leak is detected, it shall be repaired as soon as practicable, but not later than 15 calendar days after it is detected, except as provided in Section R315-261-1059.

(2) The first attempt at repair shall be made no later than 5 calendar days after each leak is detected.

(d) First attempts at repair include, but are not limited to, the best practices described under Subsection R315-261-1057(e).

(e) Any connector that is inaccessible or is ceramic or ceramic-lined, e.g., porcelain, glass, or glass-lined, is exempt from the monitoring requirements of Subsection R315-261-1058(a) and from the recordkeeping requirements of Section R315-261-1064.

R315-261-1059. Air Emission Standards: Delay of Repair.

(a) Delay of repair of equipment for which leaks have been detected shall be allowed if the repair is technically infeasible without a hazardous secondary material management unit shutdown. In such a case, repair of this equipment shall occur before the end of the next hazardous secondary material management unit shutdown.

(b) Delay of repair of equipment for which leaks have been detected shall be allowed for equipment that is isolated from the hazardous secondary material management unit and that does not continue to contain or contact hazardous secondary material with organic concentrations at least 10 percent by weight.

(c) Delay of repair for valves shall be allowed if:

(1) The remanufacturer or other person that stores or treats the hazardous secondary material determines that emissions of purged material resulting from immediate repair are greater than the emissions likely to result from delay of repair.

(2) When repair procedures are effected, the purged material is collected and destroyed or recovered in a control device complying with Section R315-261-1060.

(d) Delay of repair for pumps shall be allowed if:

(1) Repair requires the use of a dual mechanical seal system that includes a barrier fluid system.

(2) Repair is completed as soon as practicable, but not later than 6 months after the leak was detected.

(e) Delay of repair beyond a hazardous secondary material management unit shutdown shall be allowed for a valve if valve assembly replacement is necessary during the hazardous secondary material management unit shutdown, valve assembly

supplies have been depleted, and valve assembly supplies had been sufficiently stocked before the supplies were depleted. Delay of repair beyond the next hazardous secondary material management unit shutdown will not be allowed unless the next hazardous secondary material management unit shutdown occurs sooner than 6 months after the first hazardous secondary material management unit shutdown.

R315-261-1060. Air Emission Standards: Closed-Vent Systems and Control Devices.

(a) The remanufacturer or other person that stores or treats the hazardous secondary material in a hazardous secondary material management units using closed-vent systems and control devices subject to Sections R315-261-1050 through 1064 shall comply with the provisions of Section R315-261-1033.

(b)(1) The remanufacturer or other person that stores or treats the hazardous secondary material at an existing facility who cannot install a closed-vent system and control device to comply with the provisions of Sections R315-261-1050 through 1064 on the effective date that the facility becomes subject to the provisions of Sections R315-261-1050 through 1064 shall prepare an implementation schedule that includes dates by which the closed-vent system and control device shall be installed and in operation. The controls shall be installed as soon as possible, but the implementation schedule may allow up to 30 months after the effective date that the facility becomes subject to Sections R315-261-1050 through 1064 for installation and startup.

(2) Any unit that begins operation after the effective date of rule R315-261 and is subject to the provisions of Sections R315-261-1050 through 1064 when operation begins, shall comply with the rules immediately, i.e., shall have control devices installed and operating on startup of the affected unit; the 30-month implementation schedule does not apply.

(3) The remanufacturer or other person that stores or treats the hazardous secondary material at any facility in existence on the effective date of a statutory or regulatory amendment that renders the facility subject to Sections R315-261-1050 through 1064 shall comply with all requirements of Sections R315-261-1050 through 1064 as soon as practicable but no later than 30 months after the amendment's effective date. When control equipment required by Sections R315-261-1050 through 1064 cannot be installed and begin operation by the effective date of the amendment, the facility owner or operator shall prepare an implementation schedule that includes the following information: Specific calendar dates for award of contracts or issuance of purchase orders for the control equipment, initiation of on-site installation of the control equipment, completion of the control equipment installation, and performance of any testing to demonstrate that the installed equipment meets the applicable standards of Sections R315-261-1050 through 1064. The remanufacturer or other person that stores or treats the hazardous secondary material shall keep a copy of the implementation schedule at the facility.

(4) Remanufacturers or other persons that store or treat the hazardous secondary materials at facilities and units that become newly subject to the requirements of Sections R315-261-1050 through 1064 after the effective date of Rule R315-261, due to an action other than those described in Subsection R315-261-1060(b)(3) shall comply with all applicable requirements immediately, i.e., shall have control devices installed and operating on the date the facility or unit becomes subject to Sections R315-261-1050 through 1064; the 30-month implementation schedule does not apply.

R315-261-1061. Air Emission Standards for Equipment Leaks - Alternative Standards for Valves in Gas/Vapor Service or in Light Liquid Service: Percentage of Valves Allowed to Leak.

(a) A remanufacturer or other person that stores or treats the hazardous secondary material subject to the requirements of Section R315-261-1057 may elect to have all valves within a hazardous secondary material management unit comply with an alternative standard that allows no greater than 2 percent of the valves to leak.

(b) The following requirements shall be met if a remanufacturer or other person that stores or treats the hazardous secondary material decides to comply with the alternative standard of allowing 2 percent of valves to leak:

(1) A performance test as specified in Subsection R315-261-1061(c) shall be conducted initially upon designation, annually, and at other times requested by the Director.

(2) If a valve leak is detected, it shall be repaired in accordance with Subsections R315-261-1057(d) and (e).

(c) Performance tests shall be conducted in the following manner:

(1) All valves subject to the requirements in Section R315-261-1057 within the hazardous secondary material management unit shall be monitored within 1 week by the methods specified in Subsection R315-261-1063(b).

(2) If an instrument reading of 10,000 ppm or greater is measured, a leak is detected.

(3) The leak percentage shall be determined by dividing the number of valves subject to the requirements in Section R315-261-1057 for which leaks are detected by the total number of valves subject to the requirements in Section R315-261-1057 within the hazardous secondary material management unit.

R315-261-1062. Air Emission Standards for Equipment Leaks - Alternative Standards for Valves in Gas/Vapor Service or in Light Liquid Service: Skip Period Leak Detection and Repair.

(a) A remanufacturer or other person that stores or treats the hazardous secondary material subject to the requirements of Section R315-261-1057 may elect for all valves within a hazardous secondary material management unit to comply with one of the alternative work practices specified in Subsections R315-261-1062(b)(2) and (3).

(b)(1) A remanufacturer or other person that stores or treats the hazardous secondary material shall comply with the requirements for valves, as described in Section R315-261-1057, except as described in Subsections R315-261-1062(b)(2) and (3).

(2) After two consecutive quarterly leak detection periods with the percentage of valves leaking equal to or less than two percent, a remanufacturer or other person that stores or treats the hazardous secondary material may begin to skip one of the quarterly leak detection periods, i.e., monitor for leaks once every six months, for the valves subject to the requirements in Section R315-261-1057.

(3) After five consecutive quarterly leak detection periods with the percentage of valves leaking equal to or less than two percent, a remanufacturer or other person that stores or treats the hazardous secondary material may begin to skip three of the quarterly leak detection periods, i.e., monitor for leaks once every year, for the valves subject to the requirements in Section R315-261-1057.

(4) If the percentage of valves leaking is greater than two percent, the remanufacturer or other person that stores or treats the hazardous secondary material shall monitor monthly in compliance with the requirements in Section R315-261-1057, but may again elect to use Section R315-261-1062 after meeting the requirements of Subsection R315-261-1057(c)(1).

R315-261-1063. Air Emission Standards for Equipment Leaks - Test Methods and Procedures.

(a) Each remanufacturer or other person that stores or

treats the hazardous secondary material subject to the provisions of Sections R315-261-1050 through 1064 shall comply with the test methods and procedures requirements provided in Section R315-261-1063.

(b) Leak detection monitoring, as required in Sections R315-261-1052 through1062, shall comply with the following requirements:

(1) Monitoring shall comply with Reference Method 21 in 40 CFR part 60.

(2) The detection instrument shall meet the performance criteria of Reference Method 21.

(3) The instrument shall be calibrated before use on each day of its use by the procedures specified in Reference Method 21.

(4) Calibration gases shall be:

(i) Zero air, less than 10 ppm of hydrocarbon in air.

(ii) A mixture of methane or n-hexane and air at a concentration of approximately, but less than, 10,000 ppm methane or n-hexane.

(5) The instrument probe shall be traversed around all potential leak interfaces as close to the interface as possible as described in Reference Method 21.

(c) When equipment is tested for compliance with no detectable emissions, as required in Subsections R315-261-1052(e), 1053(i), and 1057(f) and Sections R315-261-1054, the test shall comply with the following requirements:

(1) The requirements of Subsections R315-261-1063(b)(1) through (4) shall apply.

(2) The background level shall be determined as set forth in Reference Method 21.

(3) The instrument probe shall be traversed around all potential leak interfaces as close to the interface as possible as described in Reference Method 21.

(4) The arithmetic difference between the maximum concentration indicated by the instrument and the background level is compared with 500 ppm for determining compliance.

(d) A remanufacturer or other person that stores or treats the hazardous secondary material shall determine, for each piece of equipment, whether the equipment contains or contacts a hazardous secondary material with organic concentration that equals or exceeds 10 percent by weight using the following:

(1) Methods described in ASTM Methods D 2267-88, E 169-87, E 168-88, E 260-85, incorporated by reference under Section R315-260-11;

(2) Method 9060A, incorporated by reference under Section R315-260-11, of "Test Methods for Evaluating Solid Waste," EPA Publication SW-846, for computing total organic concentration of the sample, or analyzed for its individual organic constituents; or

(3) Application of the knowledge of the nature of the hazardous secondary material stream or the process by which it was produced. Documentation of a material determination by knowledge is required. Examples of documentation that shall be used to support a determination under this provision include production process information documenting that no organic compounds are used, information that the material is generated by a process that is identical to a process at the same or another facility that has previously been demonstrated by direct measurement to have a total organic content less than 10 percent, or prior speciation analysis results on the same material stream where it can also be documented that no process changes have occurred since that analysis that could affect the material total organic concentration.

(e) If a remanufacturer or other person that stores or treats the hazardous secondary material determines that a piece of equipment contains or contacts a hazardous secondary material with organic concentrations at least 10 percent by weight, the determination can be revised only after following the procedures in Subsection R315-261-1063(d)(1) or (2).

(f) When a remanufacturer or other person that stores or treats the hazardous secondary material and the Director do not agree on whether a piece of equipment contains or contacts a hazardous secondary material with organic concentrations at least 10 percent by weight, the procedures in Subsection R315-261-1063(d)(1) or (2) can be used to resolve the dispute.

(g) Samples used in determining the percent organic content shall be representative of the highest total organic content hazardous secondary material that is expected to be contained in or contact the equipment.

(h) To determine if pumps or valves are in light liquid service, the vapor pressures of constituents may be obtained from standard reference texts or may be determined by ASTM D-2879-86, incorporated by reference under Section R315-260-11.

(i) Performance tests to determine if a control device achieves 95 weight percent organic emission reduction shall comply with the procedures of Subsections R315-261-1034(c)(1) through (4).

R315-261-1064. Air Emission Standards for Equipment Leaks - Recordkeeping Requirements.

(a)(1) Each remanufacturer or other person that stores or treats the hazardous secondary material subject to the provisions of Sections R315-261-1050 through 1064 shall comply with the recordkeeping requirements of Section R315-261-1064.

(2) A remanufacturer or other person that stores or treats the hazardous secondary material in more than one hazardous secondary material management unit subject to the provisions of Sections R315-261-1050 through 1064 may comply with the recordkeeping requirements for these hazardous secondary material management units in one recordkeeping system if the system identifies each record by each hazardous secondary material management unit.

(b) Remanufacturer's and other person's that store or treat the hazardous secondary material shall record and keep the following information at the facility:

(1) For each piece of equipment to which Sections R315-261-1050 through 1064 applies:

(i) Equipment identification number and hazardous secondary material management unit identification.

(ii) Approximate locations within the facility, e.g., identify the hazardous secondary material management unit on a facility plot plan.

(iii) Type of equipment, e.g., a pump or pipeline valve.

(iv) Percent-by-weight total organics in the hazardous secondary material stream at the equipment.

(v) Hazardous secondary material state at the equipment, e.g., gas/vapor or liquid.

(vi) Method of compliance with the standard, e.g., "monthly leak detection and repair" or "equipped with dual mechanical seals".

(2) For facilities that comply with the provisions of Subsection R315-261-1033(a)(2), an implementation schedule as specified in Subsection R315-261-1033(a)(2).

(3) Where a remanufacturer or other person that stores or treats the hazardous secondary material chooses to use test data to demonstrate the organic removal efficiency or total organic compound concentration achieved by the control device, a performance test plan as specified in Subsection R315-261-1035(b)(3).

(4) Documentation of compliance with Section R315-261-1060, including the detailed design documentation or performance test results specified in Subsection R315-261-1035(b)(4).

(c) When each leak is detected as specified in Sections R315-261-1052, 1053, 1057, and 1058, the following requirements apply:

(1) A weatherproof and readily visible identification,

marked with the equipment identification number, the date evidence of a potential leak was found in accordance with Subsection R315-261-1058(a), and the date the leak was detected, shall be attached to the leaking equipment.

(2) The identification on equipment, except on a valve, may be removed after it has been repaired.

(3) The identification on a valve may be removed after it has been monitored for two successive months as specified in Subsection R315-261-1057(c) and no leak has been detected during those two months.

(d) When each leak is detected as specified in Sections R315-261-1052, 1053, 1057, and 1058, the following information shall be recorded in an inspection log and shall be kept at the facility:

(1) The instrument and operator identification numbers and the equipment identification number.

(2) The date evidence of a potential leak was found in accordance with Subsection R315-261-1058(a).

(3) The date the leak was detected and the dates of each attempt to repair the leak.

(4) Repair methods applied in each attempt to repair the leak.

(5) "Above 10,000" if the maximum instrument reading measured by the methods specified in Subsection R315-261-1063(b) after each repair attempt is equal to or greater than 10,000 ppm.

(6) "Repair delayed" and the reason for the delay if a leak is not repaired within 15 calendar days after discovery of the leak.

(7) Documentation supporting the delay of repair of a valve in compliance with Subsection R315-261-1059(c).

(8) The signature of the remanufacturer or other person that stores or treats the hazardous secondary material, or designate, whose decision it was that repair could not be effected without a hazardous secondary material management unit shutdown.

(9) The expected date of successful repair of the leak if a leak is not repaired within 15 calendar days.

(10) The date of successful repair of the leak.

(e) Design documentation and monitoring, operating, and inspection information for each closed-vent system and control device required to comply with the provisions of Section R315-261-1060 shall be recorded and kept up-to-date at the facility as specified in Subsection R315-261-1035(c). Design documentation is specified in Subsections R315-261-1035(c)(1) and (2) and monitoring, operating, and inspection information in Subsections R315-261-1035(c)(3) through (8).

(f) For a control device other than a thermal vapor incinerator, catalytic vapor incinerator, flare, boiler, process heater, condenser, or carbon adsorption system, the Director shall specify the appropriate recordkeeping requirements.

(g) The following information pertaining to all equipment subject to the requirements in Sections R315-261-1052 through 1060 shall be recorded in a log that is kept at the facility:

(1) A list of identification numbers for equipment, except welded fittings, subject to the requirements of Sections R315-261-1050 through 1064.

(2)(i) A list of identification numbers for equipment that the remanufacturer or other person that stores or treats the hazardous secondary material elects to designate for no detectable emissions, as indicated by an instrument reading of less than 500 ppm above background, under the provisions of Subsections R315-261-1052(e), 1053(i), and 1057(f).

(ii) The designation of this equipment as subject to the requirements of Subsection R315-261-1052(e), 1053(i), or 1057(f) shall be signed by the remanufacturer or other person that stores or treats the hazardous secondary material.

(3) A list of equipment identification numbers for pressure relief devices required to comply with Subsection R315-261-1054(a).

(4)(i) The dates of each compliance test required in Subsections R315-261-1052(e), 1053(i), and 1057(f) and Section R315-261-1054.

(ii) The background level measured during each compliance test.

(iii) The maximum instrument reading measured at the equipment during each compliance test.

(5) A list of identification numbers for equipment in vacuum service.

(6) Identification, either by list or location, area or group, of equipment that contains or contacts hazardous secondary material with an organic concentration of at least 10 percent by weight for less than 300 hours per calendar year.

(h) The following information pertaining to all valves subject to the requirements of Subsections R315-261-1057(g) and (h) shall be recorded in a log that is kept at the facility:

(1) A list of identification numbers for valves that are designated as unsafe to monitor, an explanation for each valve stating why the valve is unsafe to monitor, and the plan for monitoring each valve.

(2) A list of identification numbers for valves that are designated as difficult to monitor, an explanation for each valve stating why the valve is difficult to monitor, and the planned schedule for monitoring each valve.

(i) The following information shall be recorded in a log that is kept at the facility for valves complying with Section R315-261-1062:

(1) A schedule of monitoring.

(2) The percent of valves found leaking during each monitoring period.

(j) The following information shall be recorded in a log that is kept at in the facility:

(1) Criteria required in Subsections R315-261-1052(d)(5)(ii) and 1053(e)(2) and an explanation of the design criteria.

(2) Any changes to these criteria and the reasons for the changes.

(k) The following information shall be recorded in a log that is kept at the facility for use in determining exemptions as provided in the applicability section of Sections R315-261-1050 and other Sections of Rule R315-261:

(1) An analysis determining the design capacity of the hazardous secondary material management unit.

(2) A statement listing the hazardous secondary material influent to and effluent from each hazardous secondary material management unit subject to the requirements in Sections R315-261-1052 through 1060 and an analysis determining whether these hazardous secondary materials are heavy liquids.

(3) An up-to-date analysis and the supporting information and data used to determine whether or not equipment is subject to the requirements in Sections R315-261-1052 through 1060. The record shall include supporting documentation as required by Subsection R315-261-1063(d)(3) when application of the knowledge of the nature of the hazardous secondary material stream or the process by which it was produced is used. If the remanufacturer or other person that stores or treats the hazardous secondary material takes any action, e.g., changing the process that produced the material, that could result in an increase in the total organic content of the material contained in or contacted by equipment determined not to be subject to the requirements in Sections R315-261-1052 through 1060, then a new determination is required.

(l) Records of the equipment leak information required by Subsection R315-261-1064(d) and the operating information required by Subsection R315-261-1064(e) need be kept only three years.

(m) The remanufacturer or other person that stores or treats the hazardous secondary material at a facility with

equipment that is subject to Sections R315-261-1050 through 1064 and to regulations at 40 CFR part 60, part 61, or part 63 may elect to determine compliance with Sections R315-261-1050 through 1064 either by documentation pursuant to Section R315-261-1064, or by documentation of compliance with the regulations at 40 CFR part 60, part 61, or part 63 pursuant to the relevant provisions of the regulations at 40 part 60, part 61, or part 63. The documentation of compliance under regulations at 40 CFR part 60, part 61, or part 63 shall be kept with or made readily available at the facility.

R315-261-1080. Air Emission Standards for Tanks and Containers - Applicability.

(a) The regulations in Sections R315-261-1080 through 1089 apply to tanks and containers that contain hazardous secondary materials excluded under the remanufacturing exclusion at Subsection R315-261-4(a)(27), unless the tanks and containers are equipped with and operating air emission controls in accordance with the requirements of an applicable Clean Air Act regulations codified under 40 CFR part 60, part 61, or part 63.

R315-261-1081. Air Emission Standards for Tanks and Containers - Definitions.

(a) As used in Sections R315-261-1080 through 1089, all terms not defined herein shall have the meaning given to them in the Resource Conservation and Recovery Act, the Utah Solid and Hazardous Waste Act, and Rules R315-260 through 266.

(1) "Average volatile organic concentration or average VO concentration" means the mass-weighted average volatile organic concentration of a hazardous secondary material as determined in accordance with the requirements of Section R315-261-1084.

(2) "Closure device" means a cap, hatch, lid, plug, seal, valve, or other type of fitting that blocks an opening in a cover such that when the device is secured in the closed position it prevents or reduces air pollutant emissions to the atmosphere. Closure devices include devices that are detachable from the cover; e.g., a sampling port cap; manually operated, e.g., a hinged access lid or hatch; or automatically operated, e.g., a spring-loaded pressure relief valve.

(3) "Continuous seal" means a seal that forms a continuous closure that completely covers the space between the edge of the floating roof and the wall of a tank. A continuous seal may be a vapor-mounted seal, liquid-mounted seal, or metallic shoe seal. A continuous seal may be constructed of fastened segments so as to form a continuous seal.

(4) "Cover" means a device that provides a continuous barrier over the hazardous secondary material managed in a unit to prevent or reduce air pollutant emissions to the atmosphere. A cover may have openings, such as access hatches, sampling ports, gauge wells, that are necessary for operation, inspection, maintenance, and repair of the unit on which the cover is used. A cover may be a separate piece of equipment which can be detached and removed from the unit or a cover may be formed by structural features permanently integrated into the design of the unit.

(5) "Empty hazardous secondary material container" means:

(a) A container from which all hazardous secondary materials have been removed that can be removed using the practices commonly employed to remove materials from that type of container, e.g., pouring, pumping, and aspirating, and no more than 2.5 centimeters, one inch, of residue remain on the bottom of the container or inner liner;

(b) A container that is less than or equal to 119 gallons in size and no more than 3 percent by weight of the total capacity of the container remains in the container or inner liner; or

(c) A container that is greater than 119 gallons in size and no more than 0.3 percent by weight of the total capacity of the container remains in the container or inner liner.

(6) "Enclosure" means a structure that surrounds a tank or container, captures organic vapors emitted from the tank or container, and vents the captured vapors through a closed-vent system to a control device.

(7) "External floating roof" means a pontoon-type or double-deck type cover that rests on the surface of the material managed in a tank with no fixed roof.

(8) "Fixed roof" means a cover that is mounted on a unit in a stationary position and does not move with fluctuations in the level of the material managed in the unit.

(9) "Floating membrane cover" means a cover consisting of a synthetic flexible membrane material that rests upon and is supported by the hazardous secondary material being managed in a surface impoundment.

(10) "Floating roof" means a cover consisting of a double deck, pontoon single deck, or internal floating cover which rests upon and is supported by the material being contained, and is equipped with a continuous seal.

(11) "Hard-piping" means pipe or tubing that is manufactured and properly installed in accordance with relevant standards and good engineering practices.

(12) "In light material service" means the container is used to manage a material for which both of the following conditions apply: The vapor pressure of one or more of the organic constituents in the material is greater than 0.3 kilopascals (kPa) at 20 degrees C; and the total concentration of the pure organic constituents having a vapor pressure greater than 0.3 kPa at 20 degrees C is equal to or greater than 20 percent by weight.

(13) "Internal floating roof" means a cover that rests or floats on the material surface, but not necessarily in complete contact with it, inside a tank that has a fixed roof.

(14) "Liquid-mounted seal" means a foam or liquid-filled primary seal mounted in contact with the hazardous secondary material between the tank wall and the floating roof continuously around the circumference of the tank.

(15) "Malfunction" means any sudden, infrequent, and not reasonably preventable failure of air pollution control equipment, process equipment, or a process to operate in a normal or usual manner. Failures that are caused in part by poor maintenance or careless operation are not malfunctions.

(16) "Material determination" means performing all applicable procedures in accordance with the requirements of Section R315-261-1084 to determine whether a hazardous secondary material meets standards specified in Sections R315-261-1080 through 1089. Examples of a material determination include performing the procedures in accordance with the requirements of Section R315-261-1084 to determine the average VO concentration of a hazardous secondary material at the point of material origination; the average VO concentration of a hazardous secondary material at the point of material treatment and comparing the results to the exit concentration limit specified for the process used to treat the hazardous secondary material; the organic reduction efficiency and the organic biodegradation efficiency for a biological process used to treat a hazardous secondary material and comparing the results to the applicable standards; or the maximum volatile organic vapor pressure for a hazardous secondary material in a tank and comparing the results to the applicable standards.

(17) "Maximum organic vapor pressure" means the sum of the individual organic constituent partial pressures exerted by the material contained in a tank, at the maximum vapor pressure-causing conditions, i.e., temperature, agitation, pH effects of combining materials, etc., reasonably expected to occur in the tank. For the purpose of Sections R315-261-1080 through 1089, maximum organic vapor pressure is determined using the procedures specified in Subsection R315-261-1084(c).

(18) "Metallic shoe seal" means a continuous seal that is

constructed of metal sheets which are held vertically against the wall of the tank by springs, weighted levers, or other mechanisms and is connected to the floating roof by braces or other means. A flexible coated fabric, envelope, spans the annular space between the metal sheet and the floating roof.

(19) "No detectable organic emissions" means no escape of organics to the atmosphere as determined using the procedure specified in Subsection R315-261-1084(d).

(20) "Point of material origination" means as follows:

(a) When the remanufacturer or other person that stores or treats the hazardous secondary material is the generator of the hazardous secondary material, the point of material origination means the point where a material produced by a system, process, or material management unit is determined to be a hazardous secondary material excluded under Subsection R315-261-4(a)(27).

Note to paragraph (a) of the definition of "Point of material origination: "In this case, this term is being used in a manner similar to the use of the term "point of generation" in air standards established under authority of the Clean Air Act in 40 CFR parts 60, 61, and 63.

(b) When the remanufacturer or other person that stores or treats the hazardous secondary material is not the generator of the hazardous secondary material, point of material origination means the point where the remanufacturer or other person that stores or treats the hazardous secondary material accepts delivery or takes possession of the hazardous secondary material.

(21) "Safety device" means a closure device such as a pressure relief valve, frangible disc, fusible plug, or any other type of device which functions exclusively to prevent physical damage or permanent deformation to a unit or its air emission control equipment by venting gases or vapors directly to the atmosphere during unsafe conditions resulting from an unplanned, accidental, or emergency event. For the purpose of Sections R315-261-1080 through 1089, a safety device is not used for routine venting of gases or vapors from the vapor headspace underneath a cover such as during filling of the unit or to adjust the pressure in this vapor headspace in response to normal daily diurnal ambient temperature fluctuations. A safety device is designed to remain in a closed position during normal operations and open only when the internal pressure, or another relevant parameter, exceeds the device threshold setting applicable to the air emission control equipment as determined by the remanufacturer or other person that stores or treats the hazardous secondary material based on manufacturer recommendations, applicable regulations, fire protection and prevention codes, standard engineering codes and practices, or other requirements for the safe handling of flammable, ignitable, explosive, reactive, or hazardous materials.

(22) "Single-seal system" means a floating roof having one continuous seal. This seal may be vapor-mounted, liquid-mounted, or a metallic shoe seal.

(23) "Vapor-mounted seal" means a continuous seal that is mounted such that there is a vapor space between the hazardous secondary material in the unit and the bottom of the seal.

(24) "Volatile organic concentration" or "VO concentration" means the fraction by weight of the volatile organic compounds contained in a hazardous secondary material expressed in terms of parts per million (ppmw) as determined by direct measurement or by knowledge of the material in accordance with the requirements of Section R315-261-1084. For the purpose of determining the VO concentration of a hazardous secondary material, organic compounds with a Henry's law constant value of at least 0.1 mole-fraction-in-the-gas-phase/mole-fraction-in the liquid-phase (0.1 Y/X), which can also be expressed as 1.8×10^{-6} atmospheres/gram-mole/m^3, at 25 deg. Celsius shall be included.

R315-261-1082. Air Emission Standards for Tanks and Containers - Standards: General.

(a) Section R315-261-1082 applies to the management of hazardous secondary material in tanks and containers subject to Sections R315-261-1080 through 1089.

(b) The remanufacturer or other person that stores or treats the hazardous secondary material shall control air pollutant emissions from each hazardous secondary material management unit in accordance with standards specified in Sections R315-261-1084 through 1087, as applicable to the hazardous secondary material management unit, except as provided for in Subsection R315-261-1082(c).

(c) A tank or container is exempt from standards specified in Sections R315-261-1084 through 1087, as applicable, provided that the hazardous secondary material management unit is a tank or container for which all hazardous secondary material entering the unit has an average VO concentration at the point of material origination of less than 500 parts per million by weight (ppmw). The average VO concentration shall be determined using the procedures specified in Subsection R315-261-1083(a). The remanufacturer or other person that stores or treats the hazardous secondary material shall review and update, as necessary, this determination at least once every 12 months following the date of the initial determination for the hazardous secondary material streams entering the unit.

R315-261-1083. Air Emission Standards for Tanks and Containers - Material Determination Procedures.

(a) Material determination procedure to determine average volatile organic (VO) concentration of a hazardous secondary material at the point of material origination.

(1) Determining average VO concentration at the point of material origination. A remanufacturer or other person that stores or treats the hazardous secondary material shall determine the average VO concentration at the point of material origination for each hazardous secondary material placed in a hazardous secondary material management unit exempted under the provisions of Subsection R315-261-1082(c)(1) from using air emission controls in accordance with standards specified in Sections R315-261-1084 through 1087, as applicable to the hazardous secondary material management unit.

(i) An initial determination of the average VO concentration of the material stream shall be made before the first time any portion of the material in the hazardous secondary material stream is placed in a hazardous secondary material management unit exempted under the provisions of Subsection R315-261-1082(c)(1) from using air emission controls, and thereafter an initial determination of the average VO concentration of the material stream shall be made for each averaging period that a hazardous secondary material is managed in the unit; and

(ii) Perform a new material determination whenever changes to the source generating the material stream are reasonably likely to cause the average VO concentration of the hazardous secondary material to increase to a level that is equal to or greater than the applicable VO concentration limits specified in Section R315-261-1082.

(2) Determination of average VO concentration using direct measurement or knowledge. For a material determination that is required by Subsection R315-261-1083(a)(1), the average VO concentration of a hazardous secondary material at the point of material origination shall be determined using either direct measurement as specified in Subsection R315-261-1083(a)(3) or by knowledge as specified in Subsection R315-261-1083(a)(4).

(3) Direct measurement to determine average VO concentration of a hazardous secondary material at the point of material origination.

(i) Identification. The remanufacturer or other person that

stores or treats the hazardous secondary material shall identify and record in a log that is kept at the facility the point of material origination for the hazardous secondary material.

(ii) Sampling. Samples of the hazardous secondary material stream shall be collected at the point of material origination in a manner such that volatilization of organics contained in the material and in the subsequent sample is minimized and an adequately representative sample is collected and maintained for analysis by the selected method.

(A) The averaging period to be used for determining the average VO concentration for the hazardous secondary material stream on a mass-weighted average basis shall be designated and recorded. The averaging period can represent any time interval that the remanufacturer or other person that stores or treats the hazardous secondary material determines is appropriate for the hazardous secondary material stream but shall not exceed 1 year.

(B) A sufficient number of samples, but no less than four samples, shall be collected and analyzed for a hazardous secondary material determination. All of the samples for a given material determination shall be collected within a one-hour period. The average of the four or more sample results constitutes a material determination for the material stream. One or more material determinations may be required to represent the complete range of material compositions and quantities that occur during the entire averaging period due to normal variations in the operating conditions for the source or process generating the hazardous secondary material stream. Examples of such normal variations are seasonal variations in material quantity or fluctuations in ambient temperature.

(C) All samples shall be collected and handled in accordance with written procedures prepared by the remanufacturer or other person that stores or treats the hazardous secondary material and documented in a site sampling plan. This plan shall describe the procedure by which representative samples of the hazardous secondary material stream are collected such that a minimum loss of organics occurs throughout the sample collection and handling process, and by which sample integrity is maintained. A copy of the written sampling plan shall be maintained at the facility. An example of acceptable sample collection and handling procedures for a total volatile organic constituent concentration may be found in Method 25D in 40 CFR part 60, appendix A.

(D) Sufficient information, as specified in the "site sampling plan" required under Subsection R315-261-1083(a)(3)(ii)(C), shall be prepared and recorded to document the material quantity represented by the samples and, as applicable, the operating conditions for the source or process generating the hazardous secondary material represented by the samples.

(iii) Analysis. Each collected sample shall be prepared and analyzed in accordance with Method 25D in 40 CFR part 60, appendix A for the total concentration of volatile organic constituents, or using one or more methods when the individual organic compound concentrations are identified and summed and the summed material concentration accounts for and reflects all organic compounds in the material with Henry's law constant values at least 0.1 mole-fraction-in-the-gas-phase/mole-fraction-in-the-liquid-phase (0.1 Y/X), which can also be expressed as 1.8×10^{-6}atmospheres/gram-mole/m^3, at 25 deg. Celsius. At the discretion of the remanufacturer or other person that stores or treats the hazardous secondary material, the test data obtained may be adjusted by any appropriate method to discount any contribution to the total volatile organic concentration that is a result of including a compound with a Henry's law constant value of less than 0.1 Y/X at 25 deg. Celsius. To adjust these data, the measured concentration of each individual chemical constituent contained in the material is multiplied by the appropriate constituent-specific adjustment factor (f_{m25D}). If the remanufacturer or other person that stores or treats the hazardous secondary material elects to adjust the test data, the adjustment shall be made to all individual chemical constituents with a Henry's law constant value greater than or equal to 0.1 Y/X at 25 degrees Celsius contained in the material. Constituent-specific adjustment factors (f_{m25D}) can be obtained by contacting the Waste and Chemical Processes Group, Office of Air Quality Planning and Standards, Research Triangle Park, NC 27711. Other test methods may be used if they meet the requirements in Subsection R315-261-1083(a)(3)(iii)(A) or (B) and provided the requirement to reflect all organic compounds in the material with Henry's law constant values greater than or equal to 0.1 Y/X, which can also be expressed as 1.8×10^{-6}atmospheres/gram-mole/m^3, at 25 deg. Celsius, is met.

(A) Any EPA standard method that has been validated in accordance with "Alternative Validation Procedure for EPA Waste and Wastewater Methods," 40 CFR part 63, appendix D.

(B) Any other analysis method that has been validated in accordance with the procedures specified in Section 5.1 or Section 5.3, and the corresponding calculations in Section 6.1 or Section 6.3, of Method 301 in 40 CFR part 63, appendix A. The data are acceptable if they meet the criteria specified in Section 6.1.5 or Section 6.3.3 of Method 301. If correction is required under section 6.3.3 of Method 301, the data are acceptable if the correction factor is within the range 0.7 to 1.30. Other sections of Method 301 are not required.

(iv) Calculations.

(A) The average VO concentration (C) on a mass-weighted basis shall be calculated by using the results for all material determinations conducted in accordance with Subsections R315-261-1083(a)(3)(ii) and (iii) and the following equation:

The equation found in 40 CFR 261.1083(a)(3)(iv)(A), 2015 ed. is adopted and incorporated by reference.

Where:

C = Average VO concentration of the hazardous secondary material at the point of material origination on a mass-weighted basis, ppmw.

i = Individual material determination "i" of the hazardous secondary material.

n = Total number of material determinations of the hazardous secondary material conducted for the averaging period (not to exceed 1 year).

Q_i = Mass quantity of hazardous secondary material stream represented by C_i, kg/hr.

Q_T = Total mass quantity of hazardous secondary material during the averaging period, kg/hr.

C_i = Measured VO concentration of material determination "i" as determined in accordance with the requirements of Subsection R315-261-1083(a)(3)(iii), i.e., the average of the four or more samples specified in Subsection R315-261-1083(a)(3)(ii)(B), ppmw.

(B) For the purpose of determining C_i, for individual material samples analyzed in accordance with Subsection R315-261-1083(a)(3)(iii), the remanufacturer or other person that stores or treats the hazardous secondary material shall account for VO concentrations determined to be below the limit of detection of the analytical method by using the following VO concentration:

(I) If Method 25D in 40 CFR part 60, appendix A is used for the analysis, one-half the blank value determined in the method at section 4.4 of Method 25D in 40 CFR part 60, appendix A.

(II) If any other analytical method is used, one-half the sum of the limits of detection established for each organic constituent in the material that has a Henry's law constant values at least 0.1 mole-fraction-in-the-gas-phase/mole-fraction-in-the-liquid-phase (0.1 Y/X), which can also be expressed as 1.8×10^{-6}atmospheres/gram-mole/m^3, at 25 degrees Celsius.

(4) Use of knowledge by the remanufacturer or other

person that stores or treats the hazardous secondary material to determine average VO concentration of a hazardous secondary material at the point of material origination.

(i) Documentation shall be prepared that presents the information used as the basis for the knowledge by the remanufacturer or other person that stores or treats the hazardous secondary material of the hazardous secondary material stream's average VO concentration. Examples of information that may be used as the basis for knowledge include: Material balances for the source or process generating the hazardous secondary material stream; constituent-specific chemical test data for the hazardous secondary material stream from previous testing that are still applicable to the current material stream; previous test data for other locations managing the same type of material stream; or other knowledge based on information included in shipping papers or material certification notices.

(ii) If test data are used as the basis for knowledge, then the remanufacturer or other person that stores or treats the hazardous secondary material shall document the test method, sampling protocol, and the means by which sampling variability and analytical variability are accounted for in the determination of the average VO concentration. For example, a remanufacturer or other person that stores or treats the hazardous secondary material may use organic concentration test data for the hazardous secondary material stream that are validated in accordance with Method 301 in 40 CFR part 63, appendix A as the basis for knowledge of the material.

(iii) A remanufacturer or other person that stores or treats the hazardous secondary material using chemical constituent-specific concentration test data as the basis for knowledge of the hazardous secondary material may adjust the test data to the corresponding average VO concentration value which would have been obtained had the material samples been analyzed using Method 25D in 40 CFR part 60, appendix A. To adjust these data, the measured concentration for each individual chemical constituent contained in the material is multiplied by the appropriate constituent-specific adjustment factor (f_{m25D}).

(iv) In the event that the Director and the remanufacture or other person that stores or treats the hazardous secondary material disagree on a determination of the average VO concentration for a hazardous secondary material stream using knowledge, then the results from a determination of average VO concentration using direct measurement as specified in Subsection R315-261-1083(a)(3) shall be used to establish compliance with the applicable requirements of Sections R315-261-1080 through 1089. The Director may perform or request that the remanufacturer or other person that stores or treats the hazardous secondary material perform this determination using direct measurement. The remanufacturer or other person that stores or treats the hazardous secondary material may choose one or more appropriate methods to analyze each collected sample in accordance with the requirements of Subsection R315-261-1083(a)(3)(iii).

(b) Reserved

(c) Procedure to determine the maximum organic vapor pressure of a hazardous secondary material in a tank.

(1) A remanufacturer or other person that stores or treats the hazardous secondary material shall determine the maximum organic vapor pressure for each hazardous secondary material placed in a tank using Tank Level 1 controls in accordance with standards specified in Subsection R315-261-1084(c).

(2) A remanufacturer or other person that stores or treats the hazardous secondary material shall use either direct measurement as specified in Subsection R315-261-1083(c)(3) or knowledge of the waste as specified by Subsection R315-261-1083(c)(4) to determine the maximum organic vapor pressure which is representative of the hazardous secondary material composition stored or treated in the tank.

(3) Direct measurement to determine the maximum organic vapor pressure of a hazardous secondary material.

(i) Sampling. A sufficient number of samples shall be collected to be representative of the hazardous secondary material contained in the tank. All samples shall be collected and handled in accordance with written procedures prepared by the remanufacturer or other person that stores or treats the hazardous secondary material and documented in a site sampling plan. This plan shall describe the procedure by which representative samples of the hazardous secondary material are collected such that a minimum loss of organics occurs throughout the sample collection and handling process and by which sample integrity is maintained. A copy of the written sampling plan shall be maintained at the facility. An example of acceptable sample collection and handling procedures may be found in Method 25D in 40 CFR part 60, appendix A.

(ii) Analysis. Any appropriate one of the following methods may be used to analyze the samples and compute the maximum organic vapor pressure of the hazardous secondary material:

(A) Method 25E in 40 CFR part 60 appendix A;

(B) Methods described in American Petroleum Institute Publication 2517, Third Edition, February 1989, "Evaporative Loss from External Floating-Roof Tanks," incorporated by reference - refer to Section R315-260-11;

(C) Methods obtained from standard reference texts;

(D) ASTM Method 2879-92, incorporated by reference - refer to Section R315-260-11; and

(E) Any other method approved by the Director.

(4) Use of knowledge to determine the maximum organic vapor pressure of the hazardous secondary material. Documentation shall be prepared and recorded that presents the information used as the basis for the knowledge by the remanufacturer or other person that stores or treats the hazardous secondary material that the maximum organic vapor pressure of the hazardous secondary material is less than the maximum vapor pressure limit listed in Subsection R315-261-1085(b)(1)(i) for the applicable tank design capacity category. An example of information that may be used is documentation that the hazardous secondary material is generated by a process for which at other locations it previously has been determined by direct measurement that the hazardous secondary material's waste maximum organic vapor pressure is less than the maximum vapor pressure limit for the appropriate tank design capacity category.

(d) Procedure for determining no detectable organic emissions for the purpose of complying with Sections R315-261-1080 through 1089:

(1) The test shall be conducted in accordance with the procedures specified in Method 21 of 40 CFR part 60, appendix A. Each potential leak interface, i.e., a location where organic vapor leakage could occur, on the cover and associated closure devices shall be checked. Potential leak interfaces that are associated with covers and closure devices include, but are not limited to: The interface of the cover and its foundation mounting; the periphery of any opening on the cover and its associated closure device; and the sealing seat interface on a spring-loaded pressure relief valve.

(2) The test shall be performed when the unit contains a hazardous secondary material having an organic concentration representative of the range of concentrations for the hazardous secondary material expected to be managed in the unit. During the test, the cover and closure devices shall be secured in the closed position.

(3) The detection instrument shall meet the performance criteria of Method 21 of 40 CFR part 60, appendix A, except the instrument response factor criteria in section 3.1.2(a) of Method 21 shall be for the average composition of the organic constituents in the hazardous secondary material placed in the

hazardous secondary management unit, not for each individual organic constituent.

(4) The detection instrument shall be calibrated before use on each day of its use by the procedures specified in Method 21 of 40 CFR part 60, appendix A.

(5) Calibration gases shall be as follows:

(i) Zero air, less than 10 ppmv hydrocarbon in air, and

(ii) A mixture of methane or n-hexane and air at a concentration of approximately, but less than, 10,000 ppmv methane or n-hexane.

(6) The background level shall be determined according to the procedures in Method 21 of 40 CFR part 60, appendix A.

(7) Each potential leak interface shall be checked by traversing the instrument probe around the potential leak interface as close to the interface as possible, as described in Method 21 of 40 CFR part 60, appendix A. In the case when the configuration of the cover or closure device prevents a complete traverse of the interface, all accessible portions of the interface shall be sampled. In the case when the configuration of the closure device prevents any sampling at the interface and the device is equipped with an enclosed extension or horn, e.g., some pressure relief devices, the instrument probe inlet shall be placed at approximately the center of the exhaust area to the atmosphere.

(8) The arithmetic difference between the maximum organic concentration indicated by the instrument and the background level shall be compared with the value of 500 ppmv except when monitoring a seal around a rotating shaft that passes through a cover opening, in which case the comparison shall be as specified in Subsection R315-261-1083(d)(9). If the difference is less than 500 ppmv, then the potential leak interface is determined to operate with no detectable organic emissions.

(9) For the seals around a rotating shaft that passes through a cover opening, the arithmetic difference between the maximum organic concentration indicated by the instrument and the background level shall be compared with the value of 10,000 ppmw. If the difference is less than 10,000 ppmw, then the potential leak interface is determined to operate with no detectable organic emissions.

R315-261-1084. Air Emission Standards for Tanks and Containers - Standards: Tanks.

(a) The provisions of Section R315-261-1084 apply to the control of air pollutant emissions from tanks for which Subsection R315-261-1082(b) references the use of Section R315-261-1084 for such air emission control.

(b) The remanufacturer or other person that stores or treats the hazardous secondary material shall control air pollutant emissions from each tank subject to Section R315-261-1084 in accordance with the following requirements as applicable:

(1) For a tank that manages hazardous secondary material that meets all of the conditions specified in Subsections R315-261-1084(b)(1)(i) through (iii), the remanufacturer or other person that stores or treats the hazardous secondary material shall control air pollutant emissions from the tank in accordance with the Tank Level 1 controls specified in Subsection R315-261-1084(c) or the Tank Level 2 controls specified in Subsection R315-261-1084(d).

(i) The hazardous secondary material in the tank has a maximum organic vapor pressure which is less than the maximum organic vapor pressure limit for the tank's design capacity category as follows:

(A) For a tank design capacity equal to or greater than 151 m^3, the maximum organic vapor pressure limit for the tank is 5.2 kPa.

(B) For a tank design capacity equal to or greater than 75 m^3 but less than 151 m^3, the maximum organic vapor pressure limit for the tank is 27.6 kPa.

(C) For a tank design capacity less than 75 m^3, the maximum organic vapor pressure limit for the tank is 76.6 kPa.

(ii) The hazardous secondary material in the tank is not heated by the remanufacturer or other person that stores or treats the hazardous secondary material to a temperature that is greater than the temperature at which the maximum organic vapor pressure of the hazardous secondary material is determined for the purpose of complying with Subsection R315-261-1084(b)(1)(i).

(2) For a tank that manages hazardous secondary material that does not meet all of the conditions specified in Subsections R315-261-1084(b)(1)(i) through (iii), the remanufacturer or other person that stores or treats the hazardous secondary material shall control air pollutant emissions from the tank by using Tank Level 2 controls in accordance with the requirements of Subsection R315-261-1084(d). An example of tanks required to use Tank Level 2 controls is a tank for which the hazardous secondary material in the tank has a maximum organic vapor pressure that is equal to or greater than the maximum organic vapor pressure limit for the tank's design capacity category as specified in Subsection R315-261-1084(b)(1)(i).

(c) Remanufacturers or other persons that store or treats the hazardous secondary material controlling air pollutant emissions from a tank using Tank Level 1 controls shall meet the requirements specified in Subsection R315-261-1084(c)(1) through (4):

(1) The remanufacturer or other person that stores or treats that hazardous secondary material shall determine the maximum organic vapor pressure for a hazardous secondary material to be managed in the tank using Tank Level 1 controls before the first time the hazardous secondary material is placed in the tank. The maximum organic vapor pressure shall be determined using the procedures specified in Subsection R315-261-1083(c). Thereafter, the remanufacturer or other person that stores or treats the hazardous secondary material shall perform a new determination whenever changes to the hazardous secondary material managed in the tank could potentially cause the maximum organic vapor pressure to increase to a level that is equal to or greater than the maximum organic vapor pressure limit for the tank design capacity category specified in Subsection R315-261-1084(b)(1)(i), as applicable to the tank.

(2) The tank shall be equipped with a fixed roof designed to meet the following specifications:

(i) The fixed roof and its closure devices shall be designed to form a continuous barrier over the entire surface area of the hazardous secondary material in the tank. The fixed roof may be a separate cover installed on the tank, e.g., a removable cover mounted on an open-top tank, or may be an integral part of the tank structural design, e.g., a horizontal cylindrical tank equipped with a hatch.

(ii) The fixed roof shall be installed in a manner such that there are no visible cracks, holes, gaps, or other open spaces between roof section joints or between the interface of the roof edge and the tank wall.

(iii) Each opening in the fixed roof, and any manifold system associated with the fixed roof, shall be either:

(A) Equipped with a closure device designed to operate such that when the closure device is secured in the closed position there are no visible cracks, holes, gaps, or other open spaces in the closure device or between the perimeter of the opening and the closure device; or

(B) Connected by a closed-vent system that is vented to a control device. The control device shall remove or destroy organics in the vent stream, and shall be operating whenever hazardous secondary material is managed in the tank, except as provided for in Subsection R315-261-1084(c)(2)(iii)(B)(I) and (II).

(I) During periods when it is necessary to provide access

to the tank for performing the activities of Subsection R315-261-1084(c)(2)(iii)(B)(II), venting of the vapor headspace underneath the fixed roof to the control device is not required, opening of closure devices is allowed, and removal of the fixed roof is allowed. Following completion of the activity, the remanufacturer or other person that stores or treats the hazardous secondary material shall promptly secure the closure device in the closed position or reinstall the cover, as applicable, and resume operation of the control device.

(II) During periods of routine inspection, maintenance, or other activities needed for normal operations, and for removal of accumulated sludge or other residues from the bottom of the tank.

(iv) The fixed roof and its closure devices shall be made of suitable materials that will minimize exposure of the hazardous secondary material to the atmosphere, to the extent practical, and will maintain the integrity of the fixed roof and closure devices throughout their intended service life. Factors to be considered when selecting the materials for and designing the fixed roof and closure devices shall include: organic vapor permeability, the effects of any contact with the hazardous secondary material or its vapors managed in the tank; the effects of outdoor exposure to wind, moisture, and sunlight; and the operating practices used for the tank on which the fixed roof is installed.

(3) Whenever a hazardous secondary material is in the tank, the fixed roof shall be installed with each closure device secured in the closed position except as follows:

(i) Opening of closure devices or removal of the fixed roof is allowed at the following times:

(A) To provide access to the tank for performing routine inspection, maintenance, or other activities needed for normal operations. Examples of such activities include those times when a worker needs to open a port to sample the liquid in the tank, or when a worker needs to open a hatch to maintain or repair equipment. Following completion of the activity, the remanufacturer or other person that stores or treats the hazardous secondary material shall promptly secure the closure device in the closed position or reinstall the cover, as applicable, to the tank.

(B) To remove accumulated sludge or other residues from the bottom of tank.

(ii) Opening of a spring-loaded pressure-vacuum relief valve, conservation vent, or similar type of pressure relief device which vents to the atmosphere is allowed during normal operations for the purpose of maintaining the tank internal pressure in accordance with the tank design specifications. The device shall be designed to operate with no detectable organic emissions when the device is secured in the closed position. The settings at which the device opens shall be established such that the device remains in the closed position whenever the tank internal pressure is within the internal pressure operating range determined by the remanufacturer or other person that stores or treats the hazardous secondary material based on the tank manufacturer recommendations, applicable regulations, fire protection and prevention codes, standard engineering codes and practices, or other requirements for the safe handling of flammable, ignitable, explosive, reactive, or hazardous materials. Examples of normal operating conditions that may require these devices to open are during those times when the tank internal pressure exceeds the internal pressure operating range for the tank as a result of loading operations or diurnal ambient temperature fluctuations.

(iii) Opening of a safety device, as defined in Section R315-261-1081, is allowed at any time conditions require doing so to avoid an unsafe condition.

(4) The remanufacturer or other person that stores or treats the hazardous secondary material shall inspect the air emission control equipment in accordance with the following requirements.

(i) The fixed roof and its closure devices shall be visually inspected by the remanufacturer or other person that stores or treats the hazardous secondary material to check for defects that could result in air pollutant emissions. Defects include, but are not limited to, visible cracks, holes, or gaps in the roof sections or between the roof and the tank wall; broken, cracked, or otherwise damaged seals or gaskets on closure devices; and broken or missing hatches, access covers, caps, or other closure devices.

(ii) The remanufacturer or other person that stores or treats the hazardous secondary material shall perform an initial inspection of the fixed roof and its closure devices on or before the date that the tank becomes subject to Section R315-261-1084. Thereafter, the remanufacturer or other person that stores or treats the hazardous secondary material shall perform the inspections at least once every year except under the special conditions provided for in Subsection R315-261-1084(l).

(iii) In the event that a defect is detected, the remanufacturer or other person that stores or treats the hazardous secondary material shall repair the defect in accordance with the requirements of Subsection R315-261-1084(k).

(iv) The remanufacturer or other person that stores or treats the hazardous secondary material shall maintain a record of the inspection in accordance with the requirements specified in Subsection R315-261-1089(b).

(d) Remanufacturers or other persons that store or treat the hazardous secondary material controlling air pollutant emissions from a tank using Tank Level 2 controls shall use one of the following tanks:

(1) A fixed-roof tank equipped with an internal floating roof in accordance with the requirements specified in Subsection R315-261-1084(e);

(2) A tank equipped with an external floating roof in accordance with the requirements specified in Subsection R315-261-1084(f);

(3) A tank vented through a closed-vent system to a control device in accordance with the requirements specified in Subsection R315-261-1084(g);

(4) A pressure tank designed and operated in accordance with the requirements specified in Subsection R315-261-1084(h); or

(5) A tank located inside an enclosure that is vented through a closed-vent system to an enclosed combustion control device in accordance with the requirements specified in Subsection R315-261-1084(i).

(e) The remanufacturer or other person that stores or treats the hazardous secondary material who controls air pollutant emissions from a tank using a fixed roof with an internal floating roof shall meet the requirements specified in Subsections R315-261-1084(e)(1) through (3).

(1) The tank shall be equipped with a fixed roof and an internal floating roof in accordance with the following requirements:

(i) The internal floating roof shall be designed to float on the liquid surface except when the floating roof shall be supported by the leg supports.

(ii) The internal floating roof shall be equipped with a continuous seal between the wall of the tank and the floating roof edge that meets either of the following requirements:

(A) A single continuous seal that is either a liquid-mounted seal or a metallic shoe seal, as defined in Section R315-261-1081; or

(B) Two continuous seals mounted one above the other. The lower seal may be a vapor-mounted seal.

(iii) The internal floating roof shall meet the following specifications:

(A) Each opening in a noncontact internal floating roof

except for automatic bleeder vents, vacuum breaker vents, and the rim space vents is to provide a projection below the liquid surface.

(B) Each opening in the internal floating roof shall be equipped with a gasketed cover or a gasketed lid except for leg sleeves, automatic bleeder vents, rim space vents, column wells, ladder wells, sample wells, and stub drains.

(C) Each penetration of the internal floating roof for the purpose of sampling shall have a slit fabric cover that covers at least 90 percent of the opening.

(D) Each automatic bleeder vent and rim space vent shall be gasketed.

(E) Each penetration of the internal floating roof that allows for passage of a ladder shall have a gasketed sliding cover.

(F) Each penetration of the internal floating roof that allows for passage of a column supporting the fixed roof shall have a flexible fabric sleeve seal or a gasketed sliding cover.

(2) The remanufacturer or other person that stores or treats the hazardous secondary material shall operate the tank in accordance with the following requirements:

(i) When the floating roof is resting on the leg supports, the process of filling, emptying, or refilling shall be continuous and shall be completed as soon as practical.

(ii) Automatic bleeder vents are to be set closed at all times when the roof is floating, except when the roof is being floated off or is being landed on the leg supports.

(iii) Prior to filling the tank, each cover, access hatch, gauge float well or lid on any opening in the internal floating roof shall be bolted or fastened closed, i.e., no visible gaps. Rim space vents are to be set to open only when the internal floating roof is not floating or when the pressure beneath the rim exceeds the manufacturer's recommended setting.

(3) The remanufacturer or other person that stores or treats the hazardous secondary material shall inspect the internal floating roof in accordance with the procedures specified as follows:

(i) The floating roof and its closure devices shall be visually inspected by the remanufacture or other person that stores or treats the hazardous secondary material to check for defects that could result in air pollutant emissions. Defects include, but are not limited to: The internal floating roof is not floating on the surface of the liquid inside the tank; liquid has accumulated on top of the internal floating roof; any portion of the roof seals have detached from the roof rim; holes, tears, or other openings are visible in the seal fabric; the gaskets no longer close off the hazardous secondary material surface from the atmosphere; or the slotted membrane has more than 10 percent open area.

(ii) The remanufacturer or other person that stores or treats the hazardous secondary material shall inspect the internal floating roof components as follows except as provided in Subsection R315-261-1084(e)(3)(iii):

(A) Visually inspect the internal floating roof components through openings on the fixed-roof, e.g., manholes and roof hatches, at least once every 12 months after initial fill, and

(B) Visually inspect the internal floating roof, primary seal, secondary seal, if one is in service, gaskets, slotted membranes, and sleeve seals, if any, each time the tank is emptied and degassed and at least every 10 years.

(iii) As an alternative to performing the inspections specified in Subsection R315-261-1084(e)(3)(ii) for an internal floating roof equipped with two continuous seals mounted one above the other, the remanufacturer or other person that stores or treats the hazardous secondary material may visually inspect the internal floating roof, primary and secondary seals, gaskets, slotted membranes, and sleeve seals, if any, each time the tank is emptied and degassed and at least every five years.

(iv) Prior to each inspection required by Subsection R315-261-1084(e)(3)(ii) or (iii), the remanufacturer or other person that stores or treats the hazardous secondary material shall notify the Director in advance of each inspection to provide the Director with the opportunity to have an observer present during the inspection. The remanufacturer or other person that stores or treats the hazardous secondary material shall notify the Director of the date and location of the inspection as follows:

(A) Prior to each visual inspection of an internal floating roof in a tank that has been emptied and degassed, written notification shall be prepared and sent by the remanufacturer or other person that stores or treats the hazardous secondary material so that it is received by the Director at least 30 calendar days before refilling the tank except when an inspection is not planned as provided for in Subsection R315-261-1084(e)(3)(iv)(B).

(B) When a visual inspection is not planned and the remanufacturer or other person that stores or treats the hazardous secondary material could not have known about the inspection 30 calendar days before refilling the tank, the remanufacturer or other person that stores or treats the hazardous secondary material shall notify the Director as soon as possible, but no later than seven calendar days before refilling of the tank. This notification may be made by telephone and immediately followed by a written explanation for why the inspection is unplanned. Alternatively, written notification, including the explanation for the unplanned inspection, may be sent so that it is received by the Director at least seven calendar days before refilling the tank.

(v) In the event that a defect is detected, the remanufacturer or other person that stores or treats the hazardous secondary material shall repair the defect in accordance with the requirements of Subsection R315-261-1084(k).

(vi) The remanufacturer or other person that stores or treats the hazardous secondary material shall maintain a record of the inspection in accordance with the requirements specified in Subsection R315-261-1089(b).

(4) Safety devices, as defined in Section R315-261-1081, may be installed and operated as necessary on any tank complying with the requirements of Subsection R315-261-1084(e).

(f) The remanufacturer or other person that stores or treats the hazardous secondary material who controls air pollutant emissions from a tank using an external floating roof shall meet the requirements specified in Subsections R315-261-1084(f)(1) through (3).

(1) The remanufacturer or other person that stores or treats the hazardous secondary material shall design the external floating roof in accordance with the following requirements:

(i) The external floating roof shall be designed to float on the liquid surface except when the floating roof shall be supported by the leg supports.

(ii) The floating roof shall be equipped with two continuous seals, one above the other, between the wall of the tank and the roof edge. The lower seal is referred to as the primary seal, and the upper seal is referred to as the secondary seal.

(A) The primary seal shall be a liquid-mounted seal or a metallic shoe seal, as defined in Section R315-261-1081. The total area of the gaps between the tank wall and the primary seal shall not exceed 212 square centimeters per meter of tank diameter, and the width of any portion of these gaps shall not exceed 3.8 centimeters. If a metallic shoe seal is used for the primary seal, the metallic shoe seal shall be designed so that one end extends into the liquid in the tank and the other end extends a vertical distance of at least 61 centimeters above the liquid surface.

(B) The secondary seal shall be mounted above the primary seal and cover the annular space between the floating

roof and the wall of the tank. The total area of the gaps between the tank wall and the secondary seal shall not exceed 21.2 square centimeters per meter of tank diameter, and the width of any portion of these gaps shall not exceed 1.3 centimeters.

(iii) The external floating roof shall meet the following specifications:

(A) Except for automatic bleeder vents, vacuum breaker vents, and rim space vents, each opening in a noncontact external floating roof shall provide a projection below the liquid surface.

(B) Except for automatic bleeder vents, rim space vents, roof drains, and leg sleeves, each opening in the roof shall be equipped with a gasketed cover, seal, or lid.

(C) Each access hatch and each gauge float well shall be equipped with a cover designed to be bolted or fastened when the cover is secured in the closed position.

(D) Each automatic bleeder vent and each rim space vent shall be equipped with a gasket.

(E) Each roof drain that empties into the liquid managed in the tank shall be equipped with a slotted membrane fabric cover that covers at least 90 percent of the area of the opening.

(F) Each unslotted and slotted guide pole well shall be equipped with a gasketed sliding cover or a flexible fabric sleeve seal.

(G) Each unslotted guide pole shall be equipped with a gasketed cap on the end of the pole.

(H) Each slotted guide pole shall be equipped with a gasketed float or other device which closes off the liquid surface from the atmosphere.

(I) Each gauge hatch and each sample well shall be equipped with a gasketed cover.

(2) The remanufacturer or other person that stores or treats the hazardous secondary material shall operate the tank in accordance with the following requirements:

(i) When the floating roof is resting on the leg supports, the process of filling, emptying, or refilling shall be continuous and shall be completed as soon as practical.

(ii) Except for automatic bleeder vents, rim space vents, roof drains, and leg sleeves, each opening in the roof shall be secured and maintained in a closed position at all times except when the closure device shall be open for access.

(iii) Covers on each access hatch and each gauge float well shall be bolted or fastened when secured in the closed position.

(iv) Automatic bleeder vents shall be set closed at all times when the roof is floating, except when the roof is being floated off or is being landed on the leg supports.

(v) Rim space vents shall be set to open only at those times that the roof is being floated off the roof leg supports or when the pressure beneath the rim seal exceeds the manufacturer's recommended setting.

(vi) The cap on the end of each unslotted guide pole shall be secured in the closed position at all times except when measuring the level or collecting samples of the liquid in the tank.

(vii) The cover on each gauge hatch or sample well shall be secured in the closed position at all times except when the hatch or well shall be opened for access.

(viii) Both the primary seal and the secondary seal shall completely cover the annular space between the external floating roof and the wall of the tank in a continuous fashion except during inspections.

(3) The remanufacturer or other person that stores or treats the hazardous secondary material shall inspect the external floating roof in accordance with the procedures specified as follows:

(i) The remanufacturer or other person that stores or treats the hazardous secondary material shall measure the external floating roof seal gaps in accordance with the following requirements:

(A) The remanufacturer or other person that stores or treats the hazardous secondary material shall perform measurements of gaps between the tank wall and the primary seal within 60 calendar days after initial operation of the tank following installation of the floating roof and, thereafter, at least once every 5 years.

(B) The remanufacturer or other person that stores or treats the hazardous secondary material shall perform measurements of gaps between the tank wall and the secondary seal within 60 calendar days after initial operation of the tank following installation of the floating roof and, thereafter, at least once every year.

(C) If a tank ceases to hold hazardous secondary material for a period of 1 year or more, subsequent introduction of hazardous secondary material into the tank shall be considered an initial operation for the purposes of Subsections R315-261-1084(f)(3)(i)(A) and (B).

(D) The remanufacturer or other person that stores or treats the hazardous secondary material shall determine the total surface area of gaps in the primary seal and in the secondary seal individually using the following procedure:

(I) The seal gap measurements shall be performed at one or more floating roof levels when the roof is floating off the roof supports.

(II) Seal gaps, if any, shall be measured around the entire perimeter of the floating roof in each place where a 0.32-centimeter diameter uniform probe passes freely, without forcing or binding against the seal, between the seal and the wall of the tank and measure the circumferential distance of each such location.

(III) For a seal gap measured under Subsection R315-261-1084(f)(3), the gap surface area shall be determined by using probes of various widths to measure accurately the actual distance from the tank wall to the seal and multiplying each such width by its respective circumferential distance.

(IV) The total gap area shall be calculated by adding the gap surface areas determined for each identified gap location for the primary seal and the secondary seal individually, and then dividing the sum for each seal type by the nominal diameter of the tank. These total gap areas for the primary seal and secondary seal are then compared to the respective standards for the seal type as specified in Subsection R315-261-1084(f)(1)(ii).

(E) In the event that the seal gap measurements do not conform to the specifications in Subsection R315-261-1084(f)(1)(ii), the remanufacturer or other person that stores or treats the hazardous secondary material shall repair the defect in accordance with the requirements of Subsection R315-261-1084(k).

(F) The remanufacturer or other person that stores or treats the hazardous secondary material shall maintain a record of the inspection in accordance with the requirements specified in Subsection R315-261-1089(b).

(ii) The remanufacturer or other person that stores or treats the hazardous secondary material shall visually inspect the external floating roof in accordance with the following requirements:

(A) The floating roof and its closure devices shall be visually inspected by the remanufacturer or other person that stores or treats the hazardous secondary material to check for defects that could result in air pollutant emissions. Defects include, but are not limited to: Holes, tears, or other openings in the rim seal or seal fabric of the floating roof; a rim seal detached from the floating roof; all or a portion of the floating roof deck being submerged below the surface of the liquid in the tank; broken, cracked, or otherwise damaged seals or gaskets on closure devices; and broken or missing hatches, access covers, caps, or other closure devices.

(B) The remanufacturer or other person that stores or treats the hazardous secondary material shall perform an initial

inspection of the external floating roof and its closure devices on or before the date that the tank becomes subject to Section R315-261-1084. Thereafter, the remanufacturer or other person that stores or treats the hazardous secondary material shall perform the inspections at least once every year except for the special conditions provided for in Subsection R315-261-1084(l).

(C) In the event that a defect is detected, the remanufacturer or other person that stores or treats the hazardous secondary material shall repair the defect in accordance with the requirements of Subsection R315-261-1084(k).

(D) The remanufacturer or other person that stores or treats the hazardous secondary material shall maintain a record of the inspection in accordance with the requirements specified in Subsection R315-261-1089(b).

(iii) Prior to each inspection required by Subsection R315-261-1084(f)(3)(i) or (ii), the remanufacturer or other person that stores or treats the hazardous secondary material shall notify the Director in advance of each inspection to provide the Director with the opportunity to have an observer present during the inspection. The remanufacturer or other person that stores or treats the hazardous secondary material shall notify the Director of the date and location of the inspection as follows:

(A) Prior to each inspection to measure external floating roof seal gaps as required under Subsection R315-261-1084(f)(3)(i), written notification shall be prepared and sent by the remanufacturer or other person that stores or treats the hazardous secondary material so that it is received by the Director at least 30 calendar days before the date the measurements are scheduled to be performed.

(B) Prior to each visual inspection of an external floating roof in a tank that has been emptied and degassed, written notification shall be prepared and sent by the remanufacturer or other person that stores or treats the hazardous secondary material so that it is received by the Director at least 30 calendar days before refilling the tank except when an inspection is not planned as provided for in Subsection R315-261-1084(f)(3)(iii)(C).

(C) When a visual inspection is not planned and the remanufacturer or other person that stores or treats the hazardous secondary material could not have known about the inspection 30 calendar days before refilling the tank, the owner or operator shall notify the Director as soon as possible, but no later than seven calendar days before refilling of the tank. This notification may be made by telephone and immediately followed by a written explanation for why the inspection is unplanned. Alternatively, written notification, including the explanation for the unplanned inspection, may be sent so that it is received by the Director at least seven calendar days before refilling the tank.

(4) Safety devices, as defined in Section R315-261-1081, may be installed and operated as necessary on any tank complying with the requirements of Subsection R315-261-1084(f).

(g) The remanufacturer or other person that stores or treats the hazardous secondary material who controls air pollutant emissions from a tank by venting the tank to a control device shall meet the requirements specified in Subsections R315-261-1084(g)(1) through (3).

(1) The tank shall be covered by a fixed roof and vented directly through a closed-vent system to a control device in accordance with the following requirements:

(i) The fixed roof and its closure devices shall be designed to form a continuous barrier over the entire surface area of the liquid in the tank.

(ii) Each opening in the fixed roof not vented to the control device shall be equipped with a closure device. If the pressure in the vapor headspace underneath the fixed roof is less than atmospheric pressure when the control device is operating, the closure devices shall be designed to operate such that when the closure device is secured in the closed position there are no visible cracks, holes, gaps, or other open spaces in the closure device or between the perimeter of the cover opening and the closure device. If the pressure in the vapor headspace underneath the fixed roof is equal to or greater than atmospheric pressure when the control device is operating, the closure device shall be designed to operate with no detectable organic emissions.

(iii) The fixed roof and its closure devices shall be made of suitable materials that will minimize exposure of the hazardous secondary material to the atmosphere, to the extent practical, and will maintain the integrity of the fixed roof and closure devices throughout their intended service life. Factors to be considered when selecting the materials for and designing the fixed roof and closure devices shall include: Organic vapor permeability, the effects of any contact with the liquid and its vapor managed in the tank; the effects of outdoor exposure to wind, moisture, and sunlight; and the operating practices used for the tank on which the fixed roof is installed.

(iv) The closed-vent system and control device shall be designed and operated in accordance with the requirements of Section R315-261-1087.

(2) Whenever a hazardous secondary material is in the tank, the fixed roof shall be installed with each closure device secured in the closed position and the vapor headspace underneath the fixed roof vented to the control device except as follows:

(i) Venting to the control device is not required, and opening of closure devices or removal of the fixed roof is allowed at the following times:

(A) To provide access to the tank for performing routine inspection, maintenance, or other activities needed for normal operations. Examples of such activities include those times when a worker needs to open a port to sample liquid in the tank, or when a worker needs to open a hatch to maintain or repair equipment. Following completion of the activity, the remanufacturer or other person that stores or treats the hazardous secondary material shall promptly secure the closure device in the closed position or reinstall the cover, as applicable, to the tank.

(B) To remove accumulated sludge or other residues from the bottom of a tank.

(ii) Opening of a safety device, as defined in Section R315-261-1081, is allowed at any time conditions require doing so to avoid an unsafe condition.

(3) The remanufacturer or other person that stores or treats the hazardous secondary material shall inspect and monitor the air emission control equipment in accordance with the following procedures:

(i) The fixed roof and its closure devices shall be visually inspected by the remanufacturer or other person that stores or treats the hazardous secondary material to check for defects that could result in air pollutant emissions. Defects include, but are not limited to, visible cracks, holes, or gaps in the roof sections or between the roof and the tank wall; broken, cracked, or otherwise damaged seals or gaskets on closure devices; and broken or missing hatches, access covers, caps, or other closure devices.

(ii) The closed-vent system and control device shall be inspected and monitored by the remanufacturer or other person that stores or treats the hazardous secondary material in accordance with the procedures specified in Section R315-261-1087.

(iii) The remanufacturer or other person that stores or treats the hazardous secondary material shall perform an initial inspection of the air emission control equipment on or before the date that the tank becomes subject to Section R315-261-

1084. Thereafter, the remanufacturer or other person that stores or treats the hazardous secondary material shall perform the inspections at least once every year except for the special conditions provided for in Subsection R315-261-1084(l).

(iv) In the event that a defect is detected, the remanufacture or other person that stores or treats the hazardous secondary material shall repair the defect in accordance with the requirements of Subsection R315-261-1084(k).

(v) The remanufacturer or other person that stores or treats the hazardous secondary material shall maintain a record of the inspection in accordance with the requirements specified in Subsection R315-261-1089(b).

(h) The remanufacturer or other person that stores or treats the hazardous secondary material who controls air pollutant emissions by using a pressure tank shall meet the following requirements.

(1) The tank shall be designed not to vent to the atmosphere as a result of compression of the vapor headspace in the tank during filling of the tank to its design capacity.

(2) All tank openings shall be equipped with closure devices designed to operate with no detectable organic emissions as determined using the procedure specified in Subsection R315-261-1083(d).

(3) Whenever a hazardous secondary material is in the tank, the tank shall be operated as a closed system that does not vent to the atmosphere except under either or the following conditions as specified in Subsection R315-261-1084(h)(3)(i) or (h)(3)(ii).

(i) At those times when opening of a safety device, as defined in Section R315-261-1081, is required to avoid an unsafe condition.

(ii) At those times when purging of inerts from the tank is required and the purge stream is routed to a closed-vent system and control device designed and operated in accordance with the requirements of Section R315-261-1087.

(i) The remanufacturer or other person that stores or treats the hazardous secondary material who controls air pollutant emissions by using an enclosure vented through a closed-vent system to an enclosed combustion control device shall meet the requirements specified in Subsections R315-261-1084(i)(1) through (4).

(1) The tank shall be located inside an enclosure. The enclosure shall be designed and operated in accordance with the criteria for a permanent total enclosure as specified in "Procedure T - Criteria for and Verification of a Permanent or Temporary Total Enclosure" under 40 CFR 52.741, appendix B. The enclosure may have permanent or temporary openings to allow worker access; passage of material into or out of the enclosure by conveyor, vehicles, or other mechanical means; entry of permanent mechanical or electrical equipment; or direct airflow into the enclosure. The remanufacturer or other person that stores or treats the hazardous secondary material shall perform the verification procedure for the enclosure as specified in Section 5.0 to "Procedure T - Criteria for and Verification of a Permanent or Temporary Total Enclosure" initially when the enclosure is first installed and, thereafter, annually.

(2) The enclosure shall be vented through a closed-vent system to an enclosed combustion control device that is designed and operated in accordance with the standards for either a vapor incinerator, boiler, or process heater specified in Section R315-261-1087.

(3) Safety devices, as defined in Section R315-261-1081, may be installed and operated as necessary on any enclosure, closed-vent system, or control device used to comply with the requirements of Subsections R315-261-1084(i)(1) and (2).

(4) The remanufacturer or other person that stores or treats the hazardous secondary material shall inspect and monitor the closed-vent system and control device as specified in Section R315-261-1087.

(j) The remanufacturer or other person that stores or treats the hazardous secondary material shall transfer hazardous secondary material to a tank subject to Section R315-261-1084 in accordance with the following requirements:

(1) Transfer of hazardous secondary material, except as provided in Subsection R315-261-1084(j)(2), to the tank from another tank subject to Section R315-261-1084 shall be conducted using continuous hard-piping or another closed system that does not allow exposure of the hazardous secondary material to the atmosphere. For the purpose of complying with this provision, an individual drain system is considered to be a closed system when it meets the requirements of 40 CFR part 63, subpart RR - National Emission Standards for Individual Drain Systems.

(2) The requirements of Subsection R315-261-1084(j)(1) do not apply when transferring a hazardous secondary material to the tank under any of the following conditions:

(i) The hazardous secondary material meets the average VO concentration conditions specified in Subsection R315-261-1082(c)(1) at the point of material origination.

(ii) The hazardous secondary material has been treated by an organic destruction or removal process to meet the requirements in Subsection R315-261-1082(c)(2).

(iii) The hazardous secondary material meets the requirements of Subsection R315-261-1082(c)(4).

(k) The remanufacturer or other person that stores or treats the hazardous secondary material shall repair each defect detected during an inspection performed in accordance with the requirements of Subsection R315-261-1084(c)(4), (e)(3), (f)(3), or (g)(3) as follows:

(1) The remanufacturer or other person that stores or treats the hazardous secondary material shall make first efforts at repair of the defect no later than 5 calendar days after detection, and repair shall be completed as soon as possible but no later than 45 calendar days after detection except as provided in Subsection R315-261-1084(k)(2).

(2) Repair of a defect may be delayed beyond 45 calendar days if the remanufacturer or other person that stores or treats the hazardous secondary material determines that repair of the defect requires emptying or temporary removal from service of the tank and no alternative tank capacity is available at the site to accept the hazardous secondary material normally managed in the tank. In this case, the remanufacturer or other person that stores or treats the hazardous secondary material shall repair the defect the next time the process or unit that is generating the hazardous secondary material managed in the tank stops operation. Repair of the defect shall be completed before the process or unit resumes operation.

(l) Following the initial inspection and monitoring of the cover as required by the applicable provisions of Sections R315-261-1080 through 1089, subsequent inspection and monitoring may be performed at intervals longer than 1 year under the following special conditions:

(1) In the case when inspecting or monitoring the cover would expose a worker to dangerous, hazardous, or other unsafe conditions, then the remanufacturer or other person that stores or treats the hazardous secondary material may designate a cover as an "unsafe to inspect and monitor cover" and comply with all of the following requirements:

(i) Prepare a written explanation for the cover stating the reasons why the cover is unsafe to visually inspect or to monitor, if required.

(ii) Develop and implement a written plan and schedule to inspect and monitor the cover, using the procedures specified in the applicable section of Sections R315-261-1080 through 1089, as frequently as practicable during those times when a worker can safely access the cover.

(2) In the case when a tank is buried partially or entirely underground, a remanufacturer or other person that stores or

treats the hazardous secondary material is required to inspect and monitor, as required by the applicable provisions of Section R315-261-1084, only those portions of the tank cover and those connections to the tank, e.g., fill ports, access hatches, gauge wells, etc., that are located on or above the ground surface.

R315-261-1086. Air Emission Standards for Tanks and Containers - Standards: Containers.

(a) Applicability. The provisions of Section R315-261-1086 apply to the control of air pollutant emissions from containers for which Subsection R315-261-1082(b) references the use Section R315-261-1086 for such air emission control.

(b) General requirements.

(1) The remanufacturer or other person that stores or treats the hazardous secondary material shall control air pollutant emissions from each container subject to Section R315-261-1086 in accordance with the following requirements, as applicable to the container.

(i) For a container having a design capacity greater than 0.1 m^3 and less than or equal to 0.46 m^3, the remanufacturer or other person that stores or treats the hazardous secondary material shall control air pollutant emissions from the container in accordance with the Container Level 1 standards specified in Subsection R315-261-1086(c).

(ii) For a container having a design capacity greater than 0.46 m^3 that is not in light material service, the remanufacturer or other person that stores or treats the hazardous secondary material shall control air pollutant emissions from the container in accordance with the Container Level 1 standards specified in Subsection R315-261-1086(c).

(iii) For a container having a design capacity greater than 0.46 m^3 that is in light material service, the remanufacturer or other person that stores or treats the hazardous secondary material shall control air pollutant emissions from the container in accordance with the Container Level 2 standards specified in Subsection R315-261-1086(d).

(c) Container Level 1 standards.

(1) A container using Container Level 1 controls is one of the following:

(i) A container that meets the applicable U.S. Department of Transportation regulations on packaging hazardous materials for transportation as specified in Subsection R315-261-1086(f).

(ii) A container equipped with a cover and closure devices that form a continuous barrier over the container openings such that when the cover and closure devices are secured in the closed position there are no visible holes, gaps, or other open spaces into the interior of the container. The cover may be a separate cover installed on the container, e.g., a lid on a drum or a suitably secured tarp on a roll-off box, or may be an integral part of the container structural design, e.g., a "portable tank" or bulk cargo container equipped with a screw-type cap.

(iii) An open-top container in which an organic-vapor suppressing barrier is placed on or over the hazardous secondary material in the container such that no hazardous secondary material is exposed to the atmosphere. One example of such a barrier is application of a suitable organic-vapor suppressing foam.

(2) A container used to meet the requirements of Subsection R315-261-1086(c)(1)(ii) or (iii) shall be equipped with covers and closure devices, as applicable to the container, that are composed of suitable materials to minimize exposure of the hazardous secondary material to the atmosphere and to maintain the equipment integrity, for as long as the container is in service. Factors to be considered in selecting the materials of construction and designing the cover and closure devices shall include: Organic vapor permeability; the effects of contact with the hazardous secondary material or its vapor managed in the container; the effects of outdoor exposure of the closure device or cover material to wind, moisture, and sunlight; and the operating practices for which the container is intended to be used.

(3) Whenever a hazardous secondary material is in a container using Container Level 1 controls, the remanufacturer or other person that stores or treats the hazardous secondary material shall install all covers and closure devices for the container, as applicable to the container, and secure and maintain each closure device in the closed position except as follows:

(i) Opening of a closure device or cover is allowed for the purpose of adding hazardous secondary material or other material to the container as follows:

(A) In the case when the container is filled to the intended final level in one continuous operation, the remanufacturer or other person that stores or treats the hazardous secondary material shall promptly secure the closure devices in the closed position and install the covers, as applicable to the container, upon conclusion of the filling operation.

(B) In the case when discrete quantities or batches of material intermittently are added to the container over a period of time, the remanufacturer or other person that stores or treats the hazardous secondary material shall promptly secure the closure devices in the closed position and install covers, as applicable to the container, upon either the container being filled to the intended final level; the completion of a batch loading after which no additional material will be added to the container within 15 minutes; the person performing the loading operation leaving the immediate vicinity of the container; or the shutdown of the process generating the hazardous secondary material being added to the container, whichever condition occurs first.

(ii) Opening of a closure device or cover is allowed for the purpose of removing hazardous secondary material from the container as follows:

(A) For the purpose of meeting the requirements of Section R315-261-1086, an empty hazardous secondary material container may be open to the atmosphere at any time, i.e., covers and closure devices on such a container are not required to be secured in the closed position.

(B) In the case when discrete quantities or batches of material are removed from the container, but the container is not an empty hazardous secondary material container, the remanufacturer or other person that stores or treats the hazardous secondary material shall promptly secure the closure devices in the closed position and install covers, as applicable to the container, upon the completion of a batch removal after which no additional material will be removed from the container within 15 minutes or the person performing the unloading operation leaves the immediate vicinity of the container, whichever condition occurs first.

(iii) Opening of a closure device or cover is allowed when access inside the container is needed to perform routine activities other than transfer of hazardous secondary material. Examples of such activities include those times when a worker needs to open a port to measure the depth of or sample the material in the container, or when a worker needs to open a manhole hatch to access equipment inside the container. Following completion of the activity, the remanufacturer or other person that stores or treats the hazardous secondary material shall promptly secure the closure device in the closed position or reinstall the cover, as applicable to the container.

(iv) Opening of a spring-loaded pressure-vacuum relief valve, conservation vent, or similar type of pressure relief device which vents to the atmosphere is allowed during normal operations for the purpose of maintaining the internal pressure of the container in accordance with the container design specifications. The device shall be designed to operate with no detectable organic emissions when the device is secured in the closed position. The settings at which the device opens shall be

established such that the device remains in the closed position whenever the internal pressure of the container is within the internal pressure operating range determined by the remanufacturer or other persons that stores or treats the hazardous secondary material based on container manufacturer recommendations, applicable regulations, fire protection and prevention codes, standard engineering codes and practices, or other requirements for the safe handling of flammable, ignitable, explosive, reactive, or hazardous materials. Examples of normal operating conditions that may require these devices to open are during those times when the internal pressure of the container exceeds the internal pressure operating range for the container as a result of loading operations or diurnal ambient temperature fluctuations.

(v) Opening of a safety device, as defined in 40 CFR 261.1081, is allowed at any time conditions require doing so to avoid an unsafe condition.

(4) The remanufacturer or other person that stores or treats the hazardous secondary material using containers with Container Level 1 controls shall inspect the containers and their covers and closure devices as follows:

(i) In the case when a hazardous secondary material already is in the container at the time the remanufacturer or other person that stores or treats the hazardous secondary material first accepts possession of the container at the facility and the container is not emptied within 24 hours after the container is accepted at the facility, i.e., is not an empty hazardous secondary material container, the remanufacturer or other person that stores or treats the hazardous secondary material shall visually inspect the container and its cover and closure devices to check for visible cracks, holes, gaps, or other open spaces into the interior of the container when the cover and closure devices are secured in the closed position. The container visual inspection shall be conducted on or before the date that the container is accepted at the facility, i.e., the date the container becomes subject to the container standards of Section R315-261-1086.

(ii) In the case when a container used for managing hazardous secondary material remains at the facility for a period of 1 year or more, the remanufacturer or other person that stores or treats the hazardous secondary material shall visually inspect the container and its cover and closure devices initially and thereafter, at least once every 12 months, to check for visible cracks, holes, gaps, or other open spaces into the interior of the container when the cover and closure devices are secured in the closed position. If a defect is detected, the remanufacturer or other person that stores or treats the hazardous secondary material shall repair the defect in accordance with the requirements of Subsection R315-261-1086(c)(4)(iii).

(iii) When a defect is detected for the container, cover, or closure devices, the remanufacturer or other person that stores or treats the hazardous secondary material shall make first efforts at repair of the defect no later than 24 hours after detection and repair shall be completed as soon as possible but no later than 5 calendar days after detection. If repair of a defect cannot be completed within 5 calendar days, then the hazardous secondary material shall be removed from the container and the container shall not be used to manage hazardous secondary material until the defect is repaired.

(5) The remanufacturer or other person that stores or treats the hazardous secondary material shall maintain at the facility a copy of the procedure used to determine that containers with capacity of 0.46 m^3 or greater, which do not meet applicable U.S. Department of Transportation regulations as specified in Subsection R315-261-1086(f), are not managing hazardous secondary material in light material service.

(d) Container Level 2 standards.

(1) A container using Container Level 2 controls is one of the following:

(i) A container that meets the applicable U.S. Department of Transportation regulations on packaging hazardous materials for transportation as specified in Subsection R315-261-1086(f).

(ii) A container that operates with no detectable organic emissions as defined in Section R315-261-1081 and determined in accordance with the procedure specified in Subsection R315-261-1086(g).

(iii) A container that has been demonstrated within the preceding 12 months to be vapor-tight by using 40 CFR part 60, appendix A, Method 27 in accordance with the procedure specified in Subsection R315-261-1086(h).

(2) Transfer of hazardous secondary material in or out of a container using Container Level 2 controls shall be conducted in such a manner as to minimize exposure of the hazardous secondary material to the atmosphere, to the extent practical, considering the physical properties of the hazardous secondary material and good engineering and safety practices for handling flammable, ignitable, explosive, reactive, or other hazardous materials. Examples of container loading procedures that the Director considers to meet the requirements of Subsection R315-261-1086(d) include using any one of the following: a submerged-fill pipe or other submerged-fill method to load liquids into the container; a vapor-balancing system or a vapor-recovery system to collect and control the vapors displaced from the container during filling operations; or a fitted opening in the top of a container through which the hazardous secondary material is filled and subsequently purging the transfer line before removing it from the container opening.

(3) Whenever a hazardous secondary material is in a container using Container Level 2 controls, the remanufacturer or other person that stores or treats the hazardous secondary material shall install all covers and closure devices for the container, and secure and maintain each closure device in the closed position except as follows:

(i) Opening of a closure device or cover is allowed for the purpose of adding hazardous secondary material or other material to the container as follows:

(A) In the case when the container is filled to the intended final level in one continuous operation, the remanufacture or other person that stores or treats the hazardous secondary material shall promptly secure the closure devices in the closed position and install the covers, as applicable to the container, upon conclusion of the filling operation.

(B) In the case when discrete quantities or batches of material intermittently are added to the container over a period of time, the remanufacturer or other person that stores or treats the hazardous secondary material shall promptly secure the closure devices in the closed position and install covers, as applicable to the container, upon either the container being filled to the intended final level; the completion of a batch loading after which no additional material will be added to the container within 15 minutes; the person performing the loading operation leaving the immediate vicinity of the container; or the shutdown of the process generating the material being added to the container, whichever condition occurs first.

(ii) Opening of a closure device or cover is allowed for the purpose of removing hazardous secondary material from the container as follows:

(A) For the purpose of meeting the requirements of Section R315-261-1086, an empty hazardous secondary material container may be open to the atmosphere at any time, i.e., covers and closure devices are not required to be secured in the closed position on an empty container.

(B) In the case when discrete quantities or batches of material are removed from the container, but the container is not an empty hazardous secondary materials container, the remanufacturer or other person that stores or treats the hazardous secondary material shall promptly secure the closure devices in the closed position and install covers, as applicable

to the container, upon the completion of a batch removal after which no additional material will be removed from the container within 15 minutes or the person performing the unloading operation leaves the immediate vicinity of the container, whichever condition occurs first.

(iii) Opening of a closure device or cover is allowed when access inside the container is needed to perform routine activities other than transfer of hazardous secondary material. Examples of such activities include those times when a worker needs to open a port to measure the depth of or sample the material in the container, or when a worker needs to open a manhole hatch to access equipment inside the container. Following completion of the activity, the remanufacturer or other person that stores or treats the hazardous secondary material shall promptly secure the closure device in the closed position or reinstall the cover, as applicable to the container.

(iv) Opening of a spring-loaded, pressure-vacuum relief valve, conservation vent, or similar type of pressure relief device which vents to the atmosphere is allowed during normal operations for the purpose of maintaining the internal pressure of the container in accordance with the container design specifications. The device shall be designed to operate with no detectable organic emission when the device is secured in the closed position. The settings at which the device opens shall be established such that the device remains in the closed position whenever the internal pressure of the container is within the internal pressure operating range determined by the remanufacturer or other person that stores or treats the hazardous secondary material based on container manufacturer recommendations, applicable regulations, fire protection and prevention codes, standard engineering codes and practices, or other requirements for the safe handling of flammable, ignitable, explosive, reactive, or hazardous materials. Examples of normal operating conditions that may require these devices to open are during those times when the internal pressure of the container exceeds the internal pressure operating range for the container as a result of loading operations or diurnal ambient temperature fluctuations.

(v) Opening of a safety device, as defined in Section R315-261-1081, is allowed at any time conditions require doing so to avoid an unsafe condition.

(4) The remanufacture or other person that stores or treats the hazardous secondary material using containers with Container Level 2 controls shall inspect the containers and their covers and closure devices as follows:

(i) In the case when a hazardous secondary material already is in the container at the time the remanufacturer or other person that stores or treats the hazardous secondary material first accepts possession of the container at the facility and the container is not emptied within 24 hours after the container is accepted at the facility, i.e., is not an empty hazardous secondary material container, the remanufacturer or other person that stores or treats the hazardous secondary material shall visually inspect the container and its cover and closure devices to check for visible cracks, holes, gaps, or other open spaces into the interior of the container when the cover and closure devices are secured in the closed position. The container visual inspection shall be conducted on or before the date that the container is accepted at the facility, i.e., the date the container becomes subject to the container standards of Section R315-261-1086.

(ii) In the case when a container used for managing hazardous secondary material remains at the facility for a period of 1 year or more, the remanufacturer or other person that stores or treats the hazardous secondary material shall visually inspect the container and its cover and closure devices initially and thereafter, at least once every 12 months, to check for visible cracks, holes, gaps, or other open spaces into the interior of the container when the cover and closure devices are secured in the closed position. If a defect is detected, the remanufacturer or other person that stores or treats the hazardous secondary material shall repair the defect in accordance with the requirements of Subsection R315-261-1086(d)(4)(iii).

(iii) When a defect is detected for the container, cover, or closure devices, the remanufacturer or other person that stores or treats the hazardous secondary material shall make first efforts at repair of the defect no later than 24 hours after detection, and repair shall be completed as soon as possible but no later than 5 calendar days after detection. If repair of a defect cannot be completed within 5 calendar days, then the hazardous secondary material shall be removed from the container and the container shall not be used to manage hazardous secondary material until the defect is repaired.

(e) Container Level 3 standards.

(1) A container using Container Level 3 controls is one of the following:

(i) A container that is vented directly through a closed-vent system to a control device in accordance with the requirements of Subsection R315-261-1086(e)(2)(ii).

(ii) A container that is vented inside an enclosure which is exhausted through a closed-vent system to a control device in accordance with the requirements of Subsections R315-261-1086(e)(2)(i) and (ii).

(2) The remanufacturer or other person that stores or treats the hazardous secondary material shall meet the following requirements, as applicable to the type of air emission control equipment selected by the remanufacturer or other person that stores or treats the hazardous secondary material:

(i) The container enclosure shall be designed and operated in accordance with the criteria for a permanent total enclosure as specified in "Procedure T - Criteria for and Verification of a Permanent or Temporary Total Enclosure" under 40 CFR 52.741, appendix B. The enclosure may have permanent or temporary openings to allow worker access; passage of containers through the enclosure by conveyor or other mechanical means; entry of permanent mechanical or electrical equipment; or direct airflow into the enclosure. The remanufacturer or other person that stores or treats the hazardous secondary material shall perform the verification procedure for the enclosure as specified in Section 5.0 to "Procedure T - Criteria for and Verification of a Permanent or Temporary Total Enclosure" initially when the enclosure is first installed and, thereafter, annually.

(ii) The closed-vent system and control device shall be designed and operated in accordance with the requirements of Section R315-261-1087.

(3) Safety devices, as defined in Section R315-261-1081, may be installed and operated as necessary on any container, enclosure, closed-vent system, or control device used to comply with the requirements of Subsection R315-261-1086(e)(1).

(4) Remanufacturers or other persons that store or treat the hazardous secondary material using Container Level 3 controls in accordance with the provisions of Sections R315-261-1080 through 1089 shall inspect and monitor the closed-vent systems and control devices as specified in Section R315-261-1087.

(5) Remanufacturers or other persons that store or treat the hazardous secondary material that use Container Level 3 controls in accordance with the provisions of Sections R315-261-1080 through 1089 shall prepare and maintain the records specified in Subsection R315-261-1089(d).

(6) Transfer of hazardous secondary material in or out of a container using Container Level 3 controls shall be conducted in such a manner as to minimize exposure of the hazardous secondary material to the atmosphere, to the extent practical, considering the physical properties of the hazardous secondary material and good engineering and safety practices for handling flammable, ignitable, explosive, reactive, or other hazardous materials. Examples of container loading procedures that the

Director considers to meet the requirements of Subsection R315-261-1086(e) include using any one of the following: a submerged-fill pipe or other submerged-fill method to load liquids into the container; a vapor-balancing system or a vapor-recovery system to collect and control the vapors displaced from the container during filling operations; or a fitted opening in the top of a container through which the hazardous secondary material is filled and subsequently purging the transfer line before removing it from the container opening.

(f) For the purpose of compliance with Subsection R315-261-1086(c)(1)(i) or (d)(1)(i), containers shall be used that meet the applicable U.S. Department of Transportation regulations on packaging hazardous materials for transportation as follows:

(1) The container meets the applicable requirements specified in 49 CFR part 178 or part 179.

(2) Hazardous secondary material is managed in the container in accordance with the applicable requirements specified in 49 CFR part 107, subpart B and 49 CFR parts 172, 173, and 180.

(3) For the purpose of complying with Sections R315-261-1080 through 1089, no exceptions to the 49 CFR part 178 or part 179 regulations are allowed.

(g) To determine compliance with the no detectable organic emissions requirement of Subsection R315-261-1086(d)(1)(ii), the procedure specified in Subsection R315-261-1083(d) shall be used.

(1) Each potential leak interface, i.e., a location where organic vapor leakage could occur, on the container, its cover, and associated closure devices, as applicable to the container, shall be checked. Potential leak interfaces that are associated with containers include, but are not limited to: the interface of the cover rim and the container wall; the periphery of any opening on the container or container cover and its associated closure device; and the sealing seat interface on a spring-loaded pressure-relief valve.

(2) The test shall be performed when the container is filled with a material having a volatile organic concentration representative of the range of volatile organic concentrations for the hazardous secondary materials expected to be managed in this type of container. During the test, the container cover and closure devices shall be secured in the closed position.

(h) Procedure for determining a container to be vapor-tight using Method 27 of 40 CFR part 60, appendix A for the purpose of complying with Subsection R315-261-1086(d)(1)(iii).

(1) The test shall be performed in accordance with Method 27 of 40 CFR part 60, appendix A.

(2) A pressure measurement device shall be used that has a precision of +/- 2.5 mm water and that is capable of measuring above the pressure at which the container is to be tested for vapor tightness.

(3) If the test results determined by Method 27 indicate that the container sustains a pressure change less than or equal to 750 Pascals within 5 minutes after it is pressurized to a minimum of 4,500 Pascals, then the container is determined to be vapor-tight.

R315-261-1087. Air Emission Standards for Tanks and Containers - Standards: Closed-Vent Systems and Control Devices.

(a) Section R315-261-1087 applies to each closed-vent system and control device installed and operated by the remanufacturer or other person who stores or treats the hazardous secondary material to control air emissions in accordance with standards of Sections R315-261-1080 through 1089.

(b) The closed-vent system shall meet the following requirements:

(1) The closed-vent system shall route the gases, vapors, and fumes emitted from the hazardous secondary material in the hazardous secondary material management unit to a control device that meets the requirements specified in Subsection R315-261-1087(c).

(2) The closed-vent system shall be designed and operated in accordance with the requirements specified in Subsection R315-261-1033(k).

(3) In the case when the closed-vent system includes bypass devices that could be used to divert the gas or vapor stream to the atmosphere before entering the control device, each bypass device shall be equipped with either a flow indicator as specified in Subsection R315-261-1087(b)(3)(i) or a seal or locking device as specified in Subsection R315-261-1087(b)(3)(ii). For the purpose of complying with Subsection R315-261-1087(b)(3), low leg drains, high point bleeds, analyzer vents, open-ended valves or lines, spring loaded pressure relief valves, and other fittings used for safety purposes are not considered to be bypass devices.

(i) If a flow indicator is used to comply with Subsection R315-261-1087(b)(3), the indicator shall be installed at the inlet to the bypass line used to divert gases and vapors from the closed-vent system to the atmosphere at a point upstream of the control device inlet. For Subsection R315-261-1087(b), a flow indicator means a device which indicates the presence of either gas or vapor flow in the bypass line.

(ii) If a seal or locking device is used to comply with Subsection R315-261-1087(b)(3), the device shall be placed on the mechanism by which the bypass device position is controlled, e.g., valve handle, damper lever, when the bypass device is in the closed position such that the bypass device cannot be opened without breaking the seal or removing the lock. Examples of such devices include, but are not limited to, a car-seal or a lock-and-key configuration valve. The remanufacturer or other person that stores or treats the hazardous secondary material shall visually inspect the seal or closure mechanism at least once every month to verify that the bypass mechanism is maintained in the closed position.

(4) The closed-vent system shall be inspected and monitored by the remanufacturer or other person that stores or treats the hazardous secondary material in accordance with the procedure specified in Subsection R315-261-1033(l).

(c) The control device shall meet the following requirements:

(1) The control device shall be one of the following devices:

(i) A control device designed and operated to reduce the total organic content of the inlet vapor stream vented to the control device by at least 95 percent by weight;

(ii) An enclosed combustion device designed and operated in accordance with the requirements of Subsection R315-261-1033(c); or

(iii) A flare designed and operated in accordance with the requirements of Subsection R315-261-1033(d).

(2) The remanufacturer or other person that stores or treats the hazardous secondary material who elects to use a closed-vent system and control device to comply with the requirements Section R315-261-1087 shall comply with the requirements specified in Subsections R315-261-1087(c)(2)(i) through (vi).

(i) Periods of planned routine maintenance of the control device, during which the control device does not meet the specifications of Subsection R315-261-1087(c)(1)(i), (ii), or (iii), as applicable, shall not exceed 240 hours per year.

(ii) The specifications and requirements in Subsections R315-261-1087(c)(1)(i) through (iii) for control devices do not apply during periods of planned routine maintenance.

(iii) The specifications and requirements in Subsections R315-261-1087(c)(1)(i) through (iii) for control devices do not apply during a control device system malfunction.

(iv) The remanufacturer or other person that stores or treats the hazardous secondary material shall demonstrate

compliance with the requirements of Subsection R315-261-1087(c)(2)(i), i.e., planned routine maintenance of a control device, during which the control device does not meet the specifications of Subsection R315-261-1087(c)(1)(i), (ii), or (iii), as applicable, shall not exceed 240 hours per year, by recording the information specified in Subsection R315-261-1089(e)(1)(v).

(v) The remanufacturer or other person that stores or treats the hazardous secondary material shall correct control device system malfunctions as soon as practicable after their occurrence in order to minimize excess emissions of air pollutants.

(vi) The remanufacturer or other person that stores or treats the hazardous secondary material shall operate the closed-vent system such that gases, vapors, or fumes are not actively vented to the control device during periods of planned maintenance or control device system malfunction, i.e., periods when the control device is not operating or not operating normally, except in cases when it is necessary to vent the gases, vapors, and/or fumes to avoid an unsafe condition or to implement malfunction corrective actions or planned maintenance actions.

(3) The remanufacturer or other person that stores or treats the hazardous secondary material using a carbon adsorption system to comply with Subsection R315-261-1087(c)(1) shall operate and maintain the control device in accordance with the following requirements:

(i) Following the initial startup of the control device, all activated carbon in the control device shall be replaced with fresh carbon on a regular basis in accordance with the requirements of Subsection R315-261-1033(g) or (h).

(ii) All carbon that is hazardous waste and that is removed from the control device shall be managed in accordance with the requirements of Subsection R315-261-1033(n), regardless of the average volatile organic concentration of the carbon.

(4) A remanufacturer or other person that stores or treats the hazardous secondary material using a control device other than a thermal vapor incinerator, flare, boiler, process heater, condenser, or carbon adsorption system to comply with Subsection R315-261-1087(c)(1) shall operate and maintain the control device in accordance with the requirements of Subsection R315-261-1033(j).

(5) The remanufacturer or other person that stores or treats the hazardous secondary material shall demonstrate that a control device achieves the performance requirements of Subsection R315-261-1087(c)(1) as follows:

(i) A remanufacturer or other person that stores or treats the hazardous secondary material shall demonstrate using either a performance test as specified in Subsection R315-261-1087(c)(5)(iii) or a design analysis as specified in Subsection R315-261-1087(c)(5)(iv) the performance of each control device except for the following:

(A) A flare;

(B) A boiler or process heater with a design heat input capacity of 44 megawatts or greater;

(C) A boiler or process heater into which the vent stream is introduced with the primary fuel;

(ii) A remanufacturer or other person that stores or treats the hazardous secondary material shall demonstrate the performance of each flare in accordance with the requirements specified in Subsection R315-261-1033(e).

(iii) For a performance test conducted to meet the requirements of Subsection R315-261-1087(c)(5)(i), the remanufacturer or other person that stores or treats the hazardous secondary material shall use the test methods and procedures specified in Subsections R315-261-1034(c)(1) through (4).

(iv) For a design analysis conducted to meet the requirements of Subsection R315-261-1087(c)(5)(i), the design analysis shall meet the requirements specified in Subsection R315-261-1035(b)(4)(iii).

(v) The remanufacturer or other person that stores or treats the hazardous secondary material shall demonstrate that a carbon adsorption system achieves the performance requirements of Subsection R315-261-1087(c)(1) based on the total quantity of organics vented to the atmosphere from all carbon adsorption system equipment that is used for organic adsorption, organic desorption or carbon regeneration, organic recovery, and carbon disposal.

(6) If the remanufacturer or other person that stores or treats the hazardous secondary material and the Director do not agree on a demonstration of control device performance using a design analysis then the disagreement shall be resolved using the results of a performance test performed by the remanufacturer or other person that stores or treats the hazardous secondary material in accordance with the requirements of Subsection R315-261-1087(c)(5)(iii). The Director may choose to have an authorized representative observe the performance test.

(7) The closed-vent system and control device shall be inspected and monitored by the remanufacture or other person that stores or treats the hazardous secondary material in accordance with the procedures specified in Subsections R315-261-1033(f)(2) and (l). The readings from each monitoring device required by Subsection R315-261-1033(f)(2) shall be inspected at least once each operating day to check control device operation. Any necessary corrective measures shall be immediately implemented to ensure the control device is operated in compliance with the requirements Section R315-261-1087.

R315-261-1088. Air Emission Standards for Tanks and Containers - Inspection and Monitoring Requirements.

(a) The remanufacturer or other person that stores or treats the hazardous secondary material shall inspect and monitor air emission control equipment used to comply with Sections R315-261-1080 through 1089 in accordance with the applicable requirements specified in Sections R315-261-1084 through 1087.

(b) The remanufacture or other person that stores or treats the hazardous secondary material shall develop and implement a written plan and schedule to perform the inspections and monitoring required by Subsection R315-261-1088(a). The remanufacturer or other person that stores or treats the hazardous secondary material shall keep the plan and schedule at the facility.

R315-261-1089. Air Emission Standards for Tanks and Containers - Recordkeeping Requirements.

(a) Each remanufacturer or other person that stores or treats the hazardous secondary material subject to requirements of Sections R315-261-1080 through 1089 shall record and maintain the information specified in Subsections R315-261-1089(b) through (j), as applicable to the facility. Except for air emission control equipment design documentation and information required by Subsections R315-261-1089(i) and (j), records required by Section R315-261-1089 shall be maintained at the facility for a minimum of 3 years. Air emission control equipment design documentation shall be maintained at the facility until the air emission control equipment is replaced or otherwise no longer in service. Information required by Subsections R315-261-1089(i) and (j) shall be maintained at the facility for as long as the hazardous secondary material management unit is not using air emission controls specified in Sections R315-261-1084 through 1087 in accordance with the conditions specified in Subsection R315-261-1080(b)(7) or (d), respectively.

(b) The remanufacturer or other person that stores or treats the hazardous secondary material using a tank with air emission

controls in accordance with the requirements of Section R315-261-1084 shall prepare and maintain records for the tank that include the following information:

(1) For each tank using air emission controls in accordance with the requirements of Section R315-261-1084, the remanufacturer or other person that stores or treats the hazardous secondary material shall record:

(i) A tank identification number (or other unique identification description as selected by the remanufacturer or other person that stores or treats the hazardous secondary material).

(ii) A record for each inspection required by Section R315-261-1084 that includes the following information:

(A) Date inspection was conducted.

(B) For each defect detected during the inspection: The location of the defect, a description of the defect, the date of detection, and corrective action taken to repair the defect. In the event that repair of the defect is delayed in accordance with the requirements of Section R315-261-1084, the remanufacturer or other person that stores or treats the hazardous secondary material shall also record the reason for the delay and the date that completion of repair of the defect is expected.

(2) In addition to the information required by Subsection R315-261-1089(b)(1), the remanufacturer or other person that stores or treats the hazardous secondary material shall record the following information, as applicable to the tank:

(i) The remanufacturer or other person that stores or treats the hazardous secondary material using a fixed roof to comply with the Tank Level 1 control requirements specified in Subsection R315-261-1084(c) shall prepare and maintain records for each determination for the maximum organic vapor pressure of the hazardous secondary material in the tank performed in accordance with the requirements of Subsection R315-261-1084(c). The records shall include the date and time the samples were collected, the analysis method used, and the analysis results.

(ii) The remanufacturer or other person that stores or treats the hazardous secondary material using an internal floating roof to comply with the Tank Level 2 control requirements specified in Subsection R315-261-1084(e) shall prepare and maintain documentation describing the floating roof design.

(iii) Remanufacturer or other persons that store or treat the hazardous secondary material using an external floating roof to comply with the Tank Level 2 control requirements specified in Subsection R315-261-1084(f) shall prepare and maintain the following records:

(A) Documentation describing the floating roof design and the dimensions of the tank.

(B) Records for each seal gap inspection required by Subsection R315-261-1084(f)(3) describing the results of the seal gap measurements. The records shall include the date that the measurements were performed, the raw data obtained for the measurements, and the calculations of the total gap surface area. In the event that the seal gap measurements do not conform to the specifications in Subsection R315-261-1084(f)(1), the records shall include a description of the repairs that were made, the date the repairs were made, and the date the tank was emptied, if necessary.

(iv) Each remanufacturer or other person that stores or treats the hazardous secondary material using an enclosure to comply with the Tank Level 2 control requirements specified in Subsection R315-261-1084(i) shall prepare and maintain the following records:

(A) Records for the most recent set of calculations and measurements performed by the remanufacturer or other person that stores or treats the hazardous secondary material to verify that the enclosure meets the criteria of a permanent total enclosure as specified in "Procedure T - Criteria for and Verification of a Permanent or Temporary Total Enclosure" under 40 CFR 52.741, appendix B.

(B) Records required for the closed-vent system and control device in accordance with the requirements of Subsection R315-261-1089(e).

(c) Reserved

(d) The remanufacturer or other person that stores or treats the hazardous secondary material using containers with Container Level 3 air emission controls in accordance with the requirements of Subsection R315-261-1086 shall prepare and maintain records that include the following information:

(1) Records for the most recent set of calculations and measurements performed by the remanufacturer or other person that stores or treats the hazardous secondary material to verify that the enclosure meets the criteria of a permanent total enclosure as specified in "Procedure T - Criteria for and Verification of a Permanent or Temporary Total Enclosure" under 40 CFR 52.741, appendix B.

(2) Records required for the closed-vent system and control device in accordance with the requirements of Subsection R315-261-1089(e).

(e) The remanufacturer or other person that stores or treats the hazardous secondary material using a closed-vent system and control device in accordance with the requirements of Subsection R315-261-1087 shall prepare and maintain records that include the following information:

(1) Documentation for the closed-vent system and control device that includes:

(i) Certification that is signed and dated by the remanufacturer or other person that stores or treats the hazardous secondary material stating that the control device is designed to operate at the performance level documented by a design analysis as specified in Subsection R315-261-1089(e)(1)(ii) or by performance tests as specified in Subsection R315-261-1089(e)(1)(iii) when the tank or container is or would be operating at capacity or the highest level reasonably expected to occur.

(ii) If a design analysis is used, then design documentation as specified in Subsection R315-261-1035(b)(4). The documentation shall include information prepared by the remanufacturer or other person that stores or treats the hazardous secondary material or provided by the control device manufacturer or vendor that describes the control device design in accordance with Subsection R315-261-1035(b)(4)(iii) and certification by the remanufacturer or other person that stores or treats the hazardous secondary material that the control equipment meets the applicable specifications.

(iii) If performance tests are used, then a performance test plan as specified in Subsection R315-261-1035(b)(3) and all test results.

(iv) Information as required by Subsections R315-261-1035(c)(1) and 261.1035(c)(2), as applicable.

(v) A remanufacturer or other person that stores or treats the hazardous secondary material shall record, on a semiannual basis, the information specified in Subsections R315-261-1089(e)(1)(v)(A) and (B) for those planned routine maintenance operations that would require the control device not to meet the requirements of Subsection R315-261-1087(c)(1)(i), (ii), or (iii), as applicable.

(A) A description of the planned routine maintenance that is anticipated to be performed for the control device during the next 6-month period. This description shall include the type of maintenance necessary, planned frequency of maintenance, and lengths of maintenance periods.

(B) A description of the planned routine maintenance that was performed for the control device during the previous 6-month period. This description shall include the type of maintenance performed and the total number of hours during those 6 months that the control device did not meet the requirements of Subsection R315-261-1087(c)(1)(i), (ii), or (iii),

as applicable, due to planned routine maintenance.

(vi) A remanufacturer or other person that stores or treats the hazardous secondary material shall record the information specified in Subsections R315-261-1089(e)(1)(vi)(A) through (C) for those unexpected control device system malfunctions that would require the control device not to meet the requirements of Subsection R315-261-1087(c)(1)(i), (ii), or (iii), as applicable.

(A) The occurrence and duration of each malfunction of the control device system.

(B) The duration of each period during a malfunction when gases, vapors, or fumes are vented from the hazardous secondary material management unit through the closed-vent system to the control device while the control device is not properly functioning.

(C) Actions taken during periods of malfunction to restore a malfunctioning control device to its normal or usual manner of operation.

(vii) Records of the management of carbon removed from a carbon adsorption system conducted in accordance with Subsection R315-261-1087(c)(3)(ii).

(f) The remanufacturer or other person that stores or treats the hazardous secondary material using a tank or container exempted under the hazardous secondary material organic concentration conditions specified in Subsections R315-261-1082(c)(1) or (c)(2)(i) through (vi), shall prepare and maintain at the facility records documenting the information used for each material determination, e.g., test results, measurements, calculations, and other documentation. If analysis results for material samples are used for the material determination, then the remanufacturer or other person that stores or treats the hazardous secondary material shall record the date, time, and location that each material sample is collected in accordance with applicable requirements of Section R315-261-1083.

(g) A remanufacturer or other person that stores or treats the hazardous secondary material designating a cover as "unsafe to inspect and monitor" pursuant to Subsection R315-261-1084(l) or Subsection R315-261-1085(g) shall record and keep at facility the following information: The identification numbers for hazardous secondary material management units with covers that are designated as "unsafe to inspect and monitor," the explanation for each cover stating why the cover is unsafe to inspect and monitor, and the plan and schedule for inspecting and monitoring each cover.

(h) The remanufacturer or other person that stores or treats the hazardous secondary material that is subject to Sections R315-261-1080 through 1089 and to the control device standards in 40 CFR part 60, subpart VV, or 40 CFR part 61, subpart V, may elect to demonstrate compliance with the applicable sections of Sections R315-261-1080 through 1089 by documentation either pursuant to Sections R315-261-1080 through 1089, or pursuant to the provisions of 40 CFR part 60, subpart VV or 40 CFR part 61, subpart V, to the extent that the documentation required by 40 CFR parts 60 or 61 duplicates the documentation required by Section R315-261-1089.

R315-261-1090. Appendix I to Rule R315-261 -- Representative Sampling Methods.

The methods and equipment used for sampling waste materials will vary with the form and consistency of the waste materials to be sampled. Samples collected using the sampling protocols listed below, for sampling waste with properties similar to the indicated materials, shall be considered by the Agency to be representative of the waste.

Extremely viscous liquid-ASTM Standard D140-70 Crushed or powdered material-ASTM Standard D346-75 Soil or rock-like material-ASTM Standard D420-69 Soil-like material-ASTM Standard D1452-65

Fly Ash-like material-ASTM Standard D2234-76, ASTM Standards are available from ASTM, 1916 Race St., Philadelphia, PA 19103

Containerized liquid waste-"COLIWASA."

Liquid waste in pits, ponds, lagoons, and similar reservoirs-"Pond Sampler."

This manual also contains additional information on application of these protocols.

R315-261-1091. Appendix VII to Rule R315-261-Basis for Listing Hazardous Waste.

TABLE

EPA hazardous waste No.	Hazardous constituents for which listed
F001	Tetrachloroethylene, methylene chloride trichloroethylene, 1,1,1-trichloroethane, carbon tetrachloride, chlorinated fluorocarbons.
F002	Tetrachloroethylene, methylene chloride, trichloroethylene, 1,1,1-trichloroethane, 1,1,2-trichloroethane, chlorobenzene, 1,1,2-trichloro-1,2,2-trifluoroethane, ortho-dichlorobenzene, trichlorofluoromethane.
F003	N.A.
F004	Cresols and cresylic acid, nitrobenzene.
F005	Toluene, methyl ethyl ketone, carbon disulfide, isobutanol, pyridine, 2-ethoxyethanol, benzene, 2-nitropropane.
F006	Cadmium, hexavalent chromium, nickel, cyanide (complexed).
F007	Cyanide (salts).
F008	Cyanide (salts).
F009	Cyanide (salts).
F010	Cyanide (salts).
F011	Cyanide (salts).
F012	Cyanide (complexed).
F019	Hexavalent chromium, cyanide (complexed).
F020	Tetra- and pentachlorodibenzo-p-dioxins; tetra and pentachlorodi-benzofurans; tri- and tetrachlorophenols and their chlorophenoxy derivative acids, esters, ethers, amine and other salts.
F021	Penta- and hexachlorodibenzo-p- dioxins; penta- and hexachlorodibenzofurans; pentachlorophenol and its derivatives.
F022	Tetra-, penta-, and hexachlorodibenzo-p-dioxins; tetra-, penta-, and hexachlorodibenzofurans.
F023	Tetra-, and pentachlorodibenzo-p-dioxins; tetra- and pentachlorodibenzofurans; tri- and tetrachlorophenols and their chlorophenoxy derivative acids, esters, ethers, amine and other salts.
F024	Chloromethane, dichloromethane, trichloromethane, carbon tetrachloride, chloroethylene, 1,1-dichloroethane, 1,2-dichloroethane, trans-1-2-dichloroethylene, 1,1-dichloroethylene, 1,1,1-trichloroethane, 1,1,2-trichloroethane, trichloroethylene, 1,1,1,2-tetra-chloroethane, 1,1,2,2-tetrachloroethane, tetrachloroethylene, pentachloroethane, hexachloroethane, allyl chloride (3-chloropropene), dichloropropane, dichloropropene, 2-chloro-1,3-butadiene, hexachloro-1,3-butadiene, hexachlorocyclopentadiene, hexachlorocyclohexane, benzene, chlorbenzene, dichlorobenzenes, 1,2,4-trichlorobenzene, tetrachlorobenzene, pentachlorobenzene, hexachlorobenzene, toluene, naphthalene.
F025	Chloromethane; Dichloromethane; Trichloromethane; Carbon tetrachloride; Chloroethylene; 1,1-Dichloroethane; 1,2-Dichloroethane; trans-1,2-Dichloroethylene; 1,1-Dichloroethylene; 1,1,1-Trichloroethane; 1,1,2-Trichloroethane; Trichloroethylene; 1,1,1,2-Tetrachloroethane; 1,1,2,2-Tetrachloroethane; Tetrachloroethylene; Pentachloroethane; Hexachloroethane; Allyl chloride (3-Chloropropene); Dichloropropane; Dichloropropene; 2-Chloro-1,3-butadiene; Hexachloro-1,3-butadiene; Hexachlorocyclopentadiene; Benzene; Chlorobenzene; Dichlorobenzene; 1,2,4-Trichlorobenzene; Tetrachlorobenzene;

Pentachlorobenzene; Hexachlorobenzene; Toluene; Naphthalene.
F026 Tetra-, penta-, and hexachlorodibenzo-p-dioxins; tetra-, penta-, and hexachlorodibenzofurans.
F027 Tetra-, penta-, and hexachlorodibenzo-p-dioxins; tetra-, penta-, and hexachlorodibenzofurans; tri-, tetra-, and pentachlorophenols and their chlorophenoxy derivative acids, esters, ethers, amine and other salts.
F028 Tetra-, penta-, and hexachlorodibenzo-p-dioxins; tetra-, penta-, and hexachlorodibenzofurans; tri-, tetra-, and pentachlorophenols and their chlorophenoxy derivative acids, esters, ethers, amine and other salts.
F032 Benz(a)anthracene, benzo(a)pyrene, dibenz(a,h)-anthracene, indeno(1,2,3-cd)pyrene, pentachlorophenol, arsenic, chromium, tetra-, penta-, hexa-, heptachlorodibenzo-p-dioxins, tetra-, penta-, hexa-, heptachlorodibenzofurans.
F034 Benz(a)anthracene, benzo(k)fluoranthene, benzo(a)pyrene, dibenz(a,h)anthracene, indeno(1,2,3-cd)pyrene, naphthalene, arsenic, chromium.
F035 Arsenic, chromium, lead.
F037 Benzene, benzo(a)pyrene, chrysene, lead, chromium.
F038 Benzene, benzo(a)pyrene, chrysene, lead, chromium.
F039 All constituents for which treatment standards are specified for multi-source leachate (wastewaters and nonwastewaters) under Section R315-268-43, Table CCW.
F999 CX, GA, GB, GD, H, HD, HL, HN-1, HN-2, HN-3, HT, L, T, and VX.
K001 Pentachlorophenol, phenol, 2-chlorophenol, p-chloro-m-cresol, 2,4-dimethylphenyl, 2,4-dinitrophenol, trichlorophenols, tetrachlorophenols, 2,4-dinitrophenol, creosote, chrysene, naphthalene, fluoranthene, benzo(b)fluoranthene, benzo(a)pyrene, indeno(1,2,3-cd)pyrene, benz(a)anthracene, dibenz(a)anthracene, acenaphthalene.
K002 Hexavalent chromium, lead
K003 Hexavalent chromium, lead.
K004 Hexavalent chromium.
K005 Hexavalent chromium, lead.
K006 Hexavalent chromium.
K007 Cyanide (complexed), hexavalent chromium.
K008 Hexavalent chromium.
K009 Chloroform, formaldehyde, methylene chloride, methyl chloride, paraldehyde, formic acid.
K010 Chloroform, formaldehyde, methylene chloride, methyl chloride, paraldehyde, formic acid, chloroacetaldehyde.
K011 Acrylonitrile, acetonitrile, hydrocyanic acid.
K013 Hydrocyanic acid, acrylonitrile, acetonitrile.
K014 Acetonitrile, acrylamide.
K015 Benzyl chloride, chlorobenzene, toluene, benzotrichloride.
K016 Hexachlorobenzene, hexachlorobutadiene, carbon tetrachloride, hexachloroethane, perchloroethylene.
K017 Epichlorohydrin, chloroethers (bis(chloromethyl) ether and bis (2-chloroethyl) ethers), trichloropropane, dichloropropanols.
K018 1,2-dichloroethane, trichloroethylene, hexachlorobutadiene, hexachlorobenzene.
K019 Ethylene dichloride, 1,1,1-trichloroethane, 1,1,2-trichloroethane, tetrachloroethanes (1,1,2,2-tetrachloroethane and 1,1,1,2-tetrachloroethane), trichloroethylene, tetrachloroethylene, carbon tetrachloride, chloroform, vinyl chloride, vinylidene chloride.
K020 Ethylene dichloride, 1,1,1-trichloroethane, 1,1,2-trichloroethane, tetrachloroethanes (1,1,2,2-tetrachloroethane and 1,1,1,2-tetrachloroethane), trichloroethylene, tetrachloroethylene, carbon tetrachloride, chloroform, vinyl chloride, vinylidene chloride.
K021 Antimony, carbon tetrachloride, chloroform.
K022 Phenol, tars (polycyclic aromatic hydrocarbons).
K023 Phthalic anhydride, maleic anhydride.
K024 Phthalic anhydride, 1,4-naphthoquinone.
K025 Meta-dinitrobenzene, 2,4-dinitrotoluene.
K026 Paraldehyde, pyridines, 2-picoline.
K027 Toluene diisocyanate, toluene-2, 4-diamine.
K028 1,1,1-trichloroethane, vinyl chloride.
K029 1,2-dichloroethane, 1,1,1-trichloroethane, vinyl chloride, vinylidene chloride, chloroform.
K030 Hexachlorobenzene, hexachlorobutadiene, hexachloroethane, 1,1,1,2-tetrachloroethane, 1,1,2,2-tetrachloroethane, ethylene dichloride.
K031 Arsenic.
K032 Hexachlorocyclopentadiene.
K033 Hexachlorocyclopentadiene.
K034 Hexachlorocyclopentadiene.
K035 Creosote, chrysene, naphthalene, fluoranthene benzo(b) fluoranthene, benzo(a)pyrene, indeno(1,2,3-cd) pyrene, benzo(a)anthracene, dibenzo(a)anthracene, acenaphthalene.
K036 Toluene, phosphorodithioic and phosphorothioic acid esters.
K037 Toluene, phosphorodithioic and phosphorothioic acid esters.
K038 Phorate, formaldehyde, phosphorodithioic and phosphorothioic acid esters.
K039 Phosphorodithioic and phosphorothioic acid esters.
K040 Phorate, formaldehyde, phosphorodithioic and phosphorothioic acid esters.
K041 Toxaphene.
K042 Hexachlorobenzene, ortho-dichlorobenzene.
K043 2,4-dichlorophenol, 2,6-dichlorophenol, 2,4,6-trichlorophenol.
K044 N.A.
K045 N.A.
K046 Lead.
K047 N.A.
K048 Hexavalent chromium, lead.
K049 Hexavalent chromium, lead.
K050 Hexavalent chromium.
K051 Hexavalent chromium, lead.
K052 Lead.
K060 Cyanide, napthalene, phenolic compounds, arsenic.
K061 Hexavalent chromium, lead, cadmium.
K062 Hexavalent chromium, lead.
K069 Hexavalent chromium, lead, cadmium.
K071 Mercury.
K073 Chloroform, carbon tetrachloride, hexachloroethane, trichloroethane, tetrachloroethylene, dichloroethylene, 1,1,2,2-tetrachloroethane.
K083 Aniline, diphenylamine, nitrobenzene, phenylenediamine.
K084 Arsenic.
K085 Benzene, dichlorobenzenes, trichlorobenzenes, tetrachlorobenzenes, pentachlorobenzene, hexachlorobenzene, benzyl chloride.
K086 Lead, hexavalent chromium.
K087 Phenol, naphthalene.
K088 Cyanide (complexes).
K093 Phthalic anhydride, maleic anhydride.
K094 Phthalic anhydride.
K095 1,1,2-trichloroethane, 1,1,1,2-tetrachloroethane, 1,1,2,2-tetrachloroethane.
K096 1,2-dichloroethane, 1,1,1-trichloroethane, 1,1,2-trichloroethane.
K097 Chlordane, heptachlor.
K098 Toxaphene.
K099 2,4-dichlorophenol, 2,4,6-trichlorophenol.
K100 Hexavalent chromium, lead, cadmium.
K101 Arsenic.
K102 Arsenic.
K103 Aniline, nitrobenzene, phenylenediamine.
K104 Aniline, benzene, diphenylamine, nitrobenzene, phenylenediamine.
K105 Benzene, monochlorobenzene, dichlorobenzenes, 2,4,6-trichlorophenol.
K106 Mercury.
K107 1,1-Dimethylhydrazine (UDMH).
K108 1,1-Dimethylhydrazine (UDMH).
K109 1,1-Dimethylhydrazine (UDMH).
K110 1,1-Dimethylhydrazine (UDMH).
K111 2,4-Dinitrotoluene.
K112 2,4-Toluenediamine, o-toluidine, p-toluidine, aniline.
K113 2,4-Toluenediamine, o-toluidine, p-toluidine, aniline.
K114 2,4-Toluenediamine, o-toluidine, p-toluidine.
K115 2,4-Toluenediamine.
K116 Carbon tetrachloride, tetrachloroethylene, chloroform, phosgene.
K117 Ethylene dibromide.
K118 Ethylene dibromide.
K123 Ethylene thiourea.

K124	Ethylene thiourea.
K125	Ethylene thiourea.
K126	Ethylene thiourea.
K131	Dimethyl sulfate, methyl bromide.
K132	Methyl bromide.
K136	Ethylene dibromide.
K141	Benzene, benz(a)anthracene, benzo(a)pyrene, benzo(b)fluoranthene, benzo(k)fluoranthene, dibenz(a,h)anthracene, indeno(1,2,3-cd)pyrene.
K142	Benzene, benz(a)anthracene, benzo(a)pyrene, benzo(b)fluoranthene, benzo(k)fluoranthene, dibenz(a,h)anthracene, indeno(1,2,3-cd)pyrene.
K143	Benzene, benz(a)anthracene, benzo(b)fluoranthene, benzo(k)fluoranthene.
K144	Benzene, benz(a)anthracene, benzo(a)pyrene, benzo(b)fluoranthene, benzo(k)fluoranthene, dibenz(a,h)anthracene.
K145	Benzene, benz(a)anthracene, benzo(a)pyrene, dibenz(a,h)anthracene, naphthalene.
K147	Benzene, benz(a)anthracene, benzo(a)pyrene, benzo(b)fluoranthene, benzo(k)fluoranthene, dibenz(a,h)anthracene, indeno(1,2,3-cd)pyrene.
K148	Benz(a)anthracene, benzo(a)pyrene, benzo(b)fluoranthene, benzo(k)fluoranthene, dibenz(a,h)anthracene, indeno(1,2,3-cd)pyrene.
K149	Benzotrichloride, benzyl chloride, chloroform, chloromethane, chlorobenzene, 1,4-dichlorobenzene, hexachlorobenzene, pentachlorobenzene, 1,2,4,5-tetrachlorobenzene, toluene.
K150	Carbon tetrachloride, chloroform, chloromethane, 1,4-dichlorobenzene, hexachlorobenzene, pentachlorobenzene, 1,2,4,5-tetrachlorobenzene, 1,1,2,2-tetrachloroethane, tetrachloroethylene, 1,2,4-trichlorobenzene.
K151	Benzene, carbon tetrachloride, chloroform, hexachlorobenzene, pentachlorobenzene, toluene, 1,2,4,5-tetrachlorobenzene, tetrachloroethylene.
K156	Benomyl, carbaryl, carbendazim, carbofuran, carbosulfan, formaldehyde, methylene chloride, triethylamine.
K157	Carbon tetrachloride, formaldehyde, methyl chloride, methylene chloride, pyridine, triethylamine.
K158	Benomyl, carbendazim, carbofuran, carbosulfan, chloroform, methylene chloride.
K159	Benzene, butylate, eptc, molinate, pebulate, vernolate.
K161	Antimony, arsenic, metam-sodium, ziram.
K169	Benzene.
K170	Benzo(a)pyrene, dibenz(a,h)anthracene, benzo (a) anthracene, benzo (b)fluoranthene, benzo(k)fluoranthene, 3-methylcholanthrene, 7, 12-dimethylbenz(a)anthracene.
K171	Benzene, arsenic.
K172	Benzene, arsenic.
K174	1,2,3,4,6,7,8-Heptachlorodibenzo-p-dioxin (1,2,3,4,6,7,8-HpCDD), 1,2,3,4,6,7,8-Heptachlorodibenzofuran (1,2,3,4,6,7,8-HpCDF), 1,2,3,4,7,8,9-Heptachlorodibenzofuran (1,2,3,6,7,8,9-HpCDF), HxCDDs (All Hexachlorodibenzo-p-dioxins), HxCDFs (All Hexachlorodibenzofurans), PeCDDs (All Pentachlorodibenzo-p-dioxins), OCDD (1,2,3,4,6,7,8,9-Octachlorodibenzo-p-dioxin, OCDF (1,2,3,4,6,7,8,9-Octachlorodibenzofuran), PeCDFs (All Pentachlorodibenzofurans), TCDDs (All tetrachlorodi-benzo-p-dioxins), TCDFs (All tetrachlorodibenzofurans).
K175	Mercury
K176	Arsenic, Lead.
K177	Antimony.
K178	Thallium.
K181	Aniline, o-anisidine, 4-chloroaniline, p-cresidine, 2,4-dimethylaniline, 1,2-phenylenediamine, 1,3-phenylenediamine.

N.A.-Waste is hazardous because it fails the test for the characteristic of ignitability, corrosivity, or reactivity.

R315-261-1092. Appendix VIII to Rule 315-261-Hazardous Constituents.

Appendix VIII to 40 CFR Part 261, 2015 Ed., is adopted and incorporated by reference, with the following addition:

(a) P999 - CX, GA, GB, GD, H, HD, HL, HN-1, HN-2, HN-3, HT, L, T, and VX.

R315-261-1093. Appendix IX to Rule 315-261-Hazardous Constituents.

Appendix IX to 40 CFR Part 261, 2015 Ed., is adopted and incorporated by reference

KEY: hazardous waste
October 15, 2019 **19-6-105**
19-6-106

R315. Environmental Quality, Waste Management and Radiation Control, Waste Management.
R315-262. Hazardous Waste Generator Requirements.
R315-262-1. General -- Terms Used in this Part.

(a) As used in Rule R315-262:

(1) "Condition for exemption" means any requirement in Sections R315-262-14, R315-262-15, R315-262-16, R315-262-17, R315-262-70, or Sections R315-262-200 through R315-262-216 or Sections R315-262-230 through R315-262-233 that states an event, action, or standard that shall occur or be met in order to obtain an exemption from any applicable requirement in Rule R315-124, R315-264 through R315-268, and R315-270, or from any requirement for notification under section 3010 of RCRA.

(2) "Independent requirement" means a requirement of Rule R315-262 that states an event, action, or standard that shall occur or be met; and that applies without relation to, or irrespective of, the purpose of obtaining a conditional exemption from storage facility permit, interim status, and operating requirements under Sections R315-262-14, R315-262-15, R315-262-16, R315-262-17, or Sections R315-262-200 through R315-262-216 or Sections R315-262-230 through R315-262-233.

R315-262-10. General -- Purpose, Scope, and Applicability.

(a) The regulations in Rule R315-262 establish standards for generators of hazardous waste as defined by Section R315-260-10.

(1) A person who generates a hazardous waste as defined by Rule R315-261 is subject to all the applicable independent requirements in the sections listed below:

(i) Independent requirements of a very small quantity generator.

(A) Subsections R315-262-11(a) through (d) Hazardous waste determination and recordkeeping; and

(B) Section R315-262-13 Generator category determination.

(ii) Independent requirements of a small quantity generator.

(A) Section R315-262-11 Hazardous waste determination and recordkeeping;

(B) Section R315-262-13 Generator category determination;

(C) Section R315-262-18 EPA identification numbers and re-notification for small quantity generators and large quantity generators;

(D) Sections R315-262-20 through R315-262-27--Manifest requirements applicable to small and large quantity generators;

(E) Sections R315-262-30 through R315-262-34--Pre-transport requirements applicable to small and large quantity generators;

(F) Section R315-262-40 Recordkeeping;

(G) Section R315-262-44 Recordkeeping for small quantity generators; and

(H) Sections R315-262-80 through R315-262-84--Transboundary movements of hazardous waste for recovery or disposal.

(iii) Independent requirements of a large quantity generator.

(A) Section R315-262-11 Hazardous waste determination and recordkeeping;

(B) Section R315-262-13 Generator category determination;

(C) Section R315-262-18 EPA identification numbers and re-notification for small quantity generators and large quantity generators;

(D) Sections R315-262-20 through R315-262-27--Manifest requirements applicable to small and large quantity generators;

(E) Sections R315-262-30 through R315-262-34--Pre-transport requirements applicable to small and large quantity generators;

(F) Sections R315-262-40 through R315-262-44--Recordkeeping and reporting applicable to small and large quantity generators, except Section R315-262-44; and

(G) Sections R315-262-80 through R315-262-84--Transboundary movements of hazardous waste for recovery or disposal.

(2) A generator that accumulates hazardous waste on site is a person that stores hazardous waste; such generator is subject to the applicable requirements of Rule R315-124, R315-264 through R315-266, R315-270 and section 3010 of RCRA, unless it is one of the following:

(i) A very small quantity generator that meets the conditions for exemption in Section R315-262-14;

(ii) A small quantity generator that meets the conditions for exemption in Sections R315-262-15 and R315-262-16; or

(iii) A large quantity generator that meets the conditions for exemption in Sections R315-262-15 and R315-262-17.

(3) A generator shall not transport, offer its hazardous waste for transport, or otherwise cause its hazardous waste to be sent to a facility that is not a designated facility, as defined in Section R315-260-10, or not otherwise authorized to receive the generator's hazardous waste.

(b) Determining generator category. A generator shall use Section R315-262-13 to determine which provisions of Rule R315-262 are applicable to the generator based on the quantity of hazardous waste generated per calendar month.

(c) Reserved.

(d) Any person who exports or imports hazardous wastes shall comply with Section R315-262-18 and Sections R315-262-80 through R315-262-84.

(e) Any person who imports hazardous waste into the United States shall comply with the standards applicable to generators established in Rule R315-262.

(f) A farmer who generates waste pesticides which are hazardous waste and who complies with all of the requirements of Section R315-262-70 is not required to comply with other standards in Rule R315-262 or Rules R315- 270, 264, 265, or 268 with respect to such pesticides.

(1) A generator's violation of an independent requirement is subject to penalty and injunctive relief under Sections 19-6-112 and 19-6-113.

(2) A generator's noncompliance with a condition for exemption in Rule R315-262 is not subject to penalty or injunctive relief under Sections 19-6-112 and 19-6-113 as a violation of a Rule R315-262 condition for exemption. Noncompliance by any generator with an applicable condition for exemption from storage permit and operations requirements means that the facility is a storage facility operating without an exemption from the permit, interim status, and operations requirements in Rules R315-124, R315-264 through R315-266, and R315-270, and the notification requirements of section 3010 of RCRA. Without an exemption, any violations of such storage requirements are subject to penalty and injunctive relief under Sections 19-6-112 and 19-6-113.

(h) An owner or operator who initiates a shipment of hazardous waste from a treatment, storage, or disposal facility shall comply with the generator standards established in Rule R315-262.

Note 1: The provisions of Section R315-262-34 are applicable to the on-site accumulation of hazardous waste by generators. Therefore, the provisions of Section R315-262-34 only apply to owners or operators who are shipping hazardous waste which they generated at that facility.

Note 2: A generator who treats, stores, or disposes of hazardous waste on-site shall comply with the applicable

standards and permit requirements set forth in Rules R315-264, 265, 266, 268, and 270.

(i) Reserved.

(j) Reserved.

(k) Reserved.

(l) The laboratories owned by an eligible academic entity that chooses to be subject to the requirements of Sections R315-262-200 through R315-262-216 are not subject to, for purposes of Subsection R315-262-10(l), the terms "laboratory" and "eligible academic entity" shall have the meaning as defined in Section R315-262-200:

(1) The independent requirements of Section R315-262-11 or the regulations in Section R315-262-15 for large quantity generators and small quantity generators, except as provided in Sections R315-262-200 through R315-262-216, and

(2) The conditions of Section R315-262-14, for very small quantity generators, except as provided in Sections R315-262-200 through R315-262-216.

(m) Generators of lamps, as defined in Section R315-273-9, using a drum-top crusher, as defined in Section R315-273-9, shall meet the requirements of Subsection R315-273-13(d)(3), except for the registration requirement; and Subsections R315-273-13(d)(4) and (5).

Note: A generator who treats, stores, or disposes of hazardous waste on-site shall comply with the applicable standards and permit requirements set forth in Rules R315-264, R315-265, R315-266, R315-268, and R315-270.

R315-262-11. General -- Hazardous Waste Determination and Recordkeeping.

A person who generates a solid waste, as defined in Section R315-261-2, shall make an accurate determination as to whether that waste is a hazardous waste in order to ensure wastes are properly managed according to applicable regulations. A hazardous waste determination is made using the following steps:

(a) The hazardous waste determination for each solid waste shall be made at the point of waste generation, before any dilution, mixing, or other alteration of the waste occurs, and at any time in the course of its management that it has, or may have, changed its properties as a result of exposure to the environment or other factors that may change the properties of the waste such that the hazardous classification of the waste may change.

(b) A person shall determine whether the solid waste is excluded from regulation under Section R315-261-4.

(c) If the waste is not excluded under Section R315-261-4, the person shall then use knowledge of the waste to determine whether the waste meets any of the listing descriptions under Sections R315-261-30 through R315-261-35. Acceptable knowledge that may be used in making an accurate determination as to whether the waste is listed may include waste origin, composition, the process producing the waste, feedstock, and other reliable and relevant information. If the waste is listed, the person may file a delisting petition under Sections R315-260-20 and R315-260-22 to demonstrate to the Director that the waste from this particular site or operation is not a hazardous waste.

(d) The person then shall also determine whether the waste exhibits one or more hazardous characteristics as identified in Sections R315-261-20 through R315-261-24 by following the procedures in Subsections R315-262-11(d)(1) or (2), or a combination of both.

(1) The person shall apply knowledge of the hazard characteristic of the waste in light of the materials or the processes used to generate the waste. Acceptable knowledge may include process knowledge, for example, information about chemical feedstocks and other inputs to the production process; knowledge of products, by-products, and intermediates produced by the manufacturing process; chemical or physical characterization of wastes; information on the chemical and physical properties of the chemicals used or produced by the process or otherwise contained in the waste; testing that illustrates the properties of the waste; or other reliable and relevant information about the properties of the waste or its constituents. A test other than a test method set forth in Sections R315-261-20 through R315-261-24, or an equivalent test method approved by the Director under Section R315-260-21, may be used as part of a person's knowledge to determine whether a solid waste exhibits a characteristic of hazardous waste. However, such tests do not, by themselves, provide definitive results. Persons testing their waste shall obtain a representative sample of the waste for the testing, as defined at Section R315-260-10.

(2) When available knowledge is inadequate to make an accurate determination, the person shall test the waste according to the applicable methods set forth in Sections R315-261-20 through R315-261-24 or according to an equivalent method approved by the Director under Section R315-260-21 and in accordance with the following:

(i) Persons testing their waste shall obtain a representative sample of the waste for the testing, as defined at Section R315-260-10.

(ii) Where a test method is specified in Sections R315-261-20 through R315-261-24, the results of the regulatory test, when properly performed, are definitive for determining the regulatory status of the waste.

(e) If the waste is determined to be hazardous, the generator shall refer to Rules R315-261, R315-264, R315-265, R315-266, R315-268, and R315-273 for other possible exclusions or restrictions pertaining to management of the specific waste.

(f) Recordkeeping for small and large quantity generators. A small or large quantity generator shall maintain records supporting its hazardous waste determinations, including records that identify whether a solid waste is a hazardous waste, as defined by Section R315-261-3. Records shall be maintained for at least three years from the date that the waste was last sent to on-site or off-site treatment, storage, or disposal. These records shall comprise the generator's knowledge of the waste and support the generator's determination, as described at Subsections R315-262-11(c) and (d). The records shall include, but are not limited to, the following types of information: The results of any tests, sampling, waste analyses, or other determinations made in accordance with this section; records documenting the tests, sampling, and analytical methods used to demonstrate the validity and relevance of such tests; records consulted in order to determine the process by which the waste was generated, the composition of the waste, and the properties of the waste; and records which explain the knowledge basis for the generator's determination, as described at Subsection R315-262-11(d)(1). The periods of record retention referred to in Subsection R315-262-11(2)(f) are extended automatically during the course of any unresolved enforcement action regarding the regulated activity or as requested by the Director.

(g) Identifying hazardous waste numbers for small and large quantity generators. If the waste is determined to be hazardous, small quantity generators and large quantity generators shall identify all applicable EPA hazardous waste numbers, EPA hazardous waste codes, in Sections R315-261-20 through R315-261-24 and R315-261-30 through R315-261-35. Prior to shipping the waste off site, the generator also shall mark its containers with all applicable EPA hazardous waste numbers, EPA hazardous waste codes, according to Section R315-262-32.

R315-262-13. General -- Generator Category Determination.

A generator shall determine its generator category. A

generator's category is based on the amount of hazardous waste generated each month and may change from month to month. This section sets forth procedures to determine whether a generator is a very small quantity generator, a small quantity generator, or a large quantity generator for a particular month, as defined in Section R315-260-10.

(a) Generators of either acute hazardous waste or non-acute hazardous waste. A generator who either generates acute hazardous waste or non-acute hazardous waste in a calendar month shall determine its generator category for that month by doing the following:

(1) Counting the total amount of hazardous waste generated in the calendar month;

(2) Subtracting from the total any amounts of waste exempt from counting as described in Subsections R315-262-13(c) and (d); and

(3) Determining the resulting generator category for the hazardous waste generated using Table 1 below.

(b) Generators of both acute and non-acute hazardous wastes. A generator who generates both acute hazardous waste and non-acute hazardous waste in the same calendar month shall determine its generator category for that month by doing the following:

(1) Counting separately the total amount of acute hazardous waste and the total amount of non-acute hazardous waste generated in the calendar month;

(2) Subtracting from each total any amounts of waste exempt from counting as described in Subsections R315-262-13(c) and (d);

(3) Determining separately the resulting generator categories for the quantities of acute and non-acute hazardous waste generated using Table 1 below; and

(4) Comparing the resulting generator categories from Subsection R315-262-13(b)(3) and applying the more stringent generator category to the accumulation and management of both non-acute hazardous waste and acute hazardous waste generated for that month.

TABLE 1 to Section R315-262-13

Generator Categories Based on
Quantity of Waste Generated in a Calendar Month

Quantity of acute hazardous waste generated in a calendar month	Quantity of non-acute hazardous waste generated in a calendar month	Quantity of residues from a cleanup of acute hazardous waste generated in a calendar month	Generator category
>1kg	Any amount	Any amount	Large quantity generator
Any amount	> or = 1,000kg	Any amount	Large quantity generator
Any amount	Any Amount	>100kg	Large quantity generator
< or = 1 kg	>100 kg and < 1,000 kg	< or = 100 kg	Small quantity Generator
< or = 1 kg	< or = 100 kg	< or = 100 kg	Very small quantity generator

(c) When making the monthly quantity-based determinations required by Rule R315-262, the generator shall include all hazardous waste that it generates, except hazardous waste that:

(1) Is exempt from regulation under Subsections R315-261-4(c) through (f), 261-6(a)(3), R315-261-7(a)(1), or Section R315-261-8;

(2) Is managed immediately upon generation only in on-site elementary neutralization units, wastewater treatment units, or totally enclosed treatment facilities as defined in Section R315-260-10;

(3) Is recycled, without prior storage or accumulation, only in an on-site process subject to regulation under Subsection R315-261-6(c)(2);

(4) Is used oil managed under the requirements of Subsection R315-261-6(a)(4) and R315-15;

(5) Is spent lead-acid batteries managed under the requirements of Section R315-266-80;

(6) Is universal waste managed under Section R315-261-9 and Rule R315-273;

(7) Is a hazardous waste that is an unused commercial chemical product, listed in Sections R315-261-30 through R315-261-35 or exhibiting one or more characteristics in Sections R315-261-20 through R315-261-24, that is generated solely as a result of a laboratory clean-out conducted at an eligible academic entity pursuant to Section R315-262-213. For purposes of this provision, the term eligible academic entity shall have the meaning as defined in Section R315-262-200; or

(8) Is managed as part of an episodic event in compliance with the conditions of Sections R315-262-230 through R315-262-233.

(d) In determining the quantity of hazardous waste generated in a calendar month, a generator need not include:

(1) Hazardous waste when it is removed from on-site accumulation, so long as the hazardous waste was previously counted once;

(2) Hazardous waste generated by on-site treatment (including reclamation) of the generator's hazardous waste, so long as the hazardous waste that is treated was previously counted once; and

(3) Hazardous waste spent materials that are generated, reclaimed, and subsequently reused on site, so long as such spent materials have been previously counted once.

(e) Based on the generator category as determined under Section R315-262-13, the generator shall meet the applicable independent requirements listed in Section R315-262-10. A generator's category also determines which of the provisions of Sections R315-262-14, R315-262-15, R315-262-16 or R315-262-17 shall be met to obtain an exemption from the storage facility permit, interim status, and operating requirements when accumulating hazardous waste.

(f) Mixing hazardous wastes with solid wastes

(1) Very small quantity generator wastes.

(i) Hazardous wastes generated by a very small quantity generator may be mixed with solid wastes. Very small quantity generators may mix a portion or all of its hazardous waste with solid waste and remain subject to Section R315-262-14 even though the resultant mixture exceeds the quantity limits identified in the definition of very small quantity generator at Section R315-260-10, unless the mixture exhibits one or more of the characteristics of hazardous waste identified in Sections R315-261-20 through R315-261-24.

(ii) If the resulting mixture exhibits a characteristic of hazardous waste, this resultant mixture is a newly-generated hazardous waste. The very small quantity generator shall count both the resultant mixture amount plus the other hazardous waste generated in the calendar month to determine whether the total quantity exceeds the very small quantity generator calendar month quantity limits identified in the definition of generator categories found in Section R315-260-10. If so, to remain exempt from the permitting, interim status, and operating standards, the very small quantity generator shall meet the conditions for exemption applicable to either a small quantity generator or a large quantity generator. The very small quantity generator shall also comply with the applicable independent requirements for either a small quantity generator or a large quantity generator.

(iii) If a very small quantity generator's wastes are mixed with used oil, the mixture is subject to Rule R315-15. Any material produced from such a mixture by processing, blending,

or other treatment is also regulated under Rule R315-15.

(2) Small quantity generator and large quantity generator wastes.

(i) Hazardous wastes generated by a small quantity generator or large quantity generator may be mixed with solid waste. These mixtures are subject to the following: the mixture rule in Subsections R315-261-3(a)(2)(iv), (b)(2) and (3), and (g)(2)(i); the prohibition of dilution rule at Subsection R315-268-3(a); the land disposal restriction requirements of Section R315-268-40 if a characteristic hazardous waste is mixed with a solid waste so that it no longer exhibits the hazardous characteristic; and the hazardous waste determination requirement at Section R315-262-11.

(ii) If the resulting mixture is found to be a hazardous waste, this resultant mixture is a newly-generated hazardous waste. A small quantity generator shall count both the resultant mixture amount plus the other hazardous waste generated in the calendar month to determine whether the total quantity exceeds the small quantity generator calendar monthly quantity limits identified in the definition of generator categories found in Section R315-260-10. If so, to remain exempt from the permitting, interim status, and operating standards, the small quantity generator shall meet the conditions for exemption applicable to a large quantity generator. The small quantity generator shall also comply with the applicable independent requirements for a large quantity generator.

R315-262-14. General -- Conditions For Exemption for a Very Small Quantity Generator.

(a) Provided that the very small quantity generator meets all the conditions for exemption listed in Section R315-262-14, hazardous waste generated by the very small quantity generator is not subject to the requirements of Rules R315-124, 262 (except Sections R315-262-10 through R315-262-14) through R315-268, and R315-270, and the notification requirements of section 3010 of RCRA and the very small quantity generator may accumulate hazardous waste on site without complying with such requirements. The conditions for exemption are as follows:

(1) In a calendar month the very small quantity generator generates less than or equal to the amounts specified in the definition of "very small quantity generator" in Section R315-260-10;

(2) The very small quantity generator complies with Subsections R315-262-11(a) through (d);

(3) If the very small quantity generator accumulates at any time greater than 1 kilogram (2.2 lbs) of acute hazardous waste or 100 kilograms (220 lbs) of any residue or contaminated soil, water, or other debris resulting from the cleanup of a spill, into or on any land or water, of any acute hazardous waste listed in Section R315-261-31 or Subsection R315-261-33(e), all quantities of that acute hazardous waste are subject to the following additional conditions for exemption:

(i) Such waste is held on site for no more than 90 days beginning on the date when the accumulated wastes exceed the amounts provided in Subsection R315-262-14(a)(3); and

(ii) The conditions for exemption in Subsections R315-262-17(a) through (g).

(4) If the very small quantity generator accumulates at any time 1,000 kilograms (2,200 lbs) or greater of non-acute hazardous waste, all quantities of that hazardous waste are subject to the following additional conditions for exemption:

(i) Such waste is held on site for no more than 180 days, or 270 days, if applicable, beginning on the date when the accumulated waste exceed the amounts provided in Subsection R315-262-14(a)(4);

(ii) The quantity of waste accumulated on site never exceeds 6,000 kilograms (13,200 lbs); and

(iii) The conditions for exemption in Subsections R315-262-16(b)(2) through (f).

(5) A very small quantity generator that accumulates hazardous waste in amounts less than or equal to the limits in Subsections R315-262-14(a)(3) and (4) shall either treat or dispose of its hazardous waste in an on-site facility or ensure delivery to an off-site treatment, storage, or disposal facility, either of which, if located in the U.S., is:

(i) Permitted under Rule R315-270;

(ii) In interim status under Rules R315-265 and 270;

(iii) Authorized to manage hazardous waste by a state with a hazardous waste management program approved under 40 CFR 271;

(iv) Permitted, licensed, or registered by a state to manage municipal solid waste and, if managed in a municipal solid waste landfill is subject to Rules R315-301 through R315-320;

(v) Permitted, licensed, or registered by a state to manage non-municipal non-hazardous waste and, if managed in a non-municipal non-hazardous waste disposal unit, is subject to the requirements in Rules R315-301 through R315-320 or 40 CFR 257.5 through 257.30;

(vi) A facility which:

(A) Beneficially uses or reuses, or legitimately recycles or reclaims its waste; or

(B) Treats its waste prior to beneficial use or reuse, or legitimate recycling or reclamation;

(vii) For universal waste managed under Rule R315-273, a universal waste handler or destination facility subject to the requirements of Rule R315-273;

(viii) A large quantity generator under the control of the same person as the very small quantity generator, provided the following conditions are met:

(A) The very small quantity generator and the large quantity generator are under the control of the same person as defined in Section R315-260-10. "Control," for the purposes of Subsection R315-262-14(a)(5)(viii), means the power to direct the policies of the generator, whether by the ownership of stock, voting rights, or otherwise, except that contractors who operate generator facilities on behalf of a different person as defined in Section R315-260-10 shall not be deemed to "control" such generators.

(B) The very small quantity generator marks its container(s) of hazardous waste with:

(1) The words ``Hazardous Waste'' and

(2) An indication of the hazards of the contents, examples include, but are not limited to:

(I) the applicable hazardous waste characteristic(s), i.e., ignitable, corrosive, reactive, toxic;

(II) hazard communication consistent with the Department of Transportation requirements at 49 CFR part 172 subpart E, labeling, or subpart F, placarding;

(III) a hazard statement or pictogram consistent with the Occupational Safety and Health Administration Hazard Communication Standard at 29 CFR 1910.1200; or

(IV) a chemical hazard label consistent with the National Fire Protection Association code 704.

(ix) Reserved

(x) Reserved

(xi) For airbag waste, an airbag waste collection facility or a designated facility subject to the requirements of Subsection R315-261-4(j).

(b) The placement of bulk or non-containerized liquid hazardous waste or hazardous waste containing free liquids (whether or not sorbents have been added) in any landfill is prohibited.

(c) A very small quantity generator experiencing an episodic event may generate and accumulate hazardous waste in accordance with Sections R315-262-230 through 233 in lieu of Sections R315-262-15, 16, and 17.

R315-262-15. General -- Satellite Accumulation Area Regulations for Small and Large Quantity Generators.

(a) A generator may accumulate as much as 55 gallons of non-acute hazardous waste and/or either one quart of liquid acute hazardous waste listed in Section R315-261-31 or Subsection R315-261-33(e) or 1 kg (2.2 lbs) of solid acute hazardous waste listed in Section R315-261-31 or Subsection R315-261-33(e) in containers at or near any point of generation where wastes initially accumulate which is under the control of the operator of the process generating the waste, without a permit or interim status and without complying with the requirements of Rules R315-124, R315-264 through R315-266, and R315-270, provided that all of the conditions for exemption in Section R315-262-15 are met. A generator may comply with the conditions for exemption in Section R315-262-15 instead of complying with the conditions for exemption in Subsection R315-262-16(b) or 17(a), except as required in Subsections R315-262-15(a)(7) and (8). The conditions for exemption for satellite accumulation are:

(1) If a container holding hazardous waste is not in good condition, or if it begins to leak, the generator shall immediately transfer the hazardous waste from this container to a container that is in good condition and does not leak, or immediately transfer and manage the waste in a central accumulation area operated in compliance with Subsections R315-262-16(b) or 17(a).

(2) The generator shall use a container made of or lined with materials that will not react with, and are otherwise compatible with, the hazardous waste to be accumulated, so that the ability of the container to contain the waste is not impaired.

(3) Special standards for incompatible wastes.

(i) Incompatible wastes, or incompatible wastes and materials, (see appendix V of 40 CFR 265 for examples) shall not be placed in the same container, unless 40 CFR 265.17(b), which is incorporated by reference in Section R315-265-1, is complied with.

(ii) Hazardous waste shall not be placed in an unwashed container that previously held an incompatible waste or material (see appendix V of 40 CFR 265 for examples), unless 40 CFR 265.17(b), which is incorporated by reference in Section R315-265-1, is complied with.

(iii) A container holding a hazardous waste that is incompatible with any waste or other materials accumulated nearby in other containers shall be separated from the other materials or protected from them by any practical means.

(4) A container holding hazardous waste shall be closed at all times during accumulation, except:

(i) When adding, removing, or consolidating waste; or

(ii) When temporary venting of a container is necessary:

(A) For the proper operation of equipment, or

(B) To prevent dangerous situations, such as build-up of extreme pressure.

(5) A generator shall mark or label its container with the following:

(i) The words ``Hazardous Waste'' and

(ii) An indication of the hazards of the contents, examples include, but are not limited to:

(A) the applicable hazardous waste characteristic(s), i.e., ignitable, corrosive, reactive, toxic;

(B) hazard communication consistent with the Department of Transportation requirements at 49 CFR part 172 subpart E, labeling, or subpart F, placarding;

(C) a hazard statement or pictogram consistent with the Occupational Safety and Health Administration Hazard Communication Standard at 29 CFR 1910.1200; or

(D) a chemical hazard label consistent with the National Fire Protection Association code 704.

(6) A generator who accumulates either acute hazardous waste listed in Section R315-261-31 or Subsection R315-261-33(e) or non-acute hazardous waste in excess of the amounts listed in Subsection R315-262-15(a) at or near any point of generation shall do the following:

(i) Comply within three consecutive calendar days with the applicable central accumulation area regulations in Subsection R315-262-16(b) or 17(a), or

(ii) Remove the excess from the satellite accumulation area within three consecutive calendar days to either:

(A) A central accumulation area operated in accordance with the applicable regulations in Subsection R315-262-16(b) or 17(a);

(B) An on-site interim status or permitted treatment, storage, or disposal facility, or

(C) An off-site designated facility; and

(iii) During the three-consecutive-calendar-day period the generator shall continue to comply with Subsections R315-262-15(a)(1) through (5). The generator shall mark or label the container(s) holding the excess accumulation of hazardous waste with the date the excess amount began accumulating.

(7) All satellite accumulation areas operated by a small quantity generator shall meet the preparedness and prevention regulations of Subsection R315-262-16(b)(8) and emergency procedures at Subsection R315-262-16(b)(9).

(8) All satellite accumulation areas operated by a large quantity generator shall meet the Preparedness, Prevention and Emergency Procedures in Sections R315-262-250 through R315-262-265.

(b) Reserved.

R315-262-16. General -- Conditions for Exemption for a Small Quantity Generator that Accumulates Hazardous Waste.

A small quantity generator may accumulate hazardous waste on site without a permit or interim status, and without complying with the requirements of Rules R315-124, R315-264 through R315-266, and R315-270, or the notification requirements of section 3010 of RCRA, provided that all the conditions for exemption listed in Section R315-262-16 are met:

(a) Generation. The generator generates in a calendar month no more than the amounts specified in the definition of ``small quantity generator'' in Section R315-260-10.

(b) Accumulation. The generator accumulates hazardous waste on site for no more than 180 days, unless in compliance with the conditions for exemption for longer accumulation in Subsections R315-262-16(d) and (e). The following accumulation conditions also apply:

(1) Accumulation limit. The quantity of hazardous waste accumulated on site never exceeds 6,000 kilograms (13,200 pounds);

(2) Accumulation of hazardous waste in containers.

(i) Condition of containers. If a container holding hazardous waste is not in good condition, or if it begins to leak, the small quantity generator shall immediately transfer the hazardous waste from this container to a container that is in good condition, or immediately manage the waste in some other way that complies with the conditions for exemption of Section R315-262-16.

(ii) Compatibility of waste with container. The small quantity generator shall use a container made of or lined with materials that will not react with, and are otherwise compatible with, the hazardous waste to be accumulated, so that the ability of the container to contain the waste is not impaired.

(iii) Management of containers.

(A) A container holding hazardous waste shall always be closed during accumulation, except when it is necessary to add or remove waste.

(B) A container holding hazardous waste shall not be opened, handled, or accumulated in a manner that may rupture the container or cause it to leak.

(iv) Inspections. At least weekly, the small quantity generator shall inspect central accumulation areas. The small quantity generator shall look for leaking containers and for deterioration of containers caused by corrosion or other factors. See Subsection R315-262-16(b)(2)(i) for remedial action required if deterioration or leaks are detected.

(v) Special conditions for accumulation of incompatible wastes.

(A) Incompatible wastes, or incompatible wastes and materials, (see appendix V of 40 CFR 265 for examples) shall not be placed in the same container, unless 40 CFR 265.17(b), which is incorporated by reference in Section R315-265-1, is complied with.

(B) Hazardous waste shall not be placed in an unwashed container that previously held an incompatible waste or material (see appendix V of 40 CFR 265 for examples), unless 40 CFR 265.17(b), which is incorporated by reference in Section R315-265-1, is complied with.

(C) A container accumulating hazardous waste that is incompatible with any waste or other materials accumulated or stored nearby in other containers, piles, open tanks, or surface impoundments shall be separated from the other materials or protected from them by means of a dike, berm, wall, or other device.

(3) Accumulation of hazardous waste in tanks.

(i) Reserved.

(ii) A small quantity generator of hazardous waste shall comply with the following general operating conditions:

(A) Treatment or accumulation of hazardous waste in tanks shall comply with 40 CFR 265.17(b), which is incorporated by reference in Section R315-265-1.

(B) Hazardous wastes or treatment reagents shall not be placed in a tank if they could cause the tank or its inner liner to rupture, leak, corrode, or otherwise fail before the end of its intended life.

(C) Uncovered tanks shall be operated to ensure at least 60 centimeters (2 feet) of freeboard, unless the tank is equipped with a containment structure (e.g., dike or trench), a drainage control system, or a diversion structure (e.g., standby tank) with a capacity that equals or exceeds the volume of the top 60 centimeters (2 feet) of the tank.

(D) Where hazardous waste is continuously fed into a tank, the tank shall be equipped with a means to stop this inflow (e.g., waste feed cutoff system or by-pass system to a stand-by tank).

(iii) Except as noted in Subsection R315-262-16(b)(3)(iv), a small quantity generator that accumulates hazardous waste in tanks shall inspect, where present:

(A) Discharge control equipment (e.g., waste feed cutoff systems, by-pass systems, and drainage systems) at least once each operating day, to ensure that it is in good working order;

(B) Data gathered from monitoring equipment (e.g., pressure and temperature gauges) at least once each operating day to ensure that the tank is being operated according to its design;

(C) The level of waste in the tank at least once each operating day to ensure compliance with Subsection R315-262-16(b)(3)(ii)(C);

(D) The construction materials of the tank at least weekly to detect corrosion or leaking of fixtures or seams; and

(E) The construction materials of, and the area immediately surrounding, discharge confinement structures (e.g., dikes) at least weekly to detect erosion or obvious signs of leakage (e.g., wet spots or dead vegetation). The generator shall remedy any deterioration or malfunction of equipment or structures which the inspection reveals on a schedule which ensures that the problem does not lead to an environmental or human health hazard. Where a hazard is imminent or has already occurred, remedial action shall be taken immediately.

(iv) A small quantity generator accumulating hazardous waste in tanks or tank systems that have full secondary containment and that either use leak detection equipment to alert personnel to leaks, or implement established workplace practices to ensure leaks are promptly identified, shall inspect at least weekly, where applicable, the areas identified in Subsections R315-262-16(b)(3)(iii)(A) through (E). Use of the alternate inspection schedule shall be documented in the generator's operating record. This documentation shall include a description of the established workplace practices at the generator.

(v) Reserved.

(vi) A small quantity generator accumulating hazardous waste in tanks shall, upon closure of the facility, remove all hazardous waste from tanks, discharge control equipment, and discharge confinement structures. At closure, as throughout the operating period, unless the small quantity generator can demonstrate, in accordance with Subsection R315-261-3(c) or (d), that any solid waste removed from its tank is not a hazardous waste, then it shall manage such waste in accordance with all applicable provisions of Rules R315-262, R315-263, R315-265, and R315-268.

(vii) A small quantity generator shall comply with the following special conditions for accumulation of ignitable or reactive waste:

(A) Ignitable or reactive waste shall not be placed in a tank, unless:

(I) The waste is treated, rendered, or mixed before or immediately after placement in a tank so that the resulting waste, mixture, or dissolution of material no longer meets the definition of ignitable or reactive waste under Section R315-261-21 or R315-261-23 and 40 CFR 265.17(b), which is incorporated by reference in Section R315-265-1, is complied with; or

(II) The waste is accumulated or treated in such a way that it is protected from any material or conditions that may cause the waste to ignite or react; or

(III) The tank is used solely for emergencies.

(B) A small quantity generator which treats or accumulates ignitable or reactive waste in covered tanks shall comply with the buffer zone requirements for tanks contained in Tables 2-1 through 2-6 of the National Fire Protection Association's "Flammable and Combustible Liquids Code" (1977 or 1981), incorporated by reference, see Section R315-260-11.

(C) A small quantity generator shall comply with the following special conditions for incompatible wastes:

(I) Incompatible wastes, or incompatible wastes and materials, (see 40 CFR 265 appendix V for examples) shall not be placed in the same tank, unless 40 CFR 265.17(b), which is incorporated by reference in Section R315-265-1, is complied with.

(II) Hazardous waste shall not be placed in an unwashed tank that previously held an incompatible waste or material, unless 40 CFR 265.17(b), which is incorporated by reference in Section R315-265-1, is complied with.

(4) Accumulation of hazardous waste on drip pads. If the waste is placed on drip pads, the small quantity generator shall comply with the following:

(i) 40 CFR 265.440 through 265.445, which is incorporated by reference in Section R315-265-1, except 265.445(c);

(ii) The small quantity generator shall remove all wastes from the drip pad at least once every 90 days. Any hazardous wastes that are removed from the drip pad at least once every 90 days are then subject to the 180-day accumulation limit in Subsections R315-262-16(b) and Section R315-262-15 if hazardous wastes are being managed in satellite accumulation areas prior to being moved to the central accumulation area; and

(iii) The small quantity generator shall maintain on site at the facility the following records readily available for

inspection:

(A) A written description of procedures that are followed to ensure that all wastes are removed from the drip pad and associated collection system at least once every 90 days; and

(B) Documentation of each waste removal, including the quantity of waste removed from the drip pad and the sump or collection system and the date and time of removal.

(5) Accumulation of hazardous waste in containment buildings. If the waste is placed in containment buildings, the small quantity generator shall comply with of 40 CFR 265.1100 through 265.1102, which is incorporated by reference in Section R315-265-1. The generator shall label its containment buildings with the words "Hazardous Waste" in a conspicuous place easily visible to employees, visitors, emergency responders, waste handlers, or other persons on site and also in a conspicuous place provide an indication of the hazards of the contents, examples include, but are not limited to, the applicable hazardous waste characteristic(s), i.e., ignitable, corrosive, reactive, toxic; hazard communication consistent with the Department of Transportation requirements at 49 CFR part 172 subpart E, labeling, or subpart F, placarding; a hazard statement or pictogram consistent with the Occupational Safety and Health Administration Hazard Communication Standard at 29 CFR 1910.1200; or a chemical hazard label consistent with the National Fire Protection Association code 704. The generator shall also maintain:

(i) The professional engineer certification that the building complies with the design standards specified in 40 CFR 265.1101, which is incorporated by reference in Section R315-265-1. This certification shall be in the generator's files prior to operation of the unit; and

(ii) The following records by use of inventory logs, monitoring equipment, or any other effective means:

(A) A written description of procedures to ensure that each waste volume remains in the unit for no more than 90 days, a written description of the waste generation and management practices for the facility showing that the generator is consistent with maintaining the 90 day limit, and documentation that the procedures are complied with; or

(B) Documentation that the unit is emptied at least once every 90 days.

(C) Inventory logs or records with the above information shall be maintained on site and readily available for inspection.

(6) Labeling and marking of containers and tanks.

(i) Containers. A small quantity generator shall mark or label its containers with the following:

(A) The words "Hazardous Waste";

(B) An indication of the hazards of the contents, examples include, but are not limited to:

(I) the applicable hazardous waste characteristic(s), i.e., ignitable, corrosive, reactive, toxic;

(II) hazard communication consistent with the Department of Transportation requirements at 49 CFR part 172 subpart E, labeling, or subpart F, placarding;

(III) a hazard statement or pictogram consistent with the Occupational Safety and Health Administration Hazard Communication Standard at 29 CFR 1910.1200; or

(IV) a chemical hazard label consistent with the National Fire Protection Association code 704; and

(C) The date upon which each period of accumulation begins clearly visible for inspection on each container.

(ii) Tanks. A small quantity generator accumulating hazardous waste in tanks shall do the following:

(A) Mark or label its tanks with the words "Hazardous Waste";

(B) Mark or label its tanks with an indication of the hazards of the contents, examples include, but are not limited to:

(I) the applicable hazardous waste characteristic(s), i.e., ignitable, corrosive, reactive, toxic;

(II) hazard communication consistent with the Department of Transportation requirements at 49 CFR part 172 subpart E, labeling, or subpart F, placarding;

(III) a hazard statement or pictogram consistent with the Occupational Safety and Health Administration Hazard Communication Standard at 29 CFR 1910.1200; or

(IV) a chemical hazard label consistent with the National Fire Protection Association code 704;

(C) Use inventory logs, monitoring equipment, or other records to demonstrate that hazardous waste has been emptied within 180 days of first entering the tank if using a batch process, or in the case of a tank with a continuous flow process, demonstrate that estimated volumes of hazardous waste entering the tank daily exit the tank within 180 days of first entering; and

(D) Keep inventory logs or records with the above information on site and readily available for inspection.

(7) Land disposal restrictions. A small quantity generator shall comply with all the applicable requirements under Rule R315-268.

(8) Preparedness and prevention.

(i) Maintenance and operation of facility. A small quantity generator shall maintain and operate its facility to minimize the possibility of a fire, explosion, or any unplanned sudden or non-sudden release of hazardous waste or hazardous waste constituents to air, soil, or surface water which could threaten human health or the environment.

(ii) Required equipment. All areas where hazardous waste is either generated or accumulated shall be equipped with the items in Subsections R315-262-16(b)(8)(ii)(A) through (D), unless none of the hazards posed by waste handled at the facility could require a particular kind of equipment specified below or the actual waste generation or accumulation area does not lend itself for safety reasons to have a particular kind of equipment specified below. A small quantity generator may determine the most appropriate locations to locate equipment necessary to prepare for and respond to emergencies.

(A) An internal communications or alarm system capable of providing immediate emergency instruction, voice or signal, to facility personnel;

(B) A device, such as a telephone, immediately available at the scene of operations, or a hand-held two-way radio, capable of summoning emergency assistance from local police departments, fire departments, or State or local emergency response teams;

(C) Portable fire extinguishers, fire control equipment, including special extinguishing equipment, such as that using foam, inert gas, or dry chemicals, spill control equipment, and decontamination equipment; and

(D) Water at adequate volume and pressure to supply water hose streams, or foam producing equipment, or automatic sprinklers, or water spray systems.

(iii) Testing and maintenance of equipment. All communications or alarm systems, fire protection equipment, spill control equipment, and decontamination equipment, where required, shall be tested and maintained as necessary to assure its proper operation in time of emergency.

(iv) Access to communications or alarm system.

(A) Whenever hazardous waste is being poured, mixed, spread, or otherwise handled, all personnel involved in the operation shall have immediate access, e.g., direct or unimpeded access, to an internal alarm or emergency communication device, either directly or through visual or voice contact with another employee, unless such a device is not required under Subsection R315-262-16(a)(8)(ii).

(B) In the event there is just one employee on the premises while the facility is operating, the employee shall have immediate access, e.g., direct or unimpeded access, to a device, such as a telephone, immediately available at the scene of operation, or a hand-held two-way radio, capable of summoning

external emergency assistance, unless such a device is not required under Subsection R315-262-16(a)(8)(ii).

(v) Required aisle space. The small quantity generator shall maintain aisle space to allow the unobstructed movement of personnel, fire protection equipment, spill control equipment, and decontamination equipment to any area of facility operation in an emergency, unless aisle space is not needed for any of these purposes.

(vi) Arrangements with local authorities.

(A) The small quantity generator shall attempt to make arrangements with the local police department, fire department, other emergency response teams, emergency response contractors, equipment suppliers and local hospitals, taking into account the types and quantities of hazardous wastes handled at the facility. Arrangements may be made with the Local Emergency Planning Committee, if it is determined to be the appropriate organization with which to make arrangements.

(I) A small quantity generator attempting to make arrangements with its local fire department shall determine the potential need for the services of the local police department, other emergency response teams, emergency response contractors, equipment suppliers and local hospitals.

(II) As part of this coordination, the small quantity generator shall attempt to make arrangements, as necessary, to familiarize the above organizations with the layout of the facility, the properties of hazardous waste handled at the facility and associated hazards, places where facility personnel would normally be working, entrances to roads inside the facility, and possible evacuation routes as well as the types of injuries or illnesses that could result from fires, explosions, or releases at the facility.

(III) Where more than one police or fire department might respond to an emergency, the small quantity generator shall attempt to make arrangements designating primary emergency authority to a specific fire or police department, and arrangements with any others to provide support to the primary emergency authority.

(B) A small quantity generator shall maintain records documenting the arrangements with the local fire department as well as any other organization necessary to respond to an emergency. This documentation shall include documentation in the operating record that either confirms such arrangements actively exist or, in cases where no arrangements exist, confirms that attempts to make such arrangements were made.

(C) A facility possessing 24-hour response capabilities may seek a waiver from the authority having jurisdiction (AHJ) over the fire code within the facility's state or locality as far as needing to make arrangements with the local fire department as well as any other organization necessary to respond to an emergency, provided that the waiver is documented in the operating record.

(9) Emergency procedures. The small quantity generator complies with the following conditions for those areas of the generator facility where hazardous waste is generated and accumulated:

(i) At all times there shall be at least one employee either on the premises or on call, i.e., available to respond to an emergency by reaching the facility within a short period of time, with the responsibility for coordinating all emergency response measures specified in Subsection R315-262-16(b)(9)(iv). This employee is the emergency coordinator.

(ii) The small quantity generator shall post the following information next to telephones or in areas directly involved in the generation and accumulation of hazardous waste:

(A) The name and emergency telephone number of the emergency coordinator;

(B) Location of fire extinguishers and spill control material, and, if present, fire alarm; and

(C) The telephone number of the fire department, unless the facility has a direct alarm.

(iii) The small quantity generator shall ensure that all employees are thoroughly familiar with proper waste handling and emergency procedures, relevant to their responsibilities during normal facility operations and emergencies;

(iv) The emergency coordinator or his designee shall respond to any emergencies that arise. The applicable responses are as follows:

(A) In the event of a fire, call the fire department or attempt to extinguish it using a fire extinguisher;

(B) In the event of a spill, the small quantity generator is responsible for containing the flow of hazardous waste to the extent possible, and as soon as is practicable, cleaning up the hazardous waste and any contaminated materials or soil. Such containment and cleanup can be conducted either by the small quantity generator or by a contractor on behalf of the small quantity generator;

(C) In the event of a fire, explosion, or other release that could threaten human health outside the facility or when the small quantity generator has knowledge that a spill has reached surface water, the small quantity generator shall immediately notify the National Response Center, using their 24-hour toll free number 800/424-8802 and the state environmental incident reporting program at 801/536-0200 or after hours at 801/536-4123. The report shall include the following information:

(I) The name, address, and U.S. EPA identification number of the small quantity generator;

(II) Date, time, and type of incident, e.g., spill or fire;

(III) Quantity and type of hazardous waste involved in the incident;

(IV) Extent of injuries, if any; and

(V) Estimated quantity and disposition of recovered materials, if any.

(c) Transporting over 200 miles. A small quantity generator who shall transport its waste, or offer its waste for transportation, over a distance of 200 miles or more for off-site treatment, storage or disposal may accumulate hazardous waste on site for 270 days or less without a permit or without having interim status provided that the generator complies with the conditions of Subsection R315-262-16(b).

(d) Accumulation time limit extension. A small quantity generator who accumulates hazardous waste for more than 180 days (or for more than 270 days if it shall transport its waste, or offer its waste for transportation, over a distance of 200 miles or more) is subject to the requirements of Rules R315-264, R315-265, R315-268, and R315-270 unless it has been granted an extension to the 180-day (or 270-day if applicable) period. Such extension may be granted by the Director if hazardous wastes shall remain on site for longer than 180 days (or 270 days if applicable) due to unforeseen, temporary, and uncontrollable circumstances. An extension of up to 30 days may be granted at the discretion of the Director on a case-by-case basis.

(e) Rejected load. A small quantity generator who sends a shipment of hazardous waste to a designated facility with the understanding that the designated facility can accept and manage the waste and later receives that shipment back as a rejected load or residue in accordance with the manifest discrepancy provisions of Section R315-264-72 or 40 CFR 265.72, which is incorporated by reference in R315-265-1, may accumulate the returned waste on site in accordance with Subsections R315-262-16(a)-(d). Upon receipt of the returned shipment, the generator shall:

(1) Sign Item 18c of the manifest, if the transporter returned the shipment using the original manifest; or

(2) Sign Item 20 of the manifest, if the transporter returned the shipment using a new manifest.

(f) A small quantity generator experiencing an episodic event may accumulate hazardous waste in accordance with Sections R315-262-230 through R315-262-233 in lieu of

Section R315-262-17.

R315-262-17. General -- Conditions for Exemption for a Large Quantity Generator that Accumulates Hazardous Waste.

A large quantity generator may accumulate hazardous waste on site without a permit or interim status, and without complying with the requirements of Rules R315-124, R315-264 through R315-266, and R315-270, or the notification requirements of section 3010 of RCRA, provided that all of the following conditions for exemption are met:

(a) Accumulation. A large quantity generator accumulates hazardous waste on site for no more than 90 days, unless in compliance with the accumulation time limit extension or F006 accumulation conditions for exemption in Subsections R315-262-17(b) through (e). The following accumulation conditions also apply:

(1) Accumulation of hazardous waste in containers. If the hazardous waste is placed in containers, the large quantity generator shall comply with the following:

(i) Air emission standards. The applicable requirements of 40 CFR 265.1030 through 265.1035, 265.1050 through 265.1064, and 265.1080 through 265.1090, which are incorporated by reference in Section R315-265-1;

(ii) Condition of containers. If a container holding hazardous waste is not in good condition, or if it begins to leak, the large quantity generator shall immediately transfer the hazardous waste from this container to a container that is in good condition, or immediately manage the waste in some other way that complies with the conditions for exemption of this section;

(iii) Compatibility of waste with container. The large quantity generator shall use a container made of or lined with materials that will not react with, and are otherwise compatible with, the hazardous waste to be stored, so that the ability of the container to contain the waste is not impaired;

(iv) Management of containers.

(A) A container holding hazardous waste shall always be closed during accumulation, except when it is necessary to add or remove waste.

(B) A container holding hazardous waste shall not be opened, handled, or stored in a manner that may rupture the container or cause it to leak.

(v) Inspections. At least weekly, the large quantity generator shall inspect central accumulation areas. The large quantity generator shall look for leaking containers and for deterioration of containers caused by corrosion or other factors. See Subsection R315-262-17(a)(1)(ii) for remedial action required if deterioration or leaks are detected.

(vi) Special conditions for accumulation of ignitable and reactive wastes.

(A) Containers holding ignitable or reactive waste shall be located at least 15 meters (50 feet) from the facility's property line unless a written approval is obtained from the authority having jurisdiction over the local fire code allowing hazardous waste accumulation to occur within this restricted area. A record of the written approval shall be maintained as long as ignitable or reactive hazardous waste is accumulated in this area.

(B) The large quantity generator shall take precautions to prevent accidental ignition or reaction of ignitable or reactive waste. This waste shall be separated and protected from sources of ignition or reaction including but not limited to the following: Open flames, smoking, cutting and welding, hot surfaces, frictional heat, sparks (static, electrical, or mechanical), spontaneous ignition, e.g., from heat-producing chemical reactions, and radiant heat. While ignitable or reactive waste is being handled, the large quantity generator shall confine smoking and open flame to specially designated locations. "No Smoking" signs shall be conspicuously placed wherever there is a hazard from ignitable or reactive waste.

(vii) Special conditions for accumulation of incompatible wastes.

(A) Incompatible wastes, or incompatible wastes and materials, see appendix V of 40 CFR 265 for examples, shall not be placed in the same container, unless 40 CFR 265.17(b), which is incorporated by reference in Section R315-265-1, is complied with.

(B) Hazardous waste shall not be placed in an unwashed container that previously held an incompatible waste or material, see appendix V of 40 CFR 265 for examples, unless 40 CFR 265.17(b), which is incorporated by reference in Section R315-265-1, is complied with.

(C) A container holding a hazardous waste that is incompatible with any waste or other materials accumulated or stored nearby in other containers, piles, open tanks, or surface impoundments shall be separated from the other materials or protected from them by means of a dike, berm, wall, or other device.

(2) Accumulation of hazardous waste in tanks. If the waste is placed in tanks, the large quantity generator shall comply with the applicable requirements of 40 CFR 265.190 through 265.202, except 265.197(c) of Closure and post-closure care and 265.200, Waste analysis and trial tests, as well as the applicable requirements of 265.1030 through 265.1035, 265.1050 through 265.1064, and 265.1080 through 265.1090, which are incorporated by reference in Section R315-265-1.

(3) Accumulation of hazardous waste on drip pads. If the hazardous waste is placed on drip pads, the large quantity generator shall comply with the following:

(i) 40 CFR 265.440 through 265.445, which are incorporated by reference in Section R315-265-1;

(ii) The large quantity generator shall remove all wastes from the drip pad at least once every 90 days. Any hazardous wastes that are removed from the drip pad are then subject to the 90-day accumulation limit in Subsection R315-262-17(a) and Section R315-262-15, if the hazardous wastes are being managed in satellite accumulation areas prior to being moved to a central accumulation area; and

(iii) The large quantity generator shall maintain on site at the facility the following records readily available for inspection:

(A) A written description of procedures that are followed to ensure that all wastes are removed from the drip pad and associated collection system at least once every 90 days; and

(B) Documentation of each waste removal, including the quantity of waste removed from the drip pad and the sump or collection system and the date and time of removal.

(4) Accumulation of hazardous waste in containment buildings. If the waste is placed in containment buildings, the large quantity generator shall comply with 40 CFR 265.1100 through 265.1102, which are incorporated by reference in Section R315-265-1. The generator shall label its containment building with the words "Hazardous Waste" in a conspicuous place easily visible to employees, visitors, emergency responders, waste handlers, or other persons on site, and also in a conspicuous place provide an indication of the hazards of the contents, examples include, but are not limited to, the applicable hazardous waste characteristic(s), i.e., ignitable, corrosive, reactive, toxic); hazard communication consistent with the Department of Transportation requirements at 49 CFR part 172 subpart E, labeling, or subpart F, placarding; a hazard statement or pictogram consistent with the Occupational Safety and Health Administration Hazard Communication Standard at 29 CFR 1910.1200; or a chemical hazard label consistent with the National Fire Protection Association code 704. The generator shall also maintain:

(i) The professional engineer certification that the building complies with the design standards specified in 40 CFR

265.1101, which is incorporated by reference in Section R315-265-1. This certification shall be in the generator's files prior to operation of the unit; and

(ii) The following records by use of inventory logs, monitoring equipment, or any other effective means:

(A) A written description of procedures to ensure that each waste volume remains in the unit for no more than 90 days, a written description of the waste generation and management practices for the facility showing that the generator is consistent with respecting the 90 day limit, and documentation that the procedures are complied with; or

(B) Documentation that the unit is emptied at least once every 90 days.

(C) Inventory logs or records with the above information shall be maintained on site and readily available for inspection.

(5) Labeling and marking of containers and tanks.

(i) Containers. A large quantity generator shall mark or label its containers with the following:

(A) The words "Hazardous Waste";

(B) An indication of the hazards of the contents, examples include, but are not limited to:

(I) the applicable hazardous waste characteristic(s), i.e., ignitable, corrosive, reactive, toxic;

(II) hazard communication consistent with the Department of Transportation requirements at 49 CFR part 172 subpart E, labeling, or subpart F, placarding;

(III) a hazard statement or pictogram consistent with the Occupational Safety and Health Administration Hazard Communication Standard at 29 CFR 1910.1200; or

(IV) a chemical hazard label consistent with the National Fire Protection Association code 704; and

(C) The date upon which each period of accumulation begins clearly visible for inspection on each container.

(ii) Tanks. A large quantity generator accumulating hazardous waste in tanks shall do the following:

(A) Mark or label its tanks with the words "Hazardous Waste";

(B) Mark or label its tanks with an indication of the hazards of the contents, examples include, but are not limited to:

(I) the applicable hazardous waste characteristic(s), i.e., ignitable, corrosive, reactive, toxic;

(II) hazard communication consistent with the Department of Transportation requirements at 49 CFR part 172 subpart E, labeling, or subpart F, placarding;

(III) a hazard statement or pictogram consistent with the Occupational Safety and Health Administration Hazard Communication Standard at 29 CFR 1910.1200; or

(IV) a chemical hazard label consistent with the National Fire Protection Association code 704;

(C) Use inventory logs, monitoring equipment or other records to demonstrate that hazardous waste has been emptied within 90 days of first entering the tank if using a batch process, or in the case of a tank with a continuous flow process, demonstrate that estimated volumes of hazardous waste entering the tank daily exit the tank within 90 days of first entering; and

(D) Keep inventory logs or records with the above information on site and readily available for inspection.

(6) Emergency procedures. The large quantity generator complies with the standards in Section R315-262-250 through R315-262-265, Preparedness, Prevention and Emergency Procedures for Large Quantity Generators.

(7) Personnel training.

(i)(A) Facility personnel shall successfully complete a program of classroom instruction, online training, e.g., computer-based or electronic, or on-the-job training that teaches them to perform their duties in a way that ensures compliance with this part. The large quantity generator shall ensure that this program includes all the elements described in the document required under Subsection R315-262-17(a)(7)(iv).

(B) This program shall be directed by a person trained in hazardous waste management procedures, and shall include instruction which teaches facility personnel hazardous waste management procedures, including contingency plan implementation, relevant to the positions in which they are employed.

(C) At a minimum, the training program shall be designed to ensure that facility personnel are able to respond effectively to emergencies by familiarizing them with emergency procedures, emergency equipment, and emergency systems, including where applicable:

(I) Procedures for using, inspecting, repairing, and replacing facility emergency and monitoring equipment;

(II) Key parameters for automatic waste feed cut-off systems;

(III) Communications or alarm systems;

(IV) Response to fires or explosions;

(V) Response to ground-water contamination incidents; and

(VI) Shutdown of operations.

(D) For facility employees that receive emergency response training pursuant to Occupational Safety and Health Administration regulations 29 CFR 1910.120(p)(8) and 1910.120(q), the large quantity generator is not required to provide separate emergency response training pursuant to Section R315-262-17, provided that the overall facility training meets all the conditions of exemption in Section R315-262-17.

(ii) Facility personnel shall successfully complete the program required in Subsection R315-262-17(a)(7)(i) within six months after the date of their employment or assignment to the facility, or to a new position at the facility, whichever is later. Employees shall not work in unsupervised positions until they have completed the training standards of Subsection R315-262-17(a)(7)(i).

(iii) Facility personnel shall take part in an annual review of the initial training required in Subsection R315-262-17(a)(7)(i).

(iv) The large quantity generator shall maintain the following documents and records at the facility:

(A) The job title for each position at the facility related to hazardous waste management, and the name of the employee filling each job;

(B) A written job description for each position listed under Subsection R315-262-17(a)(7)(iv)(A). This description may be consistent in its degree of specificity with descriptions for other similar positions in the same company location or bargaining unit, but shall include the requisite skill, education, or other qualifications, and duties of facility personnel assigned to each position;

(C) A written description of the type and amount of both introductory and continuing training that will be given to each person filling a position listed under Subsection R315-262-17(a)(7)(iv)(A);

(D) Records that document that the training or job experience, required under Subsections R315-262-17(a)(7)(i), (ii), and (iii), has been given to, and completed by, facility personnel.

(v) Training records on current personnel shall be kept until closure of the facility. Training records on former employees shall be kept for at least three years from the date the employee last worked at the facility. Personnel training records may accompany personnel transferred within the same company.

(8) Closure. A large quantity generator accumulating hazardous wastes in containers, tanks, drip pads, and containment buildings, prior to closing a unit at the facility, or prior to closing the facility, shall meet the following conditions:

(i) Notification for closure of a waste accumulation unit. A large quantity generator shall perform one of the following when closing a waste accumulation unit:

(A) Place a notice in the operating record within 30 days after closure identifying the location of the unit within the facility; or

(B) Meet the closure performance standards of Subsection R315-262-17(a)(8)(iii) for container, tank, and containment building waste accumulation units or Subsection R315-262-17(a)(8)(iv) for drip pads and notify the Director following the procedures in Subsection R315-262-17(a)(8)(ii)(B) for the waste accumulation unit. If the waste accumulation unit is subsequently reopened, the generator may remove the notice from the operating record.

(ii) Notification for closure of the facility.

(A) Notify the Director using EPA form 8700-12 no later than 30 days prior to closing the facility.

(B) Notify the Director using EPA form 8700-12 within 90 days after closing the facility that it has complied with the closure performance standards of Subsection R315-262-17(a)(8)(iii) or (iv). If the facility cannot meet the closure performance standards of Subsection R315-262-17(a)(8)(iii) or (iv), notify the Director using EPA form 8700-12 that it will close as a landfill under 40 CFR 265.310, which is incorporated by reference in Section R315-265-1, in the case of a container, tank or containment building unit(s), or for a facility with drip pads, notify using EPA form 8700-12 that it will close under the standards of 40 CFR 265.445(b), which is incorporated by reference in Section R315-265-1.

(C) A large quantity generator may request additional time to clean close, but it shall notify the Director using EPA form 8700-12 within 75 days after the date provided in Subsection R315-262-17(a)(8)(ii)(A) to request an extension and provide an explanation as to why the additional time is required.

(iii) Closure performance standards for container, tank systems, and containment building waste accumulation units.

(A) At closure, the generator shall close the waste accumulation unit or facility in a manner that:

(I) Minimizes the need for further maintenance by controlling, minimizing, or eliminating, to the extent necessary to protect human health and the environment, the post-closure escape of hazardous waste, hazardous constituents, leachate, contaminated run-off, or hazardous waste decomposition products to the ground or surface waters or to the atmosphere,

(II) Removes or decontaminates all contaminated equipment, structures and soil and any remaining hazardous waste residues from waste accumulation units including containment system components (pads, liners, etc.), contaminated soils and subsoils, bases, and structures and equipment contaminated with waste, unless Subsection R315-261-3(d) applies.

(III) Any hazardous waste generated in the process of closing either the generator's facility or unit(s) accumulating hazardous waste shall be managed in accordance with all applicable standards of Rules R315-262, R315-263, R315-265 and R315-268, including removing any hazardous waste contained in these units within 90 days of generating it and managing these wastes in a hazardous waste permitted treatment, storage and disposal facility or interim status facility.

(IV) If the generator demonstrates that any contaminated soils and wastes cannot be practicably removed or decontaminated as required in Subsection R315-262-17(a)(8)(ii)(A)(II), then the waste accumulation unit is considered to be a landfill and the generator shall close the waste accumulation unit and perform post-closure care in accordance with the closure and post-closure care requirements that apply to landfills (40 CFR 265.310, which is incorporated by reference in Section R315-265-1). In addition, for the purposes of closure, post-closure, and financial responsibility, such a waste accumulation unit is then considered to be a landfill, and the generator shall meet all of the requirements for landfills specified in 40 CFR 265.110 through 265.121 and 265.140 through 265.148, which are incorporated by reference in Section R315-265-1.

(iv) Closure performance standards for drip pad waste accumulation units. At closure, the generator shall comply with the closure requirements of Subsections R315-262-17(a)(8)(ii) and (a)(8)(iii)(A)(I) and (III), and 40 CFR 265.445(a) and (b), which are incorporated by reference in Section R315-265-1.

(v) The closure requirements of Subsection R315-262-17(a)(8) do not apply to satellite accumulation areas.

(9) Land disposal restrictions. The large quantity generator complies with all applicable requirements under Rule R315-268.

(b) Accumulation time limit extension. A large quantity generator who accumulates hazardous waste for more than 90 days is subject to the requirements of Rules R315-124, R315-264 through R315-266, R315-268, and R315-270 and the notification requirements of section 3010 of RCRA, unless it has been granted an extension to the 90-day period. Such extension may be granted by the Director if hazardous wastes shall remain on site for longer than 90 days due to unforeseen, temporary, and uncontrollable circumstances. An extension of up to 30 days may be granted at the discretion of the Director on a case-by-case basis.

(c) Accumulation of F006. A large quantity generator who also generates wastewater treatment sludges from electroplating operations that meet the listing description for the EPA hazardous waste number F006, may accumulate F006 waste on site for more than 90 days, but not more than 180 days without being subject to Rules R315-124, R315-264 through R315-266 and R315-270, and the notification requirements of section 3010 of RCRA, provided that it complies with all of the following additional conditions for exemption:

(1) The large quantity generator has implemented pollution prevention practices that reduce the amount of any hazardous substances, pollutants, or contaminants entering F006 or otherwise released to the environment prior to its recycling;

(2) The F006 waste is legitimately recycled through metals recovery;

(3) No more than 20,000 kilograms of F006 waste is accumulated on site at any one time; and

(4) The F006 waste is managed in accordance with the following:

(i)(A) If the F006 waste is placed in containers, the large quantity generator shall comply with the applicable conditions for exemption in Subsection R315-262-17(a)(1); and/or

(B) If the F006 is placed in tanks, the large quantity generator shall comply with the applicable conditions for exemption of Subsection R315-262-17(a)(2); and/or

(C) If the F006 is placed in containment buildings, the large quantity generator shall comply with 40 CFR 265.1100 through 265.1102, which are incorporated by reference in Section R315-265-1, and has placed its professional engineer certification that the building complies with the design standards specified in 40 CFR 265.1101, which is incorporated by reference in Section R315-265-1, in the facility's files prior to operation of the unit. The large quantity generator shall maintain the following records:

(I) A written description of procedures to ensure that the F006 waste remains in the unit for no more than 180 days, a written description of the waste generation and management practices for the facility showing that they are consistent with the 180-day limit, and documentation that the large quantity generator is complying with the procedures; or

(II) Documentation that the unit is emptied at least once every 180 days.

(ii) The large quantity generator is exempt from all the requirements in 40 CFR 265.110 through 265.121 and 265.140 through 265.148, which are incorporated by reference in Section R315-265-1, except for those referenced in Subsection R315-

262-17(a)(8).

(iii) The date upon which each period of accumulation begins is clearly marked and shall be clearly visible for inspection on each container;

(iv) While being accumulated on site, each container and tank is labeled or marked clearly with:

(A) The words "Hazardous Waste"; and

(B) An indication of the hazards of the contents, examples include, but are not limited to:

(I) the applicable hazardous waste characteristic(s), i.e., ignitable, corrosive, reactive, toxic;

(II) hazard communication consistent with the Department of Transportation requirements at 49 CFR part 172 subpart E, labeling, or subpart F, placarding;

(III) a hazard statement or pictogram consistent with the Occupational Safety and Health Administration Hazard Communication Standard at 29 CFR 1910.1200; or

(IV) a chemical hazard label consistent with the National Fire Protection Association code 704.

(v) The large quantity generator complies with the requirements in Subsection R315-262-17(a)(6) and (7).

(d) F006 transported over 200 miles. A large quantity generator who also generates wastewater treatment sludges from electroplating operations that meet the listing description for the EPA hazardous waste number F006, and who shall transport this waste, or offer this waste for transportation, over a distance of 200 miles or more for off-site metals recovery, may accumulate F006 waste on site for more than 90 days, but not more than 270 days without being subject to Rules R315-124, R315-264 through R315-266, R315-270, and the notification requirements of section 3010 of RCRA, if the large quantity generator complies with all of the conditions for exemption of Subsections R315-262-17(c)(1) through (4).

(e) F006 accumulation time extension. A large quantity generator accumulating F006 in accordance with Subsections R315-262-17(c) and (d) who accumulates F006 waste on site for more than 180 days, or for more than 270 days if the generator shall transport this waste, or offer this waste for transportation, over a distance of 200 miles or more, or who accumulates more than 20,000 kilograms of F006 waste on site is an operator of a storage facility and is subject to the requirements of Rules R315-124, R315-264, R315-265, and R315-270, and the notification requirements of section 3010 of RCRA, unless the generator has been granted an extension to the 180-day, or 270-day if applicable, period or an exception to the 20,000 kilogram accumulation limit. Such extensions and exceptions may be granted by the Director if F006 waste shall remain on site for longer than 180 days (or 270 days if applicable) or if more than 20,000 kilograms of F006 waste shall remain on site due to unforeseen, temporary, and uncontrollable circumstances. An extension of up to 30 days or an exception to the accumulation limit may be granted at the discretion of the Director on a case-by-case basis.

(f) Consolidation of hazardous waste received from very small quantity generators. Large quantity generators may accumulate on site hazardous waste received from very small quantity generators under control of the same person, as defined in Section R315-260-10, without a storage permit or interim status and without complying with the requirements of Rules R315-124, R315-264 through R315-266, R315-268, and R315-270, and the notification requirements of section 3010 of RCRA, provided that they comply with the following conditions. "Control," for the purposes of this section, means the power to direct the policies of the generator, whether by the ownership of stock, voting rights, or otherwise, except that contractors who operate generator facilities on behalf of a different person shall not be deemed to "control" such generators.

(1) The large quantity generator notifies the Director at least thirty (30) days prior to receiving the first shipment from a very small quantity generator(s) using EPA Form 8700-12; and

(i) Identifies on the form the name(s) and site address(es) for the very small quantity generator(s) as well as the name and business telephone number for a contact person for the very small quantity generator(s); and

(ii) Submits an updated Site ID form (EPA Form 8700-12) within 30 days after a change in the name or site address for the very small quantity generator.

(2) The large quantity generator maintains records of shipments for three years from the date the hazardous waste was received from the very small quantity generator. These records shall identify the name, site address, and contact information for the very small quantity generator and include a description of the hazardous waste received, including the quantity and the date the waste was received.

(3) The large quantity generator complies with the independent requirements identified in Subsection R315-262-10(a)(1)(iii) and the conditions for exemption in Subsection R315-262-17(f) for all hazardous waste received from a very small quantity generator. For purposes of the labeling and marking regulations in Subsection R315-262-17(a)(5), the large quantity generator shall label the container or unit with the date accumulation started, i.e., the date the hazardous waste was received from the very small quantity generator. If the large quantity generator is consolidating incoming hazardous waste from a very small quantity generator with either its own hazardous waste or with hazardous waste from other very small quantity generators, the large quantity generator shall label each container or unit with the earliest date any hazardous waste in the container was accumulated on site.

(g) Rejected load. A large quantity generator who sends a shipment of hazardous waste to a designated facility with the understanding that the designated facility can accept and manage the waste and later receives that shipment back as a rejected load or residue in accordance with the manifest discrepancy provisions of Sections R315-264-72 or 40 CFR 265.72, which is incorporated by reference in Section R315-265-1, may accumulate the returned waste on site in accordance with Subsections R315-262-17(a) and (b). Upon receipt of the returned shipment, the generator shall:

(1) Sign Item 18c of the manifest, if the transporter returned the shipment using the original manifest; or

(2) Sign Item 20 of the manifest, if the transporter returned the shipment using a new manifest.

R315-262-18. General -- EPA Identification Numbers and Re-Notification for Small Quantity Generators and Large Quantity Generators.

(a) A generator shall not treat, store, dispose of, transport, or offer for transportation, hazardous waste without having received an EPA identification number from the Director.

(b) A generator who has not received an EPA identification number shall obtain one by applying to the Director using EPA Form 8700-12. Upon receiving the request the Director will assign an EPA identification number to the generator.

(c) A generator shall not offer its hazardous waste to transporters or to treatment, storage, or disposal facilities that have not received an EPA identification number.

(d) Re-notification.

(1) A small quantity generator shall re-notify the Director starting in 2021 and every four years thereafter using EPA Form 8700-12. This re-notification shall be submitted by September 1st of each year in which re-notifications are required.

(2) A large quantity generator shall re-notify the Director by March 1 of each even-numbered year thereafter using EPA Form 8700-12. A large quantity generator may submit this re-

notification as part of its Biennial Report required under Section R315-262-41.

(e) A recognized trader shall not arrange for import or export of hazardous waste without having received an EPA identification number from the Director.

R315-262-20. Manifest Requirements Applicable to Small and Large Quantity Generators -- General Requirements.

(a)(1) A generator who transports, or offers for transport a hazardous waste for offsite treatment, storage, or disposal, or a treatment, storage, and disposal facility who offers for transport a rejected hazardous waste load, shall prepare a Manifest (OMB Control number 2050-0039) on EPA Form 8700-22, and, if necessary, EPA Form 8700-22A, according to the instructions included in the appendix to Rule R315-262.

(2) Reserved.

(3) Electronic manifest. In lieu of using the manifest form specified in Subsection R315-262-20(a)(1), a person required to prepare a manifest under Subsection R315-262-20(a)(1) may prepare and use an electronic manifest, provided that the person:

(i) Complies with the requirements in Section R315-262-24 for use of electronic manifests, and

(ii) Complies with the requirements of 40 CFR 3.10 for the reporting of electronic documents to EPA.

(b) A generator shall designate on the manifest one facility which is permitted to handle the waste described on the manifest.

(c) A generator may also designate on the manifest one alternate facility which is permitted to handle his waste in the event an emergency prevents delivery of the waste to the primary designated facility.

(d) If the transporter is unable to deliver the hazardous waste to the designated facility or the alternate facility, the generator shall either designate another facility or instruct the transporter to return the waste.

(e) The requirements of Section R315-262-20 through 27 do not apply to hazardous waste produced by generators of greater than 100 kg but less than 1000 kg in a calendar month where:

(1) The waste is reclaimed under a contractual agreement pursuant to which:

(i) The type of waste and frequency of shipments are specified in the agreement;

(ii) The vehicle used to transport the waste to the recycling facility and to deliver regenerated material back to the generator is owned and operated by the reclaimer of the waste; and

(2) The generator maintains a copy of the reclamation agreement in his files for a period of at least three years after termination or expiration of the agreement.

(f) The requirements of Sections R315-262-20 through 27 and Subsection R315-262-32(b) do not apply to the transport of hazardous wastes on a public or private right-of-way within or along the border of contiguous property under the control of the same person, even if such contiguous property is divided by a public or private right-of-way. Notwithstanding Subsection R315-263-10(a), the generator or transporter shall comply with the requirements for transporters set forth in Sections R315-263-30 and 31 in the event of a discharge of hazardous waste on a public or private right-of-way.

R315-262-21. Manifest Requirements Applicable to Small and Large Quantity Generators -- Manifest Tracking Numbers, Manifest Printing, and Obtaining Manifests.

(a)(1) A registrant may not print, or have printed, the manifest for use of distribution unless it has received approval from the EPA Director of the Office of Resource Conservation and Recovery to do so under Subsection R315-262-21(c) and (e).

(2) The approved registrant is responsible for ensuring that the organizations identified in its application are in compliance with the procedures of its approved application and the requirements of Section R315-262-21. The registrant is responsible for assigning manifest tracking numbers to its manifests.

(b) A registrant shall submit an initial application to the EPA Director of the Office of Resource Conservation and Recovery that contains the following information:

(1) Name and mailing address of registrant;

(2) Name, telephone number and email address of contact person;

(3) Brief description of registrant's government or business activity;

(4) EPA identification number of the registrant, if applicable;

(5) Description of the scope of the operations that the registrant plans to undertake in printing, distributing, and using its manifests, including:

(i) A description of the printing operation. The description should include an explanation of whether the registrant intends to print its manifests in-house, i.e., using its own printing establishments, or through a separate, i.e., unaffiliated, printing company. If the registrant intends to use a separate printing company to print the manifest on its behalf, the application shall identify this printing company and discuss how the registrant will oversee the company. If this includes the use of intermediaries, e.g., prime and subcontractor relationships, the role of each shall be discussed. The application shall provide the name and mailing address of each company. It also shall provide the name and telephone number of the contact person at each company.

(ii) A description of how the registrant will ensure that its organization and unaffiliated companies, if any, comply with the requirements of Section R315-262-21. The application shall discuss how the registrant will ensure that a unique manifest tracking number will be pre-printed on each manifest. The application shall describe the internal control procedures to be followed by the registrant and unaffiliated companies to ensure that numbers are tightly controlled and remain unique. In particular, the application shall describe how the registrant will assign manifest tracking numbers to its manifests. If computer systems or other infrastructure will be used to maintain, track, or assign numbers, these should be indicated. The application shall also indicate how the printer will pre-print a unique number on each form, e.g., crash or press numbering. The application also shall explain the other quality procedures to be followed by each establishment and printing company to ensure that all required print specifications are consistently achieved and that printing violations are identified and corrected at the earliest practicable time.

(iii) An indication of whether the registrant intends to use the manifests for its own business operations or to distribute the manifests to a separate company or to the general public, e.g., for purchase.

(6) A brief description of the qualifications of the company that will print the manifest. The registrant may use readily available information to do so, e.g., corporate brochures, product samples, customer references, documentation of ISO certification, so long as such information pertains to the establishments or company being proposed to print the manifest.

(7) Proposed unique three-letter manifest tracking number suffix. If the registrant is approved to print the manifest, the registrant shall use this suffix to pre-print a unique manifest tracking number on each manifest.

(8) A signed certification by a duly authorized employee of the registrant that the organizations and companies in its application will comply with the procedures of its approved application and the requirements of Section R315-262-21 and that it will notify the EPA Director of the Office of Resource

Conservation and Recovery of any duplicated manifest tracking numbers on manifests that have been used or distributed to other parties as soon as this becomes known.

(c) EPA shall review the application submitted under Subsection R315-262-21(b) and either approve it or request additional information or modification before approving it.

(d)(1) Upon EPA approval of the application under Subsection R315-262-21(c), EPA shall provide the registrant an electronic file of the manifest, continuation sheet, and manifest instructions and ask the registrant to submit three fully assembled manifests and continuation sheet samples, except as noted in Subsection R315-262-21(d)(3). The registrant's samples shall meet all of the specifications in Subsection R315-262-21(f) and be printed by the company that will print the manifest as identified in the application approved under Subsection R315-262-21(c).

(2) The registrant shall submit a description of the manifest samples as follows:

(i) Paper type, i.e., manufacturer and grade of the manifest paper;

(ii) Paper weight of each copy;

(iii) Ink color of the manifest's instructions. If screening of the ink was used, the registrant shall indicate the extent of the screening; and

(iv) Method of binding the copies.

(3) The registrant need not submit samples of the continuation sheet if it will print its continuation sheet using the same paper type, paper weight of each copy, ink color of the instructions, and binding method as its manifest form samples.

(e) EPA shall evaluate the forms and either approve the registrant to print them as proposed or request additional information or modification to them before approval. EPA shall notify the registrant of its decision by mail. The registrant cannot use or distribute its forms until EPA approves them. An approved registrant shall print the manifest and continuation sheet according to its application approved under Subsection R315-262-21(c) and the manifest specifications in Subsection R315-262-21(f). It also shall print the forms according to the paper type, paper weight, ink color of the manifest instructions and binding method of its approved forms.

(f) Paper manifests and continuation sheets shall be printed according to the following specifications:

(1) The manifest and continuation sheet shall be printed with the exact format and appearance as EPA Forms 8700-22 and 8700-22A, respectively. However, information required to complete the manifest may be pre-printed on the manifest form.

(2) A unique manifest tracking number assigned in accordance with a numbering system approved by EPA shall be pre-printed in Item 4 of the manifest. The tracking number shall consist of a unique three-letter suffix following nine digits.

(3) The manifest and continuation sheet shall be printed on 81/2 x 11-inch white paper, excluding common stubs, e.g., top- or side-bound stubs. The paper shall be durable enough to withstand normal use.

(4) The manifest and continuation sheet shall be printed in black ink that can be legibly photocopied, scanned, or faxed, except that the marginal words indicating copy distribution shall be printed with a distinct ink color or with another method; e.g., white text against black background in text box, or, black text against grey background in text box; that clearly distinguishes the copy distribution notations from the other text and data entries on the form.

(5) The manifest and continuation sheet shall be printed as six-copy forms. Copy-to-copy registration shall be exact within 1/32 nd of an inch. Handwritten and typed impressions on the form shall be legible on all six copies. Copies shall be bound together by one or more common stubs that reasonably ensure that they will not become detached inadvertently during normal use.

(6) Each copy of the manifest and continuation sheet shall indicate how the copy shall be distributed, as follows:

(i) Page 1, top copy: "Designated facility to destination State, if required".

(ii) Page 2: "Designated facility to generator State, if required".

(iii) Page 3: "Designated facility to generator".

(iv) Page 4: "Designated facility's copy".

(v) Page 5: "Transporter's copy".

(vi) Page 6 (bottom copy): "Generator's initial copy".

(7) The instructions in the appendix to Rule R315-262 shall appear legibly on the back of the copies of the manifest and continuation sheet as provided in Subsection R315-262-21(f). The instructions shall not be visible through the front of the copies when photocopied or faxed.

(i) Manifest EPA Form 8700-22.

(A) The "Instructions for Generators" on Copy 6;

(B) The "Instructions for International Shipment Block" and "Instructions for Transporters" on Copy 5; and

(C) The "Instructions for Treatment, Storage, and Disposal Facilities" on Copy 4.

(ii) Manifest EPA Form 8700-22A.

(A) The "Instructions for Generators" on Copy 6;

(B) The "Instructions for Transporters" on Copy 5; and

(C) The "Instructions for Treatment, Storage, and Disposal Facilities" on Copy 4.

(g)(1) A generator may use manifests printed by any source so long as the source of the printed form has received approval from EPA to print the manifest under Subsections R315-262-21(c) and (e). A registered source may be a:

(i) State agency;

(ii) Commercial printer;

(iii) Hazardous waste generator, transporter or TSDF; or

(iv) Hazardous waste broker or other preparer who prepares or arranges shipments of hazardous waste for transportation.

(2) A generator shall determine whether the generator state or the consignment state for a shipment regulates any additional wastes, beyond those regulated Federally, as hazardous wastes under these states' authorized programs. Generators also shall determine whether the consignment state or generator state requires the generator to submit any copies of the manifest to these states. In cases where the generator shall supply copies to either the generator's state or the consignment state, the generator is responsible for supplying legible photocopies of the manifest to these states.

(h)(1) If an approved registrant would like to update any of the information provided in its application approved under Subsection R315-262-21(c), e.g., to update a company phone number or name of contact person, the registrant shall revise the application and submit it to the EPA Director of the Office of Resource Conservation and Recovery, along with an indication or explanation of the update, as soon as practicable after the change occurs. The Agency either shall approve or deny the revision. If the Agency denies the revision, it shall explain the reasons for the denial, and it shall contact the registrant and request further modification before approval.

(2) If the registrant would like a new tracking number suffix, the registrant shall submit a proposed suffix to the EPA Director of the Office of Resource Conservation and Recovery, along with the reason for requesting it. The Agency shall either approve the suffix or deny the suffix and provide an explanation why it is not acceptable.

(3) If a registrant would like to change the paper type, paper weight, ink color of the manifest instructions, or binding method of its manifest or continuation sheet subsequent to approval under Subsection R315-262-21(e), then the registrant shall submit three samples of the revised form for EPA review and approval. If the approved registrant would like to use a new

printer, the registrant shall submit three manifest samples printed by the new printer, along with a brief description of the printer's qualifications to print the manifest. EPA shall evaluate the manifests and either approve the registrant to print the forms as proposed or request additional information or modification to them before approval. EPA shall notify the registrant of its decision by mail. The registrant cannot use or distribute its revised forms until EPA approves them.

(i) If, subsequent to its approval under Subsection R315-262-21(e), a registrant typesets its manifest or continuation sheet instead of using the electronic file of the forms provided by EPA, it shall submit three samples of the manifest or continuation sheet to the registry for approval. EPA shall evaluate the manifests or continuation sheets and either approve the registrant to print them as proposed or request additional information or modification to them before approval. EPA shall notify the registrant of its decision by mail. The registrant cannot use or distribute its typeset forms until EPA approves them.

(j) EPA may exempt a registrant from the requirement to submit form samples under Subsection R315-262-21(d) or (h)(3) if the Agency is persuaded that a separate review of the registrant's forms would serve little purpose in informing an approval decision; e.g., a registrant certifies that it will print the manifest using the same paper type, paper weight, ink color of the instructions and binding method of the form samples approved for some other registrant. A registrant may request an exemption from EPA by indicating why an exemption is warranted.

(k) An approved registrant shall notify EPA by phone or email as soon as it becomes aware that it has duplicated tracking numbers on any manifests that have been used or distributed to other parties.

(l) If, subsequent to approval of a registrant under Subsection R315-262-21(e), EPA becomes aware that the approved paper type, paper weight, ink color of the instructions, or binding method of the registrant's form is unsatisfactory, EPA shall contact the registrant and require modifications to the form.

(m)(1) EPA may suspend and, if necessary, revoke printing privileges if we find that the registrant:

(i) Has used or distributed forms that deviate from its approved form samples in regard to paper weight, paper type, ink color of the instructions, or binding method; or

(ii) Exhibits a continuing pattern of behavior in using or distributing manifests that contain duplicate manifest tracking numbers.

(2) EPA shall send a warning letter to the registrant that specifies the date by which it shall come into compliance with the requirements. If the registrant does not come in compliance by the specified date, EPA shall send a second letter notifying the registrant that EPA has suspended or revoked its printing privileges. An approved registrant shall provide information on its printing activities to EPA if requested.

R315-262-22. Manifest Requirements Applicable to Small and Large Quantity Generators -- Number of Copies.

The manifest consists of at least the number of copies which will provide the generator, each transporter, and the owner or operator of the designated facility with one copy each for their records and another copy to be returned to the generator.

R315-262-23. Manifest Requirements Applicable to Small and Large Quantity Generators -- Use of the Manifest.

(a) The generator shall:

(1) Sign the manifest certification by hand; and

(2) Obtain the handwritten signature of the initial transporter and date of acceptance on the manifest; and

(3) Retain one copy, in accordance with Subsection R315-262-40(a).

(b) The generator shall give the transporter the remaining copies of the manifest.

(c) For shipments of hazardous waste within Utah solely by water, bulk shipments only, the generator shall send three copies of the manifest dated and signed in accordance with Section R315-262-23 to the owner or operator of the designated facility or the last water, bulk shipment, transporter to handle the waste in the United States if exported by water. Copies of the manifest are not required for each transporter.

(d) For rail shipments of hazardous waste within Utah which originate at the site of generation, the generator shall send at least three copies of the manifest dated and signed in accordance with Section R315-262-23 to:

(1) The next non-rail transporter, if any; or

(2) The designated facility if transported solely by rail; or

(3) The last rail transporter to handle the waste in the United States if exported by rail.

(e) For shipments of hazardous waste to a designated facility in an authorized State which has not yet obtained federal authorization to regulate that particular waste as hazardous, the generator shall assure that the designated facility agrees to sign and return the manifest to the generator, and that any out-of-state transporter signs and forwards the manifest to the designated facility.

Note: See Subsections R315-263-20(e) and (f) for special provisions for rail or water, bulk shipment, transporters.

(f) For rejected shipments of hazardous waste or container residues contained in non-empty containers that are returned to the generator by the designated facility, following the procedures of Subsections R315-264-72(f) or 40 CFR 265.72(f), which is adopted by reference in Section R315-265-1; the generator shall:

(1) Sign either:

(i) Item 20 of the new manifest if a new manifest is used for the returned shipment; or

(ii) Item 18c of the original manifest if the original manifest is used for the returned shipment;

(2) Provide the transporter a copy of the manifest;

(3) Within 30 days of delivery of the rejected shipment or container residues contained in non-empty containers, send a copy of the manifest to the designated facility that returned the shipment to the generator; and

(4) Retain at the generator's site a copy of each manifest for at least three years from the date of delivery.

R315-262-24. Manifest Requirements Applicable to Small and Large Quantity Generators -- Use of the Electronic Manifest.

(a) Legal equivalence to paper manifests. Electronic manifests that are obtained, completed, and transmitted in accordance with Subsection R315-262-20(a)(3), and used in accordance with Section R315-262-24 in lieu of EPA Forms 8700-22 and 8700-22A are the legal equivalent of paper manifest forms bearing handwritten signatures, and satisfy for all purposes any requirement in these regulations to obtain, complete, sign, provide, use, or retain a manifest.

(1) Any requirement in these regulations to sign a manifest or manifest certification by hand, or to obtain a handwritten signature, is satisfied by signing with or obtaining a valid and enforceable electronic signature within the meaning of Section R315-262-25.

(2) Any requirement in these regulations to give, provide, send, forward, or return to another person a copy of the manifest is satisfied when an electronic manifest is transmitted to the other person by submission to the system.

(3) Any requirement in these regulations for a generator to keep or retain a copy of each manifest is satisfied by retention

of a signed electronic manifest in the generator's account on the national e-Manifest system, provided that such copies are readily available for viewing and production if requested by any EPA or Utah inspector.

(4) No generator may be held liable for the inability to produce an electronic manifest for inspection under Section R315-262-24 if the generator can demonstrate that the inability to produce the electronic manifest is due exclusively to a technical difficulty with the electronic manifest system for which the generator bears no responsibility.

(b) A generator may participate in the electronic manifest system either by accessing the electronic manifest system from its own electronic equipment, or by accessing the electronic manifest system from portable equipment brought to the generator's site by the transporter who accepts the hazardous waste shipment from the generator for off-site transportation.

(c) Restriction on use of electronic manifests. A generator may prepare an electronic manifest for the tracking of hazardous waste shipments involving any RCRA hazardous waste only if it is known at the time the manifest is originated that all waste handlers named on the manifest participate in the electronic manifest system.

(d) Requirement for one printed copy. To the extent the Hazardous Materials regulation on shipping papers for carriage by public highway requires shippers of hazardous materials to supply a paper document for compliance with 49 CFR 177.817, a generator originating an electronic manifest shall also provide the initial transporter with one printed copy of the electronic manifest.

(e) Special procedures when electronic manifest is unavailable. If a generator has prepared an electronic manifest for a hazardous waste shipment, but the electronic manifest system becomes unavailable for any reason prior to the time that the initial transporter has signed electronically to acknowledge the receipt of the hazardous waste from the generator, then the generator shall obtain and complete a paper manifest and if necessary, a continuation sheet (EPA Forms 8700-22 and 8700-22A) in accordance with the manifest instructions in the appendix to Rule R315-262, and use these paper forms from this point forward in accordance with the requirements of Section R315-262-23.

(f) Special procedures for electronic signature methods undergoing tests. If a generator has prepared an electronic manifest for a hazardous waste shipment, and signs this manifest electronically using an electronic signature method which is undergoing pilot or demonstration tests aimed at demonstrating the practicality or legal dependability of the signature method, then the generator shall also sign with an ink signature the generator/offeror certification on the printed copy of the manifest provided under Subsection R315-262-24(d).

(g) Imposition of user fee. A generator who is a user of the electronic manifest may be assessed a user fee by EPA for the origination of each electronic manifest. EPA shall maintain and update from time-to-time the current schedule of electronic manifest user fees, which shall be determined based on current and projected system costs and level of use of the electronic manifest system. The current schedule of electronic manifest user fees shall be published as an appendix to Rule R315-262.

R315-262-25. Manifest Requirements Applicable to Small and Large Quantity Generators -- Electronic Manifest Signatures.

Electronic signature methods for the e-Manifest system shall:

(a) Be a legally valid and enforceable signature under applicable EPA and other Federal requirements pertaining to electronic signatures; and

(b) Be a method that is designed and implemented in a manner that EPA considers to be as cost-effective and practical as possible for the users of the manifest.

R315-262-27. Manifest Requirements Applicable to Small and Large Quantity Generators -- Waste Minimization Certification.

A generator who initiates a shipment of hazardous waste shall certify to one of the following statements in Item 15 of the uniform hazardous waste manifest:

(a) "I am a large quantity generator. I have a program in place to reduce the volume and toxicity of waste generated to the degree I have determined to be economically practicable and I have selected the practicable method of treatment, storage, or disposal currently available to me which minimizes the present and future threat to human health and the environment;" or

(b) "I am a small quantity generator. I have made a good faith effort to minimize my waste generation and select the best waste management method that is available to me and that I can afford."

R315-262-30. Pre-Transport Requirements Applicable to Small and Large Quantity Generators -- Packaging.

Before transporting hazardous waste or offering hazardous waste for transportation off-site, a generator shall package the waste in accordance with the applicable Department of Transportation regulations on packaging under 49 CFR parts 173, 178, and 179.

R315-262-31. Pre-Transport Requirements Applicable to Small and Large Quantity Generators -- Labeling.

Before transporting or offering hazardous waste for transportation off-site, a generator shall label each package in accordance with the applicable Department of Transportation regulations on hazardous materials under 49 CFR part 172.

R315-262-32. Pre-Transport Requirements Applicable to Small and Large Quantity Generators -- Marking.

(a) Before transporting or offering hazardous waste for transportation off-site, a generator shall mark each package of hazardous waste in accordance with the applicable Department of Transportation regulations on hazardous materials under 49 CFR part 172;

(b) Before transporting hazardous waste or offering hazardous waste for transportation off site, a generator shall mark each container of 119 gallons or less used in such transportation with the following words and information in accordance with the requirements of 49 CFR 172.304:

(1) HAZARDOUS WASTE-Federal Law Prohibits Improper Disposal. If found, contact the nearest police or public safety authority or the U.S. Environmental Protection Agency.

(2) Generator's Name and Address ____.

(3) Generator's EPA Identification Number ____.

(4) Manifest Tracking Number ____.

(5) EPA Hazardous Waste Number(s) ____.

(c) A generator may use a nationally recognized electronic system, such as bar coding, to identify the EPA Hazardous Waste Number(s), as required by Subsection R315-262-32(b)(5) or paragraph (d).

(d) Lab packs that will be incinerated in compliance with Subsection R315-268-42(c) are not required to be marked with EPA Hazardous Waste Number(s), except D004, D005, D006, D007, D008, D010, and D011, where applicable.

R315-262-33. Pre-Transport Requirements Applicable to Small and Large Quantity Generators -- Placarding.

Before transporting hazardous waste or offering hazardous waste for transportation off-site, a generator shall placard or offer the initial transporter the appropriate placards according to Department of Transportation regulations for hazardous

materials under 49 CFR part 172, subpart F.

R315-262-35. Pre-Transport Requirements Applicable to Small and Large Quantity Generators -- Liquids in Landfills Prohibition.

The placement of bulk or non-containerized liquid hazardous waste or hazardous waste containing free liquids (whether or not sorbents have been added) in any landfill is prohibited. Prior to disposal in a hazardous waste landfill, liquids shall meet additional requirements as specified in Sections R315-264-314 and 40 CFR 265.314, which is incorporated by reference in Section R315-265-1.

R315-262-40. Recordkeeping and Reporting Applicable to Small and Large Quantity Generators -- Recordkeeping.

(a) A generator shall keep a copy of each manifest signed in accordance with Subsection R315-262-23(a) for three years or until he receives a signed copy from the designated facility which received the waste. This signed copy shall be retained as a record for at least three years from the date the waste was accepted by the initial transporter.

(b) A generator shall keep a copy of each Biennial Report and Exception Report for a period of at least three years from the due date of the report.

(c) A generator shall follow Subsection R315-262-11(f) for recordkeeping requirements for documenting hazardous waste determinations.

(d) The periods or retention referred to in Section R315-262-40 are extended automatically during the course of any unresolved enforcement action regarding the regulated activity or as requested by the Director.

(e) Records maintained in accordance with Section R315-262-40 and any other records which the Director deems necessary to determine quantities and disposition of hazardous waste or other determinations, test results, or waste analyses made in accordance with R315-262-11 shall be available for inspection by any duly authorized officer, employee or representative of the Department or the Director as provided in R315-260-5 for a period of at least three years from the date the waste was last sent to on-site or off-site treatment, storage, or disposal facilities.

R315-262-41. Recordkeeping and Reporting Applicable to Small and Large Quantity Generators -- Biennial Report for Large Quantity Generators.

(a) A generator who is a large quantity generator for at least one month of an odd-numbered year, reporting year, who ships any hazardous waste off-site to a treatment, storage or disposal facility within the United States shall complete and submit EPA Form 8700-13 A/B to the Director by March 1 of the following even-numbered year and shall cover generator activities during the previous year.

(b) Any generator who is a large quantity generator for at least one month of an odd-numbered year (reporting year) who treats, stores, or disposes of hazardous waste on site shall complete and submit EPA Form 8700-13 A/B to the Director by March 1 of the following even-numbered year covering those wastes in accordance with the provisions of Rules R315-264, R315-265, R315-266, and R315-270. This requirement also applies to large quantity generators that receive hazardous waste from very small quantity generators pursuant to Subsection R315-262-17(f).

(c) Exports of hazardous waste to foreign countries are not required to be reported on the Biennial Report form. A separate annual report requirement is set forth at Subsection R315-262-83(g) for hazardous waste exporters.

R315-262-42. Recordkeeping and Reporting Applicable to Small and Large Quantity Generators -- Exception Reporting.

(a)(1) A generator of 1,000 kilograms or greater of hazardous waste in a calendar month, or greater than 1 kg of acute hazardous waste listed in Section R315-261-31 or Subsection R315-261-33(e) in a calendar month, who does not receive a copy of the manifest with the handwritten signature of the owner or operator of the designated facility within 35 days of the date the waste was accepted by the initial transporter shall contact the transporter and/or the owner or operator of the designated facility to determine the status of the hazardous waste.

(2) A generator of 1,000 kilograms or greater of hazardous waste in a calendar month, or greater than 1 kg of acute hazardous waste listed in Section R315-261-31 or Subsection R315-261-33(e) in a calendar month, shall submit an Exception Report to the Director if he has not received a copy of the manifest with the handwritten signature of the owner or operator of the designated facility within 45 days of the date the waste was accepted by the initial transporter. The Exception Report shall include:

(i) A legible copy of the manifest for which the generator does not have confirmation of delivery;

(ii) A cover letter signed by the generator or his authorized representative explaining the efforts taken to locate the hazardous waste and the results of those efforts.

(b) A generator of greater than 100 kilograms but less than 1000 kilograms of hazardous waste in a calendar month who does not receive a copy of the manifest with the handwritten signature of the owner or operator of the designated facility within 60 days of the date the waste was accepted by the initial transporter shall submit a legible copy of the manifest, with some indication that the generator has not received confirmation of delivery, to the Director.

Note: The submission to the Director need only be a handwritten or typed note on the manifest itself, or on an attached sheet of paper, stating that the return copy was not received.

(c) For rejected shipments of hazardous waste or container residues contained in non-empty containers that are forwarded to an alternate facility by a designated facility using a new manifest, following the procedures of Subsections R315-264-72(e)(1) through (6) or 40 CFR 265.72(e)(1) through (6), which are adopted by reference; the generator shall comply with the requirements of Subsections R315-262-42(a) or (b), as applicable, for the shipment forwarding the material from the designated facility to the alternate facility instead of for the shipment from the generator to the designated facility. For purposes of Subsection R315-262-42(a) or (b) for a shipment forwarding such waste to an alternate facility by a designated facility:

(1) The copy of the manifest received by the generator shall have the handwritten signature of the owner or operator of the alternate facility in place of the signature of the owner or operator of the designated facility, and

(2) The 35/45/60-day timeframes begin the date the waste was accepted by the initial transporter forwarding the hazardous waste shipment from the designated facility to the alternate facility.

R315-262-43. Recordkeeping and Reporting Applicable to Small and Large Quantity Generators -- Additional Reporting.

The Director, as he deems necessary, may require generators to furnish additional reports concerning the quantities and disposition of wastes identified or listed in Rule R315-261.

R315-262-44. Recordkeeping and Reporting Applicable to Small and Large Quantity Generators -- Recordkeeping for

Small Quantity Generators.

A small quantity generator is subject only to the following independent requirements in Sections R315-262-40 through R315-262-43:

(a) Subsection R315-262-40(a), (c), and (d), recordkeeping;

(b) Subsection R315-262-42(b), exception reporting; and

(c) Section R315-262-43, additional reporting.

R315-262-70. Farmers.

A farmer disposing of waste pesticides from his own use which are hazardous wastes is not required to comply with the standards in Rule R315-262 or other standards in Rules R315-264, R315-265, R315-268, or R315-270 for those wastes provided he triple rinses each emptied pesticide container in accordance with Subsection R315-261-7(b)(3) and disposes of the pesticide residues on his own farm in a manner consistent with the disposal instructions on the pesticide label.

R315-262-80. Transboundary Movements of Hazardous Waste for Recovery or Disposal -- Applicability.

(a) The requirements of Sections R315-262-80 through 84 apply to transboundary movements of hazardous wastes.

(b) Any person, including exporter, importer, disposal facility operator, or recovery facility operator, who mixes two or more wastes, including hazardous and non-hazardous wastes, or otherwise subjects two or more wastes, including hazardous and nonhazardous wastes, to physical or chemical transformation operations, and thereby creates a new hazardous waste, becomes a generator and assumes all subsequent generator duties under RCRA and any exporter duties, if applicable, under Sections R315-262-80 through 84.

R315-262-81. Transboundary Movements of Hazardous Waste for Recovery or Disposal -- Definitions.

In addition to the definitions set forth at Section R315-260-10, the following definitions apply to Sections R315-262-80 through 84:

"Competent authority" means the regulatory authority or authorities of concerned countries having jurisdiction over transboundary movements of wastes.

"Countries concerned" means the countries of export or import and any countries of transit.

"Country of export" means any country from which a transboundary movement of hazardous wastes is planned to be initiated or is initiated.

"Country of import" means any country to which a transboundary movement of hazardous wastes is planned or takes place for the purpose of submitting the wastes to recovery or disposal operations therein.

"Country of transit" means any country other than the country of export or country of import across which a transboundary movement of hazardous wastes is planned or takes place.

"Disposal operations" means activities which do not lead to the possibility of resource recovery, recycling, reclamation, direct re-use or alternate uses, which include:

D1 Release or Deposit into or onto land, other than by any of operations D2 through D5 or D12.

D2 Land treatment, such as biodegradation of liquids or sludges in soils.

D3 Deep injection, such as injection into wells, salt domes or naturally occurring repositories.

D4 Surface impoundment, such as placing of liquids or sludges into pits, ponds or lagoons.

D5 Specially engineered landfill, such as placement into lined discrete cells which are capped and isolated from one another and the environment.

D6 Release into a water body other than a sea or ocean, and other than by operation D4.

D7 Release into a sea or ocean, including sea-bed insertion, other than by operation D4.

D8 Biological treatment not specified elsewhere in operations D1 through D12, which results in final compounds or mixtures which are discarded by means of any of operations D1 through D12.

D9 Physical or chemical treatment not specified elsewhere in operations D1 through D12, such as evaporation, drying, calcination, neutralization, or precipitation, which results in final compounds or mixtures which are discarded by means of any of operations D1 through D12.

D10 Incineration on land.

D11 Incineration at sea.

D12 Permanent storage.

D13 Blending or mixing, prior to any of operations D1 through D12.

D14 Repackaging, prior to any of operations D1 through D13.

D15 (or DC17 for transboundary movements with Canada only) Interim Storage, prior to any of operations D1 through D12.

DC15 Release, including the venting of compressed or liquified gases, or treatment, other than by any of operations D1 to D12 (for transboundary movements with Canada only).

DC16 Testing of a new technology to dispose of a hazardous waste (for transboundary movements with Canada only).

"EPA Acknowledgment of Consent" (AOC) means the letter EPA sends to the exporter documenting the specific terms of the country of import's consent and the country(ies) of transit's consent(s). The AOC meets the definition of an export license in U.S. Census Bureau regulations 15 CFR 30.1.

"Export" means the transportation of hazardous waste from a location under the jurisdiction of the United States to a location under the jurisdiction of another country, or a location not under the jurisdiction of any country, for the purposes of recovery or disposal operations therein.

"Exporter, also known as primary exporter on the RCRA hazardous waste manifest", means the person domiciled in the United States who is required to originate the movement document in accordance with Subsection R315-262-83(d) or the manifest for a shipment of hazardous waste in accordance with Sections R315-262-20 through 27, which specifies a foreign receiving facility as the facility to which the hazardous wastes will be sent, or any recognized trader who proposes export of the hazardous wastes for recovery or disposal operations in the country of import.

"Foreign exporter" means the person under the jurisdiction of the country of export who has, or will have at the time the planned transboundary movement commences, possession or other forms of legal control of the hazardous wastes and who proposes shipment of the hazardous wastes to the United States for recovery or disposal operations.

"Foreign importer" means the person to whom possession or other form of legal control of the hazardous waste is assigned at the time the exported hazardous waste is received in the country of import.

"Foreign receiving facility" means a facility which, under the importing country's applicable domestic law, is operating or is authorized to operate in the country of import to receive the hazardous wastes and to perform recovery or disposal operations on them.

"Import" means the transportation of hazardous waste from a location under the jurisdiction of another country to a location under the jurisdiction of the United States for the purposes of recovery or disposal operations therein.

"Importer" means the person to whom possession or other form of legal control of the hazardous waste is assigned at the

time the imported hazardous waste is received in the United States.

"OECD area" means all land or marine areas under the national jurisdiction of any OECD Member country. When the regulations refer to shipments to or from an OECD Member country, this means OECD area.

"OECD" means the Organization for Economic Cooperation and Development.

"OECD Member country" means the countries that are members of the OECD and participate in the Amended 2001 OECD Decision. (EPA provides a list of OECD Member countries at https://www.epa.gov/hwgenerators/international-agreementstransboundary- shipments-waste).

"Receiving facility" means a U.S. facility which, under RCRA and other applicable domestic laws, is operating or is authorized to operate to receive hazardous wastes and to perform recovery or disposal operations on them.

"Recovery operations" means activities leading to resource recovery, recycling, reclamation, direct re-use or alternative uses, which include:

R1 Use as a fuel (other than in direct incineration) or other means to generate energy.

R2 Solvent reclamation/ regeneration.

R3 Recycling/reclamation of organic substances which are not used as solvents.

R4 Recycling/reclamation of metals and metal compounds.

R5 Recycling/reclamation of other inorganic materials.

R6 Regeneration of acids or bases.

R7 Recovery of components used for pollution abatement.

R8 Recovery of components used from catalysts.

R9 Used oil re-refining or other reuses of previously used oil.

R10 Land treatment resulting in benefit to agriculture or ecological improvement.

R11 Uses of residual materials obtained from any of the operations numbered R1 through R10 or RC14 (for transboundary shipments with Canada only).

R12 Exchange of wastes for submission to any of the operations numbered R1 through R11 or RC14 (for transboundary shipments with Canada only).

R13 Accumulation of material intended for any operation numbered R1 through R12 or RC14 (for transboundary shipments with Canada only).

RC14 Recovery or regeneration of a substance or use or re-use of a recyclable material, other than by any of operations R1 to R10 (for transboundary shipments with Canada only).

RC15 Testing of a new technology to recycle a hazardous recyclable material (for transboundary shipments with Canada only).

RC16 Interim storage prior to any of operations R1 to R11 or RC14 (for transboundary shipments with Canada only).

"Transboundary movement" means any movement of hazardous wastes from an area under the national jurisdiction of one country to an area under the national jurisdiction of another country.

R315-262-82. Transboundary Movements of Hazardous Waste for Recovery or Disposal -- General Conditions.

(a) Scope. The level of control for exports and imports of waste is indicated by assignment of the waste to either a list of wastes subject to the Green control procedures or a list of wastes subject to the Amber control procedures and whether the waste is or is not hazardous waste. The OECD Green and Amber lists are incorporated by reference in Section R315-260-11.

(1) Green list wastes.

(i) Green wastes that are not hazardous wastes are subject to existing controls normally applied to commercial transactions, and are not subject to the requirements of Sections R315-262-80 through 84.

(ii) Green wastes that are hazardous wastes are subject to the requirements of Sections R315-262-80 through 84.

(2) Amber list wastes.

(i) Amber wastes that are hazardous wastes are subject to the requirements of Sections R315-262-80 through 84, even if they are imported to or exported from a country that does not consider the waste to be hazardous or control the transboundary shipment as a hazardous waste import or export.

(A) For exports, the exporter shall comply with Section R315-262-83.

(B) For imports, the recovery or disposal facility and the importer shall comply with Section R315-262-84.

(ii) Amber wastes that are not hazardous wastes, but are considered hazardous by the other country are subject to the Amber control procedures in the country that considers the waste hazardous, and are not subject to the requirements of Sections R315-262-80 through 84. All responsibilities of the importer or exporter shift to the foreign importer or foreign exporter in the other country that considers the waste hazardous unless the parties make other arrangements through contracts.

Note to Subsection R315-262-82(a)(2): Some Amber list wastes are not listed or otherwise identified as hazardous under RCRA, and therefore are not subject to the requirements of Sections R315-262-80 through 84. Regardless of the status of the waste under RCRA, however, other Federal environmental statutes, for example, the Toxic Substances Control Act, restrict certain waste imports or exports. Such restrictions continue to apply with regard to Sections R315-262-80 through 84.

(3) Mixtures of wastes.

(i) A Green waste that is mixed with one or more other Green wastes such that the resulting mixture is not hazardous waste is not subject to the requirements of Sections R315-262-80 through 84.

Note to Subsection R315-262-82(a)(3)(i): The regulated community should note that some countries may require, by domestic law, that mixtures of different Green wastes be subject to the Amber control procedures.

(ii) A Green waste that is mixed with one or more Amber wastes, in any amount, de minimis or otherwise, or a mixture of two or more Amber wastes, such that the resulting waste mixture is hazardous waste is subject to the requirements of Sections R315-262-80 through 84.

Note to Subsection R315-262-82(a)(3)(ii): The regulated community should note that some countries may require, by domestic law, that a mixture of a Green waste and more than a de minimis amount of an Amber waste or a mixture of two or more Amber wastes be subject to the Amber control procedures.

(4) Wastes not yet assigned to an OECD waste list are eligible for transboundary movements, as follows:

(i) If such wastes are hazardous wastes, such wastes are subject to the requirements of Sections R315-262-80 through 84.

(ii) If such wastes are not hazardous wastes, such wastes are not subject to the requirements of Sections R315-262-80 through 84.

(b) General conditions applicable to transboundary movements of hazardous waste.

(1) The hazardous waste shall be destined for recovery or disposal operations at a facility that, under applicable domestic law, is operating or is authorized to operate in the country of import;

(2) The transboundary movement shall be in compliance with applicable international transport agreements; and Note to Subsection R315-262-82(b)(2): These international agreements include, but are not limited to, the Chicago Convention (1944), ADR (1957), ADNR (1970), MARPOL Convention (1973/1978), SOLAS Convention (1974), IMDG Code (1985), COTIF (1985), and RID (1985).

(3) Any transit of hazardous waste through one or more

countries shall be conducted in compliance with all applicable international and national laws and regulations.

(c) Duty to return wastes subject to the Amber control procedures during transit through the United States. When a transboundary movement of hazardous wastes transiting the United States and subject to the Amber control procedures does not comply with the requirements of the notification and movement documents or otherwise constitutes illegal shipment, and if alternative arrangements cannot be made to recover or dispose of these wastes in an environmentally sound manner, the waste shall be returned to the country of export. The U.S. transporter shall inform EPA at the specified mailing address in Subsection R315-262-82(e) of the need to return the shipment. EPA will then inform the competent authority of the country of export, citing the reason(s) for returning the waste. The U.S. transporter shall complete the return within ninety (90) days from the time EPA informs the country of export of the need to return the waste, unless informed in writing by EPA of another timeframe agreed to by the concerned countries.

(d) Laboratory analysis exemption. Export or import of a hazardous waste sample is exempt from the requirements of Sections R315-262-80 through 84 if the sample is destined for laboratory analysis to assess its physical or chemical characteristics, or to determine its suitability for recovery or disposal operations, does not exceed twenty-five kilograms (25 kg) in quantity, is appropriately packaged and labeled, and complies with the conditions of Subsection R315-261-4(d) or (e).

(e) EPA Address for submittals by postal mail or hand delivery. Submittals required in Sections R315-262-80 through 84 to be made by postal mail or hand delivery should be sent to the following addresses:

(1) For postal mail delivery, the Office of Enforcement and Compliance Assurance, Office of Federal Activities, International Compliance Assurance Division (2254A), Environmental Protection Agency, 1200 Pennsylvania Avenue NW., Washington, DC 20460.

(2) For hand-delivery, the Office of Enforcement and Compliance Assurance, Office of Federal Activities, International Compliance Assurance Division, Environmental Protection Agency, William Jefferson Clinton South Bldg., Room 6144, 12th St. and Pennsylvania Ave., NW., Washington, DC 20004.

R315-262-83. Transboundary Movements of Hazardous Waste for Recovery or Disposal -- Exports of Hazardous Waste.

(a) General export requirements. Except as provided in Subsections R315-262-83(a)(5) and (6), exporters that have received an AOC from EPA before December 31, 2016 are subject to that approval and the requirements listed in the AOC that existed at the time of that approval until such time the approval period expires. All other exports of hazardous waste are prohibited unless:

(1) The exporter complies with the contract requirements in Subsection R315-262-83(f);

(2) The exporter complies with the notification requirements in Subsection R315-262-83(b);

(3) The exporter receives an AOC from EPA documenting consent from the countries of import and transit, and original country of export if exporting previously imported hazardous waste;

(4) The exporter ensures compliance with the movement documents requirements in Subsection R315-262-83(d);

(5) The exporter ensures compliance with the manifest instructions for export shipments in Subsection R315-262-83(c); and

(6) The exporter or a U.S. authorized agent:

(i) For shipments initiated prior to the AES filing compliance date, does one of the following:

(A) Submits Electronic Export Information (EEI) for each shipment to the Automated Export System (AES) or its successor system, under the International Trade Data System (ITDS) platform, in accordance with 15 CFR 30.4(b), and includes the following items in the EEI, along with the other information required under 15 CFR 30.6:

(I) EPA license code;

(II) Commodity classification code for each hazardous waste per 15 CFR 30.6(a)(12);

(III) EPA consent number for each hazardous waste;

(IV) Country of ultimate destination code per 15 CFR 30.6(a)(5);

(V) Date of export per 15 CFR 30.6(a)(2);

(VI) RCRA hazardous waste manifest tracking number, if required;

(VII) Quantity of each hazardous waste in shipment and units for reported quantity, if required reporting units established by value for the reported commodity classification number are in units of weight or volume per 15 CFR 30.6(a)(15); or

(VIII) EPA net quantity for each hazardous waste reported in units of kilograms if solid or in units of liters if liquid, if required reporting units established by value for the reported commodity classification number are not in units of weight or volume.

(B) Complies with a paper-based process by:

(I) Attaching paper documentation of consent, for example, a copy of the EPA Acknowledgment of Consent, international movement document, to the manifest, or shipping papers if a manifest is not required, which shall accompany the hazardous waste shipment. For exports by rail or water, bulk shipment, the primary exporter shall provide the transporter with the paper documentation of onsent which shall accompany the hazardous waste but which need not be attached to the manifest except that for exports by water, bulk shipment, the primary exporter shall attach the paper documentation of consent to the shipping paper.

(II) Providing the transporter with an additional copy of the manifest, and instructing the transporter via mail, email or fax to deliver that copy to the U.S. Customs official at the point the hazardous waste leaves the United States in accordance with Subsection R315-263-20(g)(4)(ii);

(ii) For shipments initiated on or after the AES filing compliance date, submits Electronic Export Information (EEI) for each shipment to the Automated Export System (AES) or its successor system, under the International Trade Data System (ITDS) platform, in accordance with 15 CFR 30.4(b), and includes the following items in the EEI, along with the other information required under 15 CFR 30.6:

(A) EPA license code;

(B) Commodity classification code for each hazardous waste per 15 CFR 30.6(a)(12);

(C) EPA consent number for each hazardous waste;

(D) Country of ultimate destination code per 15 CFR 30.6(a)(5);

(E) Date of export per 15 CFR 30.6(a)(2);

(F) RCRA hazardous waste manifest tracking number, if required;

(G) Quantity of each hazardous waste in shipment and units for reported quantity, if required reporting units established by value for the reported commodity classification number are in units of weight or volume per 15 CFR 30.6(a)(15); or

(H) EPA net quantity for each hazardous waste reported in units of kilograms if solid or in units of liters if liquid, if required reporting units established by value for the reported commodity classification number are not in units of weight or volume.

(b) Notifications.

(1) General notifications. At least sixty (60) days before the first shipment of hazardous waste is expected to leave the United States, the exporter shall provide notification in English to EPA of the proposed transboundary movement. Notifications shall be submitted electronically using EPA's Waste Import Export Tracking System (WIETS), or its successor system. The notification may cover up to one year of shipments of one or more hazardous wastes being sent to the same recovery or disposal facility, and shall include all of the following information:

(i) Exporter name and EPA identification number, address, telephone, fax numbers, and email address;

(ii) Foreign receiving facility name, address, telephone, fax numbers, email address, technologies employed, and the applicable recovery or disposal operations as defined in Section R315-262-81;

(iii) Foreign importer name (if not the owner or operator of the foreign receiving facility), address, telephone, fax numbers, and email address;

(iv) Intended transporter(s), their agent(s), or both; address, telephone, fax, and email address;

(v) "U.S." as the country of export name, "USA01" as the relevant competent authority code, and the intended U.S. port(s) of exit;

(vi) The ISO standard 3166 country name 2-digit code, OECD/Basel competent authority code, and the ports of entry and exit for each country of transit;

(vii) The ISO standard 3166 country name 2-digit code, OECD/Basel competent authority code, and port of entry for the country of import;

(viii) Statement of whether the notification covers a single shipment or multiple shipments;

(ix) Start and End Dates requested for transboundary movements;

(x) Means of transport planned to be used;

(xi) Description(s) of each hazardous waste, including whether each hazardous waste is regulated universal waste under Rule R315-273, spent lead-acid batteries being exported for recovery of lead under Sections R315-266-80, or industrial ethyl alcohol being exported for reclamation under Subsection R315-261-6(a)(3)(i), estimated total quantity of each waste in either metric tons or cubic meters, the applicable RCRA waste code(s) for each hazardous waste, the applicable OECD waste code from the lists incorporated by reference in Section R315-260-11, and the United Nations/U.S. Department of Transportation (DOT) ID number for each waste;

(xii) Specification of the recovery or disposal operation(s) as defined in Section R315-262-81.

(xiii) Certification/Declaration signed by the exporter that states: I certify that the above information is complete and correct to the best of my knowledge. I also certify that legally enforceable written contractual obligations have been entered into and that any applicable insurance or other financial guarantee is or shall be in force covering the transboundary movement. Name: Signature: Date:

(2) Exports to pre-consented recovery facilities in OECD Member countries. If the recovery facility is located in an OECD member country and has been pre-consented by the competent authority of the OECD member country to recover the waste sent by exporters located in other OECD member countries, the notification may cover up to three years of shipments. Notifications proposing export to a pre-consented facility in an OECD member country shall include all information listed in Subsections R315-262-83(b)(1)(i) through (b)(1)(xiii) and additionally state that the facility is pre-consented. Exporters shall submit the notification to EPA using the allowable methods listed in Subsection R315-262-83(b)(1) at least ten days before the first shipment is expected to leave the United States.

(3) Notifications listing interim recycling operations or interim disposal operations. If the foreign receiving facility listed in Subsection R315-262-83(b)(1)(ii) will engage in any of the interim recovery operations R12 or R13 or interim disposal operations D13 through D15, or in the case of transboundary movements with Canada, any of the interim recovery operations R12, R13, or RC16, or interim disposal operations D13 to D14, or DC17, the notification submitted according to Subsection R315-262-83(b)(1) shall also include the final foreign recovery or disposal facility name, address, telephone, fax numbers, email address, technologies employed, and which of the applicable recovery or disposal operations R1 through R11 and D1 through D12, or in the case of transboundary movements with Canada, which of the applicable recovery or disposal operations R1 through R11, RC14 to RC15, D1 through D12, and DC15 to DC16 will be employed at the final foreign recovery or disposal facility. The recovery and disposal operations in Subsection R315-262-83(b) are defined in Section R315-262-81.

(4) Renotifications. When the exporter wishes to change any of the information specified on the original notification (including increasing the estimate of the total quantity of hazardous waste specified in the original notification or adding transporters), the exporter shall submit a renotification of the changes to EPA using the allowable methods in Subsection R315-262-83(b)(1). Any shipment using the requested changes cannot take place until the countries of import and transit consent to the changes and the exporter receives an EPA AOC letter documenting the countries' consents to the changes.

(5) For cases where the proposed country of import and recovery or disposal operations are not covered under an international agreement to which both the United States and the country of import are parties, EPA will coordinate with the Department of State to provide the complete notification to country of import and any countries of transit. In all other cases, EPA will provide the notification directly to the country of import and any countries of transit. A notification is complete when EPA receives a notification which EPA determines satisfies the requirements of Subsections R315-262-83(b)(1)(i) through (b)(1)(xiii).

(6) Where the countries of import and transit consent to the proposed transboundary movement(s) of the hazardous waste(s), EPA will forward an EPA AOC letter to the exporter documenting the countries' consents. Where any of the countries of import and transit objects to the proposed transboundary movement(s) of the hazardous waste or withdraws a prior consent, EPA will notify the exporter.

(7) Export of hazardous wastes for recycling or disposal operations that were originally imported into the United States for recycling or disposal operations in a third country is prohibited unless an exporter in the United States complies with the export requirements in Section R315-262-83, including providing notification to EPA in accordance with Subsection R315-262-83(b)(1). In addition to listing all required information in Subsections R315-262-83(b)(1)(i) through (b)(1)(xiii), the exporter shall provide the original consent number issued for the initial import of the wastes in the notification, and receive an AOC from EPA documenting the consent of the competent authorities in new country of import, the original country of export, and any transit countries prior to re-export.

(8) Upon request by EPA, the exporter shall furnish to EPA any additional information which the country of import requests in order to respond to a notification.

(c) RCRA manifest instructions for export shipments. The exporter shall comply with the manifest requirements of Sections R315-262-20 through 23 except that:

(1) In lieu of the name, site address and EPA ID number of the designated permitted facility, the exporter shall enter the

name and site address of the foreign receiving facility;

(2) In the International Shipments block, the exporter shall check the export box and enter the U.S. port of exit, city and State, from the United States.

(3) The exporter shall list the consent number from the AOC for each hazardous waste listed on the manifest, matched to the relevant list number for the hazardous waste from block 9b. If additional space is needed, the exporter should use a Continuation Sheet(s) (EPA Form 8700--22A).

(4) The exporter may obtain the manifest from any source that is registered with the U.S. EPA as a supplier of manifests, for example, states, waste handlers, or commercial forms printers.

(d) Movement document requirements for export shipments.

(1) All exporters shall ensure that a movement document meeting the conditions of Subsection R315-262-83(d)(2) accompanies each transboundary movement of hazardous wastes from the initiation of the shipment until it reaches the foreign receiving facility, including cases in which the hazardous waste is stored, sorted by the foreign importer prior to shipment to the foreign receiving facility, or both, except as provided in Subsections R315-262-83(d)(1)(i) and (ii).

(i) For shipments of hazardous waste within the United States solely by water, bulk shipments only, the exporter shall forward the movement document to the last water, bulk shipment, transporter to handle the hazardous waste in the United States if exported by water.

(ii) For rail shipments of hazardous waste within the United States which start from the company originating the export shipment, the exporter shall forward the movement document to the next non-rail transporter, if any, or the last rail transporter to handle the hazardous waste in the United States if exported by rail.

(2) The movement document shall include the following Subsections R315-262-83(d)(2)(i) through (xv):

(i) The corresponding consent number(s) and hazardous waste number(s) for the listed hazardous waste from the relevant EPA AOC(s);

(ii) The shipment number and the total number of shipments from the EPA AOC;

(iii) Exporter name and EPA identification number, address, telephone, fax numbers, and email address;

(iv) Foreign receiving facility name, address, telephone, fax numbers, email address, technologies employed, and the applicable recovery or disposal operations as defined in Section R315-262-81;

(v) Foreign importer name, if not the owner or operator of the foreign receiving facility, address, telephone, fax numbers, and email address;

(vi) Description(s) of each hazardous waste, quantity of each hazardous waste in the shipment, applicable RCRA hazardous waste code(s) for each hazardous waste, applicable OECD waste code for each hazardous waste from the lists incorporated by reference in Section R315-260-11, and the United Nations/U.S. Department of Transportation (DOT) ID number for each hazardous waste;

(vii) Date movement commenced;

(viii) Name, if not exporter, address, telephone, fax numbers, and email of company originating the shipment;

(ix) Company name, EPA ID number, address, telephone, fax, and email address of all transporters;

(x) Identification (license, registered name or registration number) of means of transport, including types of packaging;

(xi) Any special precautions to be taken by transporter(s);

(xii) Certification/declaration signed and dated by the exporter that the information in the movement document is complete and correct;

(xiii) Appropriate signatures for each custody transfer, for example, transporter, importer, and owner or operator of the foreign receiving facility;

(xiv) Each U.S. person that has physical custody of the hazardous waste from the time the movement commences until it arrives at the foreign receiving facility shall sign the movement document, for example, transporter, foreign importer, and owner or operator of the foreign receiving facility; and

(xv) As part of the contract requirements per Subsection R315-262-83(f), the exporter shall require that the foreign receiving facility send a copy of the signed movement document to confirm receipt within three working days of shipment delivery to the exporter, to the competent authorities of the countries of import and transit, and for shipments occurring on or after the electronic import-export reporting compliance date, the exporter shall additionally require that the foreign receiving facility send a copy to EPA at the same time using the allowable methods listed in Subsection R315-262-83(b)(1).

(e) Duty to return or re-export hazardous wastes. When a transboundary movement of hazardous wastes cannot be completed in accordance with the terms of the contract or the consent(s) and alternative arrangements cannot be made to recover or dispose of the waste in an environmentally sound manner in the country of import, the exporter shall ensure that the hazardous waste is returned to the United States or re-exported to a third country. If the waste shall be returned, the exporter shall provide for the return of the hazardous waste shipment within ninety days from the time the country of import informs EPA of the need to return the waste or such other period of time as the concerned countries agree. In all cases, the exporter shall submit an exception report to EPA in accordance with Subsection R315-262-83(h).

(f) Export contract requirements.

(1) Exports of hazardous waste are prohibited unless they occur under the terms of a valid written contract, chain of contracts, or equivalent arrangements (when the movement occurs between parties controlled by the same corporate or legal entity). Such contracts or equivalent arrangements shall be executed by the exporter, foreign importer (if different from the foreign receiving facility), and the owner or operator of the foreign receiving facility, and shall specify responsibilities for each. Contracts or equivalent arrangements are valid for the purposes of Section R315-262-83 only if persons assuming obligations under the contracts or equivalent arrangements have appropriate legal status to conduct the operations specified in the contract or equivalent arrangements.

(2) Contracts or equivalent arrangements shall specify the name and EPA ID number, where available, of Subsection R315-262-83(f)(2)(i) through (iv):

(i) The company from where each export shipment of hazardous waste is initiated;

(ii) Each person who will have physical custody of the hazardous wastes;

(iii) Each person who will have legal control of the hazardous wastes; and

(iv) The foreign receiving facility.

(3) Contracts or equivalent arrangements shall specify which party to the contract will assume responsibility for alternate management of the hazardous wastes if their disposition cannot be carried out as described in the notification of intent to export. In such cases, contracts shall specify that:

(i) The transporter or foreign receiving facility having actual possession or physical control over the hazardous wastes will immediately inform the exporter, EPA, and either the competent authority of the country of transit or the competent authority of the country of import of the need to make alternate management arrangements; and

(ii) The person specified in the contract will assume responsibility for the adequate management of the hazardous wastes in compliance with applicable laws and regulations

including, if necessary, arranging the return of hazardous wastes and, as the case may be, shall provide the notification for re-export to the competent authority in the country of import and include the equivalent of the information required in Subsection R315-262-83(b)(1), the original consent number issued for the initial export of the hazardous wastes in the notification, and obtain consent from EPA and the competent authorities in the new country of import and any transit countries prior to re-export.

(4) Contracts shall specify that the foreign receiving facility send a copy of the signed movement document to confirm receipt within three working days of shipment delivery to the exporter and to the competent authorities of the countries of import and transit. For contracts that will be in effect on or after the electronic import-export reporting compliance date, the contracts shall additionally specify that the foreign receiving facility send a copy to EPA at the same time using the allowable methods listed in Subsection R315-262-83(b)(1) on or after that date.

(5) Contracts shall specify that the foreign receiving facility shall send a copy of the signed and dated confirmation of recovery or disposal, as soon as possible, but no later than thirty days after completing recovery or disposal on the waste in the shipment and no later than one calendar year following receipt of the waste, to the exporter and to the competent authority of the country of import. For contracts that will be in effect on or after the electronic import-export reporting compliance date, the contracts shall additionally specify that the foreign receiving facility send a copy to EPA at the same time using the allowable methods listed in Subsection R315-262-83(b)(1) on or after that date.

(6) Contracts shall specify that the foreign importer or the foreign receiving facility that performed interim recycling operations R12, R13, or RC16, or interim disposal operations D13 through D15 or DC17, (recovery and disposal operations defined in Section R315-262-81) as appropriate, will:

(i) Provide the notification required in Subsection R315-262-83(f)(3)(ii) prior to any re-export of the hazardous wastes to a final foreign recovery or disposal facility in a third country; and

(ii) Promptly send copies of the confirmation of recovery or disposal that it receives from the final foreign recovery or disposal facility within one year of shipment delivery to the final foreign recovery or disposal facility that performed one of recovery operations R1 through R11, or RC16, or one of disposal operations D1 through D12, DC15 or DC16 to the competent authority of the country of import. For contracts that will be in effect on or after the electronic import-export reporting compliance date, the contracts shall additionally specify that the foreign facility send copies to EPA at the same time using the allowable method listed in Subsection R315-262-83(b)(1) on or after that date.

(7) Contracts or equivalent arrangements shall include provisions for financial guarantees, if required by the competent authorities of the country of import and any countries of transit, in accordance with applicable national or international law requirements.

Note 1 to Subsection R315-262-83(f)(7): Financial guarantees so required are intended to provide for alternate recycling, disposal or other means of sound management of the wastes in cases where arrangements for the shipment and the recovery operations cannot be carried out as foreseen. The United States does not require such financial guarantees at this time; however, some OECD Member countries and other foreign countries do. It is the responsibility of the exporter to ascertain and comply with such requirements; in some cases, persons or facilities located in those OECD Member countries or other foreign countries may refuse to enter into the necessary contracts absent specific references or certifications to financial guarantees.

(8) Contracts or equivalent arrangements shall contain provisions requiring each contracting party to comply with all applicable requirements of Sections R315-262-80 through 84.

(9) Upon request by EPA, U.S. exporters, importers, or recovery facilities shall submit to EPA copies of contracts, chain of contracts, or equivalent arrangements, when the movement occurs between parties controlled by the same corporate or legal entity.

(g) Annual reports. The exporter shall file an annual report with EPA no later than March 1 of each year summarizing the types, quantities, frequency, and ultimate destination of all such hazardous waste exported during the previous calendar year. Prior to one year after the AES filing compliance date, the exporter shall mail or hand-deliver annual reports to EPA using one of the addresses specified in Subsection R315-262-82(e), or submit to EPA using the allowable methods specified in Subsection R315-262-83(b)(1) if the exporter has electronically filed EPA information in AES, or its successor system, per Subsection R315-262-83(a)(6)(i)(A) for all shipments made the previous calendar year. Subsequently, the exporter shall submit annual reports to EPA using the allowable methods specified in Subsection R315-262-83(b)(1). The annual report shall include all of the following Subsections R315-262-83(g)(1) through (6) specified as follows:

(1) The EPA identification number, name, and mailing and site address of the exporter filing the report;

(2) The calendar year covered by the report;

(3) The name and site address of each foreign receiving facility;

(4) By foreign receiving facility, for each hazardous waste exported:

(i) A description of the hazardous waste;

(ii) The applicable EPA hazardous waste code(s), from Sections R315-261-20 through 24 and 30 through 35, for each waste;

(iii) The applicable waste code from the appropriate OECD waste list incorporated by reference in Section R315-260-11;

(iv) The applicable DOT ID number;

(v) The name and U.S. EPA ID number, where applicable, for each transporter used over the calendar year covered by the report; and

(vi) The consent number(s) under which the hazardous waste was shipped, and for each consent number, the total amount of the hazardous waste and the number of shipments exported during the calendar year covered by the report;

(5) In even numbered years, for each hazardous waste exported, except for hazardous waste produced by exporters of greater than 100kg but less than 1,000kg in a calendar month, and except for hazardous waste for which information was already provided pursuant to Section R315-262-41:

(i) A description of the efforts undertaken during the year to reduce the volume and toxicity of the waste generated; and

(ii) A description of the changes in volume and toxicity of the waste actually achieved during the year in comparison to previous years to the extent such information is available for years prior to 1984; and

(6) A certification signed by the exporter that states: I certify under penalty of law that I have personally examined and am familiar with the information submitted in this and all attached documents, and that based on my inquiry of those individuals immediately responsible for obtaining the information, I believe that the submitted information is true, accurate, and complete. I am aware that there are significant penalties for submitting false information including the possibility of fine and imprisonment.

(h) Exception reports.

(1) The exporter shall file an exception report in lieu of the requirements of Section R315-262-42 (if applicable) with EPA if any of the following occurs:

(i) The exporter has not received a copy of the RCRA hazardous waste manifest, if applicable, signed by the transporter identifying the point of departure of the hazardous waste from the United States, within forty-five (45) days from the date it was accepted by the initial transporter, in which case the exporter shall file the exception report within the next thirty (30) days;

(ii) The exporter has not received a written confirmation of receipt from the foreign receiving facility in accordance with Subsection R315-262-83(d) within ninety (90) days from the date the waste was accepted by the initial transporter in which case the exporter shall file the exception report within the next thirty (30) days; or

(iii) The foreign receiving facility notifies the exporter, or the country of import notifies EPA, of the need to return the shipment to the U.S. or arrange alternate management, in which case the exporter shall file the exception report within thirty (30) days of notification, or one (1) day prior to the date the return shipment commences, whichever is sooner.

(2) Prior to the electronic import-export reporting compliance date, exception reports shall be mailed or hand delivered to EPA using the addresses listed in Subsection R315-262-82(e). Subsequently, exception reports shall be submitted to EPA using the allowable methods listed in Subsection R315-262-83(b)(1).

(i) Recordkeeping.

(1) The exporter shall keep the following records as described in Subsections R315-262-83(i)(1)(i) through (v) and provide them to EPA or Utah personnel upon request:

(i) A copy of each notification of intent to export and each EPA AOC for a period of at least three (3) years from the date the hazardous waste was accepted by the initial transporter;

(ii) A copy of each annual report for a period of at least three (3) years from the due date of the report;

(iii) A copy of any exception reports and a copy of each confirmation of receipt, for example, movement document, sent by the foreign receiving facility to the exporter for at least three (3) years from the date the hazardous waste was accepted by the initial transporter; and

(iv) A copy of each confirmation of recovery or disposal sent by the foreign receiving facility to the exporter for at least three (3) years from the date that the foreign receiving facility completed interim or final processing of the hazardous waste shipment.

(v) A copy of each contract or equivalent arrangement established per Subsection R315-262-83(f) for at least three (3) years from the expiration date of the contract or equivalent arrangement.

(2) Exporters may satisfy these recordkeeping requirements by retaining electronically submitted documents in the exporter's account on EPA's Waste Import Export Tracking System (WIETS), or its successor system, provided that copies are readily available for viewing and production if requested by any EPA or Utah inspector. No exporter may be held liable for the inability to produce such documents for inspection under Section R315-262-83 if the exporter can demonstrate that the inability to produce the document is due exclusively to technical difficulty with EPA's Waste Import Export Tracking System (WIETS), or its successor system for which the exporter bears no responsibility.

(3) The periods of retention referred to in Section R315-262-83 are extended automatically during the course of any unresolved enforcement action regarding the regulated activity or as requested by the Administrator.

R315-262-84. Transboundary Movements of Hazardous Waste for Recovery or Disposal -- Imports of Hazardous Waste.

(a) General import requirements.

(1) With the exception of Subsection R315-262-84(a)(5), importers of shipments covered under a consent from EPA to the country of export issued before December 31, 2016 are subject to that approval and the requirements that existed at the time of that approval until such time the approval period expires. Otherwise, any other person who imports hazardous waste from a foreign country into the United States shall comply with the requirements of Rule R315-262 and the special requirements of Sections R315-262-80 through 84.

(2) In cases where the country of export does not require the foreign exporter to submit a notification and obtain consent to the export prior to shipment, the importer shall submit a notification to EPA in accordance with Subsection R315-262-84(b).

(3) The importer shall comply with the contract requirements in Subsection R315-262-84(f).

(4) The importer shall ensure compliance with the movement documents requirements in Subsection R315-262-84(d); and

(5) The importer shall ensure compliance with the manifest instructions for import shipments in Subsection R315-262-84(c).

(b) Notifications. In cases where the competent authority of the country of export does not regulate the waste as hazardous waste and, thus, does not require the foreign exporter to submit to it a notification proposing export and obtain consent from EPA and the competent authorities for the countries of transit, but EPA does regulate the waste as hazardous waste:

(1) The importer is required to provide notification in English to EPA of the proposed transboundary movement of hazardous waste at least sixty (60) days before the first shipment is expected to depart the country of export. Notifications submitted prior to the electronic import-export reporting compliance date shall be mailed or hand delivered to EPA at the addresses specified in Subsection R315-262-82(e). Notifications submitted on or after the electronic import-export reporting compliance date shall be submitted electronically using EPA's Waste Import Export Tracking System (WIETS), or its successor system. The notification may cover up to one year of shipments of one or more hazardous wastes being sent from the same foreign exporter, and shall include all of the following information:

(i) Foreign exporter name, address, telephone, fax numbers, and email address;

(ii) Receiving facility name, EPA ID number, address, telephone, fax numbers, email address, technologies employed, and the applicable recovery or disposal operations as defined in Section R315-262-81;

(iii) Importer name (if not the owner or operator of the receiving facility), EPA ID number, address, telephone, fax numbers, and email address;

(iv) Intended transporter(s), their agent(s), or both; address, telephone, fax, and email address;

(v) "U.S." as the country of import, "USA01" as the relevant competent authority code, and the intended U.S. port(s) of entry;

(vi) The ISO standard 3166 country name 2-digit code, OECD/Basel competent authority code, and the ports of entry and exit for each country of transit;

(vii) The ISO standard 3166 country name 2-digit code, OECD/Basel competent authority code, and port of exit for the country of export;

(viii) Statement of whether the notification covers a single shipment or multiple shipments;

(ix) Start and End Dates requested for transboundary

movements;

(x) Means of transport planned to be used;

(xi) Description(s) of each hazardous waste, including whether each hazardous waste is regulated universal waste under Rule R315-273, spent lead-acid batteries being exported for recovery of lead under Section R315-266-80, or industrial ethyl alcohol being exported for reclamation under Subsection R315-261-6(a)(3)(i), estimated total quantity of each hazardous waste, the applicable RCRA hazardous waste code(s) for each hazardous waste, the applicable OECD waste code from the lists incorporated by reference in Section R315-260-11, and the United Nations/ U.S. Department of Transportation (DOT) ID number for each hazardous waste;

(xii) Specification of the recovery or disposal operation(s) as defined in Section R315-262-81; and

(xiii) Certification/Declaration signed by the importer that states: I certify that the above information is complete and correct to the best of my knowledge. I also certify that legally enforceable written contractual obligations have been entered into and that any applicable insurance or other financial guarantee is or shall be in force covering the transboundary movement. Name: Signature: Date:

Note to Subsection R315-262-84(b)(1)(xiii): The United States does not currently require financial assurance for these waste shipments.

(2) Notifications listing interim recycling operations or interim disposal operations. If the receiving facility listed in Subsection R315-262-84(b)(1)(ii) will engage in any of the interim recovery operations R12 or R13 or interim disposal operations D13 through D15, the notification submitted according to Subsection R315-262-84(b)(1) shall also include the final recovery or disposal facility name, address, telephone, fax numbers, email address, technologies employed, and which of the applicable recovery or disposal operations R1 through R11 and D1 through D12, will be employed at the final recovery or disposal facility. The recovery and disposal operations in Subsection R315-262-84(b)(2) are defined in Section R315-262-81.

(3) Renotifications. When the foreign exporter wishes to change any of the conditions specified on the original notification, including increasing the estimate of the total quantity of hazardous waste specified in the original notification or adding transporters, the importer shall submit a renotification of the changes to EPA using the allowable methods in Subsection R315-262-84(b)(1). Any shipment using the requested changes cannot take place until EPA and the countries of transit consent to the changes and the importer receives an EPA AOC letter documenting the consents to the changes.

(4) A notification is complete when EPA determines the notification satisfies the requirements of Subsections R315-262-84(b)(1)(i) through (xiii).

(5) Where EPA and the countries of transit consent to the proposed transboundary movement(s) of the hazardous waste(s), EPA will forward an EPA AOC letter to the importer documenting the countries' consents and EPA's consent. Where any of the countries of transit or EPA objects to the proposed transboundary movement(s) of the hazardous waste or withdraws a prior consent, EPA will notify the importer.

(6) Export of hazardous wastes originally imported into the United States. Export of hazardous wastes that were originally imported into the United States for recycling or disposal operations is prohibited unless an exporter in the United States complies with the export requirements in Subsection R315-262-83(b)(7).

(c) RCRA Manifest instructions for import shipments.

(1) When importing hazardous waste, the importer shall meet all the requirements of Section R315-262-20 for the manifest except that:

(i) In place of the generator's name, address and EPA identification number, the name and address of the foreign generator and the importer's name, address and EPA identification number shall be used.

(ii) In place of the generator's signature on the certification statement, the importer or his agent shall sign and date the certification and obtain the signature of the initial transporter.

(2) The importer may obtain the manifest form from any source that is registered with the EPA as a supplier of manifests, for example, states, waste handlers, or commercial forms printers.

(3) In the International Shipments block, the importer shall check the import box and enter the point of entry, city and State, into the United States.

(4) The importer shall provide the transporter with an additional copy of the manifest to be submitted by the receiving facility to U.S. EPA in accordance with Subsection R315-264-71(a)(3) and Subsection R315-265-71(a)(3).

(5) In lieu of the requirements of Subsection R315-262-20(d), where a shipment cannot be delivered for any reason to the receiving facility, the importer shall instruct the transporter in writing via fax, email or mail to:

(i) Return the hazardous waste to the foreign exporter or designate another facility within the United States; and

(ii) Revise the manifest in accordance with the importer's instructions.

(d) Movement document requirements for import shipments.

(1) The importer shall ensure that a movement document meeting the conditions of Subsection R315-262-84(d)(2) accompanies each transboundary movement of hazardous wastes from the initiation of the shipment in the country of export until it reaches the receiving facility, including cases in which the hazardous waste is stored, sorted by the importer prior to shipment to the receiving facility, or both, except as provided in Subsections R315-262-84(d)(1)(i) and (ii).

(i) For shipments of hazardous waste within the United States by water, bulk shipments only, the importer shall forward the movement document to the last water, bulk shipment, transporter to handle the hazardous waste in the United States if imported by water.

(ii) For rail shipments of hazardous waste within the United States which start from the company originating the export shipment, the importer shall forward the movement document to the next non-rail transporter, if any, or the last rail transporter to handle the hazardous waste in the United States if imported by rail.

(2) The movement document shall include the following Subsections R315-262-84(d)(2)(i) through (xv):

(i) The corresponding AOC number(s) and waste number(s) for the listed waste;

(ii) The shipment number and the total number of shipments under the AOC number;

(iii) Foreign exporter name, address, telephone, fax numbers, and email address;

(iv) Receiving facility name, EPA ID number, address, telephone, fax numbers, email address, technologies employed, and the applicable recovery or disposal operations as defined in Section R315-262-81;

(v) Importer name, if not the owner or operator of the receiving facility, EPA ID number, address, telephone, fax numbers, and email address;

(vi) Description(s) of each hazardous waste, quantity of each hazardous waste in the shipment, applicable RCRA hazardous waste code(s) for each hazardous waste, the applicable OECD waste code for each hazardous waste from the lists incorporated by reference in Section R315-260-11, and the United Nations/U.S. Department of Transportation (DOT) ID number for each hazardous waste;

(vii) Date movement commenced;

(viii) Name, if not the foreign exporter, address, telephone, fax numbers, and email of the foreign company originating the shipment;

(ix) Company name, EPA ID number, address, telephone, fax, and email address of all transporters;

(x) Identification, license, registered name or registration number, of means of transport, including types of packaging;

(xi) Any special precautions to be taken by transporter(s);

(xii) Certification/declaration signed and dated by the foreign exporter that the information in the movement document is complete and correct;

(xiii) Appropriate signatures for each custody transfer, for example, transporter, importer, and owner or operator of the receiving facility;

(xiv) Each person that has physical custody of the waste from the time the movement commences until it arrives at the receiving facility shall sign the movement document, for example, transporter, importer, and owner or operator of the receiving facility; and

(xv) The receiving facility shall send a copy of the signed movement document to confirm receipt within three working days of shipment delivery to the foreign exporter, to the competent authorities of the countries of export and transit, and for shipments received on or after the electronic import-export reporting compliance date, to EPA electronically using EPA's Waste Import Export Tracking System (WIETS), or its successor system.

(e) Duty to return or export hazardous wastes. When a transboundary movement of hazardous wastes cannot be completed in accordance with the terms of the contract or the consent(s), the provisions of Subsection R315-262-84(f)(4) apply. If alternative arrangements cannot be made to recover the hazardous waste in an environmentally sound manner in the United States, the hazardous waste shall be returned to the country of export or exported to a third country. The provisions of Subsection R315-262-84(b)(6) apply to any hazardous waste shipments to be exported to a third country. If the return shipment will cross any transit country, the return shipment may only occur after EPA provides notification to and obtains consent from the competent authority of the country of transit, and provides a copy of that consent to the importer.

(f) Import contract requirements.

(1) Imports of hazardous waste shall occur under the terms of a valid written contract, chain of contracts, or equivalent arrangements, when the movement occurs between parties controlled by the same corporate or legal entity. Such contracts or equivalent arrangements shall be executed by the foreign exporter, importer, and the owner or operator of the receiving facility, and shall specify responsibilities for each. Contracts or equivalent arrangements are valid for the purposes of Section R315-262-84 only if persons assuming obligations under the contracts or equivalent arrangements have appropriate legal status to conduct the operations specified in the contract or equivalent arrangements.

(2) Contracts or equivalent arrangements shall specify the name and EPA ID number, where available, of Subsections R315-262-84(f)(2)(i) through (iv):

(i) The foreign company from where each import shipment of hazardous waste is initiated;

(ii) Each person who will have physical custody of the hazardous wastes;

(iii) Each person who will have legal control of the hazardous wastes; and

(iv) The receiving facility.

(3) Contracts or equivalent arrangements shall specify the use of a movement document in accordance with Subsection R315-262-84(d).

(4) Contracts or equivalent arrangements shall specify which party to the contract will assume responsibility for alternate management of the hazardous wastes if their disposition cannot be carried out as described in the notification of intent to export submitted by either the foreign exporter or the importer. In such cases, contracts shall specify that:

(i) The transporter or receiving facility having actual possession or physical control over the hazardous wastes will immediately inform the foreign exporter and importer, and the competent authority where the shipment is located of the need to arrange alternate management or return; and

(ii) The person specified in the contract will assume responsibility for the adequate management of the hazardous wastes in compliance with applicable laws and regulations including, if necessary, arranging the return of the hazardous wastes and, as the case may be, shall provide the notification for re-export required in Subsection R315-262-83(b)(7).

(5) Contracts shall specify that the importer or the receiving facility that performed interim recycling operations R12, R13, or RC16, or interim disposal operations D13 through D15 or DC15 through DC17, as appropriate, will provide the notification required in Subsection R315-262-83(b)(7) prior to the re-export of hazardous wastes. The recovery and disposal operations in Subsection R315-262-84(e)(5) are defined in Section R315-262-81.

(6) Contracts or equivalent arrangements shall include provisions for financial guarantees, if required by the competent authorities of any countries concerned, in accordance with applicable national or international law requirements.

Note to Subsection R315-262-84(f)(6): Financial guarantees so required are intended to provide for alternate recycling, disposal or other means of sound management of the wastes in cases where arrangements for the shipment and the recovery operations cannot be carried out as foreseen. The United States does not require such financial guarantees at this time; however, some OECD Member countries or other foreign countries do. It is the responsibility of the importer to ascertain and comply with such requirements; in some cases, persons or facilities located in those countries may refuse to enter into the necessary contracts absent specific references or certifications to financial guarantees.

(7) Contracts or equivalent arrangements shall contain provisions requiring each contracting party to comply with all applicable requirements of Sections R315-262-80 through 84.

(8) Upon request by EPA, importers or disposal or recovery facilities shall submit to EPA copies of contracts, chain of contracts, or equivalent arrangements, when the movement occurs between parties controlled by the same corporate or legal entity.

(g) Confirmation of recovery or disposal. The receiving facility shall do the following:

(1) Send copies of the signed and dated confirmation of recovery or disposal, as soon as possible, but no later than thirty days after completing recovery or disposal on the waste in the shipment and no later than one calendar year following receipt of the waste, to the foreign exporter, to the competent authority of the country of export, and for shipments recycled or disposed of on or after the electronic import-export reporting compliance date, to EPA electronically using EPA's Waste Import Export Tracking System (WIETS), or its successor system.

(2) If the receiving facility performed any of recovery operations R12, R13, or RC16, or disposal operations D13 through D15, or DC17, the receiving facility shall promptly send copies of the confirmation of recovery or disposal that it receives from the final recovery or disposal facility within one year of shipment delivery to the final recovery or disposal facility that performed one of recovery operations R1 through R11, or RC14 to RC15, or one of disposal operations D1 through D12, or DC15 to DC16, to the competent authority of the country of export, and for confirmations received on or after the electronic import-export reporting compliance date, to EPA

electronically using EPA's Waste Import Export Tracking System (WIETS), or its successor system. The recovery and disposal operations in Subsection R315-262-84(g)(2) are defined in Section R315-262-81.

(h) Recordkeeping.

(1) The importer shall keep the following records and provide them to EPA or authorized state personnel upon request:

(i) A copy of each notification that the importer sends to EPA under Subsection R315-262-84(b)(1) and each EPA AOC it receives in response for a period of at least three (3) years from the date the hazardous waste was accepted by the initial foreign transporter; and

(ii) A copy of each contract or equivalent arrangement established per Subsection R315-262-84(f) for at least three (3) years from the expiration date of the contract or equivalent arrangement.

(2) The receiving facility shall keep the following records:

(i) A copy of each confirmation of receipt, for example, movement document, that the receiving facility sends to the foreign exporter for at least three (3) years from the date it received the hazardous waste;

(ii) A copy of each confirmation of recovery or disposal that the receiving facility sends to the foreign exporter for at least three (3) years from the date that it completed processing the waste shipment;

(iii) For the receiving facility that performed any of recovery operations R12, R13, or RC16, or disposal operations D13 through D15, or DC17, recovery and disposal operations defined in Section R315-262-81, a copy of each confirmation of recovery or disposal that the final recovery or disposal facility sent to it for at least three (3) years from the date that the final recovery or disposal facility completed processing the waste shipment; and

(iv) A copy of each contract or equivalent arrangement established per Subsection R315-262-84(f) for at least three (3) years from the expiration date of the contract or equivalent arrangement.

(3) Importers and receiving facilities may satisfy these recordkeeping requirements by retaining electronically submitted documents in the importer's or receiving facility's account on EPA's Waste Import Export Tracking System (WIETS), or its successor system, provided that copies are readily available for viewing and production if requested by any EPA or authorized state inspector. No importer or receiving facility may be held liable for the inability to produce such documents for inspection under this section if the importer or receiving facility can demonstrate that the inability to produce the document is due exclusively to technical difficulty with EPA's Waste Import Export Tracking System (WIETS), or its successor system for which the importer or receiving facility bears no responsibility.

(4) The periods of retention referred to in Section R315-262-84 are extended automatically during the course of any unresolved enforcement action regarding the regulated activity or as requested by the Director.

R315-262-200. Alternative Requirements for Hazardous Waste Determination and Accumulation of Unwanted Material for Laboratories Owned by Eligible Academic Entities -- Definitions for Sections R315-262-200 through R315-262-216.

(a) The following definitions apply to Sections R315-262-200 through 216:

(1) "College/University" means a private or public, post-secondary, degree-granting, academic institution, that is accredited by an accrediting agency listed annually by the U.S. Department of Education.

(2) "Eligible academic entity" means a college or university, or a non-profit research institute that is owned by or has a formal written affiliation agreement with a college or university, or a teaching hospital that is owned by or has a formal written affiliation agreement with a college or university.

(3) "Formal written affiliation agreement for a non-profit research institute" means a written document that establishes a relationship between institutions for the purposes of research and/or education and is signed by authorized representatives, as defined by Section R315-260-10, from each institution. A relationship on a project-by-project or grant-by-grant basis is not considered a formal written affiliation agreement. A formal written affiliation agreement for a teaching hospital means a master affiliation agreement and program letter of agreement, as defined by the Accreditation Council for Graduate Medical Education, with an accredited medical program or medical school.

(4) Laboratory means an area owned by an eligible academic entity where relatively small quantities of chemicals and other substances are used on a non-production basis for teaching or research, or diagnostic purposes at a teaching hospital, and are stored and used in containers that are easily manipulated by one person. Photo laboratories, art studios, and field laboratories are considered laboratories. Areas such as chemical stockrooms and preparatory laboratories that provide a support function to teaching or research laboratories, or diagnostic laboratories at teaching hospitals, are also considered laboratories.

(5) "Laboratory clean-out" means an evaluation of the inventory of chemicals and other materials in a laboratory that are no longer needed or that have expired and the subsequent removal of those chemicals or other unwanted materials from the laboratory. A clean-out may occur for several reasons. It may be on a routine basis, e.g., at the end of a semester or academic year, or as a result of a renovation, relocation, or change in laboratory supervisor/occupant. A regularly scheduled removal of unwanted material as required by Section R315-262-208 does not qualify as a laboratory clean-out.

(6) "Laboratory worker" means a person who handles chemicals and/or unwanted material in a laboratory and may include, but is not limited to, faculty, staff, post-doctoral fellows, interns, researchers, technicians, supervisors/managers, and principal investigators. A person does not need to be paid or otherwise compensated for his/her work in the laboratory to be considered a laboratory worker. Undergraduate and graduate students in a supervised classroom setting are not laboratory workers.

(7) "Non-profit research institute" means an organization that conducts research as its primary function and files as a non-profit organization under the tax code of 26 U.S.C. 501(c)(3).

(8) "Reactive acutely hazardous unwanted material" means an unwanted material that is one of the acutely hazardous commercial chemical products listed in Subsection R315-261-33(e) for reactivity.

(9) "Teaching hospital" means a hospital that trains students to become physicians, nurses or other health or laboratory personnel.

(10) "Trained professional" means a person who has completed the applicable RCRA training requirements of 40 CFR 265.16, which is incorporated by reference in Section R315-265-1, for large quantity generators, or is knowledgeable about normal operations and emergencies in accordance with Subsection R315-262-17 for small quantity generators and very small quantity generators. A trained professional may be an employee of the eligible academic entity or may be a contractor or vendor who meets the requisite training requirements.

(11) "Unwanted material" means any chemical, mixtures of chemicals, products of experiments or other material from a laboratory that is no longer needed, wanted or usable in the laboratory and that is destined for hazardous waste

determination by a trained professional. Unwanted materials include reactive acutely hazardous unwanted materials and materials that may eventually be determined not to be solid waste pursuant to Section R315-261-2, or a hazardous waste pursuant to Section R315-261-3. If an eligible academic entity elects to use another equally effective term in lieu of "unwanted material," as allowed by Subsection R315-262-206(a)(1)(i), the equally effective term has the same meaning and is subject to the same requirements as "unwanted material" under Section R315-262-200 through 216.

(12) "Working container" means a small container, i.e., two gallons or less, that is in use at a laboratory bench, hood, or other work station, to collect unwanted material from a laboratory experiment or procedure.

R315-262-201. Alternative Requirements for Hazardous Waste Determination and Accumulation of Unwanted Material for Laboratories Owned by Eligible Academic Entities -- Applicability of Sections R315-262-200 through R315-262-216.

(a) Large quantity generators and small quantity generators. Sections R315-262-200 through R315-262-216 provides alternative requirements to the requirements in Sections R315-262-11 and R315-262-15 for the hazardous waste determination and accumulation of hazardous waste in laboratories owned by eligible academic entities that choose to be subject to Sections R315-262-200 through R315-262-216, provided that they complete the notification requirements of Section R315-262-203.

(b) Very small quantity generators. Sections R315-262-200 through R315-262-216 provide alternative requirements to the conditional exemption in Section R315-262-14 for the accumulation of hazardous waste in laboratories owned by eligible academic entities that choose to be subject to Sections R315-262-200 through R315-262-216, provided that they complete the notification requirements of Section R315-262-203.

R315-262-202. Alternative Requirements for Hazardous Waste Determination and Accumulation of Unwanted Material for Laboratories Owned by Eligible Academic Entities -- Sections R315-262-200 through R315-262-216 are Optional.

(a) Large quantity generators and small quantity generators. Eligible academic entities have the option of complying with Sections R315-262-200 through R315-262-216 with respect to its laboratories, as an alternative to complying with the requirements of Section R315-262-11 and Section R315-262-15.

(b) Very small quantity generators. Eligible academic entities have the option of complying with Sections R315-262-200 through 216 with respect to laboratories, as an alternative to complying with the conditional exemption of Section R315-262-14.

R315-262-203. Alternative Requirements for Hazardous Waste Determination and Accumulation of Unwanted Material for Laboratories Owned by Eligible Academic Entities -- How an Eligible Academic Entity Indicates it will be Subject to the Requirements of Sections R315-262-200 through R315-262-216.

(a) An eligible academic entity shall notify the Director in writing, using the RCRA Subtitle C Site Identification Form, EPA Form 8700-12, that it is electing to be subject to the requirements of Sections R315-262-200 through R315-262-216 for all the laboratories owned by the eligible academic entity under the same EPA Identification Number. An eligible academic entity that is a very small quantity generator and does not have an EPA Identification Number shall notify that it is electing to be subject to the requirements of Sections R315-262-200 through R315-262-216 for all the laboratories owned by the eligible academic entity that are on-site, as defined by Section R315-260-10. An eligible academic entity shall submit a separate notification, Site Identification Form, for each EPA Identification Number, or site, for very small quantity generators, that is electing to be subject to the requirements of Sections R315-262-200 through R315-262-216, and shall submit the Site Identification Form before it begins operating under Sections R315-262-200 through R315-262-216.

(b) When submitting the Site Identification Form, the eligible academic entity shall, at a minimum, fill out the following fields on the form:

(1) Reason for Submittal.

(2) Site EPA Identification Number, except for very small quantity generators.

(3) Site Name.

(4) Site Location Information.

(5) Site Land Type.

(6) North American Industry Classification System (NAICS) Code(s) for the Site.

(7) Site Mailing Address.

(8) Site Contact Person.

(9) Operator and Legal Owner of the Site.

(10) Type of Regulated Waste Activity.

(11) Certification.

(c) An eligible academic entity shall keep a copy of the notification on file at the eligible academic entity for as long as its laboratories are subject to Sections R315-262-200 through R315-262-216.

(d) A teaching hospital that is not owned by a college or university shall keep a copy of its formal written affiliation agreement with a college or university on file at the teaching hospital for as long as its laboratories are subject to Sections R315-262-200 through R315-262-216.

(e) A non-profit research institute that is not owned by a college or university shall keep a copy of its formal written affiliation agreement with a college or university on file at the non-profit research institute for as long as its laboratories are subject to Sections R315-262-200 through R315-262-216.

R315-262-204. Alternative Requirements for Hazardous Waste Determination and Accumulation of Unwanted Material for Laboratories Owned by Eligible Academic Entities - How an Eligible Academic Entity Indicates It Will Withdraw from the Requirements of Sections R315-262-200 Through 216.

(a) An eligible academic entity shall notify the Director in writing, using the RCRA Subtitle C Site Identification Form (EPA Form 8700-12), that it is electing to no longer be subject to the requirements of Sections R315-262-200 through R315-262-216 for all the laboratories owned by the eligible academic entity under the same EPA Identification Number and that it will comply with the requirements of Sections R315-262-11 and R315-262-15 for small quantity generators and large quantity generators. An eligible academic entity that is a very small quantity generator and does not have an EPA Identification Number shall notify that it is withdrawing from the requirements of Sections R315-262-200 through R315-262-216 for all the laboratories owned by the eligible academic entity that are on-site and that it will comply with the conditional exemption in Section R315-262-14. An eligible academic entity shall submit a separate notification, Site Identification Form, for each EPA Identification Number, or site, for very small quantity generators, that is withdrawing from the requirements of Sections R315-262-200 through R315-262-216 and shall submit the Site Identification Form before it begins operating under the requirements of Sections R315-262-11 and R315-262-15 for small quantity generators and large quantity generators, or

Section R315-262-14 for very small quantity generators.

(b) When submitting the Site Identification Form, the eligible academic entity shall, at a minimum, fill out the following fields on the form:

(1) Reason for Submittal.

(2) Site EPA Identification Number, except for very small quantity generators.

(3) Site Name.

(4) Site Location Information.

(5) Site Land Type.

(6) North American Industry Classification System (NAICS) Code(s) for the Site.

(7) Site Mailing Address.

(8) Site Contact Person.

(9) Operator and Legal Owner of the Site.

(10) Type of Regulated Waste Activity.

(11) Certification.

(c) An eligible academic entity shall keep a copy of the withdrawal notice on file at the eligible academic entity for three years from the date of the notification.

R315-262-205. Alternative Requirements for Hazardous Waste Determination and Accumulation of Unwanted Material for Laboratories Owned by Eligible Academic Entities Summary of the Requirements of Sections R315-262-200 through R315-262-216.

An eligible academic entity that chooses to be subject to Sections R315-262-200 through 216 is not required to have interim status or a RCRA Part B permit for the accumulation of unwanted material and hazardous waste in its laboratories, provided the laboratories comply with the provisions of Sections R315-262-200 through 216 and the eligible academic entity has a Laboratory Management Plan (LMP) in accordance with Section R315-262-214 that describes how the laboratories owned by the eligible academic entity will comply with the requirements of Sections R315-262-200 through 216.

R315-262-206. Alternative Requirements for Hazardous Waste Determination and Accumulation of Unwanted Material for Laboratories Owned by Eligible Academic Entities -- Labeling and Management Standards for Containers of Unwanted Material in the Laboratory.

An eligible academic entity shall manage containers of unwanted material while in the laboratory in accordance with the requirements in Section R315-262-206.

(a) Labeling: Label unwanted material as follows:

(1) The following information shall be affixed or attached to the container:

(i) The words "unwanted material" or another equally effective term that is to be used consistently by the eligible academic entity and that is identified in Part I of the Laboratory Management Plan, and

(ii) Sufficient information to alert emergency responders to the contents of the container. Examples of information that would be sufficient to alert emergency responders to the contents of the container include, but are not limited to:

(A) The name of the chemical(s),

(B) The type or class of chemical, such as organic solvents or halogenated organic solvents.

(2) The following information may be affixed or attached to the container, but shall at a minimum be associated with the container:

(i) The date that the unwanted material first began accumulating in the container, and

(ii) Information sufficient to allow a trained professional to properly identify whether an unwanted material is a solid and hazardous waste and to assign the proper hazardous waste code(s), pursuant to Section R315-262-11. Examples of information that would allow a trained professional to properly identify whether an unwanted material is a solid or hazardous waste include, but are not limited to:

(A) The name and/or description of the chemical contents or composition of the unwanted material, or, if known, the product of the chemical reaction,

(B) Whether the unwanted material has been used or is unused,

(C) A description of the manner in which the chemical was produced or processed, if applicable.

(b) Management of Containers in the Laboratory. An eligible academic entity shall properly manage containers of unwanted material in the laboratory to assure safe storage of the unwanted material, to prevent leaks, spills, emissions to the air, adverse chemical reactions, and dangerous situations that may result in harm to human health or the environment. Proper container management shall include the following:

(1) Containers are maintained and kept in good condition and damaged containers are replaced, overpacked, or repaired, and

(2) Containers are compatible with their contents to avoid reactions between the contents and the container; and are made of, or lined with, material that is compatible with the unwanted material so that the container's integrity is not impaired, and

(3) Containers shall be kept closed at all times, except:

(i) When adding, removing or bulking unwanted material, or

(ii) A working container may be open until the end of the procedure or work shift, or until it is full, whichever comes first, at which time the working container shall either be closed or the contents emptied into a separate container that is then closed, or

(iii) When venting of a container is necessary:

(A) For the proper operation of laboratory equipment, such as with in-line collection of unwanted materials from high performance liquid chromatographs; or

(B) To prevent dangerous situations, such as build-up of extreme pressure.

R315-262-207. Alternative Requirements for Hazardous Waste Determination and Accumulation of Unwanted Material for Laboratories Owned by Eligible Academic Entities -- Training.

An eligible academic entity shall provide training to all individuals working in a laboratory at the eligible academic entity, as follows:

(a) Training for laboratory workers and students shall be commensurate with their duties so they understand the requirements in Sections R315-262-200 through 216 and can implement them.

(b) An eligible academic entity can provide training for laboratory workers and students in a variety of ways, including, but not limited to:

(1) Instruction by the professor or laboratory manager before or during an experiment; or

(2) Formal classroom training; or

(3) Electronic/written training; or

(4) On-the-job training; or

(5) Written or oral exams.

(c) An eligible academic entity that is a large quantity generator shall maintain documentation for the durations specified in 40 CFR 265.16(e), which is incorporated by reference in R315-265-1, demonstrating training for all laboratory workers that is sufficient to determine whether laboratory workers have been trained. Examples of documentation demonstrating training can include, but are not limited to, the following:

(1) Sign-in/attendance sheet(s) for training session(s); or

(2) Syllabus for training session; or

(3) Certificate of training completion; or

(4) Test results.

(d) A trained professional shall:

(1) Accompany the transfer of unwanted material and hazardous waste when the unwanted material and hazardous waste is removed from the laboratory, and

(2) Make the hazardous waste determination, pursuant to Subsections R315-262-11(a) through (d), for unwanted material.

R315-262-208. Alternative Requirements for Hazardous Waste Determination and Accumulation of Unwanted Material for Laboratories Owned by Eligible Academic Entities -- Removing Containers of Unwanted Material from the Laboratory.

(a) Removing containers of unwanted material on a regular schedule. An eligible academic entity shall either:

(1) Remove all containers of unwanted material from each laboratory on a regular interval, not to exceed 12 months; or

(2) Remove containers of unwanted material from each laboratory within 12 months of each container's accumulation start date.

(b) The eligible academic entity shall specify in Part I of its Laboratory Management Plan whether it will comply with Subsection R315-262-208(a)(1) or (a)(2) for the regular removal of unwanted material from its laboratories.

(c) The eligible academic entity shall specify in Part II of its Laboratory Management Plan how it will comply with Subsection R315-262-208(a)(1) or (a)(2) and develop a schedule for regular removals of unwanted material from its laboratories.

(d) Removing containers of unwanted material when volumes are exceeded.

(1) If a laboratory accumulates a total volume of unwanted material, including reactive acutely hazardous unwanted material, in excess of 55 gallons before the regularly scheduled removal, the eligible academic entity shall ensure that all containers of unwanted material in the laboratory, including reactive acutely hazardous unwanted material:

(i) Are marked on the label that is associated with the container, or on the label that is affixed or attached to the container, if that is preferred, with the date that 55 gallons is exceeded; and

(ii) Are removed from the laboratory within 10 calendar days of the date that 55 gallons was exceeded, or at the next regularly scheduled removal, whichever comes first.

(2) If a laboratory accumulates more than 1 quart of liquid reactive acutely hazardous unwanted material or more than 1 kg (2.2 pounds) of solid reactive acutely hazardous unwanted material before the regularly scheduled removal, then the eligible academic entity shall ensure that all containers of reactive acutely hazardous unwanted material:

(i) Are marked on the label that is associated with the container, or on the label that is affixed or attached to the container, if that is preferred, with the date that 1 quart or 1 kg is exceeded; and

(ii) Are removed from the laboratory within 10 calendar days of the date that 1 quart or 1 kg was exceeded, or at the next regularly scheduled removal, whichever comes first.

R315-262-209. Alternative Requirements for Hazardous Waste Determination and Accumulation of Unwanted Material for Laboratories Owned by Eligible Academic Entities -- Where and When to Make the Hazardous Waste Determination and Where to Send Containers of Unwanted Material Upon Removal from the Laboratory.

(a) Large quantity generators and small quantity generators-an eligible academic entity shall ensure that a trained professional makes a hazardous waste determination, pursuant to Section R315-262-11, for unwanted material in any of the following areas:

(1) In the laboratory before the unwanted material is removed from the laboratory, in accordance with Section R315-262-210;

(2) Within 4 calendar days of arriving at an on-site central accumulation area, in accordance with Section R315-262-211; and

(3) Within 4 calendar days of arriving at an on-site interim status or permitted treatment, storage or disposal facility, in accordance with Section R315-262-212.

(b) Very small quantity generators-An eligible academic entity shall ensure that a trained professional makes a hazardous waste determination, pursuant to Subsections R315-262-11(a) through (d), for unwanted material in the laboratory before the unwanted material is removed from the laboratory, in accordance with Section R315-262-210.

R315-262-210. Alternative Requirements for Hazardous Waste Determination and Accumulation of Unwanted Material for Laboratories Owned by Eligible Academic Entities -- Making the Hazardous Waste Determination in the Laboratory Before the Unwanted Material is Removed from the Laboratory.

If an eligible academic entity makes the hazardous waste determination, pursuant to Section R315-262-11, for unwanted material in the laboratory, it shall comply with the following:

(a) A trained professional shall make the hazardous waste determination, pursuant to Subsections R315-262-11(a) through (d), before the unwanted material is removed from the laboratory.

(b) If an unwanted material is a hazardous waste, the eligible academic entity shall:

(1) Write the words "hazardous waste" on the container label that is affixed or attached to the container, before the hazardous waste may be removed from the laboratory; and

(2) Write the appropriate hazardous waste code(s) on the label that is associated with the container, or on the label that is affixed or attached to the container, if that is preferred, before the hazardous waste is transported off-site.

(3) Count the hazardous waste toward the eligible academic entity's generator status, pursuant to Section R315-262-13, in the calendar month that the hazardous waste determination was made.

(c) A trained professional shall accompany all hazardous waste that is transferred from the laboratory(ies) to an on-site central accumulation area or on-site interim status or permitted treatment, storage or disposal facility.

(d) When hazardous waste is removed from the laboratory:

(1) Large quantity generators and small quantity generators shall ensure it is taken directly from the laboratory(ies) to an on-site central accumulation area, or on-site interim status or permitted treatment, storage or disposal facility, or transported off-site.

(2) Very small quantity generators shall ensure it is taken directly from the laboratory(ies) to any of the types of facilities listed in Section R315-262-14.

(e) An unwanted material that is a hazardous waste is subject to all applicable hazardous waste regulations when it is removed from the laboratory.

R315-262-211. Alternative Requirements for Hazardous Waste Determination and Accumulation of Unwanted Material for Laboratories Owned by Eligible Academic Entities - Making the Hazardous Waste Determination at an On-Site Central Accumulation Area.

If an eligible academic entity makes the hazardous waste determination, pursuant to Section R315-262-11, for unwanted material at an on-site central accumulation area, it shall comply with the following:

(a) A trained professional shall accompany all unwanted material that is transferred from the laboratory(ies) to an on-site

central accumulation area.

(b) All unwanted material removed from the laboratory(ies) shall be taken directly from the laboratory(ies) to the on-site central accumulation area.

(c) The unwanted material becomes subject to the generator accumulation regulations of Section R315-262-16 for small quantity generators or Section R315-262-17 for large quantity generators as soon as it arrives in the central accumulation area, except for the "hazardous waste" labeling conditions of Subsections R315-262-16(b)(6) and 17(a)(5).

(d) A trained professional shall determine, pursuant to Subsections R315-262-11(a) through (d), if the unwanted material is a hazardous waste within 4 calendar days of the unwanted materials' arrival at the on-site central accumulation area.

(e) If the unwanted material is a hazardous waste, the eligible academic entity shall:

(1) Write the words "hazardous waste" on the container label that is affixed or attached to the container, within 4 calendar days of arriving at the on-site central accumulation area and before the hazardous waste may be removed from the on-site central accumulation area, and

(2) Write the appropriate hazardous waste code(s) on the container label that is associated with the container, or on the label that is affixed or attached to the container, if that is preferred, before the hazardous waste may be treated or disposed of on-site or transported off-site, and

(3) Count the hazardous waste toward the eligible academic entity's generator category, pursuant to Section R315-262-13 in the calendar month that the hazardous waste determination was made, and

(4) Manage the hazardous waste according to all applicable hazardous waste regulations.

R315-262-212. Alternative Requirements for Hazardous Waste Determination and Accumulation of Unwanted Material for Laboratories Owned by Eligible Academic Entities -- Making the Hazardous Waste Determination at an On-Site Interim Status or Permitted Treatment, Storage or Disposal Facility.

If an eligible academic entity makes the hazardous waste determination, pursuant to Section R315-262-11, for unwanted material at an on-site interim status or permitted treatment, storage or disposal facility, it shall comply with the following:

(a) A trained professional shall accompany all unwanted material that is transferred from the laboratory(ies) to an on-site interim status or permitted treatment, storage or disposal facility.

(b) All unwanted material removed from the laboratory(ies) shall be taken directly from the laboratory(ies) to the on-site interim status or permitted treatment, storage or disposal facility.

(c) The unwanted material becomes subject to the terms of the eligible academic entity's hazardous waste permit or interim status as soon as it arrives in the on-site treatment, storage or disposal facility.

(d) A trained professional shall determine, pursuant to Subsections R315-262-11(a) through (d), if the unwanted material is a hazardous waste within 4 calendar days of the unwanted materials' arrival at an on-site interim status or permitted treatment, storage or disposal facility.

(e) If the unwanted material is a hazardous waste, the eligible academic entity shall:

(1) Write the words "hazardous waste" on the container label that is affixed or attached to the container within 4 calendar days of arriving at the on-site interim status or permitted treatment, storage or disposal facility and before the hazardous waste may be removed from the on-site interim status or permitted treatment, storage or disposal facility, and

(2) Write the appropriate hazardous waste code(s) on the container label that is associated with the container, or on the label that is affixed or attached to the container, if that is preferred, before the hazardous waste may be treated or disposed on-site or transported off-site, and

(3) Count the hazardous waste toward the eligible academic entity's generator status, pursuant to Subsections R315-261-5(c) and (d) in the calendar month that the hazardous waste determination was made, and

(4) Manage the hazardous waste according to all applicable hazardous waste regulations.

R315-262-213. Alternative Requirements for Hazardous Waste Determination and Accumulation of Unwanted Material for Laboratories Owned by Eligible Academic Entities -- Laboratory Clean-outs.

(a) One time per 12 month period for each laboratory, an eligible academic entity may opt to conduct a laboratory clean-out that is subject to all the applicable requirements of Sections R315-262-200 through 216, except that:

(1) If the volume of unwanted material in the laboratory exceeds 55 gallons, or 1 quart of liquid reactive acutely hazardous unwanted material or 1 kg of solid reactive acutely hazardous unwanted material, the eligible academic entity is not required to remove all unwanted materials from the laboratory within 10 calendar days of exceeding 55 gallons, or 1 quart of liquid reactive acutely hazardous unwanted material or 1 kg or solid reactive acutely hazardous unwanted material, as required by Section R315-262-208. Instead, the eligible academic entity shall remove all unwanted materials from the laboratory within 30 calendar days from the start of the laboratory clean-out; and

(2) For the purposes of on-site accumulation, an eligible academic entity is not required to count a hazardous waste that is an unused commercial chemical product, listed in Sections R315-261-30 through R315-261-35 or exhibiting one or more characteristics in Sections R315-261-20 through R315-261-24, generated solely during the laboratory clean-out toward its hazardous waste generator category, pursuant to Section R315-262-13. An unwanted material that is generated prior to the beginning of the laboratory clean-out and is still in the laboratory at the time the laboratory clean-out commences shall be counted toward hazardous waste generator category, pursuant to Section R315-262-13, if it is determined to be hazardous waste; and

(3) For the purposes of off-site management, an eligible academic entity shall count all its hazardous waste, regardless of whether the hazardous waste was counted toward generator category under Subsection R315-262-213(a)(2), and if it generates more than 1 kg per month of acute hazardous waste or more than 100 kg per month of non-acute hazardous waste, i.e., the very small quantity generator limits as defined in Section R315-260-10, the hazardous waste is subject to all applicable hazardous waste regulations when it is transported off site; and

(4) An eligible academic entity shall document the activities of the laboratory clean-out. The documentation shall, at a minimum, identify the laboratory being cleaned out, the date the laboratory clean-out begins and ends, and the volume of hazardous waste generated during the laboratory clean-out. The eligible academic entity shall maintain the records for a period of three years from the date the clean-out ends; and

(b) For all other laboratory clean-outs conducted during the same 12-month period, an eligible academic entity is subject to all the applicable requirements of Sections R315-262-200 through 216, including, but not limited to:

(1) The requirement to remove all unwanted materials from the laboratory within 10 calendar days of exceeding 55 gallons, or 1 quart of reactive acutely hazardous unwanted material, as required by Section R315-262-208; and

(2) The requirement to count all hazardous waste, including unused hazardous waste, generated during the

laboratory clean-out toward its hazardous waste generator category, pursuant to Section R315-262-13.

R315-262-214. Alternative Requirements for Hazardous Waste Determination and Accumulation of Unwanted Material for Laboratories Owned by Eligible Academic Entities Laboratory Management Plan.

An eligible academic entity shall develop and retain a written Laboratory Management Plan, or revise an existing written plan. The Laboratory Management Plan is a site-specific document that describes how the eligible academic entity will manage unwanted materials in compliance with Sections R315-262-200 through 216. An eligible academic entity may write one Laboratory Management Plan for all the laboratories owned by the eligible academic entity that have opted into Sections R315-262-200 through 216, even if the laboratories are located at sites with different EPA Identification Numbers. The Laboratory Management Plan shall contain two parts with a total of nine elements identified in Subsections R315-262-214(a) and (b). In Part I of its Laboratory Management Plan, an eligible academic entity shall describe its procedures for each of the elements listed in Subsection R315-262-214(a). An eligible academic entity shall implement and comply with the specific provisions that it develops to address the elements in Part I of the Laboratory Management Plan. In Part II of its Laboratory Management Plan, an eligible academic entity shall describe its best management practices for each of the elements listed in Subsection R315-262-214(b). The specific actions taken by an eligible academic entity to implement each element in Part II of its Laboratory Management Plan may vary from the procedures described in the eligible academic entity's Laboratory Management Plan, without constituting a violation of Sections R315-262-200 through 216. An eligible academic entity may include additional elements and best management practices in Part II of its Laboratory Management Plan if it chooses.

(a) The eligible academic entity shall implement and comply with the specific provisions of Part I of its Laboratory Management Plan. In Part I of its Laboratory Management Plan, an eligible academic entity shall:

(1) Describe procedures for container labeling in accordance with Subsection R315-262-206(a), as follows:

(i) Identifying whether the eligible academic entity will use the term "unwanted material" on the containers in the laboratory. If not, identify an equally effective term that will be used in lieu of "unwanted material" and consistently by the eligible academic entity. The equally effective term, if used, has the same meaning and is subject to the same requirements as "unwanted material."

(ii) Identifying the manner in which information that is "associated with the container" will be imparted.

(2) Identify whether the eligible academic entity will comply with Subsection R315-262-208(a)(1) or (a)(2) for regularly scheduled removals of unwanted material from the laboratory.

(b) In Part II of its Laboratory Management Plan, an eligible academic entity shall:

(1) Describe its intended best practices for container labeling and management, see the required standards at Section R315-262-206.

(2) Describe its intended best practices for providing training for laboratory workers and students commensurate with their duties, see the required standards at Subsection R315-262-207(a).

(3) Describe its intended best practices for providing training to ensure safe on-site transfers of unwanted material and hazardous waste by trained professionals, see the required standards at Subsection R315-262-207(d)(1).

(4) Describe its intended best practices for removing unwanted material from the laboratory, including:

(i) For regularly scheduled removals-Develop a regular schedule for identifying and removing unwanted materials from its laboratories, see the required standards at Subsections R315-262-208(a)(1) and (a)(2).

(ii) For removals when maximum volumes are exceeded:

(A) Describe its intended best practices for removing unwanted materials from the laboratory within 10 calendar days when unwanted materials have exceeded their maximum volumes, see the required standards at Subsection R315-262-208(d).

(B) Describe its intended best practices for communicating that unwanted materials have exceeded their maximum volumes.

(5) Describe its intended best practices for making hazardous waste determinations, including specifying the duties of the individuals involved in the process, see the required standards at Subsections R315-262-11(a) through (d) and Sections R315-262-209 through R315-262-212.

(6) Describe its intended best practices for laboratory clean-outs, if the eligible academic entity plans to use the incentives for laboratory clean-outs provided in Section R315-262-213, including:

(i) Procedures for conducting laboratory clean-outs, see the required standards at Subsections R315-262-213(a)(1) through (3); and

(ii) Procedures for documenting laboratory clean-outs, see the required standards at Subsection R315-262-213(a)(4).

(7) Describe its intended best practices for emergency prevention, including:

(i) Procedures for emergency prevention, notification, and response, appropriate to the hazards in the laboratory; and

(ii) A list of chemicals that the eligible academic entity has, or is likely to have, that become more dangerous when they exceed their expiration date and/or as they degrade; and

(iii) Procedures to safely dispose of chemicals that become more dangerous when they exceed their expiration date and/or as they degrade; and

(iv) Procedures for the timely characterization of unknown chemicals.

(c) An eligible academic entity shall make its Laboratory Management Plan available to laboratory workers, students, or any others at the eligible academic entity who request it.

(d) An eligible academic entity shall review and revise its Laboratory Management Plan, as needed.

R315-262-215. Alternative Requirements for Hazardous Waste Determination and Accumulation of Unwanted Material for Laboratories Owned by Eligible Academic Entities -- Unwanted Material that Is Not Solid or Hazardous Waste.

(a) If an unwanted material does not meet the definition of solid waste in Section R315-261-2, it is no longer subject to Sections R315-262-200 through 216 or to Rules R315-260 through 266, 268, or 270.

(b) If an unwanted material does not meet the definition of hazardous waste in Section R315-261-3, it is no longer subject to Sections R315-262-200 through 216 or to Rules R315-260 through 266, 268, or 270, but shall be managed in compliance with any other applicable regulations and/or conditions.

R315-262-216. Alternative Requirements for Hazardous Waste Determination and Accumulation of Unwanted Material for Laboratories Owned by Eligible Academic Entities -- Non-Laboratory Hazardous Waste Generated at an Eligible Academic Entity.

An eligible academic entity that generates hazardous waste outside of a laboratory is not eligible to manage that hazardous waste under Sections R315-262-200 through 216; and

(a) Remains subject to the generator requirements of Sections R315-262-11 and R315-262-15 for large quantity

generators and small quantity generators, if the hazardous waste is managed in a satellite accumulation area, and all other applicable generator requirements of Rule R315-262, with respect to that hazardous waste; or

(b) Remains subject to the conditional exemption of Section R315-262-14 for very small quantity generators, with respect to that hazardous waste.

R315-262-217. Appendix to Rule R315-262 -- Uniform Hazardous Waste Manifest and Instructions (EPA Forms 8700-22 and 8700-22A and Their Instructions).

U.S. EPA Forms 8700-22 and Manifest Continuation Sheet (EPA Form 8700-22A) found in appendix to 40 CFR 262, 2015 edition, are incorporated and incorporated by reference.

Read all instructions before completing this form.

1. This form has been designed for use on a 12-pitch (elite) typewriter which is also compatible with standard computer printers; a firm point pen may also be used - press down hard.

2. Federal regulations require generators and transporters of hazardous waste and owners or operators of hazardous waste treatment, storage, and disposal facilities to complete this form (FORM 8700-22) and, if necessary, the continuation sheet (FORM 8700-22A) for both inter- and intrastate transportation of hazardous waste.

Manifest 8700-22

The following statement shall be included with each Uniform Hazardous Waste Manifest, either on the form, in the instructions to the form, or accompanying the form:

Public reporting burden for this collection of information is estimated to average: 30 minutes for generators, 10 minutes for transporters, and 25 minutes for owners or operators of treatment, storage, and disposal facilities. This includes time for reviewing instructions, gathering data, completing, reviewing and transmitting the form. Any correspondence regarding the PRA burden statement for the manifest shall be sent to the Director of the Collection Strategies Division in EPA's Office of Information Collection at the following address: U.S. Environmental Protection Agency (2822T), 1200 Pennsylvania Ave., NW., Washington, DC 20460. Do not send the completed form to this address.

I. Instructions for Generators

Manifest 8700-22

The following statement shall be included with each Uniform Hazardous Waste Manifest, either on the form, in the instructions to the form, or accompanying the form:

Public reporting burden for this collection of information is estimated to average: 30 minutes for generators, 10 minutes for transporters, and 25 minutes for owners or operators of treatment, storage, and disposal facilities. This includes time for reviewing instructions, gathering data, completing, reviewing and transmitting the form. Send comments regarding the burden estimate, including suggestions for reducing this burden, to: Chief, Information Policy Branch (2136), U.S. Environmental Protection Agency, Ariel Rios Building; 1200 Pennsylvania Ave., NW., Washington, DC 20460; and to the Office of Information and Regulatory Affairs, Office of Management and Budget, Washington, DC 20503.

Item 1. Generator's U.S. EPA Identification Number

Enter the generator's U.S. EPA twelve digit identification number, or the State generator identification number if the generator site does not have an EPA identification number.

Item 2. Page 1 of _

Enter the total number of pages used to complete this Manifest (i.e., the first page (EPA Form 8700-22) plus the number of Continuation Sheets (EPA Form 8700-22A), if any).

Item 3. Emergency Response Phone Number

Enter a phone number for which emergency response information can be obtained in the event of an incident during transportation. The emergency response phone number shall:

1. Be the number of the generator or the number of an agency or organization who is capable of and accepts responsibility for providing detailed information about the shipment;

2. Reach a phone that is monitored 24 hours a day at all times the waste is in transportation (including transportation related storage); and

3. Reach someone who is either knowledgeable of the hazardous waste being shipped and has comprehensive emergency response and spill cleanup/incident mitigation information for the material being shipped or has immediate access to a person who has that knowledge and information about the shipment.

Note: Emergency Response phone number information should only be entered in Item 3 when there is one phone number that applies to all the waste materials described in Item 9b. If a situation (e.g., consolidated shipments) arises where more than one Emergency Response phone number applies to the various wastes listed on the manifest, the phone numbers associated with each specific material should be entered after its description in Item 9b.

Item 4. Manifest Tracking Number

This unique tracking number shall be pre-printed on the manifest by the forms printer.

Item 5. Generator's Mailing Address, Phone Number and Site Address

Enter the name of the generator, the mailing address to which the completed manifest signed by the designated facility should be mailed, and the generator's telephone number. Note, the telephone number (including area code) should be the normal business number for the generator, or the number where the generator or his authorized agent may be reached to provide instructions in the event the designated and/or alternate (if any) facility rejects some or all of the shipment. Also enter the physical site address from which the shipment originates only if this address is different than the mailing address.

Item 6. Transporter 1 Company Name, and U.S. EPA ID Number

Enter the company name and U.S. EPA ID number of the first transporter who will transport the waste. Vehicle or driver information may not be entered here.

Item 7. Transporter 2 Company Name and U.S. EPA ID Number

If applicable, enter the company name and U.S. EPA ID number of the second transporter who will transport the waste. Vehicle or driver information may not be entered here.

If more than two transporters are needed, use a Continuation Sheet(s) (EPA Form 8700-22A).

Item 8. Designated Facility Name, Site Address, and U.S. EPA ID Number

Enter the company name and site address of the facility designated to receive the waste listed on this manifest. Also enter the facility's phone number and the U.S. EPA twelve digit identification number of the facility.

Item 9. U.S. DOT Description (Including Proper Shipping Name, Hazard Class or Division, Identification Number, and Packing Group)

Item 9a. If the wastes identified in Item 9b consist of both hazardous and nonhazardous materials, then identify the hazardous materials by entering an "X" in this Item next to the corresponding hazardous material identified in Item 9b.

If applicable, enter the name of the person accepting the waste on behalf of the second transporter. That person shall acknowledge acceptance of the waste described on the manifest by signing and entering the date of receipt.

Item 9b. Enter the U.S. DOT Proper Shipping Name, Hazard Class or Division, Identification Number (UN/NA) and Packing Group for each waste as identified in 49 CFR 172. Include technical name(s) and reportable quantity references, if

applicable.

Note: If additional space is needed for waste descriptions, enter these additional descriptions in Item 27 on the Continuation Sheet (EPA Form 8700-22A). Also, if more than one Emergency Response phone number applies to the various wastes described in either Item 9b or Item 27, enter applicable Emergency Response phone numbers immediately following the shipping descriptions for those Items.

Item 10. Containers (Number and Type)

Enter the number of containers for each waste and the appropriate abbreviation from Table I (below) for the type of container.

TABLE I

Types of Containers

BA = Burlap, cloth, paper, or plastic bags.
CF = Fiber or plastic boxes, cartons, cases.
CM = Metal boxes, cartons, cases (including roll-offs).
CW = Wooden boxes, cartons, cases.
CY = Cylinders.
DF = Fiberboard or plastic drums, barrels, kegs.
DM = Metal drums, barrels, kegs.
DT = Dump truck.
DW = Wooden drums, barrels, kegs.
HG = Hopper or gondola cars.
TC = Tank cars.
TP = Portable tanks.
TT = Cargo tanks (tank trucks).

Item 11. Total Quantity

Enter, in designated boxes, the total quantity of waste. Round partial units to the nearest whole unit, and do not enter decimals or fractions. To the extent practical, report quantities using appropriate units of measure that will allow you to report quantities with precision. Waste quantities entered should be based on actual measurements or reasonably accurate estimates of actual quantities shipped. Container capacities are not acceptable as estimates.

Item 12. Units of Measure (Weight/Volume)

Enter, in designated boxes, the appropriate abbreviation from Table II (below) for the unit of measure.

TABLE II

Units of Measure

G = Gallons (liquids only).
K = Kilograms.
L = Liters (liquids only).
M = Metric Tons (1000 kilograms).
N = Cubic Meters.
P = Pounds.
T = Tons (2000 pounds).
Y = Cubic Yards.

Note: Tons, Metric Tons, Cubic Meters, and Cubic Yards should only be reported in connection with very large bulk shipments, such as rail cars, tank trucks, or barges.

Item 13. Waste Codes

Enter up to six federal and state waste codes to describe each waste stream identified in Item 9b. State waste codes that are not redundant with federal codes shall be entered here, in addition to the federal waste codes which are most representative of the properties of the waste.

Item 14. Special Handling Instructions and Additional Information.

1. Generators may enter any special handling or shipment-specific information necessary for the proper management or tracking of the materials under the generator's or other handler's business processes, such as waste profile numbers, container codes, bar codes, or response guide numbers. Generators also may use this space to enter additional descriptive information about their shipped materials, such as chemical names, constituent percentages, physical state, or specific gravity of wastes identified with volume units in Item 12.

2. This space may be used to record limited types of federally required information for which there is no specific space provided on the manifest, including any alternate facility designations; the manifest tracking number of the original manifest for rejected wastes and residues that are re-shipped under a second manifest; and the specification of PCB waste descriptions and PCB out-of-service dates required under 40 CFR 761.207. Generators, however, cannot be required to enter information in this space to meet state regulatory requirements.

Item 15. Generator's/Offeror's Certifications

1. The generator shall read, sign, and date the waste minimization certification statement. In signing the waste minimization certification statement, those generators who have not been exempted by statute or regulation from the duty to make a waste minimization certification under section 3002(b) of RCRA are also certifying that they have complied with the waste minimization requirements. The Generator's Certification also contains the required attestation that the shipment has been properly prepared and is in proper condition for transportation (the shipper's certification). The content of the shipper's certification statement is as follows: "I hereby declare that the contents of this consignment are fully and accurately described above by the proper shipping name, and are classified, packaged, marked, and labeled/placarded, and are in all respects in proper condition for transport by highway according to applicable international and national governmental regulations. If export shipment and I am the Primary Exporter, I certify that the contents of this consignment conform to the terms of the attached EPA Acknowledgment of Consent." When a party other than the generator prepares the shipment for transportation, this party may also sign the shipper's certification statement as the offeror of the shipment.

2. Generator or Offeror personnel may preprint the words, "On behalf of" in the signature block or may hand write this statement in the signature block prior to signing the generator/offeror certification, to indicate that the individual signs as the employee or agent of the named principal.

Note: All of the above information except the handwritten signature required in Item 15 may be pre-printed.

II. Instructions for International Shipment Block

Item 16. International Shipments

For export shipments, the primary exporter shall check the export box, and enter the point of exit (city and state) from the United States. For import shipments, the importer shall check the import box and enter the point of entry (city and state) into the United States.

III. Instructions for Transporters

Item 17. Transporters' Acknowledgments of Receipt

Enter the name of the person accepting the waste on behalf of the first transporter. That person shall acknowledge acceptance of the waste described on the manifest by signing and entering the date of receipt. Only one signature per transportation company is required. Signatures are not required to track the movement of wastes in and out of transfer facilities, unless there is a change of custody between transporters.

If applicable, enter the name of the person accepting the waste on behalf of the second transporter. That person shall acknowledge acceptance of the waste described on the manifest by signing and entering the date of receipt.

Note: Transporters carrying imports, who are acting as importers, may have responsibilities to enter information in the International Shipments Block. Transporters carrying exports may also have responsibilities to enter information in the International Shipments Block. See above instructions for Item 16.

IV. Instructions for Owners and Operators of Treatment, Storage, and Disposal Facilities

Item 18. Discrepancy

Item 18a. Discrepancy Indication Space

1. The authorized representative of the designated (or alternate) facility's owner or operator shall note in this space any discrepancies between the waste described on the Manifest and the waste actually received at the facility. Manifest discrepancies are: significant differences (as defined by Subsections R315-264-72(b) and R315-265-72(b)), between the quantity or type of hazardous waste designated on the manifest or shipping paper, and the quantity and type of hazardous waste a facility actually receives, rejected wastes, which may be a full or partial shipment of hazardous waste that the TSDF cannot accept, or container residues, which are residues that exceed the quantity limits for "empty" containers set forth in Subsection R315-261-7(b).

2. For rejected loads and residues (Subsections R315-264-72(d), (e), and (f), or R315-265-72(d), (e), or (f)), check the appropriate box if the shipment is a rejected load (i.e., rejected by the designated and/or alternate facility and is sent to an alternate facility or returned to the generator) or a regulated residue that cannot be removed from a container. Enter the reason for the rejection or the inability to remove the residue and a description of the waste. Also, reference the manifest tracking number for any additional manifests being used to track the rejected waste or residue shipment on the original manifest. Indicate the original manifest tracking number in Item 14, the Special Handling Block and Additional Information Block of the additional manifests.

3. Owners or operators of facilities located in unauthorized States (i.e., states in which the U.S. EPA administers the hazardous waste management program) who cannot resolve significant differences in quantity or type within 15 days of receiving the waste shall submit to their Regional Administrator a letter with a copy of the Manifest at issue describing the discrepancy and attempts to reconcile it (Subsections R315-264-72(c) and R315-265-72(c)).

4. Owners or operators of facilities located in authorized States (i.e., those States that have received authorization from the U.S. EPA to administer the hazardous waste management program) should contact their State agency for information on where to report discrepancies involving "significant differences" to state officials.

Item 18b. Alternate Facility (or Generator) for Receipt of Full Load Rejections

Enter the name, address, phone number, and EPA Identification Number of the Alternate Facility which the rejecting TSDF has designated, after consulting with the generator, to receive a fully rejected waste shipment. In the event that a fully rejected shipment is being returned to the generator, the rejecting TSDF may enter the generator's site information in this space. This field is not to be used to forward partially rejected loads or residue waste shipments.

Item 18c. Alternate Facility (or Generator) Signature

The authorized representative of the alternate facility (or the generator in the event of a returned shipment) shall sign and date this field of the form to acknowledge receipt of the fully rejected wastes or residues identified by the initial TSDF.

Item 19. Hazardous Waste Report Management Method Codes

Enter the most appropriate Hazardous Waste Report Management Method code for each waste listed in Item 9. The Hazardous Waste Report Management Method code is to be entered by the first treatment, storage, or disposal facility (TSDF) that receives the waste and is the code that best describes the way in which the waste is to be managed when received by the TSDF.

Item 20. Designated Facility Owner or Operator Certification of Receipt (Except As Noted in Item 18a)

Enter the name of the person receiving the waste on behalf of the owner or operator of the facility. That person shall acknowledge receipt or rejection of the waste described on the Manifest by signing and entering the date of receipt or rejection where indicated. Since the Facility Certification acknowledges receipt of the waste except as noted in the Discrepancy Space in Item 18a, the certification should be signed for both waste receipt and waste rejection, with the rejection being noted and described in the space provided in Item 18a. Fully rejected wastes may be forwarded or returned using Item 18b after consultation with the generator. Enter the name of the person accepting the waste on behalf of the owner or operator of the alternate facility or the original generator. That person shall acknowledge receipt or rejection of the waste described on the Manifest by signing and entering the date they received or rejected the waste in Item 18c. Partially rejected wastes and residues shall be re-shipped under a new manifest, to be initiated and signed by the rejecting TSDF as offeror of the shipment.

Instructions -- Continuation Sheet, U.S. EPA Form 8700-22A

Read all instructions before completing this form. This form has been designed for use on a 12-pitch (elite) typewriter; a firm point pen may also be used---press down hard.

This form shall be used as a continuation sheet to U.S. EPA Form 8700-22 if:

More than two transporters are to be used to transport the waste; or

More space is required for the U.S. DOT descriptions and related information in Item 9 of U.S. EPA Form 8700-22.

Federal regulations require generators and transporters of hazardous waste and owners or operators of hazardous waste treatment, storage, or disposal facilities to use the uniform hazardous waste manifest (EPA Form 8700-22) and, if necessary, this continuation sheet (EPA Form 8700-22A) for both interstate and intrastate transportation.

Item 21. Generator's ID Number

Enter the generator's U.S. EPA twelve digit identification number or, the State generator identification number if the generator site does not have an EPA identification number.

Item 22. Page _---

Enter the page number of this Continuation Sheet.

Item 23. Manifest Tracking Number

Enter the Manifest Tracking number from Item 4 of the Manifest form to which this continuation sheet is attached.

Item 24. Generator's Name---

Enter the generator's name as it appears in Item 5 on the first page of the Manifest.

Item 25. Transporter---Company Name

If additional transporters are used to transport the waste described on this Manifest, enter the company name of each additional transporter in the order in which they will transport the waste. Enter after the word "Transporter" the order of the transporter. For example, Transporter 3 Company Name. Also enter the U.S. EPA twelve digit identification number of the transporter described in Item 25.

Item 26. Transporter---Company Name

If additional transporters are used to transport the waste described on this Manifest, enter the company name of each additional transporter in the order in which they will transport the waste. Enter after the word "Transporter" the order of the transporter. For example, Transporter 4 Company Name. Each Continuation Sheet can record the names of two additional transporters. Also enter the U.S. EPA twelve digit identification number of the transporter named in Item 26.

Item 27. U.S. D.O.T. Description Including Proper Shipping Name, Hazardous Class, and ID Number (UN/NA)

For each row enter a sequential number under Item 27b that corresponds to the order of waste codes from one continuation sheet to the next, to reflect the total number of wastes being shipped. Refer to instructions for Item 9 of the

manifest for the information to be entered.

Item 28. Containers (No. And Type)

Refer to the instructions for Item 10 of the manifest for information to be entered.

Item 29. Total Quantity

Refer to the instructions for Item 11 of the manifest form.

Item 30. Units of Measure (Weight/Volume)

Refer to the instructions for Item 12 of the manifest form.

Item 31. Waste Codes

Refer to the instructions for Item 13 of the manifest form.

Item 32. Special Handling Instructions and Additional Information

Refer to the instructions for Item 14 of the manifest form.

Transporters

Item 33. Transporter - Acknowledgment of Receipt of Materials

Enter the same number of the Transporter as identified in Item 25. Enter also the name of the person accepting the waste on behalf of the Transporter (Company Name) identified in Item 25. That person shall acknowledge acceptance of the waste described on the Manifest by signing and entering the date of receipt.

Item 34. Transporter - Acknowledgment of Receipt of Materials

Enter the same number of the Transporter as identified in Item 26. Enter also the name of the person accepting the waste on behalf of the Transporter (Company Name) identified in Item 26. That person shall acknowledge acceptance of the waste described on the Manifest by signing and entering the date of receipt.

Owner and Operators of Treatment, Storage, or Disposal Facilities

Item 35. Discrepancy Indication Space

Refer to Item 18. This space may be used to more fully describe information on discrepancies identified in Item 18a of the manifest form.

Item 36. Hazardous Waste Report Management Method Codes

For each field here, enter the sequential number that corresponds to the waste materials described under Item 27, and enter the appropriate process code that describes how the materials will be processed when received. If additional continuation sheets are attached, continue numbering the waste materials and process code fields sequentially, and enter on each sheet the process codes corresponding to the waste materials identified on that sheet.

R315-262-230. Alternative Standards for Episodic Generation -- Applicability.

Sections R315-262-230 through 233 are applicable to very small quantity generators and small quantity generators as defined in Section R315-260-10.

R315-262-231. Alternative Standards for Episodic Generation -- Definitions for Sections R315-262-230 Through 233.

(a) "Episodic event" means an activity or activities, either planned or unplanned, that does not normally occur during generator operations, resulting in an increase in the generation of hazardous wastes that exceeds the calendar month quantity limits for the generator's usual category.

(b) "Planned episodic event" means an episodic event that the generator planned and prepared for, including regular maintenance, tank cleanouts, short-term projects, and removal of excess chemical inventory

(c) "Unplanned episodic event" means an episodic event that the generator did not plan or reasonably did not expect to occur, including production process upsets, product recalls, accidental spills, or "acts of nature," such as tornado, hurricane, or flood.

R315-262-232. Alternative Standards for Episodic Generation -- Conditions for a Generator Managing Hazardous Waste from an Episodic Event.

(a) Very small quantity generator. A very small quantity generator may maintain its existing generator category for hazardous waste generated during an episodic event provided that the generator complies with the following conditions:

(1) The very small quantity generator is limited to one episodic event per calendar year, unless a petition is granted under Section R315-262-233;

(2) Notification. The very small quantity generator shall notify the Director no later than thirty (30) calendar days prior to initiating a planned episodic event using EPA Form 8700-12. In the event of an unplanned episodic event, the generator shall notify the Director within 72 hours of the unplanned event via phone, email, or fax and subsequently submit EPA Form 8700-12. The generator shall include the start date and end date of the episodic event, the reason(s) for the event, types and estimated quantities of hazardous waste expected to be generated as a result of the episodic event, and shall identify a facility contact and emergency coordinator with 24-hour telephone access to discuss the notification submittal or respond to an emergency in compliance with Subsection R315-262-16(b)(9)(i);

(3) EPA ID Number. The very small quantity generator shall have an EPA identification number or obtain an EPA identification number using EPA Form 8700-12;

(4) Accumulation. A very small quantity generator is prohibited from accumulating hazardous waste generated from an episodic event on drip pads and in containment buildings. When accumulating hazardous waste in containers and tanks the following conditions apply:

(i) Containers. A very small quantity generator accumulating in containers shall mark or label its containers with the following:

(A) The words "Episodic Hazardous Waste";

(B) An indication of the hazards of the contents, examples include:

(I) the applicable hazardous waste characteristic(s), i.e., ignitable, corrosive, reactive, toxic;

(II) hazard communication consistent with the Department of Transportation requirements at 49 CFR part 172 subpart E, labeling, or subpart F, placarding;

(III) a hazard statement or pictogram consistent with the Occupational Safety and Health Administration Hazard Communication Standard at 29 CFR 1910.1200; or

(IV) a chemical hazard label consistent with the National Fire Protection Association code 704; and

(C) The date upon which the episodic event began, clearly visible for inspection on each container.

(ii) Tanks. A very small quantity generator accumulating episodic hazardous waste in tanks shall do the following:

(A) Mark or label the tank with the words "Episodic Hazardous Waste";

(B) Mark or label its tanks with an indication of the hazards of the contents, examples include, but are not limited to:

(I) the applicable hazardous waste characteristic(s), i.e., ignitable, corrosive, reactive, toxic;

(II) hazard communication consistent with the Department of Transportation requirements at 49 CFR part 172 subpart E, labeling, or subpart F, placarding;

(III) a hazard statement or pictogram consistent with the Occupational Safety and Health Administration Hazard Communication Standard at 29 CFR 1910.1200; or

(IV) a chemical hazard label consistent with the National Fire Protection Association code 704;

(C) Use inventory logs, monitoring equipment or other

records to identify the date upon which each episodic event begins; and

(D) Keep inventory logs or records with the above information on site and readily available for inspection.

(iii) Hazardous waste shall be managed in a manner that minimizes the possibility of a fire, explosion, or release of hazardous waste or hazardous waste constituents to the air, soil, or water;

(A) Containers shall be in good condition and compatible with the hazardous waste being accumulated therein. Containers shall be kept closed except to add or remove waste; and

(B) Tanks shall be in good condition and compatible with the hazardous waste accumulated therein. Tanks shall have procedures in place to prevent the overflow (e.g., be equipped with a means to stop inflow with systems such as a waste feed cutoff system or bypass system to a standby tank when hazardous waste is continuously fed into the tank). Tanks shall be inspected at least once each operating day to ensure all applicable discharge control equipment, such as waste feed cutoff systems, bypass systems, and drainage systems are in good working order and to ensure the tank is operated according to its design by reviewing the data gathered from monitoring equipment such as pressure and temperature gauges from the inspection.

(5) The very small quantity generator shall comply with the hazardous waste manifest provisions of Sections R315-262-20 through 27 when it sends its episodic event hazardous waste off site to a designated facility, as defined in Section R315-260-10.

(6) The very small quantity generator has up to sixty (60) calendar days from the start of the episodic event to manifest and send its hazardous waste generated from the episodic event to a designated facility, as defined in Section R315-260-10.

(7) Very small quantity generators shall maintain the following records for three (3) years from the end date of the episodic event:

(i) Beginning and end dates of the episodic event;

(ii) A description of the episodic event;

(iii) A description of the types and quantities of hazardous wastes generated during the event;

(iv) A description of how the hazardous waste was managed as well as the name of the designated facility that received the hazardous waste;

(v) Name(s) of hazardous waste transporters; and

(vi) An approval letter from the Director if the generator petitioned to conduct one additional episodic event per calendar year.

(b) Small quantity generators. A small quantity generator may maintain its existing generator category during an episodic event provided that the generator complies with the following conditions:

(1) The small quantity generator is limited to one episodic event per calendar year unless a petition is granted under Section R315-262-233;

(2) Notification. The small quantity generator shall notify the Director no later than thirty (30) calendar days prior to initiating a planned episodic event using EPA Form 8700-12. In the event of an unplanned episodic event, the small quantity generator shall notify the Director within 72 hours of the unplanned event via phone, email, or fax, and subsequently submit EPA Form 8700-12. The small quantity generator shall include the start date and end date of the episodic event and the reason(s) for the event, types and estimated quantities of hazardous wastes expected to be generated as a result of the episodic event, and identify a facility contact and emergency coordinator with 24-hour telephone access to discuss the notification submittal or respond to emergency;

(3) EPA ID Number. The small quantity generator shall have an EPA identification number or obtain an EPA identification number using EPA Form 8700-12; and

(4) Accumulation by small quantity generators. A small quantity generator is prohibited from accumulating hazardous wastes generated from an episodic event waste on drip pads and in containment buildings. When accumulating hazardous waste generated from an episodic event in containers and tanks, the following conditions apply:

(i) Containers. A small quantity generator accumulating episodic hazardous waste in containers shall meet the standards at Subsection R315-262-16(b)(2) and shall mark or label its containers with the following:

(A) The words "Episodic Hazardous Waste";

(B) An indication of the hazards of the contents, examples include, but are not limited to:

(I) the applicable hazardous waste characteristic(s), i.e., ignitable, corrosive, reactive, toxic;

(II) hazard communication consistent with the Department of Transportation requirements at 49 CFR part 172 subpart E, labeling, or subpart F, placarding;

(III) a hazard statement or pictogram consistent with the Occupational Safety and Health Administration Hazard Communication Standard at 29 CFR 1910.1200; or

(IV) a chemical hazard label consistent with the National Fire Protection Association code 704; and

(C) The date upon which the episodic event began, clearly visible for inspection on each container.

(ii) Tanks. A small quantity generator accumulating episodic hazardous waste in tanks shall meet the standards at Subsection R315-262-16(b)(3) and shall do the following:

(A) Mark or label its tank with the words "Episodic Hazardous Waste";

(B) Mark or label its tanks with an indication of the hazards of the contents, examples include, but are not limited to:

(I) the applicable hazardous waste characteristic(s), i.e., ignitable, corrosive, reactive, toxic;

(II) hazard communication consistent with the Department of Transportation requirements at 49 CFR part 172 subpart E, labeling, or subpart F, placarding;

(III) a hazard statement or pictogram consistent with the Occupational Safety and Health Administration Hazard Communication Standard at 29 CFR 1910.1200; or

(IV) a chemical hazard label consistent with the National Fire Protection Association code 704;

(C) Use inventory logs, monitoring equipment or other records to identify the date upon which each period of accumulation begins and ends; and

(D) Keep inventory logs or records with the above information on site and available for inspection.

(5) The small quantity generator shall treat hazardous waste generated from an episodic event on site or manifest and ship such hazardous waste off site to a designated facility (as defined by Section R315-260-10) within sixty (60) calendar days from the start of the episodic event.

(6) The small quantity generator shall maintain the following records for three (3) years from the end date of the episodic event:

(i) Beginning and end dates of the episodic event;

(ii) A description of the episodic event;

(iii) A description of the types and quantities of hazardous wastes generated during the event;

(iv) A description of how the hazardous waste was managed as well as the name of the designated facility (as defined by Section R315-260-10) that received the hazardous waste;

(v) Name(s) of hazardous waste transporters; and

(vi) An approval letter from the Director if the generator petitioned to conduct one additional episodic event per calendar year.

R315-262-233 Alternative Standards for Episodic Generation -- Petition to Manage One Additional Episodic Event Per Calendar Year.

(a) A generator may petition the Director for a second episodic event in a calendar year without impacting its generator category under the following conditions:

(1) If a very small quantity generator or small quantity generator has already held a planned episodic event in a calendar year, the generator may petition the Director for an additional unplanned episodic event in that calendar year within 72 hours of the unplanned event.

(2) If a very small quantity generator or small quantity generator has already held an unplanned episodic event in a calendar year, the generator may petition the Director for an additional planned episodic event in that calendar year.

(b) The petition shall include the following:

(1) The reason(s) why an additional episodic event is needed and the nature of the episodic event;

(2) The estimated amount of hazardous waste to be managed from the event;

(3) How the hazardous waste is to be managed;

(4) The estimated length of time needed to complete management of the hazardous waste generated from the episodic event - not to exceed sixty (60) days; and

(5) Information regarding the previous episodic event managed by the generator, including the nature of the event, whether it was a planned or unplanned event, and how the generator complied with the conditions.

(c) The petition shall be made to the Director in writing, either on paper or electronically.

(d) The generator shall retain written approval in its records for three (3) years from the date the episodic event ended.

R315-262-250. Preparedness, Prevention, and Emergency Procedures for Large Quantity Generators -- Applicability.

The regulations of Sections R315-262-250 through 265 apply to those areas of a large quantity generator where hazardous waste is generated or accumulated on site.

R315-262-251. Preparedness, Prevention, and Emergency Procedures for Large Quantity Generators -- Maintenance and Operation of Facility.

A large quantity generator shall maintain and operate its facility to minimize the possibility of a fire, explosion, or any unplanned sudden or non-sudden release of hazardous waste or hazardous waste constituents to air, soil, or surface water which could threaten human health or the environment.

R315-262-252. Preparedness, Prevention, and Emergency Procedures for Large Quantity Generators -- Required Equipment.

All areas deemed applicable by Section R315-262-250 shall be equipped with the items in Subsections R315-262-252(a) through (d) (unless none of the hazards posed by waste handled at the facility could require a particular kind of equipment specified below or the actual hazardous waste generation or accumulation area does not lend itself for safety reasons to have a particular kind of equipment specified below). A large quantity generator may determine the most appropriate locations within its facility to locate equipment necessary to prepare for and respond to emergencies:

(a) An internal communications or alarm system capable of providing immediate emergency instruction (voice or signal) to facility personnel;

(b) A device, such as a telephone (immediately available at the scene of operations) or a hand-held two-way radio, capable of summoning emergency assistance from local police departments, fire departments, or state or local emergency response teams;

(c) Portable fire extinguishers, fire control equipment (including special extinguishing equipment, such as that using foam, inert gas, or dry chemicals), spill control equipment, and decontamination equipment; and

(d) Water at adequate volume and pressure to supply water hose streams, or foam producing equipment, or automatic sprinklers, or water spray systems.

R315-262-253. Preparedness, Prevention, and Emergency Procedures for Large Quantity Generators -- Testing and Maintenance of Equipment.

All communications or alarm systems, fire protection equipment, spill control equipment, and decontamination equipment, where required, shall be tested and maintained as necessary to assure its proper operation in time of emergency.

R315-262-254. Preparedness, Prevention, and Emergency Procedures for Large Quantity Generators -- Access to Communications or Alarm System.

(a) Whenever hazardous waste is being poured, mixed, spread, or otherwise handled, all personnel involved in the operation shall have immediate access (e.g., direct or unimpeded access) to an internal alarm or emergency communication device, either directly or through visual or voice contact with another employee, unless such a device is not required under Section R315-262-252.

(b) In the event there is just one employee on the premises while the facility is operating, the employee shall have immediate access, e.g., direct or unimpeded access, to a device, such as a telephone, immediately available at the scene of operation, or a hand-held two-way radio, capable of summoning external emergency assistance, unless such a device is not required under Section R315-262-252.

R315-262-255. Preparedness, Prevention, and Emergency Procedures for Large Quantity Generators -- Required Aisle Space.

The large quantity generator shall maintain aisle space to allow the unobstructed movement of personnel, fire protection equipment, spill control equipment, and decontamination equipment to any area of facility operation in an emergency, unless aisle space is not needed for any of these purposes.

R315-262-256. Preparedness, Prevention, and Emergency Procedures for Large Quantity Generators -- Arrangements with Local Authorities.

(a) The large quantity generator shall attempt to make arrangements with the local police department, fire department, other emergency response teams, emergency response contractors, equipment suppliers, and local hospitals, taking into account the types and quantities of hazardous wastes handled at the facility. Arrangements may be made with the Local Emergency Planning Committee, if it is determined to be the appropriate organization with which to make arrangements.

(1) A large quantity generator attempting to make arrangements with its local fire department shall determine the potential need for the services of the local police department, other emergency response teams, emergency response contractors, equipment suppliers and local hospitals.

(2) As part of this coordination, the large quantity generator shall attempt to make arrangements, as necessary, to familiarize the above organizations with the layout of the facility, the properties of the hazardous waste handled at the facility and associated hazards, places where personnel would normally be working, entrances to roads inside the facility, and possible evacuation routes as well as the types of injuries or illnesses which could result from fires, explosions, or releases at the facility.

(3) Where more than one police or fire department might respond to an emergency, the large quantity generator shall attempt to make arrangements designating primary emergency authority to a specific fire or police department, and arrangements with any others to provide support to the primary emergency authority.

(b) The large quantity generator shall maintain records documenting the arrangements with the local fire department as well as any other organization necessary to respond to an emergency. This documentation shall include documentation in the operating record that either confirms such arrangements actively exist or, in cases where no arrangements exist, confirms that attempts to make such arrangements were made.

(c) A facility possessing 24-hour response capabilities may seek a waiver from the State Fire Marshal or locality as far as needing to make arrangements with the local fire department as well as any other organization necessary to respond to an emergency, provided that the waiver is documented in the operating record.

R315-262-260. Preparedness, Prevention, and Emergency Procedures for Large Quantity Generators -- Purpose and Implementation of Contingency Plan.

(a) A large quantity generator shall have a contingency plan for the facility. The contingency plan shall be designed to minimize hazards to human health or the environment from fires, explosions, or any unplanned sudden or non-sudden release of hazardous waste or hazardous waste constituents to air, soil, or surface water.

(b) The provisions of the plan shall be carried out immediately whenever there is a fire, explosion, or release of hazardous waste or hazardous waste constituents which could threaten human health or the environment.

R315-262-261. Preparedness, Prevention, and Emergency Procedures for Large Quantity Generators -- Content of Contingency Plan.

(a) The contingency plan shall describe the actions facility personnel shall take to comply with Sections R315-262-260 and 265 in response to fires, explosions, or any unplanned sudden or non-sudden release of hazardous waste or hazardous waste constituents to air, soil, or surface water at the facility.

(b) If the generator has already prepared a Spill Prevention, Control, and Countermeasures (SPCC) Plan in accordance with some other emergency or contingency plan, it need only amend that plan to incorporate hazardous waste management provisions that are sufficient to comply with the standards of Rule R315-262. The generator may develop one contingency plan that meets all regulatory standards. The plan should be based on the National Response Team's Integrated Contingency Plan Guidance, "One Plan."

(c) The plan shall describe arrangements agreed to with the local police department, fire department, other emergency response teams, emergency response contractors, equipment suppliers, local hospitals or, if applicable, the Local Emergency Planning Committee, pursuant to Section R315-262-256.

(d) The plan shall list names and emergency telephone numbers of all persons qualified to act as emergency coordinator (see Section R315-262-264), and this list shall be kept up to date. Where more than one person is listed, one shall be named as primary emergency coordinator and others shall be listed in the order in which they will assume responsibility as alternates. In situations where the generator facility has an emergency coordinator continuously on duty because it operates 24 hours per day, every day of the year, the plan may list the staffed position, e.g., operations manager, shift coordinator, shift operations supervisor, as well as an emergency telephone number that can be guaranteed to be answered at all times.

(e) The plan shall include a list of all emergency equipment at the facility, such as fire extinguishing systems, spill control equipment, communications and alarm systems, internal and external, and decontamination equipment, where this equipment is required. This list shall be kept up to date. In addition, the plan shall include the location and a physical description of each item on the list, and a brief outline of its capabilities.

(f) The plan shall include an evacuation plan for generator personnel where there is a possibility that evacuation could be necessary. This plan shall describe signal(s) to be used to begin evacuation, evacuation routes, and alternate evacuation routes, in cases where the primary routes could be blocked by releases of hazardous waste or fires.

R315-262-262. Preparedness, Prevention, and Emergency Procedures for Large Quantity Generators -- Copies of Contingency Plan.

A copy of the contingency plan and all revisions to the plan shall be maintained at the large quantity generator and:

(a) The large quantity generator shall submit a copy of the contingency plan and all revisions to all local emergency responders (i.e., police departments, fire departments, hospitals and State and local emergency response teams that may be called upon to provide emergency services). This document may also be submitted to the Local Emergency Planning Committee, as appropriate.

(b) A large quantity generator that first becomes subject to these provisions after May 30, 2017 or a large quantity generator that is otherwise amending its contingency plan shall at that time submit a quick reference guide of the contingency plan to the local emergency responders identified at Subsection R315-262-262(a) or, as appropriate, the Local Emergency Planning Committee. The quick reference guide shall include the following elements:

(1) The types/names of hazardous wastes in layman's terms and the associated hazard associated with each hazardous waste present at any one time, e.g., toxic paint wastes, spent ignitable solvent, corrosive acid;

(2) The estimated maximum amount of each hazardous waste that may be present at any one time;

(3) The identification of any hazardous wastes where exposure would require unique or special treatment by medical or hospital staff;

(4) A map of the facility showing where hazardous wastes are generated, accumulated and treated and routes for accessing these wastes;

(5) A street map of the facility in relation to surrounding businesses, schools and residential areas to understand how best to get to the facility and also evacuate citizens and workers;

(6) The locations of water supply, e.g., fire hydrant and its flow rate;

(7) The identification of on-site notification systems, e.g., a fire alarm that rings off site, smoke alarms; and

(8) The name of the emergency coordinator(s) and 7/24-hour emergency telephone number(s) or, in the case of a facility where an emergency coordinator is continuously on duty, the emergency telephone number for the emergency coordinator.

(c) Generators shall update, if necessary, their quick reference guides, whenever the contingency plan is amended and submit these documents to the local emergency responders identified at Subsection R315-262-262(a) or, as appropriate, the Local Emergency Planning Committee.

R315-262-263. Preparedness, Prevention, and Emergency Procedures for Large Quantity Generators -- Amendment of Contingency Plan.

The contingency plan shall be reviewed, and immediately amended, if necessary, whenever:

(a) Applicable regulations are revised;

(b) The plan fails in an emergency;

(c) The generator facility changes--in its design, construction, operation, maintenance, or other circumstances--in a way that materially increases the potential for fires, explosions, or releases of hazardous waste or hazardous waste constituents, or changes the response necessary in an emergency;

(d) The list of emergency coordinators changes; or

(e) The list of emergency equipment changes.

R315-262-264. Preparedness, Prevention, and Emergency Procedures for Large Quantity Generators -- Emergency Coordinator.

At all times, there shall be at least one employee either on the generator's premises or on call, i.e., available to respond to an emergency by reaching the facility within a short period of time, with the responsibility for coordinating all emergency response measures and implementing the necessary emergency procedures outlined in Section R315-262-265. Although responsibilities may vary depending on factors such as type and variety of hazardous waste(s) handled by the facility, as well as type and complexity of the facility, this emergency coordinator shall be thoroughly familiar with all aspects of the generator's contingency plan, all operations and activities at the facility, the location and characteristics of hazardous waste handled, the location of all records within the facility, and the facility's layout. In addition, this person shall have the authority to commit the resources needed to carry out the contingency plan.

R315-262-265. Preparedness, Prevention, and Emergency Procedures for Large Quantity Generators -- Emergency Procedures.

(a) Whenever there is an imminent or actual emergency situation, the emergency coordinator (or designee when the emergency coordinator is on call) shall immediately:

(1) Activate internal facility alarms or communication systems, where applicable, to notify all facility personnel; and

(2) Notify appropriate state or local agencies with designated response roles if their help is needed.

(b) Whenever there is a release, fire, or explosion, the emergency coordinator shall immediately identify the character, exact source, amount, and areal extent of any released materials. The emergency coordinator may do this by observation or review of the facility records or manifests and, if necessary, by chemical analysis.

(c) Concurrently, the emergency coordinator shall assess possible hazards to human health or the environment that may result from the release, fire, or explosion. This assessment shall consider both direct and indirect effects of the release, fire, or explosion, e.g., the effects of any toxic, irritating, or asphyxiating gases that are generated, or the effects of any hazardous surface water run-offs from water or chemical agents used to control fire and heat-induced explosions.

(d) If the emergency coordinator determines that the facility has had a release, fire, or explosion which could threaten human health, or the environment, outside the facility, the emergency coordinator shall report the findings as follows:

(1) If the assessment indicates that evacuation of local areas may be advisable, the emergency coordinator shall immediately notify appropriate local authorities. The emergency coordinator shall be available to help appropriate officials decide whether local areas should be evacuated; and

(2) The emergency coordinator shall immediately notify either the government official designated as the on-scene coordinator for that geographical area, or the National Response Center, using their 24-hour toll free number 800-424-8802, and the Division of Waste Management and Radiation Control at 801-536-0200 or after hours at 801-536-4123. The report shall include:

(i) Name and telephone number of reporter;

(ii) Name and address of the generator;

(iii) Time and type of incident (e.g., release, fire);

(iv) Name and quantity of material(s) involved, to the extent known;

(v) The extent of injuries, if any; and

(vi) The possible hazards to human health, or the environment, outside the facility.

(e) During an emergency, the emergency coordinator shall take all reasonable measures necessary to ensure that fires, explosions, and releases do not occur, recur, or spread to other hazardous waste at the generator's facility. These measures shall include, where applicable, stopping processes and operations, collecting and containing released hazardous waste, and removing or isolating containers.

(f) If the generator stops operations in response to a fire, explosion or release, the emergency coordinator shall monitor for leaks, pressure buildup, gas generation, or ruptures in valves, pipes, or other equipment, wherever this is appropriate.

(g) Immediately after an emergency, the emergency coordinator shall provide for treating, storing, or disposing of recovered waste, contaminated soil or surface water, or any other material that results from a release, fire, or explosion at the facility. Unless the generator can demonstrate, in accordance with Subsections R315-261-3(c) or (d), that the recovered material is not a hazardous waste, then it is a newly generated hazardous waste that shall be managed in accordance with all the applicable requirements and conditions for exemption in Rules R315-262, 263, and 265.

(h) The emergency coordinator shall ensure that, in the affected area(s) of the facility:

(1) No hazardous waste that may be incompatible with the released material is treated, stored, or disposed of until cleanup procedures are completed; and

(2) All emergency equipment listed in the contingency plan is cleaned and fit for its intended use before operations are resumed.

(i) The generator shall note in the operating record the time, date, and details of any incident that requires implementing the contingency plan. Within 15 days after the incident, the generator shall submit a written report on the incident to the Director. The report shall include:

(I) Name, address, and telephone number of the generator;

(II) Date, time, and type of incident, e.g., fire, explosion;

(III) Name and quantity of material(s) involved;

(IV) The extent of injuries, if any;

(V) An assessment of actual or potential hazards to human health or the environment, where this is applicable; and

(VI) Estimated quantity and disposition of recovered material that resulted from the incident.

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R315. Environmental Quality, Waste Management and Radiation Control, Waste Management.
R315-263. Standards Applicable to Transporters of Hazardous Waste and Standards Applicable to Emergency Control of Spills for All Hazardous Waste Handlers.
R315-263-10. Scope.

(a) Sections R315-263-11, 12, 20, 21, 22, 25, and 34 establish standards which apply to persons transporting hazardous waste within Utah if the transportation requires a manifest under Rule R315-262.

(b) Sections R315-263-11, 12, 20, 21, 22, 25, and 34 do not apply to on-site transportation of hazardous waste by generators or by owners or operators of permitted hazardous waste management facilities.

(c) A transporter of hazardous waste shall also comply with Rule R315-262 if he:

(1) Transports hazardous waste into Utah; or

(2) Mixes hazardous wastes of different DOT shipping descriptions by placing them into a single container.

(d) A transporter of hazardous waste that is being imported from or exported to any other country for purposes of recovery or disposal is subject to Sections R315-263-10 through 263-12 and to all other relevant requirements of Sections R315-262-80 through 262-84, including, but not limited to, Subsections R315-262-83(d) and 262-84(d) for movement documents.

(e) Reserved

(f) Reserved

(g) Sections R315-263-30, 31, 32, and 33 apply to all handlers of hazardous waste or material that when spilled may become a hazardous waste.

R315-263-11. EPA Identification Number.

(a) A transporter shall not transport hazardous wastes without having received an EPA identification number from the Director.

(b) A transporter who has not received an EPA identification number may obtain one by applying to the Director using EPA Form 8700-12. Upon receiving the request, the Director shall assign an EPA identification number to the transporter.

R315-263-12. Transfer Facility Requirements.

(a) A transporter who stores manifested shipments of hazardous waste in containers meeting the independent requirements of Section R315-262-30 at a transfer facility for a period of ten (10) days or less is not subject to regulation under Rules R315-264, 265, 268, and 270 with respect to the storage of those wastes.

(b) When consolidating the contents of two or more containers with the same hazardous waste into a new container, or when combining and consolidating two different hazardous wastes that are compatible with each other, the transporter must mark its containers of 119 gallons or less with the following information:

(1) The words "Hazardous Waste" and

(2) The applicable EPA hazardous waste number(s), EPA hazardous waste codes, in Sections R315-261-20 through 24 and 30 through 35, or in compliance with Section R315-262-32(c).

R315-263-20. The Manifest System.

(a)(1) Manifest requirement. A transporter may not accept hazardous waste from a generator unless the transporter is also provided with a manifest form; EPA Form 8700-22, and if necessary, EPA Form 8700-22A; signed in accordance with the requirement of Section R315-262-23, or is provided with an electronic manifest that is obtained, completed, and transmitted in accordance with Subsection R315-262-20(a)(3), and signed with a valid and enforceable electronic signature as described in Section R315-262-25.

(2) Exports. For exports of hazardous waste subject to the requirements of Sections R315-262-80 through 262-84, a transporter may not accept hazardous waste without a manifest signed by the generator in accordance with Section R315-263-20, as appropriate, and for exports occurring under the terms of consent issued by EPA on or after December 31, 2016, a movement document that includes all information require by Subsection R315-262-83(d).

(3) Compliance date for form revisions. The revised Manifest form and procedures in Sections R315-260-10, 261-7, 263-20, and 263-21, had an effective date of September 5, 2006.

(4) Use of electronic manifest-legal equivalence to paper forms for participating transporters. Electronic manifests that are obtained, completed, and transmitted in accordance with Subsection R315-262-20(a)(3), and used in accordance with Section R315-263-20 in lieu of EPA Forms 8700-22 and 8700-22A, are the legal equivalent of paper manifest forms bearing handwritten signatures, and satisfy for all purposes any requirement in these regulations to obtain, complete, sign, carry, provide, give, use, or retain a manifest.

(i) Any requirement in these regulations to sign a manifest or manifest certification by hand, or to obtain a handwritten signature, is satisfied by signing with or obtaining a valid and enforceable electronic signature within the meaning of Section R315-262-25.

(ii) Any requirement in these regulations to give, provide, send, forward, or return to another person a copy of the manifest is satisfied when a copy of an electronic manifest is transmitted to the other person by submission to the system.

(iii) Any requirement in these regulations for a manifest to accompany a hazardous waste shipment is satisfied when a copy of an electronic manifest is accessible during transportation and forwarded to the person or persons who are scheduled to receive delivery of the waste shipment, except that to the extent that the Hazardous Materials regulation on shipping papers for carriage by public highway requires transporters of hazardous materials to carry a paper document to comply with 49 CFR 177.817, a hazardous waste transporter shall carry one printed copy of the electronic manifest on the transport vehicle.

(iv) Any requirement in these regulations for a transporter to keep or retain a copy of a manifest is satisfied by the retention of an electronic manifest in the transporter's account on the e-Manifest system, provided that such copies are readily available for viewing and production if requested by any EPA or Utah inspector.

(v) No transporter may be held liable for the inability to produce an electronic manifest for inspection under Section R315-263-20 if that transporter can demonstrate that the inability to produce the electronic manifest is exclusively due to a technical difficulty with the EPA system for which the transporter bears no responsibility.

(5) A transporter may participate in the electronic manifest system either by accessing the electronic manifest system from the transporter's own electronic equipment, or by accessing the electronic manifest system from the equipment provided by a participating generator, by another transporter, or by a designated facility.

(6) Special procedures when electronic manifest is not available. If after a manifest has been originated electronically and signed electronically by the initial transporter, and the electronic manifest system should become unavailable for any reason, then:

(i) The transporter in possession of the hazardous waste when the electronic manifest becomes unavailable shall reproduce sufficient copies of the printed manifest that is carried on the transport vehicle pursuant to Subsection R315-263-20(a)(4)(iii)(A), or obtain and complete another paper manifest for this purpose. The transporter shall reproduce sufficient

copies to provide the transporter and all subsequent waste handlers with a copy for their files, plus two additional copies that will be delivered to the designated facility with the hazardous waste.

(ii) On each printed copy, the transporter shall include a notation in the Special Handling and Additional Description space, Item 14, that the paper manifest is a replacement manifest for a manifest originated in the electronic manifest system, shall include, if not pre-printed on the replacement manifest, the manifest tracking number of the electronic manifest that is replaced by the paper manifest, and shall also include a brief explanation why the electronic manifest was not available for completing the tracking of the shipment electronically.

(iii) A transporter signing a replacement manifest to acknowledge receipt of the hazardous waste shall ensure that each paper copy is individually signed and that a legible handwritten signature appears on each copy.

(iv) From the point at which the electronic manifest is no longer available for tracking the waste shipment, the paper replacement manifest copies shall be carried, signed, retained as records, and given to a subsequent transporter or to the designated facility, following the instructions, procedures, and requirements that apply to the use of all other paper manifests.

(7) Special procedures for electronic signature methods undergoing tests. If a transporter using an electronic manifest signs this manifest electronically using an electronic signature method which is undergoing pilot or demonstration tests aimed at demonstrating the practicality or legal dependability of the signature method, then the transporter shall sign the electronic manifest electronically and also sign with an ink signature the transporter acknowledgement of receipt of materials on the printed copy of the manifest that is carried on the vehicle in accordance with Subsection R315-263-20(a)(4)(iii)(A). This printed copy bearing the generator's and transporter's ink signatures shall also be presented by the transporter to the designated facility to sign in ink to indicate the receipt of the waste materials or to indicate discrepancies. After the owner/operator of the designated facility has signed this printed manifest copy with its ink signature, the printed manifest copy shall be delivered to the designated facility with the waste materials.

(8) Imposition of user fee for electronic manifest use. A transporter who is a user of the electronic manifest may be assessed a user fee by EPA for the origination or processing of each electronic manifest. EPA shall maintain and update from time-to-time the current schedule of electronic manifest user fees, which shall be determined based on current and projected system costs and level of use of the electronic manifest system. The current schedule of electronic manifest user fees shall be published as an appendix to 40 CFR part 262.

(b) Before transporting the hazardous waste, the transporter shall sign and date the manifest acknowledging acceptance of the hazardous waste from the generator. The transporter shall return a signed copy to the generator before leaving the generator's property.

(c) The transporter shall ensure that the manifest accompanies the hazardous waste. In the case of exports occurring under the terms of a consent issued by EPA to the exporter on or after December 31, 2016, the transporter shall ensure that a movement document that includes all information required by Subsection R315-262-83(d) also accompanies the hazardous waste. In the case of imports occurring under the terms of a consent issued by EPA to the country of export or the importer on or after December 31, 2016, the transporter shall ensure that a movement document that includes all information required by Subsection R315-262-84(d) also accompanies the hazardous waste.

(d) A transporter who delivers a hazardous waste to another transporter or to the designated facility shall:

(1) Obtain the date of delivery and the handwritten signature of that transporter or of the owner or operator of the designated facility on the manifest; and

(2) Retain one copy of the manifest in accordance with Section R315-263-22; and

(3) Give the remaining copies of the manifest to the accepting transporter or designated facility.

(e) The requirements of Subsections R315-263-20(c), (d) and (f) do not apply to water, bulk shipment, transporters if:

(1) The hazardous waste is delivered by water, bulk shipment, to the designated facility; and

(2) A shipping paper containing all the information required on the manifest; excluding the EPA identification numbers, generator certification, and signatures; and, for exports or imports occurring under the terms of a consent issued by EPA on or after December 31, 2016, a movement document that includes all information required by Subsections R315-262-83(d) or 262-84(d) accompanies the hazardous waste; and

(3) The delivering transporter obtains the date of delivery and handwritten signature of the owner or operator of the designated facility on either the manifest or the shipping paper; and

(4) The person delivering the hazardous waste to the initial water, bulk shipment, transporter obtains the date of delivery and signature of the water, bulk shipment, transporter on the manifest and forwards it to the designated facility; and

(5) A copy of the shipping paper or manifest is retained by each water, bulk shipment, transporter in accordance with Section R315-263-22.

(f) For shipments involving rail transportation, the requirements of Subsections R315-263-20(c), (d) and (e) do not apply and the following requirements do apply:

(1) When accepting hazardous waste from a non-rail transporter, the initial rail transporter shall:

(i) Sign and date the manifest acknowledging acceptance of the hazardous waste;

(ii) Return a signed copy of the manifest to the non-rail transporter;

(iii) Forward at least three copies of the manifest to:

(A) The next non-rail transporter, if any; or

(B) The designated facility, if the shipment is delivered to that facility by rail; or

(C) The last rail transporter designated to handle the waste in the United States;

(iv) Retain one copy of the manifest and rail shipping paper in accordance with Section R315-263-22.

(2) Rail transporters shall ensure that a shipping paper containing all the information required on the manifest; excluding the EPA identification numbers, generator certification, and signatures; and, for exports or imports occurring under the terms of a consent issued by EPA on or after December 31, 2016, a movement document that includes all information required by Subsections R315-262-83(d) or 262-84(d) accompanies the hazardous waste at all times.

Note to Subsection R315-263-20(f)(2): Intermediate rail transporters are not required to sign the manifest, movement document, or shipping paper.

(3) When delivering hazardous waste to the designated facility, a rail transporter shall:

(i) Obtain the date of delivery and handwritten signature of the owner or operator of the designated facility on the manifest or the shipping paper, if the manifest has not been received by the facility; and

(ii) Retain a copy of the manifest or signed shipping paper in accordance with Section R315-263-22.

(4) When delivering hazardous waste to a non-rail transporter a rail transporter shall:

(i) Obtain the date of delivery and the handwritten signature of the next non-rail transporter on the manifest; and

(ii) Retain a copy of the manifest in accordance with Section R315-263-22.

(5) Before accepting hazardous waste from a rail transporter, a non-rail transporter shall sign and date the manifest and provide a copy to the rail transporter.

(g) Transporters who transport hazardous waste out of the United States shall:

(1) Sign and date the manifest in the International Shipments block to indicate the date that the shipment left the United States;

(2) Retain one copy in accordance with Subsection R315-263-22(d);

(3) Return a signed copy of the manifest to the generator; and

(4) For paper manifest only,

(i) Send a copy of the manifest to the e-Manifest system in accordance with the allowable methods specified in Subsection R315-264-71(a)(2)(v); and

(ii) For shipments initiated prior to the AES filing compliance date, when instructed by the exporter to do so, give a copy of the manifest to a U.S. Customs official at the point of departure from the United States.

(h) A transporter transporting hazardous waste from a generator who generates greater than 100 kilograms but less than 1000 kilograms of hazardous waste in a calendar month need not comply with the requirements of Section 315-263-20 or those of Section R315-263-22 provided that:

(1) The waste is being transported pursuant to a reclamation agreement as provided for in Subsection R315-262-20(e);

(2) The transporter records, on a log or shipping paper, the following information for each shipment:

(i) The name, address, and U.S. EPA Identification Number of the generator of the waste;

(ii) The quantity of waste accepted;

(iii) All DOT-required shipping information;

(iv) The date the waste is accepted; and

(3) The transporter carries this record when transporting waste to the reclamation facility; and

(4) The transporter retains these records for a period of at least three years after termination or expiration of the agreement.

R315-263-21. Compliance with the Manifest.

(a) The transporter shall deliver the entire quantity of hazardous waste which he has accepted from a generator or a transporter to:

(1) The designated facility listed on the manifest; or

(2) The alternate designated facility, if the hazardous waste cannot be delivered to the designated facility because an emergency prevents delivery; or

(3) The next designated transporter; or

(4) The place outside the United States designated by the generator.

(b)(1) If the hazardous waste cannot be delivered in accordance with Subsection R315-263-21(a) because of an emergency condition other than rejection of the waste by the designated facility, then the transporter shall contact the generator for further directions and shall revise the manifest according to the generator's instructions.

(2) If hazardous waste is rejected by the designated facility while the transporter is on the facility's premises, then the transporter shall obtain the following:

(i) For a partial load rejection or for regulated quantities of container residues, a copy of the original manifest that includes the facility's date and signature, and the Manifest Tracking Number of the new manifest that shall accompany the shipment, and a description of the partial rejection or container residue in the discrepancy block of the original manifest. The transporter shall retain a copy of this manifest in accordance with Section R315-263-22, and give the remaining copies of the original manifest to the rejecting designated facility. If the transporter is forwarding the rejected part of the shipment or a regulated container residue to an alternate facility or returning it to the generator, the transporter shall obtain a new manifest to accompany the shipment, and the new manifest shall include all of the information required in Subsections R315-264-72(e)(1) through (6) or (f)(1) through (6) or 40 CFR 265.72(e)(1) through (6) or (f)(1) through (6), which are adopted by reference.

(ii) For a full load rejection that will be taken back by the transporter, a copy of the original manifest that includes the rejecting facility's signature and date attesting to the rejection, the description of the rejection in the discrepancy block of the manifest, and the name, address, phone number, and Identification Number for the alternate facility or generator to whom the shipment shall be delivered. The transporter shall retain a copy of the manifest in accordance with Section R315-263-22, and give a copy of the manifest containing this information to the rejecting designated facility. If the original manifest is not used, then the transporter shall obtain a new manifest for the shipment and comply with Subsection R315-264-72(e)(1) through (6) or 40 CFR 265.72(e)(1) through (6), which are adopted by reference.

R315-263-22. Recordkeeping.

(a) A transporter of hazardous waste shall keep a copy of the manifest signed by the generator, himself, and the next designated transporter or the owner or operator of the designated facility for a period of three years from the date the hazardous waste was accepted by the initial transporter.

(b) For shipments delivered to the designated facility by water, bulk shipment, each water, bulk shipment, transporter shall retain a copy of the shipping paper containing all the information required in Subsection R315-263-20(e)(2) for a period of three years from the date the hazardous waste was accepted by the initial transporter.

(c) For shipments of hazardous waste by rail within the United States:

(1) The initial rail transporter shall keep a copy of the manifest and shipping paper with all the information required in Subsection R315-263-20(f)(2) for a period of three years from the date the hazardous waste was accepted by the initial transporter; and

(2) The final rail transporter shall keep a copy of the signed manifest, or the shipping paper if signed by the designated facility in lieu of the manifest, for a period of three years from the date the hazardous waste was accepted by the initial transporter.

Note: Intermediate rail transporters are not required to keep records pursuant to these regulations.

(d) A transporter who transports hazardous waste out of the United States shall keep a copy of the manifest indicating that the hazardous waste left the United States for a period of three years from the date the hazardous waste was accepted by the initial transporter.

(e) The periods of retention referred to in Section R315-263-22 are extended automatically during the course of any unresolved enforcement action regarding the regulated activity or as requested by the Director.

R315-263-25. Electronic Manifest Signatures.

(a) Electronic manifest signatures shall meet the criteria described in Section R315-262-25.

R315-263-30. Immediate Action.

In the event of a spill of hazardous waste or material which, when spilled, becomes hazardous waste, the person responsible for the material at the time of the spill shall

immediately:

(a) Take appropriate action to minimize the threat to human health and the environment.

(b) Notify the Utah State Department of Environmental Quality, 24-hour Answering Service, 801-536- 4123 if the following spill quantities are exceeded:

(1) One kilogram (2.2 pounds) of material listed in R315-261-31, and which is an acute hazardous waste identified with a hazard code of (H), or an acute hazardous Waste identified in R315-261-33(e). Notify for a spill of a lesser quantity if there is a potential threat to human health or the environment; or

(2) One hundred kilograms (220 pounds) of hazardous waste or material which, when spilled, becomes hazardous waste, other than a spill of wastes identified in Subsection R315-263-30(a)(1). Notify for a spill of a lesser quantity if there is a potential threat to human health or the environment.

(c) Provide the following information when reporting the spill:

(1) Name, phone number, and address of person responsible for the spill.

(2) Name, title, and phone number of individual reporting.

(3) Time and date of spill.

(4) Location of spill -- as specific as possible including nearest town, city, highway or waterway.

(5) Description contained on the manifest and the amount of material spilled.

(6) Cause of spill.

(7) Emergency action taken to minimize the threat to human health and the environment.

(d) An air, rail, highway, or water transporter who has discharged hazardous waste shall:

(1) Give notice, if required by 49 CFR 171.15 to the National Response Center, 800-424-8802 or 202- 426-2675; and

(2) Report in writing as required by 49 CFR 171.16 to the Director, Office of Hazardous Materials Regulations, Materials Transportation Bureau, Department of Transportation, Washington, D.C. 20590.

(e) A water, bulk shipment, transporter who has discharged hazardous waste shall give the same notice as required by 33 CFR 153.203 for oil and hazardous substances.

R315-263-31. Spill Clean-up.

The person responsible for the material at the time of the spill shall clean up all the spilled material and any residue or contaminated media or other material resulting from the spill or take action as may be required by the Director so that the spilled material, residue, or contaminated media no longer presents a hazard to human health or the environment as defined in Rule R315-101. The cleanup or other required actions shall be at the expense of the person responsible for the spill. If the person responsible for the spill fails to take the required action, the Department may take action and bill the responsible person.

R315-263-32. Emergency Control Variance.

If a spill of hazardous waste requires immediate removal to protect human health or the environment, as determined by the Director, a variance may be granted by the Director to the manifest and recordkeeping requirements of these rules until the spilled material and any residue or contaminated soil, water or other material resulting from the spill no longer presents an immediate hazard to human health or the environment, as determined by the Director.

R315-263-33. Reporting.

Within 15 days after any spill of hazardous waste or material which, when spilled, becomes hazardous waste, and is reported under Subsection R315-263-30(b), the person responsible for the material at the time of the spill shall submit to the Director a written report which contains the following information:

(a) The person's name, address, and telephone number;

(b) Date, time, location, and nature of the incident;

(c) Name and quantity of material(s) involved;

(d) The extent of injuries, if any;

(e) An assessment of actual or potential hazards to human health or the environment, where this is applicable; and

(f) The estimated quantity and disposition of recovered material that resulted from the incident.

R315-263-34. Compliance with Department of Transportation Regulations.

Transporters of hazardous waste shall comply with the following pertinent regulations of the U.S. Department of Transportation governing the transportation of hazardous materials for both interstate and intrastate shipments:

(a) 49 CFR 171, General Information Regulations and Definitions;

(b) 49 CFR 172, Hazardous Materials Table and Hazardous Material Communications Regulations;

(c) 49 CFR 173, Shippers -- General Requirements for Shipments and Packaging;

(d) 49 CFR 174, Carriage by Rail;

(e) 49 CFR 175, Carriage by Aircraft;

(f) 49 CFR 176, Carriage by Vessel;

(g) 49 CFR 177, Carriage by Public Highway;

(h) 49 CFR 178, Shipping Container Specification; and

(i) 49 CFR 179, Specifications for Tank Cars.

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R315. Environmental Quality, Waste Management and Radiation Control, Waste Management.

R315-264. Standards for Owners and Operators of Hazardous Waste Treatment, Storage, and Disposal Facilities.

R315-264-1. General -- Purpose, Scope and Applicability.

(a) The purpose of Rule R315-264 is to establish minimum State of Utah standards which define the acceptable management of hazardous waste.

(b) The standards in Rule R315-264 apply to owners and operators of all facilities which treat, store, or dispose of hazardous waste, except as specifically provided otherwise in Rules R315-264 or 261.

(c) Reserved

(d) The requirements of Rule R315-264 apply to a person disposing of hazardous waste by means of underground injection subject to a permit issued under an Underground Injection Control (UIC) program approved or promulgated under the Safe Drinking Water Act only to the extent they are required by 40 CFR 144.14. Rule R315-264 applies to the above-ground treatment or storage of hazardous waste before it is injected underground.

(e) The requirements of Rule R315-264 apply to the owner or operator of a POTW which treats, stores, or disposes of hazardous waste only to the extent they are included in a RCRA permit by rule granted to such a person under Rule R315-270.

(f) Reserved

(g) The requirements of Rule R315-264 do not apply to:

(1) The owner or operator of a facility permitted under Rules R315-301 through 320 to manage municipal or industrial solid waste, if the only hazardous waste the facility treats, stores, or disposes of is excluded from regulation under Rule R315-264 by Section R315-262-14;

(2) The owner or operator of a facility managing recyclable materials described in Subsections R315-261-6(a)(2), (3), and (4), except to the extent they are referred to in Rule R315-15 or Sections R315-266-20 through 23, 70, 80, or 100 through 112.

(3) A generator accumulating waste on site in compliance with Section R315-262-14, R315-262-15, R315-262-16, or R315-262-17;

(4) A farmer disposing of waste pesticides from his own use in compliance with Section R315-262-70; or

(5) The owner or operator of a totally enclosed treatment facility, as defined in Section R315-260-10.

(6) The owner or operator of an elementary neutralization unit or a wastewater treatment unit as defined in Section R315-260-10, provided that if the owner or operator is diluting hazardous ignitable (D001) wastes, other than the D001 High TOC Subcategory defined in Section R315-268-40, or reactive (D003) waste, to remove the characteristic before land disposal, the owner/operator shall comply with the requirements set out in Subsection R315-264-17(b).

(7) Reserved

(8)(i) Except as provided in Subsection R315-264-1(g)(8)(ii), a person engaged in treatment or containment activities during immediate response to any of the following situations:

(A) A discharge of a hazardous waste;

(B) An imminent and substantial threat of a discharge of hazardous waste;

(C) A discharge of a material which, when discharged, becomes a hazardous waste.

(ii) An owner or operator of a facility otherwise regulated by Rule R315-264 shall comply with all applicable requirements of Sections R315-264-30 through 35, 37 and 50 through 56.

(iii) Any person who is covered by Subsection R315-264-1(g)(8)(i) and who continues or initiates hazardous waste treatment or containment activities after the immediate response is over is subject to all applicable requirements of Rule R315-264 and 40 CFR 122 and 123 and Rule R315-124 for those activities.

(iv) In the case of an explosives or munitions emergency response, if a Federal, State, Tribal or local official acting within the scope of his or her official responsibilities, or an explosives or munitions emergency response specialist, determines that immediate removal of the material or waste is necessary to protect human health or the environment, that official or specialist may authorize the removal of the material or waste by transporters who do not have EPA identification numbers and without the preparation of a manifest. In the case of emergencies involving military munitions, the responding military emergency response specialist's organizational unit shall retain records for three years identifying the dates of the response, the responsible persons responding, the type and description of material addressed, and its disposition.

(9) A transporter storing manifested shipments of hazardous waste in containers meeting the requirements of Section R315-262-30 at a transfer facility for a period of ten days or less.

(10) The addition of absorbent material to waste in a container, as defined in Section R315-260-10, or the addition of waste to absorbent material in a container, provided that these actions occur at the time waste is first placed in the container; and Subsections R315-264-17(b), 264-171, and 264-172 are complied with.

(11) Universal waste handlers and universal waste transporters, as defined in Section R315-260-10, handling the wastes listed below. These handlers are subject to regulation under Rule R315-273, when handling the below listed universal wastes.

(i) Batteries as described in Section R315-273-2;

(ii) Pesticides as described in Section R315-273-3;

(iii) Mercury-containing equipment as described in Section R315-273-4;

(iv) Lamps as described in Section R315-273-5;

(v) Antifreeze as described in Subsection R315-272-6(a); and

(vi) Aerosol cans as described in Subsection R315-273-6(b).

(h) The requirements of Rule R315-264 apply to owners or operators of all facilities which treat, store, or dispose of hazardous wastes referred to in Rule R315-268.

(i) Reserved

(j) The requirements of Sections R315-264-10 through 19, 30 through 37, 50 through 56, and 101 do not apply to remediation waste management sites. However, some remediation waste management sites may be a part of a facility that is subject to a traditional hazardous waste permit because the facility is also treating, storing or disposing of hazardous wastes that are not remediation wastes. In these cases, Sections R315-264-10 through 19, 30 through 37, 50 through 56, and 101 do apply to the facility subject to the traditional hazardous waste permit. Instead of the requirements of Sections R315-264-10 through 19, 30 through 37, and 50 through 56, owners or operators of remediation waste management sites shall:

(1) Obtain an EPA identification number by applying to the Administrator using EPA Form 8700-12;

(2) Obtain a detailed chemical and physical analysis of a representative sample of the hazardous remediation wastes to be managed at the site. At a minimum, the analysis shall contain all of the information which shall be known to treat, store or dispose of the waste according to Rules R315-264 and 268, and shall be kept accurate and up to date;

(3) Prevent people who are unaware of the danger from entering, and minimize the possibility for unauthorized people or livestock to enter onto the active portion of the remediation waste management site, unless the owner or operator can demonstrate to the Director that:

(i) Physical contact with the waste, structures, or equipment within the active portion of the remediation waste management site shall not injure people or livestock who may enter the active portion of the remediation waste management site; and

(ii) Disturbance of the waste or equipment by people or livestock who enter onto the active portion of the remediation waste management site, shall not cause a violation of the requirements of Rule R315-264;

(4) Inspect the remediation waste management site for malfunctions, deterioration, operator errors, and discharges that may be causing, or may lead to, a release of hazardous waste constituents to the environment, or a threat to human health. The owner or operator shall conduct these inspections often enough to identify problems in time to correct them before they harm human health or the environment, and shall remedy the problem before it leads to a human health or environmental hazard. Where a hazard is imminent or has already occurred, the owner/operator shall take remedial action immediately;

(5) Provide personnel with classroom or on-the-job training on how to perform their duties in a way that ensures the remediation waste management site complies with the requirements of Rule R315-264, and on how to respond effectively to emergencies;

(6) Take precautions to prevent accidental ignition or reaction of ignitable or reactive waste, and prevent threats to human health and the environment from ignitable, reactive and incompatible waste;

(7) For remediation waste management sites subject to regulation under Sections R315-264-170 through 179,190 through 200, 220 through 232, 250 through 259, 270 Through 283, 300 through 317, 340 through 351, and 600 through 603, the owner/operator shall design, construct, operate, and maintain a unit within a 100-year floodplain to prevent washout of any hazardous waste by a 100-year flood, unless the owner/operator can meet the demonstration of Subsection R315-264-18(b);

(8) Not place any non-containerized or bulk liquid hazardous waste in any salt dome formation, salt bed formation, underground mine or cave;

(9) Develop and maintain a construction quality assurance program for all surface impoundments, waste piles and landfill units that are required to comply with Subsections R315-264-221(c) and (d), 264-251(c) and (d), and 264-301(c) and (d) at the remediation waste management site, according to the requirements of Section R315-264-19;

(10) Develop and maintain procedures to prevent accidents and a contingency and emergency plan to control accidents that occur. These procedures shall address proper design, construction, maintenance, and operation of remediation waste management units at the site. The goal of the plan shall be to minimize the possibility of, and the hazards from a fire, explosion, or any unplanned sudden or non-sudden release of hazardous waste or hazardous waste constituents to air, soil, or surface water that could threaten human health or the environment. The plan shall explain specifically how to treat, store and dispose of the hazardous remediation waste in question, and shall be implemented immediately whenever a fire, explosion, or release of hazardous waste or hazardous waste constituents which could threaten human health or the environment;

(11) Designate at least one employee, either on the facility premises or on call (that is, available to respond to an emergency by reaching the facility quickly), to coordinate all emergency response measures. This emergency coordinator shall be thoroughly familiar with all aspects of the facility's contingency plan, all operations and activities at the facility, the location and characteristics of waste handled, the location of all records within the facility, and the facility layout. In addition, this person shall have the authority to commit the resources needed to carry out the contingency plan;

(12) Develop, maintain and implement a plan to meet the requirements in Subsections R315-264-1(j)(2) through (j)(6) and (j)(9) through (j)(10); and

(13) Maintain records documenting compliance with Subsections R315-264-1(j)(1) through (j)(12).

R315-264-3. Relationship to Interim Status Standards.

A facility owner or operator who has fully complied with the requirements for interim status-as defined in section 3005(e) of RCRA and regulations under Section R315-270-70-shall comply with the regulations specified in Rule 265 in lieu of the regulations in Rule R315-264, until final administrative disposition of his permit application is made, except as provided under Sections R315-264-550 through 555.

R315-264-4. Imminent Hazard Action.

Notwithstanding any other provisions of these regulations, enforcement actions may be brought pursuant to Section 19-5-115.

R315-264-10. Applicability.

(a) The regulations in Sections R315-264-10 through 19 apply to owners and operators of all hazardous waste facilities, except as provided in Section R315-264-1 and in Subsection R315-264-10(b).

(b) Subsection R315-264-18(b) applies only to facilities subject to regulation under Sections R315-264-170 through 179, 190 through 200, 220 through 232, 250 through 259, 270 through 283, 300 through 317, 340 through 351, and 600 through 603.

R315-264-11. Identification Number.

Every facility owner or operator shall apply to Director for an EPA identification number using EPA form 8700-12. Information on obtaining this number can be acquired by contacting the Utah Division of Waste Management and Radiation Control.

R315-264-12. General Facility Standards - Required Notices.

(a) The owner or operator of a facility that is arranging or has arranged to receive hazardous waste subject to Sections R315-262-80 through 262-84 from a foreign source shall submit the following required notices:

(1) As per Subsection R315-262-84(b), for imports where the competent authority of the country of export does not require the foreign exporter to submit to it a notification proposing export and obtain consent from EPA and the competent authorities for the countries of transit, such owner or operator of the facility, if acting as the importer, shall provide notification of the proposed transboundary movement in English to EPA using the allowable methods listed in Subsection R315-262-84(b)(1) at least 60 days before the first shipment is expected to depart the country of export. The notification may cover up to one year of shipments of wastes having similar physical and chemical characteristics, the same United Nations classification, the same RCRA waste codes and OECD waste codes, and being sent from the same foreign exporter.

(2) As per Subsection R315-262-84(d)(2)(xv), a copy of the movement document bearing all required signatures within three working days of receipt of the shipment to the foreign exporter; to the competent authorities of the countries of export and transit that control the shipment as an export and transit shipment of hazardous waste respectively; and on or after the electronic import-export reporting compliance date, to EPA electronically using EPA's Waste Import Export Tracking System (WIETS), or its successor system. The original of the signed movement document shall be maintained at the facility

for at least three years. The owner or operator of a facility may satisfy this recordkeeping requirement by retaining electronically submitted documents in the facility's account on EPA's Waste Import Export Tracking System (WIETS), or its successor system, provided that copies are readily available for viewing and production if requested by any EPA or Utah inspector. No owner or operator of a facility may be held liable for the inability to produce the documents for inspection under Section R315-264-12 if the owner or operator of a facility can demonstrate that the inability to produce the document is due exclusively to technical difficulty with EPA's Waste Import Export Tracking System (WIETS), or its successor system for which the owner or operator of a facility bears no responsibility.

(3) As per Subsection R315-262-84(f)(4), if the facility has physical control of the waste and it must be sent to an alternate facility or returned to the country of export, such owner or operator of the facility shall inform EPA, using the allowable methods listed in Subsection R315-262-84(b)(1) of the need to return or arrange alternate management of the shipment.

(4) As per Subsection R315-262-84(g), such owner or operator shall:

(i) Send copies of the signed and dated confirmation of recovery or disposal, as soon as possible, but no later than 30 days after completing recovery or disposal on the waste in the shipment and no later than one calendar year following receipt of the waste, to the foreign exporter, to the competent authority of the country of export that controls the shipment as an export of hazardous waste, and for shipments recycled or disposed of on or after the electronic import-export reporting compliance date, to EPA electronically using EPA's Waste Import Export Tracking System (WIETS), or its successor system.

(ii) If the facility performed any of recovery operations R12, R13, or RC16, or disposal operations D13 through D15, or DC17, promptly send copies of the confirmation of recovery or disposal that it receives from the final recovery or disposal facility within one year of shipment delivery to the final recovery or disposal facility that performed one of recovery operations R1 through R11, or RC16, or one of disposal operations D1 through D12, or DC15 to DC16, to the competent authority of the country of export that controls the shipment as an export of hazardous waste, and on or after the electronic import-export reporting compliance date, to EPA electronically using EPA's Waste Import Export Tracking System (WIETS), or its successor system. The recovery and disposal operations in Section R315-264-12(a)(4)(ii) are defined in Section R315-262-81.

(b) The owner or operator of a facility that receives hazardous waste from an off-site source, except where the owner or operator is also the generator, shall inform the generator in writing that he has the appropriate permit(s) for, and will accept, the waste the generator is shipping. The owner or operator shall keep a copy of this written notice as part of the operating record.

(c) Before transferring ownership or operation of a facility during its operating life, or of a disposal facility during the post-closure care period, the owner or operator shall notify the new owner or operator in writing of the requirements of Rule R315-264 and Rule R315-270. An owner's or operator's failure to notify the new owner or operator of the requirements of Rule R315-264 in no way relieves the new owner or operator of his obligation to comply with all applicable requirements.

R315-264-13. General Waste Analysis.

(a)(1) Before an owner or operator treats, stores, or disposes of any hazardous wastes, or nonhazardous wastes if applicable under Subsection R315-264-113(d), he shall obtain a detailed chemical and physical analysis of a representative sample of the wastes. At a minimum, the analysis shall contain all the information which shall be known to treat, store, or dispose of the waste in accordance with Rules R315-264 and 268.

(2) The analysis may include data developed under Rule R315-261, and existing published or documented data on the hazardous waste or on hazardous waste generated from similar processes. For example, the facility's records of analyses performed on the waste before the effective date of these regulations, or studies conducted on hazardous waste generated from processes similar to that which generated the waste to be managed at the facility, may be included in the data base required to comply with Subsection R315-264-13(a)(1). The owner or operator of an off-site facility may arrange for the generator of the hazardous waste to supply part of the information required by Subsection R315-264-13(a)(1), except as otherwise specified in Subsections R315-268-7(b) and (c). If the generator does not supply the information, and the owner or operator chooses to accept a hazardous waste, the owner or operator is responsible for obtaining the information required to comply with Section R315-264-13.

(3) The analysis shall be repeated as necessary to ensure that it is accurate and up to date. At a minimum, the analysis shall be repeated:

(i) When the owner or operator is notified, or has reason to believe, that the process or operation generating the hazardous wastes, or non-hazardous wastes if applicable under Subsection R315-264-113(d), has changed; and

(ii) For off-site facilities, when the results of the inspection required in Subsection R315-264-13(a)(4) indicate that the hazardous waste received at the facility does not match the waste designated on the accompanying manifest or shipping paper.

(4) The owner or operator of an off-site facility shall inspect and, if necessary, analyze each hazardous waste movement received at the facility to determine whether it matches the identity of the waste specified on the accompanying manifest or shipping paper.

(b) The owner or operator shall develop and follow a written waste analysis plan which describes the procedures which he will carry out to comply with Subsection R315-264-13(a). He shall keep this plan at the facility. At a minimum, the plan shall specify:

(1) The parameters for which each hazardous waste, or non-hazardous waste if applicable under Subsection R315-264-113(d), will be analyzed and the rationale for the selection of these parameters, i.e., how analysis for these parameters will provide sufficient information on the waste's properties to comply with Subsection R315-264-13(a);

(2) The test methods which will be used to test for these parameters;

(3) The sampling method which will be used to obtain a representative sample of the waste to be analyzed. A representative sample may be obtained using either:

(i) One of the sampling methods described in appendix I of Rule R315-261; or

(ii) An equivalent sampling method. See Section R315-260-21 for related discussion.

(4) The frequency with which the initial analysis of the waste will be reviewed or repeated to ensure that the analysis is accurate and up to date; and

(5) For off-site facilities, the waste analyses that hazardous waste generators have agreed to supply.

(6) Where applicable, the methods that will be used to meet the additional waste analysis requirements for specific waste management methods as specified in Sections R315-264-17, 264-314, 264-341, 264-1083, and 268-7 and Subsections R315-264-1034(d) and 264-1063(d).

(7) For surface impoundments exempted from land disposal restrictions under Subsection R315-268-4(a), the procedures and schedules for:

(i) The sampling of impoundment contents;

(ii) The analysis of test data; and,

(iii) The annual removal of residues which are not delisted under Section R315-260-22 or which exhibit a characteristic of hazardous waste and either:

(A) Do not meet applicable treatment standards of Sections R315-268-40 through 49; or

(B) Where no treatment standards have been established:

(I) Such residues are prohibited from land disposal under Section R315-268-32 or RCRA section 3004(d); or

(II) Such residues are prohibited from land disposal under Subsection R315-268-33(f).

(8) For owners and operators seeking an exemption to the air emission standards of Sections R315-264-1080 through 1091 in accordance with Section R315-264-1082:

(i) If direct measurement is used for the waste determination, the procedures and schedules for waste sampling and analysis, and the results of the analysis of test data to verify the exemption.

(ii) If knowledge of the waste is used for the waste determination, any information prepared by the facility owner or operator or by the generator of the hazardous waste, if the waste is received from off-site, that is used as the basis for knowledge of the waste.

(c) For off-site facilities, the waste analysis plan required in Subsection R315-264-13(b) shall also specify the procedures which will be used to inspect and, if necessary, analyze each movement of hazardous waste received at the facility to ensure that it matches the identity of the waste designated on the accompanying manifest or shipping paper. At a minimum, the plan shall describe:

(1) The procedures which will be used to determine the identity of each movement of waste managed at the facility; and

(2) The sampling method which will be used to obtain a representative sample of the waste to be identified, if the identification method includes sampling.

(3) The procedures that the owner or operator of an off-site landfill receiving containerized hazardous waste will use to determine whether a hazardous waste generator or treater has added a biodegradable sorbent to the waste in the container.

R315-264-14. Security.

(a) The owner or operator shall prevent the unknowing entry, and minimize the possibility for the unauthorized entry, of persons or livestock onto the active portion of his facility, unless he can demonstrate to the Director that:

(1) Physical contact with the waste, structures, or equipment within the active portion of the facility will not injure unknowing or unauthorized persons or livestock which may enter the active portion of a facility; and

(2) Disturbance of the waste or equipment, by the unknowing or unauthorized entry of persons or livestock onto the active portion of a facility, will not cause a violation of the requirements of Rule R315-264. An owner or operator who wishes to make the demonstration referred to above shall do so with part B of the permit application.

(b) Unless the owner or operator has made a successful demonstration under Subsection R315-264-14(a)(1) and (2), a facility shall have:

(1) A 24-hour surveillance system, e.g., television monitoring or surveillance by guards or facility personnel, which continuously monitors and controls entry onto the active portion of the facility; or

(2)(i) An artificial or natural barrier, e.g., a fence in good repair or a fence combined with a cliff, which completely surrounds the active portion of the facility; and

(ii) A means to control entry, at all times, through the gates or other entrances to the active portion of the facility, e.g., an attendant, television monitors, locked entrance, or controlled roadway access to the facility. The requirements of Subsection R315-264-14(b) are satisfied if the facility or plant within which the active portion is located itself has a surveillance system, or a barrier and a means to control entry, which complies with the requirements of Subsection R315-264-14(b)(1) or (2).

(c) Unless the owner or operator has made a successful demonstration under Subsection R315-264-14(a)(1) and (2), a sign with the legend, "Danger-Unauthorized Personnel Keep Out", shall be posted at each entrance to the active portion of a facility, and at other locations, in sufficient numbers to be seen from any approach to this active portion. The legend shall be written in English and in any other language predominant in the area surrounding the facility, e.g., facilities in counties bordering the Canadian province of Quebec shall post signs in French; facilities in counties bordering Mexico shall post signs in Spanish, and shall be legible from a distance of at least 25 feet. Existing signs with a legend other than "Danger-Unauthorized Personnel Keep Out" may be used if the legend on the sign indicates that only authorized personnel are allowed to enter the active portion, and that entry onto the active portion can be dangerous. See Subsection R315-264-117(b) for discussion of security requirements at disposal facilities during the post-closure care period.

R315-264-15. General Facility Standards -- General Inspection Requirements.

(a) The owner or operator shall inspect his facility for malfunctions and deterioration, operator errors, and discharges which may be causing-or may lead to-release of hazardous waste constituents to the environment or a threat to human health. The owner or operator shall conduct these inspections often enough to identify problems in time to correct them before they harm human health or the environment.

(b)(1) The owner or operator shall develop and follow a written schedule for inspecting monitoring equipment, safety and emergency equipment, security devices, and operating and structural equipment, such as dikes and sump pumps, that are important to preventing, detecting, or responding to environmental or human health hazards.

(2) He shall keep this schedule at the facility.

(3) The schedule shall identify the types of problems, e.g., malfunctions or deterioration, which are to be looked for during the inspection, e.g., inoperative sump pump, leaking fitting, eroding dike, etc.

(4) The frequency of inspection may vary for the items on the schedule. However, the frequency should be based on the rate of deterioration of the equipment and the probability of an environmental or human health incident if the deterioration, malfunction, or operator error goes undetected between inspections. Areas subject to spills, such as loading and unloading areas, shall be inspected daily when in use. At a minimum, the inspection schedule shall include the items and frequencies called for in Sections R315-264-174, 193, 195, 226, 254, 278, 303, 347, 602, 1033, 1052, 1053, 1058, and 1083 through 1089, where applicable. Rule R315-270 requires the inspection schedule to be submitted with part B of the permit application. The Director shall evaluate the schedule along with the rest of the application to ensure that it adequately protects human health and the environment. As part of this review, The Director may modify or amend the schedule as may be necessary.

(c) The owner or operator shall remedy any deterioration or malfunction of equipment or structures which the inspection reveals on a schedule which ensures that the problem does not lead to an environmental or human health hazard. Where a hazard is imminent or has already occurred, remedial action shall be taken immediately.

(d) The owner or operator shall record inspections in an inspection log or summary. He shall keep these records for at least three years from the date of inspection. At a minimum,

these records shall include the date and time of the inspection, the name of the inspector, a notation of the observations made, and the date and nature of any repairs or other remedial actions.

R315-264-16. Personnel Training.

(a)(1) Facility personnel shall successfully complete a program of classroom instruction or on-the-job training that teaches them to perform their duties in a way that ensures the facility's compliance with the requirements of Rule R315-264. The owner or operator shall ensure that this program includes all the elements described in the document required under Subsection R315-264-16(d)(3). Rule R315-270 requires that owners and operators submit with part B of the RCRA permit application, an outline of the training program used, or to be used, at the facility and a brief description of how the training program is designed to meet actual job tasks.

(2) This program shall be directed by a person trained in hazardous waste management procedures, and shall include instruction which teaches facility personnel hazardous waste management procedures, including contingency plan implementation, relevant to the positions in which they are employed.

(3) At a minimum, the training program shall be designed to ensure that facility personnel are able to respond effectively to emergencies by familiarizing them with emergency procedures, emergency equipment, and emergency systems, including, where applicable:

(i) Procedures for using, inspecting, repairing, and replacing facility emergency and monitoring equipment;

(ii) Key parameters for automatic waste feed cut-off systems;

(iii) Communications or alarm systems;

(iv) Response to fires or explosions;

(v) Response to ground-water contamination incidents; and

(vi) Shutdown of operations.

(4) For facility employees that receive emergency response training pursuant to Occupational Safety and Health Administration (OSHA) regulations 29 CFR 1910.120(p)(8) and 1910.120(q), the facility is not required to provide separate emergency response training pursuant to Section R315-264-16, provided that the overall facility training meets all the requirements Section R315-264-16.

(b) Facility personnel shall successfully complete the program required in Subsection R315-264-16(a) within six months after the effective date of these regulations or six months after the date of their employment or assignment to a facility, or to a new position at a facility, whichever is later. Employees hired after the effective date of these regulations shall not work in unsupervised positions until they have completed the training requirements of Subsection R315-264-16(a).

(c) Facility personnel shall take part in an annual review of the initial training required in Subsection R315-264-16(a).

(d) The owner or operator shall maintain the following documents and records at the facility:

(1) The job title for each position at the facility related to hazardous waste management, and the name of the employee filling each job;

(2) A written job description for each position listed under Subsection R315-264-16(d)(1). This description may be consistent in its degree of specificity with descriptions for other similar positions in the same company location or bargaining unit, but shall include the requisite skill, education, or other qualifications, and duties of employees assigned to each position;

(3) A written description of the type and amount of both introductory and continuing training that will be given to each person filling a position listed under Subsection R315-264-16(d)(1);

(4) Records that document that the training or job experience required under Subsections R315-264-16(a), (b), and (c) has been given to, and completed by, facility personnel.

(e) Training records on current personnel shall be kept until closure of the facility; training records on former employees shall be kept for at least three years from the date the employee last worked at the facility. Personnel training records may accompany personnel transferred within the same company.

R315-264-17. General Requirements for Ignitable, Reactive, or Incompatible Wastes.

(a) The owner or operator shall take precautions to prevent accidental ignition or reaction of ignitable or reactive waste. This waste shall be separated and protected from sources of ignition or reaction including but not limited to: open flames; smoking; cutting and welding; hot surfaces; frictional heat; sparks, static, electrical, or mechanical; spontaneous ignition, e.g., from heat-producing chemical reactions; and radiant heat. While ignitable or reactive waste is being handled, the owner or operator shall confine smoking and open flame to specially designated locations. "No Smoking" signs shall be conspicuously placed wherever there is a hazard from ignitable or reactive waste.

(b) Where specifically required by other sections of Rule R315-264, the owner or operator of a facility that treats, stores or disposes ignitable or reactive waste, or mixes incompatible waste or incompatible wastes and other materials, shall take precautions to prevent reactions which:

(1) Generate extreme heat or pressure, fire or explosions, or violent reactions;

(2) Produce uncontrolled toxic mists, fumes, dusts, or gases in sufficient quantities to threaten human health or the environment;

(3) Produce uncontrolled flammable fumes or gases in sufficient quantities to pose a risk of fire or explosions;

(4) Damage the structural integrity of the device or facility;

(5) Through other like means threaten human health or the environment.

(c) When required to comply with Subsections R315-264-17(a) or (b), the owner or operator shall document that compliance. This documentation may be based on references to published scientific or engineering literature, data from trial tests, e.g., bench scale or pilot scale tests, waste analyses, as specified in Section R315-264-264-13, or the results of the treatment of similar wastes by similar treatment processes and under similar operating conditions.

R315-264-18. Location Standards.

(a) Seismic considerations.

(1) Portions of new facilities where treatment, storage, or disposal of hazardous waste will be conducted shall not be located within 61 meters (200 feet) of a fault which has had displacement in Holocene time. Procedures for demonstrating compliance with this standard in part B of the permit application are specified in Subsection R315-270-14(b)(11). Facilities which are located in political jurisdictions other than those listed in appendix VI of Rule R315-264, are assumed to be in compliance with this requirement.

(2) As used in Subsection R315-264-18(a)(1):

(i) "Fault" means a fracture along which rocks on one side have been displaced with respect to those on the other side.

(ii) "Displacement" means the relative movement of any two sides of a fault measured in any direction.

(iii) "Holocene" means the most recent epoch of the Quaternary period, extending from the end of the Pleistocene to the present.

(b) Floodplains.

(1) A facility located in a 100-year floodplain shall be

designed, constructed, operated, and maintained to prevent washout of any hazardous waste by a 100-year flood, unless the owner or operator can demonstrate to the Director's satisfaction that:

(i) Procedures are in effect which will cause the waste to be removed safely, before flood waters can reach the facility, to a location where the wastes will not be vulnerable to flood waters, provided that the facility where the waste is moved is a permitted hazardous waste disposal facility or a facility in interim status; or

(ii) For existing surface impoundments, waste piles, land treatment units, landfills, and miscellaneous units, no adverse effects on human health or the environment will result if washout occurs, considering:

(A) The volume and physical and chemical characteristics of the waste in the facility;

(B) The concentration of hazardous constituents that would potentially affect surface waters as a result of washout;

(C) The impact of such concentrations on the current or potential uses of and water quality standards established for the affected surface waters; and

(D) The impact of hazardous constituents on the sediments of affected surface waters or the soils of the 100-year floodplain that could result from washout.

(2) As used in Subsection R315-264-18(b)(1):

(i) "100-year floodplain" means any land area which is subject to a one percent or greater chance of flooding in any given year from any source.

(ii) "Washout" means the movement of hazardous waste from the active portion of the facility as a result of flooding.

(iii) "100-year flood" means a flood that has a one percent chance of being equalled or exceeded in any given year.

(c) Salt dome formations, salt bed formations, underground mines and caves. The placement of any noncontainerized or bulk liquid hazardous waste in any salt dome formation, salt bed formation, underground mine or cave is prohibited, except for the Department of Energy Waste Isolation Pilot Project in New Mexico.

R315-264-19. Construction Quality Assurance Program.

(a) CQA program.

(1) A construction quality assurance (CQA) program is required for all surface impoundment, waste pile, and landfill units that are required to comply with Subsections R315-264-221(c) and (d), 264-251(c) and (d), and 264-301(c) and (d). The program shall ensure that the constructed unit meets or exceeds all design criteria and specifications in the permit. The program shall be developed and implemented under the direction of a CQA officer who is a registered professional engineer.

(2) The CQA program shall address the following physical components, where applicable:

(i) Foundations;

(ii) Dikes;

(iii) Low-permeability soil liners;

(iv) Geomembranes, flexible membrane liners;

(v) Leachate collection and removal systems and leak detection systems; and

(vi) Final cover systems.

(b) Written CQA plan. The owner or operator of units subject to the CQA program under Subsection R315-264-19(a) shall develop and implement a written CQA plan. The plan shall identify steps that will be used to monitor and document the quality of materials and the condition and manner of their installation. The CQA plan shall include:

(1) Identification of applicable units, and a description of how they will be constructed.

(2) Identification of key personnel in the development and implementation of the CQA plan, and CQA officer qualifications.

(3) A description of inspection and sampling activities for all unit components identified in Subsection R315-264-19(a)(2), including observations and tests that will be used before, during, and after construction to ensure that the construction materials and the installed unit components meet the design specifications. The description shall cover: Sampling size and locations; frequency of testing; data evaluation procedures; acceptance and rejection criteria for construction materials; plans for implementing corrective measures; and data or other information to be recorded and retained in the operating record under Sections R315-264-73.

(c) Contents of program.

(1) The CQA program shall include observations, inspections, tests, and measurements sufficient to ensure:

(i) Structural stability and integrity of all components of the unit identified in Subsection R315-264-19(a)(2);

(ii) Proper construction of all components of the liners, leachate collection and removal system, leak detection system, and final cover system, according to permit specifications and good engineering practices, and proper installation of all components, e.g., pipes, according to design specifications;

(iii) Conformity of all materials used with design and other material specifications under Sections R315-264-221, 264-251, and 264-301.

(2) The CQA program shall include test fills for compacted soil liners, using the same compaction methods as in the full scale unit, to ensure that the liners are constructed to meet the hydraulic conductivity requirements of Subsections R315-264-221(c)(1)(i)(B), 264-251(c)(1)(i)(B), and 264-301(c)(1)(i)(B) in the field. Compliance with the hydraulic conductivity requirements shall be verified by using in-situ testing on the constructed test fill. The Director may accept an alternative demonstration, in lieu of a test fill, where data are sufficient to show that a constructed soil liner will meet the hydraulic conductivity requirements of Subsections R315-264-221(c)(1)(i)(B), 264-251(c)(1)(i)(B), and 264-301(c)(1)(i)(B) in the field.

(d) Certification. Waste shall not be received in a unit subject to Section R315-26419 until the owner or operator has submitted to the Director by certified mail or hand delivery a certification signed by the CQA officer that the approved CQA plan has been successfully carried out and that the unit meets the requirements of Subsections R315-264-221 (c) or (d), 264-251 (c) or (d), or 264-301 (c) or (d); and the procedure in Subsection R315-270-30(l)(2)(ii) has been completed. Documentation supporting the CQA officer's certification shall be furnished to the Director upon request.

R315-264-30. Applicability.

The regulations in Sections R316-264-30 through 37 apply to owners and operators of all hazardous waste facilities, except as Section R315-264-1 provides otherwise.

R315-264-31. Design and Operation of Facility.

Facilities shall be designed, constructed, maintained, and operated to minimize the possibility of a fire, explosion, or any unplanned sudden or non-sudden release of hazardous waste or hazardous waste constituents to air, soil, or surface water which could threaten human health or the environment.

R315-264-32. Required Equipment.

All facilities shall be equipped with the following, unless it can be demonstrated to the Director that none of the hazards posed by waste handled at the facility could require a particular kind of equipment specified below:

(a) An internal communications or alarm system capable of providing immediate emergency instruction, voice or signal, to facility personnel;

(b) A device, such as a telephone, immediately available

at the scene of operations, or a hand-held two-way radio, capable of summoning emergency assistance from local police departments, fire departments, or State or local emergency response teams;

(c) Portable fire extinguishers, fire control equipment; including special extinguishing equipment, such as that using foam, inert gas, or dry chemicals; spill control equipment; and decontamination equipment; and

(d) Water at adequate volume and pressure to supply water hose streams, or foam producing equipment, or automatic sprinklers, or water spray systems.

Rule R315-270 requires that an owner or operator who wishes to make the demonstration referred to above shall do so with part B of the permit application.

R315-264-33. Testing and Maintenance of Equipment.

All facility communications or alarm systems, fire protection equipment, spill control equipment, and decontamination equipment, where required, shall be tested and maintained as necessary to assure its proper operation in time of emergency.

R315-264-34. Access to Communications or Alarm System.

(a) Whenever hazardous waste is being poured, mixed, spread, or otherwise handled, all personnel involved in the operation shall have immediate access to an internal alarm or emergency communication device, either directly or through visual or voice contact with another employee, unless the Director has ruled that such a device is not required under Section R315-264-32.

(b) If there is ever just one employee on the premises while the facility is operating, he shall have immediate access to a device, such as a telephone, immediately available at the scene of operation, or a hand-held two-way radio, capable of summoning external emergency assistance, unless the Director has ruled that such a device is not required under Section R315-264-32.

R315-264-35. Required Aisle Space.

The owner or operator shall maintain aisle space to allow the unobstructed movement of personnel, fire protection equipment, spill control equipment, and decontamination equipment to any area of facility operation in an emergency, unless it can be demonstrated to the Director that aisle space is not needed for any of these purposes. This demonstration shall be made with the part B permit application.

R315-264-37. Arrangements with Local Authorities.

(a) The owner or operator shall attempt to make the following arrangements, as appropriate for the type of waste handled at his facility and the potential need for the services of these organizations:

(1) Arrangements to familiarize police, fire departments, and emergency response teams with the layout of the facility, properties of hazardous waste handled at the facility and associated hazards, places where facility personnel would normally be working, entrances to and roads inside the facility, and possible evacuation routes;

(2) Where more than one police and fire department might respond to an emergency, agreements designating primary emergency authority to a specific police and a specific fire department, and agreements with any others to provide support to the primary emergency authority;

(3) Agreements with State emergency response teams, emergency response contractors, and equipment suppliers; and

(4) Arrangements to familiarize local hospitals with the properties of hazardous waste handled at the facility and the types of injuries or illnesses which could result from fires, explosions, or releases at the facility.

(b) Where State or local authorities decline to enter into such arrangements, the owner or operator shall document the refusal in the operating record.

R315-264-50. Contingency Plan and Emergency Procedures -- Applicability.

The regulations in Sections R315-264-50 through 56 apply to owners and operators of all hazardous waste facilities, except as Section R315-264-1 provides otherwise.

R315-264-51. Purpose and Implementation of Contingency Plan.

(a) Each owner or operator shall have a contingency plan for his facility. The contingency plan shall be designed to minimize hazards to human health or the environment from fires, explosions, or any unplanned sudden or non-sudden release of hazardous waste or hazardous waste constituents to air, soil, or surface water.

(b) The provisions of the plan shall be carried out immediately whenever there is a fire, explosion, or release of hazardous waste or hazardous waste constituents which could threaten human health or the environment.

R315-264-52. Content of Contingency Plan.

(a) The contingency plan shall describe the actions facility personnel shall take to comply with Sections R315-264-51 and 56 in response to fires, explosions, or any unplanned sudden or non-sudden release of hazardous waste or hazardous waste constituents to air, soil, or surface water at the facility.

(b) If the owner or operator has already prepared a Spill Prevention, Control, and Countermeasures (SPCC) Plan in accordance with 40 CFR 112, or some other emergency or contingency plan, he need only amend that plan to incorporate hazardous waste management provisions that are sufficient to comply with the requirements of Rule R315-264. The owner or operator may develop one contingency plan which meets all regulatory requirements. EPA recommends that the plan be based on the National Response Team's Integrated Contingency Plan Guidance ("One Plan"). When modifications are made to non-RCRA provisions in an integrated contingency plan, the changes do not trigger the need for a RCRA permit modification.

(c) The plan shall describe arrangements agreed to by local police departments, fire departments, hospitals, contractors, and State and local emergency response teams to coordinate emergency services, pursuant to Section R315-264-37.

(d) The plan shall list names, addresses, and phone numbers, office and home, of all persons qualified to act as emergency coordinator, see Section R315-264-55, and this list shall be kept up to date. Where more than one person is listed, one shall be named as primary emergency coordinator and others shall be listed in the order in which they will assume responsibility as alternates. For new facilities, this information shall be supplied to the Director at the time of certification, rather than at the time of permit application.

(e) The plan shall include a list of all emergency equipment at the facility; such as fire extinguishing systems, spill control equipment, communications and alarm systems, internal and external, and decontamination equipment; where this equipment is required. This list shall be kept up to date. In addition, the plan shall include the location and a physical description of each item on the list, and a brief outline of its capabilities.

(f) The plan shall include an evacuation plan for facility personnel where there is a possibility that evacuation could be necessary. This plan shall describe signal(s) to be used to begin evacuation, evacuation routes, and alternate evacuation routes, in cases where the primary routes could be blocked by releases of hazardous waste or fires.

R315-264-53. Copies of Contingency Plan.

A copy of the contingency plan and all revisions to the plan shall be:

(a) Maintained at the facility;

(b) Submitted to all local police departments, fire departments, hospitals, and State and local emergency response teams that may be called upon to provide emergency services; and

(c) Made available upon request. The contingency plan shall be submitted to the Director with Part B of the permit application under Rule R315-270 and, after modification or approval, will become a condition of any permit issued.

R315-264-54. Amendment of Contingency Plan.

The contingency plan shall be reviewed, and immediately amended, if necessary, whenever:

(a) The facility permit is revised;

(b) The plan fails in an emergency;

(c) The facility changes-in its design, construction, operation, maintenance, or other circumstances-in a way that materially increases the potential for fires, explosions, or releases of hazardous waste or hazardous waste constituents, or changes the response necessary in an emergency;

(d) The list of emergency coordinators changes; or

(e) The list of emergency equipment changes.

R315-264-55. Emergency Coordinator.

At all times, there shall be at least one employee either on the facility premises or on call, i.e., available to respond to an emergency by reaching the facility within a short period of time, with the responsibility for coordinating all emergency response measures. This emergency coordinator shall be thoroughly familiar with all aspects of the facility's contingency plan, all operations and activities at the facility, the location and characteristics of waste handled, the location of all records within the facility, and the facility layout. In addition, this person shall have the authority to commit the resources needed to carry out the contingency plan. The emergency coordinator's responsibilities are more fully spelled out in Section R315-264-56. Applicable responsibilities for the emergency coordinator vary, depending on factors such as type and variety of waste(s) handled by the facility, and type and complexity of the facility.

R315-264-56. Emergency Procedures.

(a) Whenever there is an imminent or actual emergency situation, the emergency coordinator, or his designee when the emergency coordinator is on call, shall immediately:

(1) Activate internal facility alarms or communication systems, where applicable, to notify all facility personnel; and

(2) Notify appropriate State or local agencies with designated response roles if their help is needed.

(b) Whenever there is a release, fire, or explosion, the emergency coordinator shall immediately identify the character, exact source, amount, and areal extent of any released materials. He may do this by observation or review of facility records or manifests, and, if necessary, by chemical analysis.

(c) Concurrently, the emergency coordinator shall assess possible hazards to human health or the environment that may result from the release, fire, or explosion. This assessment shall consider both direct and indirect effects of the release, fire, or explosion, e.g., the effects of any toxic, irritating, or asphyxiating gases that are generated, or the effects of any hazardous surface water run-off from water or chemical agents used to control fire and heat-induced explosions.

(d) If the emergency coordinator determines that the facility has had a release, fire, or explosion which could threaten human health, or the environment, outside the facility, he shall report his findings as follows:

(1) If his assessment indicates that evacuation of local areas may be advisable, he shall immediately notify appropriate local authorities. He shall be available to help appropriate officials decide whether local areas should be evacuated; and

(2) He shall immediately notify Utah Department of Environmental Quality as specified in Section R315-263-30 and either the government official designated as the on-scene coordinator for that geographical area, or the National Response Center (using their 24-hour toll free number 800/424-8802). The report shall include:

(i) Name and telephone number of reporter;

(ii) Name and address of facility;

(iii) Time and type of incident (e.g., release, fire);

(iv) Name and quantity of material(s) involved, to the extent known;

(v) The extent of injuries, if any; and

(vi) The possible hazards to human health, or the environment, outside the facility.

(e) During an emergency, the emergency coordinator shall take all reasonable measures necessary to ensure that fires, explosions, and releases do not occur, recur, or spread to other hazardous waste at the facility. These measures shall include, where applicable, stopping processes and operations, collecting and containing release waste, and removing or isolating containers.

(f) If the facility stops operations in response to a fire, explosion, or release, the emergency coordinator shall monitor for leaks, pressure buildup, gas generation, or ruptures in valves, pipes, or other equipment, wherever this is appropriate.

(g) Immediately after an emergency, the emergency coordinator shall provide for treating, storing, or disposing of recovered waste, contaminated soil or surface water, or any other material that results from a release, fire, or explosion at the facility. Unless the owner or operator can demonstrate, in accordance with Subsection R315-261-3(c) or (d), that the recovered material is not a hazardous waste, the owner or operator becomes a generator of hazardous waste and shall manage it in accordance with all applicable requirements of Rules R315-262, 263, and 264.

(h) The emergency coordinator shall ensure that, in the affected area(s) of the facility:

(1) No waste that may be incompatible with the released material is treated, stored, or disposed of until cleanup procedures are completed; and

(2) All emergency equipment listed in the contingency plan is cleaned and fit for its intended use before operations are resumed.

(i) The owner or operator shall note in the operating record the time, date, and details of any incident that requires implementing the contingency plan. Within 15 days after the incident, he shall submit a written report on the incident to the Director. The report shall include:

(1) Name, address, and telephone number of the owner or operator;

(2) Name, address, and telephone number of the facility;

(3) Date, time, and type of incident (e.g., fire, explosion);

(4) Name and quantity of material(s) involved;

(5) The extent of injuries, if any;

(6) An assessment of actual or potential hazards to human health or the environment, where this is applicable; and

(7) Estimated quantity and disposition of recovered material that resulted from the incident.

(j) The facility owner or operator shall notify the Director and other appropriate federal, State, and local authorities, that the facility is in compliance with R315-264-56(h) before operations are resumed in the affected area(s) of the facility.

R315-264-70. Manifest System, Recordkeeping, and Reporting -- Applicability.

(a) The regulations in Sections R315-264-70 through 77

apply to owners and operators of both on-site and off-site facilities, except as Section R315-264-1 provides otherwise. Sections R315-264-71, 72, and 76 do not apply to owners and operators of on-site facilities that do not receive any hazardous waste from off-site sources. Subsection R315-264-73(b) only applies to permittees who treat, store, or dispose of hazardous wastes on-site where such wastes were generated.

R315-264-71. Manifest System, Recordkeeping, and Reporting -- Use of Manifest System.

(a)(1) If a facility receives hazardous waste accompanied by a manifest, the owner, operator or his/her agent shall sign and date the manifest as indicated in Subsection R315-264-71(a)(2) to certify that the hazardous waste covered by the manifest was received, that the hazardous waste was received except as noted in the discrepancy space of the manifest, or that the hazardous waste was rejected as noted in the manifest discrepancy space.

(2) If the facility receives a hazardous waste shipment accompanied by a manifest, the owner, operator, or his agent shall:

(i) Sign and date, by hand, each copy of the manifest;

(ii) Note any discrepancies, as defined in Subsection R315-264-72(a), on each copy of the manifest;

(iii) Immediately give the transporter at least one copy of the manifest;

(iv) Within 30 days of delivery, send a copy, Page 3, of the manifest to the generator,

(v) Within 30 days of delivery, send the top copy, Page 1, of the Manifest to the e-Manifest system for purposes of data entry and processing. In lieu of mailing this paper copy to EPA, the owner or operator may transmit to the EPA system an image file of Page 1 of the manifest, or both a data string file and the image file corresponding to Page 1 of the manifest. Any data or image files transmitted to EPA under Subsection R315-264-71(a) shall be submitted in data file and image file formats that are acceptable to EPA and that are supported by EPA's electronic reporting requirements and by the electronic manifest system.

(vi) Retain at the facility a copy of each manifest for at least three years from the date of delivery.

(3) The owner or operator of a facility receiving hazardous waste subject to Sections R315-262-80 through 262-84 from a foreign source shall:

(i) Additionally list the relevant consent number from consent documentation supplied by EPA to the facility for each waste listed on the manifest, matched to the relevant list number for the waste from block 9b. If additional space is needed, the owner or operator should use a Continuation Sheet(s), EPA Form 8700-22A; and

(ii) Send a copy of the manifest within 30 days of delivery to EPA using the addresses listed in Subsection R315-262-82(e) until the facility can submit such a copy to the e-Manifest system per Subsection R315-264-71(a)(2)(v).

(b) If a facility receives, from a rail or water (bulk shipment) transporter, hazardous waste which is accompanied by a shipping paper containing all the information required on the manifest; excluding the EPA identification numbers, generator's certification, and signatures; the owner or operator, or his agent, shall:

(1) Sign and date each copy of the manifest or shipping paper, if the manifest has not been received, to certify that the hazardous waste covered by the manifest or shipping paper was received;

(2) Note any significant discrepancies, as defined in Subsection R315-264-72(a), in the manifest or shipping paper, if the manifest has not been received, on each copy of the manifest or shipping paper. The Director does not intend that the owner or operator of a facility whose procedures under R315-264-13(c) include waste analysis shall perform that analysis before signing the shipping paper and giving it to the transporter. Subsection R315-264-72(b), however, requires reporting an unreconciled discrepancy discovered during later analysis.

(3) Immediately give the rail or water (bulk shipment) transporter at least one copy of the manifest or shipping paper, if the manifest has not been received;

(4) Within 30 days after the delivery, send a copy of the signed and dated manifest or a signed and dated copy of the shipping paper, if the manifest has not been received within 30 days after delivery, to the generator; and

Comment: Subsection R315-262-23(c) requires the generator to send three copies of the manifest to the facility when hazardous waste is sent by rail or water (bulk shipment).

(5) Retain at the facility a copy of the manifest and shipping paper, if signed in lieu of the manifest at the time of delivery, for at least three years from the date of delivery.

(c) Whenever a shipment of hazardous waste is initiated from a facility, the owner or operator of that facility shall comply with the requirements of Rule R315-262. The provisions of Sections R315-262-15, R315-262-16, and R315-262-17 are applicable to the on-site accumulation of hazardous wastes by generators. Therefore, the provisions of Sections R315-262-15, R315-262-16, and R315-262-17 only apply to owners or operators who are shipping hazardous waste which they generated at that facility or operating as a large quantity generator consolidating hazardous waste from very small quantity generators under Subsection R315-262-17(f).

(d) As per Subsection R315-262-84(d)(2)(xv), within three working days of the receipt of a shipment subject to Sections R315-262-80 through 262-84 the owner or operator of a facility shall provide a copy of the movement document bearing all required signatures to the foreign exporter; to the competent authorities of the countries of export and transit that control the shipment as an export and transit of hazardous waste respectively; and on or after the electronic import-export reporting compliance date, to EPA electronically using EPA's Waste Import Export Tracking System (WIETS), or its successor system. The original copy of the movement document shall be maintained at the facility for at least three years from the date of signature. The owner or operator of a facility may satisfy this recordkeeping requirement by retaining electronically submitted documents in the facility's account on EPA's Waste Import Export Tracking System (WIETS), or its successor system, provided that copies are readily available for viewing and production if requested by any EPA or Utah inspector. No owner or operator of a facility may be held liable for the inability to produce the documents for inspection under Section R315-264-71 if the owner or operator of a facility can demonstrate that the inability to produce the document is due exclusively to technical difficulty with EPA's Waste Import Export Tracking System (WIETS), or its successor system, for which the owner or operator of a facility bears no responsibility.

(e) A facility shall determine whether the consignment state for a shipment regulates any additional wastes, beyond those regulated Federally, as hazardous wastes under its state hazardous waste program. Facilities shall also determine whether the consignment state or generator state requires the facility to submit any copies of the manifest to these states.

(f) Legal equivalence to paper manifests. Electronic manifests that are obtained, completed, and transmitted in accordance with Subsection R315-262-20(a)(3), and used in accordance with Section R315-264-71 in lieu of the paper manifest form are the legal equivalent of paper manifest forms bearing handwritten signatures, and satisfy for all purposes any requirement in these regulations to obtain, complete, sign, provide, use, or retain a manifest.

(1) Any requirement in these regulations for the owner or operator of a facility to sign a manifest or manifest certification

by hand, or to obtain a handwritten signature, is satisfied by signing with or obtaining a valid and enforceable electronic signature within the meaning of Section R315-262-25.

(2) Any requirement in these regulations to give, provide, send, forward, or to return to another person a copy of the manifest is satisfied when a copy of an electronic manifest is transmitted to the other person.

(3) Any requirement in these regulations for a manifest to accompany a hazardous waste shipment is satisfied when a copy of an electronic manifest is accessible during transportation and forwarded to the person or persons who are scheduled to receive delivery of the waste shipment.

(4) Any requirement in these regulations for an owner or operator to keep or retain a copy of each manifest is satisfied by the retention of the facility's electronic manifest copies in its account on the e-Manifest system, provided that such copies are readily available for viewing and production if requested by any EPA or Division of Waste Management and Radiation Control inspector.

(5) No owner or operator may be held liable for the inability to produce an electronic manifest for inspection under Section R315-264-71 if the owner or operator can demonstrate that the inability to produce the electronic manifest is due exclusively to a technical difficulty with the electronic manifest system for which the owner or operator bears no responsibility.

(g) An owner or operator may participate in the electronic manifest system either by accessing the electronic manifest system from the owner's or operator's electronic equipment, or by accessing the electronic manifest system from portable equipment brought to the owner's or operator's site by the transporter who delivers the waste shipment to the facility.

(h) Special procedures applicable to replacement manifests. If a facility receives hazardous waste that is accompanied by a paper replacement manifest for a manifest that was originated electronically, the following procedures apply to the delivery of the hazardous waste by the final transporter:

(1) Upon delivery of the hazardous waste to the designated facility, the owner or operator shall sign and date each copy of the paper replacement manifest by hand in Item 20, Designated Facility Certification of Receipt, and note any discrepancies in Item 18, Discrepancy Indication Space, of the paper replacement manifest,

(2) The owner or operator of the facility shall give back to the final transporter one copy of the paper replacement manifest,

(3) Within 30 days of delivery of the waste to the designated facility, the owner or operator of the facility shall send one signed and dated copy of the paper replacement manifest to the generator, and send an additional signed and dated copy of the paper replacement manifest to the electronic manifest system, and

(4) The owner or operator of the facility shall retain at the facility one copy of the paper replacement manifest for at least three years from the date of delivery.

(i) Special procedures applicable to electronic signature methods undergoing tests. If an owner or operator using an electronic manifest signs this manifest electronically using an electronic signature method which is undergoing pilot or demonstration tests aimed at demonstrating the practicality or legal dependability of the signature method, then the owner or operator shall also sign with an ink signature the facility's certification of receipt or discrepancies on the printed copy of the manifest provided by the transporter. Upon executing its ink signature on this printed copy, the owner or operator shall retain this original copy among its records for at least 3 years from the date of delivery of the waste.

(j) Imposition of user fee for electronic manifest use. An owner or operator who is a user of the electronic manifest format may be assessed a user fee by EPA for the origination or processing of each electronic manifest. An owner or operator may also be assessed a user fee by EPA for the collection and processing of paper manifest copies that owners or operators shall submit to the electronic manifest system operator under Subsection R315-264-71(a)(2)(v). EPA shall maintain and update from time-to-time the current schedule of electronic manifest system user fees, which shall be determined based on current and projected system costs and level of use of the electronic manifest system. The current schedule of electronic manifest user fees shall be published as an appendix to 40 CFR 262.

(k) Electronic manifest signatures. Electronic manifest signatures shall meet the criteria described in Section R315-262-25.

R315-264-72. Manifest Discrepancies.

(a) Manifest discrepancies are:

(1) Significant differences, as defined by Subsection R315-264-72(b), between the quantity or type of hazardous waste designated on the manifest or shipping paper, and the quantity and type of hazardous waste a facility actually receives;

(2) Rejected wastes, which may be a full or partial shipment of hazardous waste that the treatment, storage, or disposal facility cannot accept; or

(3) Container residues, which are residues that exceed the quantity limits for "empty" containers set forth in Subsection R315-261-7(b).

(b) Significant differences in quantity are: For bulk waste, variations greater than 10 percent in weight; for batch waste, any variation in piece count, such as a discrepancy of one drum in a truckload. Significant differences in type are obvious differences which can be discovered by inspection or waste analysis, such as waste solvent substituted for waste acid, or toxic constituents not reported on the manifest or shipping paper.

(c) Upon discovering a significant difference in quantity or type, the owner or operator shall attempt to reconcile the discrepancy with the waste generator or transporter, e.g., with telephone conversations. If the discrepancy is not resolved within 15 days after receiving the waste, the owner or operator shall immediately submit to the Director a letter describing the discrepancy and attempts to reconcile it, and a copy of the manifest or shipping paper at issue.

(d)(1) Upon rejecting waste or identifying a container residue that exceeds the quantity limits for "empty" containers set forth in Subsection R315-261-7(b), the facility shall consult with the generator prior to forwarding the waste to another facility that can manage the waste. If it is impossible to locate an alternative facility that can receive the waste, the facility may return the rejected waste or residue to the generator. The facility shall send the waste to the alternative facility or to the generator within 60 days of the rejection or the container residue identification.

(2) While the facility is making arrangements for forwarding rejected wastes or residues to another facility under Section R315-264-72, it shall ensure that either the delivering transporter retains custody of the waste, or, the facility shall provide for secure, temporary custody of the waste, pending delivery of the waste to the first transporter designated on the manifest prepared under Subsections R315-264-72(e) or (f).

(e) Except as provided in Subsections R315-264-72(e)(7), for full or partial load rejections and residues that are to be sent off-site to an alternate facility, the facility is required to prepare a new manifest in accordance with Subsection R315-262-20(a) and the following instructions:

(1) Write the generator's U.S. EPA ID number in Item 1 of the new manifest. Write the generator's name and mailing address in Item 5 of the new manifest. If the mailing address is different from the generator's site address, then write the generator's site address in the designated space for Item 5.

(2) Write the name of the alternate designated facility and the facility's U.S. EPA ID number in the designated facility block, Item 8, of the new manifest.

(3) Copy the manifest tracking number found in Item 4 of the old manifest to the Special Handling and Additional Information Block of the new manifest, and indicate that the shipment is a residue or rejected waste from the previous shipment.

(4) Copy the manifest tracking number found in Item 4 of the new manifest to the manifest reference number line in the Discrepancy Block of the old manifest, Item 18a.

(5) Write the DOT description for the rejected load or the residue in Item 9, U.S. DOT Description, of the new manifest and write the container types, quantity, and volume(s) of waste.

(6) Sign the Generator's/Offeror's Certification to certify, as the offeror of the shipment, that the waste has been properly packaged, marked and labeled and is in proper condition for transportation, and mail a signed copy of the manifest to the generator identified in Item 5 of the new manifest.

(7) For full load rejections that are made while the transporter remains present at the facility, the facility may forward the rejected shipment to the alternate facility by completing Item 18b of the original manifest and supplying the information on the next destination facility in the Alternate Facility space. The facility shall retain a copy of this manifest for its records, and then give the remaining copies of the manifest to the transporter to accompany the shipment. If the original manifest is not used, then the facility shall use a new manifest and comply with Subsections R315-264-72(e)(1), (2), (3), (4), (5), and (6).

(f) Except as provided in Subsection R315-264-72(f)(7), for rejected wastes and residues that shall be sent back to the generator, the facility is required to prepare a new manifest in accordance with Subsection R315-262-20(a) and the following instructions:

(1) Write the facility's U.S. EPA ID number in Item 1 of the new manifest. Write the facility's name and mailing address in Item 5 of the new manifest. If the mailing address is different from the facility's site address, then write the facility's site address in the designated space for Item 5 of the new manifest.

(2) Write the name of the initial generator and the generator's U.S. EPA ID number in the designated facility block, Item 8, of the new manifest.

(3) Copy the manifest tracking number found in Item 4 of the old manifest to the Special Handling and Additional Information Block of the new manifest, and indicate that the shipment is a residue or rejected waste from the previous shipment.

(4) Copy the manifest tracking number found in Item 4 of the new manifest to the manifest reference number line in the Discrepancy Block of the old manifest, Item 18a.

(5) Write the DOT description for the rejected load or the residue in Item 9, U.S. DOT Description, of the new manifest and write the container types, quantity, and volume(s) of waste.

(6) Sign the Generator's/Offeror's Certification to certify, as offeror of the shipment, that the waste has been properly packaged, marked and labeled and is in proper condition for transportation.

(7) For full load rejections that are made while the transporter remains at the facility, the facility may return the shipment to the generator with the original manifest by completing Item 18a and 18b of the manifest and supplying the generator's information in the Alternate Facility space. The facility shall retain a copy for its records and then give the remaining copies of the manifest to the transporter to accompany the shipment. If the original manifest is not used, then the facility shall use a new manifest and comply with Subsections R315-264-72(f)(1), (2), (3), (4), (5), (6), and (8).

(8) For full or partial load rejections and container residues contained in non-empty containers that are returned to the generator, the facility shall also comply with the exception reporting requirements in Subsection R315-262-42(a).

(g) If a facility rejects a waste or identifies a container residue that exceeds the quantity limits for "empty" containers set forth in Subsection R315-261-7(b) after it has signed, dated, and returned a copy of the manifest to the delivering transporter or to the generator, the facility shall amend its copy of the manifest to indicate the rejected wastes or residues in the discrepancy space of the amended manifest. The facility shall also copy the manifest tracking number from Item 4 of the new manifest to the Discrepancy space of the amended manifest, and shall re-sign and date the manifest to certify to the information as amended. The facility shall retain the amended manifest for at least three years from the date of amendment, and shall within 30 days, send a copy of the amended manifest to the transporter and generator that received copies prior to their being amended.

R315-264-73. Operating Record.

(a) The owner or operator shall keep a written operating record at his facility.

(b) The following information shall be recorded, as it becomes available, and maintained in the operating record for three years unless noted as follows:

(1) A description and the quantity of each hazardous waste received, and the method(s) and date(s) of its treatment, storage, or disposal at the facility as required by appendix I of Rule R315-264. This information shall be maintained in the operating record until closure of the facility;

(2) The location of each hazardous waste within the facility and the quantity at each location. For disposal facilities, the location and quantity of each hazardous waste shall be recorded on a map or diagram that shows each cell or disposal area. For all facilities, this information shall include cross-references to manifest document numbers if the waste was accompanied by a manifest. This information shall be maintained in the operating record until closure of the facility. See Section R315-264-119 for related requirements.

(3) Records and results of waste analyses and waste determinations performed as specified in Sections R315-264-13, 17, 314, 341, 1034, 1063, 1083, and 268-7, and Subsection R315-268-4(a).

(4) Summary reports and details of all incidents that require implementing the contingency plan as specified in Subsection R315-264-56(j);

(5) Records and results of inspections as required by Subsection R315-264-15(d), except these data need be kept only three years;

(6) Monitoring, testing or analytical data, and corrective action where required by Sections R315-264-90 through 101, and Sections R315-264-19, 191, 193, 195, 222, 223, 226, 252, 254, 276, 278, 280, 302, 304, 309, 602, 1035, 1064, and 1082 through 1090 and Subsections R315-264-1034(c), 1034(f), 1063(d), and 1063(i). Maintain in the operating record for three years, except for records and results pertaining to ground-water monitoring and cleanup which shall be maintained in the operating record until closure of the facility.

(7) For off-site facilities, notices to generators as specified in Subsection R315-264-12(b); and

(8) All closure cost estimates under Section R315-264-142, and for disposal facilities, all post-closure cost estimates under Section R315-264-144. This information shall be maintained in the operating record until closure of the facility.

(9) A certification by the permittee no less often than annually, that the permittee has a program in place to reduce the volume and toxicity of hazardous waste that he generates to the degree determined by the permittee to be economically practicable; and the proposed method of treatment, storage or disposal is that practicable method currently available to the

permittee which minimizes the present and future threat to human health and the environment.

(10) Records of the quantities and date of placement for each shipment of hazardous waste placed in land disposal units under an extension to the effective date of any land disposal restriction granted pursuant to Section R315-268-5, a petition pursuant to Section R315-268-6, or a certification under R315-268-8, and the applicable notice required by a generator under Subsection R315-268-7(a). This information shall be maintained in the operating record until closure of the facility.

(11) For an off-site treatment facility, a copy of the notice, and the certification and demonstration, if applicable, required by the generator or the owner or operator under Sections R315-268-7 or 8;

(12) For an on-site treatment facility, the information contained in the notice, except the manifest number, and the certification and demonstration if applicable, required by the generator or the owner or operator under Sections R315-268-7 or 8;

(13) For an off-site land disposal facility, a copy of the notice, and the certification and demonstration if applicable, required by the generator or the owner or operator of a treatment facility under Sections R315-268-7 or 8, whichever is applicable; and

(14) For an on-site land disposal facility, the information contained in the notice required by the generator or owner or operator of a treatment facility under Section R315-268-7, except for the manifest number, and the certification and demonstration if applicable, required under Section R315-268-8, whichever is applicable.

(15) For an off-site storage facility, a copy of the notice, and the certification and demonstration if applicable, required by the generator or the owner or operator under Sections R315-268-7 or 8; and

(16) For an on-site storage facility, the information contained in the notice, except the manifest number, and the certification and demonstration if applicable, required by the generator or the owner or operator under Sections R315-268-7 or 8.

(17) Any records required under Subsection R315-264-1(j)(13).

(18) Monitoring, testing or analytical data where required by Section R315-264-347 shall be maintained in the operating record for five years.

(19) Certifications as required by Subsection R315-264-196(f) shall be maintained in the operating record until closure of the facility.

R315-264-74. Availability, Retention, and Disposition of Records.

(a) All records, including plans, required under Rule R315-264 shall be furnished upon request, and made available at all reasonable times for inspection, by any officer, employee, or representative of EPA who is duly designated by the Administrator, or any designated representative of the Director.

(b) The retention period for all records required under Rule R315-264 is extended automatically during the course of any unresolved enforcement action regarding the facility or as requested by the Director.

(c) A copy of records of waste disposal locations and quantities under Subsection R315-264-73(b)(2) shall be submitted to the Director and local land authority upon closure of the facility.

R315-264-75. Manifest System, Recordkeeping, and Reporting -- Biennial Report.

The owner or operator shall complete and submit EPA Form 8700-13 A/B to the Director by March 1 of the following even numbered year and shall cover activities during the previous year.

R315-264-76. Unmanifested Waste Report.

(a) If a facility accepts for treatment, storage, or disposal any hazardous waste from an off-site source without an accompanying manifest, or without an accompanying shipping paper as described by Subsection R315-263-20(e), and if the waste is not excluded from the manifest requirement by Rules R315-260, through 266, 268, 270, and 273 then the owner or operator shall prepare and submit a letter to the Director within 15 days after receiving the waste. The unmanifested waste report shall contain the following information:

(1) The EPA identification number, name and address of the facility;

(2) The date the facility received the waste;

(3) The EPA identification number, name and address of the generator and the transporter, if available;

(4) A description and the quantity of each unmanifested hazardous waste the facility received;

(5) The method of treatment, storage, or disposal for each hazardous waste;

(6) The certification signed by the owner or operator of the facility or his authorized representative; and,

(7) A brief explanation of why the waste was unmanifested, if known.

R315-264-77. Additional Reports.

In addition to submitting the biennial reports and unmanifested waste reports described in Sections R315-264-75 and 76, the owner or operator shall also report to the Director:

(a) Releases, fires, and explosions as specified in Subsection R315-264-56(j);

(b) Facility closures specified in Section R315-264-115; and

(c) As otherwise required by Sections R315-264-90 through 101, 220 through 232, 250 through 259, 270 through 283, 300 through 317, 1030 through 1049, 1050 through 1079, and 1080 through 1091.

R315-264-90. Releases From Solid Waste Management Units -- Applicability.

(a)(1) Except as provided in Subsection R315-264-90 (b), the regulations in Sections R315-264-90 through 101 apply to owners or operators of facilities that treat, store or dispose of hazardous waste. The owner or operator shall satisfy the requirements identified in Subsection R315-264-90(a)(2) for all wastes, or constituents thereof, contained in solid waste management units at the facility, regardless of the time at which waste was placed in such units.

(2) All solid waste management units shall comply with the requirements in Section R315-264-101. A surface impoundment, waste pile, and land treatment unit or landfill that receives hazardous waste after July 26, 1982, hereinafter referred to as a "regulated unit", shall comply with the requirements of Sections R315-264-91 through 100 in lieu of Section R315-264-101 for purposes of detecting, characterizing and responding to releases to the uppermost aquifer. The financial responsibility requirements of Section R315-264-101 apply to regulated units.

(3) Groundwater monitoring shall be required at non-land disposal facilities as determined to be necessary and appropriate by the Director.

(b) The owner or operator's regulated unit or units are not subject to regulation for releases into the uppermost aquifer under Sections R315-264-90 through 101 if:

(1) The owner or operator is exempted under Section R315-264-1; or

(2) He operates a unit which the Director finds:

(i) Is an engineered structure,

(ii) Does not receive or contain liquid waste or waste containing free liquids,

(iii) Is designed and operated to exclude liquid, precipitation, and other run-on and run-off,

(iv) Has both inner and outer layers of containment enclosing the waste,

(v) Has a leak detection system built into each containment layer,

(vi) The owner or operator shall provide continuing operation and maintenance of these leak detection systems during the active life of the unit and the closure and post-closure care periods, and

(vii) To a reasonable degree of certainty, will not allow hazardous constituents to migrate beyond the outer containment layer prior to the end of the post-closure care period.

(3) The Director finds, pursuant to Section R315-264-280(d), that the treatment zone of a land treatment unit that qualifies as a regulated unit does not contain levels of hazardous constituents that are above background levels of those constituents by an amount that is statistically significant, and if an unsaturated zone monitoring program meeting the requirements of Section R35-264-278 has not shown a statistically significant increase in hazardous constituents below the treatment zone during the operating life of the unit. An exemption under Subsection R315-264-90(b) can only relieve an owner or operator of responsibility to meet the requirements of Sections R315-264-90 through 101 during the post-closure care period; or

(4) The Director finds that there is no potential for migration of liquid from a regulated unit to the uppermost aquifer during the active life of the regulated unit, including the closure period, and the post-closure care period specified under Section R315-264-117. This demonstration shall be certified by a qualified geologist or geotechnical engineer. In order to provide an adequate margin of safety in the prediction of potential migration of liquid, the owner or operator shall base any predictions made under Subsection R315-264-90(b) on assumptions that maximize the rate of liquid migration.

(5) He designs and operates a pile in compliance with Section R315-264-250(c).

(c) The regulations under Sections R315-264-90 through 101 apply during the active life of the regulated unit, including the closure period. After closure of the regulated unit, the regulations in Sections R315-264-90 through 101:

(1) Do not apply if all waste, waste residues, contaminated containment system components, and contaminated subsoils are removed or decontaminated at closure;

(2) Apply during the post-closure care period under Section R315-264-117 if the owner or operator is conducting a detection monitoring program under Section R315-264-98; or

(3) Apply during the compliance period under Section R315-264-96 if the owner or operator is conducting a compliance monitoring program under Section R315-264-99 or a corrective action program under Section R315-264-100.

(d) Regulations in Sections R315-264-90 through 101 may apply to miscellaneous units when necessary to comply with Sections R315-264-601 through 603.

(e) The regulations of Sections R315-264-90 through 101 apply to all owners and operators subject to the requirements of Subsection R315-270-1(c)(7), when the Agency issues either a post-closure permit or an enforceable document, as defined in Subsection R315-270-1(c)(7) at the facility. When the Director issues an enforceable document, references in Sections R315-264-90 through 101 to "in the permit" mean "in the enforceable document."

(f) The Director may replace all or part of the requirements of Sections R315-264-91 through 100 applying to a regulated unit with alternative requirements for groundwater monitoring and corrective action for releases to groundwater set out in the permit, or in an enforceable document, as defined in Subsection R315-270-1(c)(7), where the Director determines that:

(1) The regulated unit is situated among solid waste management units, or areas of concern, a release has occurred, and both the regulated unit and one or more solid waste management unit(s), or areas of concern, are likely to have contributed to the release; and

(2) It is not necessary to apply the groundwater monitoring and corrective action requirements of Sections R315-264-91 through 100 because alternative requirements will protect human health and the environment.

R315-264-91. Required Programs.

(a) Owners and operators subject to Sections R315-264-90 through 101 shall conduct a monitoring and response program as follows:

(1) Whenever hazardous constituents under Section R315-264-93 from a regulated unit are detected at a compliance point under Section R315-264-95, the owner or operator shall institute a compliance monitoring program under Section R315-264-99. Detected is defined as statistically significant evidence of contamination as described in Subsection R315-264-98(f);

(2) Whenever the ground-water protection standard under Section R315-264-92 is exceeded, the owner or operator shall institute a corrective action program under Section R315-264-100. Exceeded is defined as statistically significant evidence of increased contamination as described in Subsection R315-264-99(d);

(3) Whenever hazardous constituents under Section R315-264-93 from a regulated unit exceed concentration limits under Section R315-264-94 in ground water between the compliance point under Section R315-264-95 and the downgradient facility property boundary, the owner or operator shall institute a corrective action program under Section R315-264-100; or

(4) In all other cases, the owner or operator shall institute a detection monitoring program under Section R315-264-98.

(b) The Director shall specify in the facility permit the specific elements of the monitoring and response program. The Director may include one or more of the programs identified in Subsection R315-264-91(a) in the facility permit as may be necessary to protect human health and the environment and will specify the circumstances under which each of the programs will be required. In deciding whether to require the owner or operator to be prepared to institute a particular program, the Director shall consider the potential adverse effects on human health and the environment that might occur before final administrative action on a permit modification application to incorporate such a program could be taken.

R315-264-92. Ground-Water Protection Standard.

The owner or operator shall comply with conditions specified in the facility permit that are designed to ensure that hazardous constituents under Section R315-264-93 detected in the ground water from a regulated unit do not exceed the concentration limits under Section R315-264-94 in the uppermost aquifer underlying the waste management area beyond the point of compliance under Section R315-264-95 during the compliance period under Section R315-264-96. The Director shall establish this ground-water protection standard in the facility permit when hazardous constituents have been detected in the ground water.

R315-264-93. Hazardous Constituents.

(a) The Director shall specify in the facility permit the hazardous constituents to which the ground-water protection standard of Section R315-264-92 applies. Hazardous constituents are constituents identified in appendix VIII of Rule R315-261 that have been detected in ground water in the uppermost aquifer underlying a regulated unit and that are

reasonably expected to be in or derived from waste contained in a regulated unit, unless the Director has excluded them under Subsection R315-264-93(b).

(b) The Director shall exclude a Rule R315-261 appendix VIII constituent from the list of hazardous constituents specified in the facility permit if he finds that the constituent is not capable of posing a substantial present or potential hazard to human health or the environment. In deciding whether to grant an exemption, the Director shall consider the following:

(1) Potential adverse effects on ground-water quality, considering:

(i) The physical and chemical characteristics of the waste in the regulated unit, including its potential for migration;

(ii) The hydrogeological characteristics of the facility and surrounding land;

(iii) The quantity of ground water and the direction of ground-water flow;

(iv) The proximity and withdrawal rates of ground-water users;

(v) The current and future uses of ground water in the area;

(vi) The existing quality of ground water, including other sources of contamination and their cumulative impact on the ground-water quality;

(vii) The potential for health risks caused by human exposure to waste constituents;

(viii) The potential damage to wildlife, crops, vegetation, and physical structures caused by exposure to waste constituents;

(ix) The persistence and permanence of the potential adverse effects; and

(2) Potential adverse effects on hydraulically-connected surface water quality, considering:

(i) The volume and physical and chemical characteristics of the waste in the regulated unit;

(ii) The hydrogeological characteristics of the facility and surrounding land;

(iii) The quantity and quality of ground water, and the direction of ground-water flow;

(iv) The patterns of rainfall in the region;

(v) The proximity of the regulated unit to surface waters;

(vi) The current and future uses of surface waters in the area and any water quality standards established for those surface waters;

(vii) The existing quality of surface water, including other sources of contamination and the cumulative impact on surface-water quality;

(viii) The potential for health risks caused by human exposure to waste constituents;

(ix) The potential damage to wildlife, crops, vegetation, and physical structures caused by exposure to waste constituents; and

(x) The persistence and permanence of the potential adverse effects.

(c) In making any determination under Subsection R315-264-93(b) about the use of ground water in the area around the facility, the Director shall consider any identification of underground sources of drinking water and exempted aquifers made under 40 CFR 144.8.

R315-264-94. Concentration Limits.

(a) The Director shall specify in the facility permit concentration limits in the ground water for hazardous constituents established under Section R315-264-93. The concentration of a hazardous constituent:

(1) Shall not exceed the background level of that constituent in the ground water at the time that limit is specified in the permit; or

(2) For any of the constituents listed in Table 1, shall not exceed the respective value given in that table if the background level of the constituent is below the value given in Table 1; or

Table 1

Maximum Concentration of Constituents for Ground-water Protection

Constituent	Maximum concentration(1)
Arsenic	0.05
Barium	1.0
Cadmium	0.01
Chromium	0.05
Lead	0.05
Mercury	0.002
Selenium	0.01
Silver	0.05
Endrin (1,2,3,4,10,10-hexachloro-1,7-epoxy 1,4,4a,5,6,7,8,9a-octahydro-1, 4-endo, endo-5,8-dimethano naphthalene)	0.0002
Lindane (1,2,3,4,5,6-hexachlorocyclohexane, gamma isomer)	0.004
Methoxychlor (1,1,1-Trichloro-2,2-bis (p-methoxyphenylethane)	0.1
Toxaphene (C10H10Cl6, Technical chlorinated camphene, 67-69 percent chlorine)	0.005
2,4-D (2,4-Dichlorophenoxyacetic acid)	0.1
2,4,5-TP Silvex (2,4,5-Trichlorophenoxypropionic acid)	0.01

(1) Milligrams per liter.

(3) Shall not exceed an alternate limit established by the Director under Subsection R315-264-94(b).

(b) The Director shall establish an alternate concentration limit for a hazardous constituent if he finds that the constituent will not pose a substantial present or potential hazard to human health or the environment as long as the alternate concentration limit is not exceeded. In establishing alternate concentration limits, the Director shall consider the following factors:

(1) Potential adverse effects on ground-water quality, considering:

(i) The physical and chemical characteristics of the waste in the regulated unit, including its potential for migration;

(ii) The hydrogeological characteristics of the facility and surrounding land;

(iii) The quantity of ground water and the direction of ground-water flow;

(iv) The proximity and withdrawal rates of ground-water users;

(v) The current and future uses of ground water in the area;

(vi) The existing quality of ground water, including other sources of contamination and their cumulative impact on the ground-water quality;

(vii) The potential for health risks caused by human exposure to waste constituents;

(viii) The potential damage to wildlife, crops, vegetation, and physical structures caused by exposure to waste constituents;

(ix) The persistence and permanence of the potential adverse effects; and

(2) Potential adverse effects on hydraulically-connected surface-water quality, considering:

(i) The volume and physical and chemical characteristics of the waste in the regulated unit;

(ii) The hydrogeological characteristics of the facility and surrounding land;

(iii) The quantity and quality of ground water, and the direction of ground-water flow;

(iv) The patterns of rainfall in the region;

(v) The proximity of the regulated unit to surface waters;

(vi) The current and future uses of surface waters in the area and any water quality standards established for those surface waters;

(vii) The existing quality of surface water, including other sources of contamination and the cumulative impact on surface water quality;

(viii) The potential for health risks caused by human exposure to waste constituents;

(ix) The potential damage to wildlife, crops, vegetation, and physical structures caused by exposure to waste constituents; and

(x) The persistence and permanence of the potential adverse effects.

(c) In making any determination under Subsection R315-264-94(b) about the use of ground water in the area around the facility the Director shall consider any identification of underground sources of drinking water and exempted aquifers made under 40 CFR 144.7.

R315-264-95. Point of Compliance.

(a) The Director shall specify in the facility permit the point of compliance at which the ground-water protection standard of Section R315-264-92 applies and at which monitoring shall be conducted. The point of compliance is a vertical surface located at the hydraulically downgradient limit of the waste management area that extends down into the uppermost aquifer underlying the regulated units.

(b) The waste management area is the limit projected in the horizontal plane of the area on which waste will be placed during the active life of a regulated unit.

(1) The waste management area includes horizontal space taken up by any liner, dike, or other barrier designed to contain waste in a regulated unit.

(2) If the facility contains more than one regulated unit, the waste management area is described by an imaginary line circumscribing the several regulated units.

R315-264-96. Compliance Period.

(a) The Director shall specify in the facility permit the compliance period during which the ground-water protection standard of Section R315-264-92 applies. The compliance period is the number of years equal to the active life of the waste management area, including any waste management activity prior to permitting, and the closure period.

(b) The compliance period begins when the owner or operator initiates a compliance monitoring program meeting the requirements of Section R315-264-99.

(c) If the owner or operator is engaged in a corrective action program at the end of the compliance period specified in Subsection R316-264-96(a), the compliance period is extended until the owner or operator can demonstrate that the ground-water protection standard of Section R315-264-92 has not been exceeded for a period of three consecutive years.

R315-264-97. General Ground-Water Monitoring Requirements.

The owner or operator shall comply with the following requirements for any ground-water monitoring program developed to satisfy Sections R315-264-98 through 100:

(a) The ground-water monitoring system shall consist of a sufficient number of wells, installed at appropriate locations and depths to yield ground-water samples from the uppermost aquifer that:

(1) Represent the quality of background ground water that has not been affected by leakage from a regulated unit;

(i) A determination of background ground-water quality may include sampling of wells that are not hydraulically upgradient of the waste management area where:

(A) Hydrogeologic conditions do not allow the owner or operator to determine what wells are hydraulically upgradient; and

(B) Sampling at other wells will provide an indication of background ground-water quality that is representative or more representative than that provided by the upgradient wells; and

(2) Represent the quality of ground water passing the point of compliance.

(3) Allow for the detection of contamination when hazardous waste or hazardous constituents have migrated from the waste management area to the uppermost aquifer.

(b) If a facility contains more than one regulated unit, separate ground-water monitoring systems are not required for each regulated unit provided that provisions for sampling the ground water in the uppermost aquifer will enable detection and measurement at the compliance point of hazardous constituents from the regulated units that have entered the ground water in the uppermost aquifer.

(c) All monitoring wells shall be cased in a manner that maintains the integrity of the monitoring-well bore hole. This casing shall be screened or perforated and packed with gravel or sand, where necessary, to enable collection of ground-water samples. The annular space, i.e., the space between the bore hole and well casing, above the sampling depth shall be sealed to prevent contamination of samples and the ground water.

(d) The ground-water monitoring program shall include consistent sampling and analysis procedures that are designed to ensure monitoring results that provide a reliable indication of ground-water quality below the waste management area. At a minimum the program shall include procedures and techniques for:

(1) Sample collection;

(2) Sample preservation and shipment;

(3) Analytical procedures; and

(4) Chain of custody control.

(e) The ground-water monitoring program shall include sampling and analytical methods that are appropriate for ground-water sampling and that accurately measure hazardous constituents in ground-water samples.

(f) The ground-water monitoring program shall include a determination of the ground-water surface elevation each time ground water is sampled.

(g) In detection monitoring or where appropriate in compliance monitoring, data on each hazardous constituent specified in the permit will be collected from background wells and wells at the compliance point(s). The number and kinds of samples collected to establish background shall be appropriate for the form of statistical test employed, following generally accepted statistical principles. The sample size shall be as large as necessary to ensure with reasonable confidence that a contaminant release to ground water from a facility will be detected. The owner or operator shall determine an appropriate sampling procedure and interval for each hazardous constituent listed in the facility permit which shall be specified in the unit permit upon approval by the Director. This sampling procedure shall be:

(1) A sequence of at least four samples, taken at an interval that assures, to the greatest extent technically feasible, that an independent sample is obtained, by reference to the uppermost aquifer's effective porosity, hydraulic conductivity, and hydraulic gradient, and the fate and transport characteristics of the potential contaminants, or

(2) an alternate sampling procedure proposed by the owner or operator and approved by the Director.

(h) The owner or operator shall specify one of the following statistical methods to be used in evaluating ground-water monitoring data for each hazardous constituent which, upon approval by the Director, shall be specified in the unit permit. The statistical test chosen shall be conducted separately for each hazardous constituent in each well. Where practical quantification limits (pql's) are used in any of the following statistical procedures to comply with Subsection R315-264-97(i)(5), the pql shall be proposed by the owner or operator and

approved by the Director. Use of any of the following statistical methods shall be protective of human health and the environment and shall comply with the performance standards outlined in Subsection R315-264-97(i).

(1) A parametric analysis of variance, ANOVA, followed by multiple comparisons procedures to identify statistically significant evidence of contamination. The method shall include estimation and testing of the contrasts between each compliance well's mean and the background mean levels for each constituent.

(2) An analysis of variance, ANOVA, based on ranks followed by multiple comparisons procedures to identify statistically significant evidence of contamination. The method shall include estimation and testing of the contrasts between each compliance well's median and the background median levels for each constituent.

(3) A tolerance or prediction interval procedure in which an interval for each constituent is established from the distribution of the background data, and the level of each constituent in each compliance well is compared to the upper tolerance or prediction limit.

(4) A control chart approach that gives control limits for each constituent.

(5) Another statistical test method submitted by the owner or operator and approved by the Director.

(i) Any statistical method chosen under Subsection R315-264-97(h) for specification in the unit permit shall comply with the following performance standards, as appropriate:

(1) The statistical method used to evaluate ground-water monitoring data shall be appropriate for the distribution of chemical parameters or hazardous constituents. If the distribution of the chemical parameters or hazardous constituents is shown by the owner or operator to be inappropriate for a normal theory test, then the data should be transformed or a distribution-free theory test should be used. If the distributions for the constituents differ, more than one statistical method may be needed.

(2) If an individual well comparison procedure is used to compare an individual compliance well constituent concentration with background constituent concentrations or a ground-water protection standard, the test shall be done at a Type I error level no less than 0.01 for each testing period. If a multiple comparisons procedure is used, the Type I experimentwise error rate for each testing period shall be no less than 0.05; however, the Type I error of no less than 0.01 for individual well comparisons shall be maintained. This performance standard does not apply to tolerance intervals, prediction intervals or control charts.

(3) If a control chart approach is used to evaluate ground-water monitoring data, the specific type of control chart and its associated parameter values shall be proposed by the owner or operator and approved by the Director if he or she finds it to be protective of human health and the environment.

(4) If a tolerance interval or a prediction interval is used to evaluate groundwater monitoring data, the levels of confidence and, for tolerance intervals, the percentage of the population that the interval shall contain, shall be proposed by the owner or operator and approved by the Director if he or she finds these parameters to be protective of human health and the environment. These parameters shall be determined after considering the number of samples in the background data base, the data distribution, and the range of the concentration values for each constituent of concern.

(5) The statistical method shall account for data below the limit of detection with one or more statistical procedures that are protective of human health and the environment. Any practical quantification limit (pql) approved by the Director under Subsection R315-264-97(h) that is used in the statistical method shall be the lowest concentration level that can be reliably achieved within specified limits of precision and accuracy during routine laboratory operating conditions that are available to the facility.

(6) If necessary, the statistical method shall include procedures to control or correct for seasonal and spatial variability as well as temporal correlation in the data.

(j) Ground-water monitoring data collected in accordance with Subsection R315-264-97(g) including actual levels of constituents shall be maintained in the facility operating record. The Director shall specify in the permit when the data shall be submitted for review.

R315-264-98. Detection Monitoring Program.

An owner or operator required to establish a detection monitoring program under Sections R315-264-90 through 101 shall, at a minimum, discharge the following responsibilities:

(a) The owner or operator shall monitor for indicator parameters, e.g., specific conductance, total organic carbon, or total organic halogen, waste constituents, or reaction products that provide a reliable indication of the presence of hazardous constituents in ground water. The Director shall specify the parameters or constituents to be monitored in the facility permit, after considering the following factors:

(1) The types, quantities, and concentrations of constituents in wastes managed at the regulated unit;

(2) The mobility, stability, and persistence of waste constituents or their reaction products in the unsaturated zone beneath the waste management area;

(3) The detectability of indicator parameters, waste constituents, and reaction products in ground water; and

(4) The concentrations or values and coefficients of variation of proposed monitoring parameters or constituents in the ground-water background.

(b) The owner or operator shall install a ground-water monitoring system at the compliance point as specified under Section R315-264-95. The ground-water monitoring system shall comply with Subsections R315-264-97(a)(2), (b), and (c).

(c) The owner or operator shall conduct a ground-water monitoring program for each chemical parameter and hazardous constituent specified in the permit pursuant to Subsection R315-264-98(a) in accordance with Section R315-264-97(g). The owner or operator shall maintain a record of ground-water analytical data as measured and in a form necessary for the determination of statistical significance under Subsection R315-264-97(h).

(d) The Director shall specify the frequencies for collecting samples and conducting statistical tests to determine whether there is statistically significant evidence of contamination for any parameter or hazardous constituent specified in the permit conditions under Subsection R315-264-98(a) in accordance with Subsection R315-264-97(g).

(e) The owner or operator shall determine the ground-water flow rate and direction in the uppermost aquifer at least annually.

(f) The owner or operator shall determine whether there is statistically significant evidence of contamination for any chemical parameter of hazardous constituent specified in the permit pursuant to Subsection R315-264-98(a) at a frequency specified under Subsection R315-264-98(d).

(1) In determining whether statistically significant evidence of contamination exists, the owner or operator shall use the method(s) specified in the permit under Subsection R315-264-97(h). These method(s) shall compare data collected at the compliance point(s) to the background ground-water quality data.

(2) The owner or operator shall determine whether there is statistically significant evidence of contamination at each monitoring well as the compliance point within a reasonable period of time after completion of sampling. The Director shall

specify in the facility permit what period of time is reasonable, after considering the complexity of the statistical test and the availability of laboratory facilities to perform the analysis of ground-water samples.

(g) If the owner or operator determines pursuant to Subsection R315-264-98(f) that there is statistically significant evidence of contamination for chemical parameters or hazardous constituents specified pursuant to Subsection R315-264-98(a) at any monitoring well at the compliance point, he or she shall:

(1) Notify the Director of this finding in writing within seven days. The notification shall indicate what chemical parameters or hazardous constituents have shown statistically significant evidence of contamination;

(2) Immediately sample the ground water in all monitoring wells and determine whether constituents in the list of appendix IX of Rule R315-264 are present, and if so, in what concentration. However, the Director, on a discretionary basis, may allow sampling for a site-specific subset of constituents from the appendix IX list of Rule R315-264 and other representative/related waste constituents.

(3) For any appendix IX compounds found in the analysis pursuant to Subsection R315-264-98(g)(2), the owner or operator may resample within one month or at an alternative site-specific schedule approved by the Director and repeat the analysis for those compounds detected. If the results of the second analysis confirm the initial results, then these constituents shall form the basis for compliance monitoring. If the owner or operator does not resample for the compounds in Subsection R315-264-98(g)(2), the hazardous constituents found during this initial appendix IX analysis shall form the basis for compliance monitoring.

(4) Within 90 days, submit to the Director an application for a permit modification to establish a compliance monitoring program meeting the requirements of Section R315-264-99. The application shall include the following information:

(i) An identification of the concentration of any appendix IX constituent detected in the ground water at each monitoring well at the compliance point;

(ii) Any proposed changes to the ground-water monitoring system at the facility necessary to meet the requirements of Section R315-264-99;

(iii) Any proposed additions or changes to the monitoring frequency, sampling and analysis procedures or methods, or statistical methods used at the facility necessary to meet the requirements of Section R315-264-99;

(iv) For each hazardous constituent detected at the compliance point, a proposed concentration limit under Subsections R315-264-94(a)(1) or (2), or a notice of intent to seek an alternate concentration limit under Subsection R315-264-94(b); and

(5) Within 180 days, submit to the Director:

(i) All data necessary to justify an alternate concentration limit sought under Subsection R315-264-94(b); and

(ii) An engineering feasibility plan for a corrective action program necessary to meet the requirement of Section R315-264-100, unless:

(A) All hazardous constituents identified under Subsection R315-264-98(g)(2) are listed in Table 1 of Section R315-264-94 and their concentrations do not exceed the respective values given in that Table; or

(B) The owner or operator has sought an alternate concentration limit under Subsection R315-264-94(b) for every hazardous constituent identified under Subsection R315-264-98(g)(2).

(6) If the owner or operator determines, pursuant to Subsection R315-264-98(f), that there is a statistically significant difference for chemical parameters or hazardous constituents specified pursuant to Subsection R315-264-98(a) at any monitoring well at the compliance point, he or she may demonstrate that a source other than a regulated unit caused the contamination or that the detection is an artifact caused by an error in sampling, analysis, or statistical evaluation or natural variation in the ground water. The owner operator may make a demonstration under Subsection R315-264-98(g) in addition to, or in lieu of, submitting a permit modification application under Subsection R315-264-98(g)(4); however, the owner or operator is not relieved of the requirement to submit a permit modification application within the time specified in Subsection R315-264-98(g)(4) unless the demonstration made under Subsection R315-264-98(g) successfully shows that a source other than a regulated unit caused the increase, or that the increase resulted from error in sampling, analysis, or evaluation. In making a demonstration under Subsection R315-264-98(g), the owner or operator shall:

(i) Notify the Director in writing within seven days of determining statistically significant evidence of contamination at the compliance point that he intends to make a demonstration under Subsection R315-264-98(g);

(ii) Within 90 days, submit a report to the Director which demonstrates that a source other than a regulated unit caused the contamination or that the contamination resulted from error in sampling, analysis, or evaluation;

(iii) Within 90 days, submit to the Director an application for a permit modification to make any appropriate changes to the detection monitoring program facility; and

(iv) Continue to monitor in accordance with the detection monitoring program established under Section R315-264-98.

(h) If the owner or operator determines that the detection monitoring program no longer satisfies the requirements of Section R315-264-98, he or she shall, within 90 days, submit an application for a permit modification to make any appropriate changes to the program.

R315-264-99. Compliance Monitoring Program.

An owner or operator required to establish a compliance monitoring program under Sections R315-264-90 through 101 shall, at a minimum, discharge the following responsibilities:

(a) The owner or operator shall monitor the ground water to determine whether regulated units are in compliance with the ground-water protection standard under Section R315-264-92. The Director shall specify the ground-water protection standard in the facility permit, including:

(1) A list of the hazardous constituents identified under Section R315-264-93;

(2) Concentration limits under Section R315-264-94 for each of those hazardous constituents;

(3) The compliance point under Section R315-264-95; and

(4) The compliance period under Section R315-264-96.

(b) The owner or operator shall install a ground-water monitoring system at the compliance point as specified under Section R315-264-95. The ground-water monitoring system shall comply with Subsections R315-264-97(a)(2), (b), and (c).

(c) The Director shall specify the sampling procedures and statistical methods appropriate for the constituents and the facility, consistent with Subsections R315-264-97(g) and (h).

(1) The owner or operator shall conduct a sampling program for each chemical parameter or hazardous constituent in accordance with Subsection R315-264-97(g).

(2) The owner or operator shall record ground-water analytical data as measured and in form necessary for the determination of statistical significance under Subsection R315-264-97(h) for the compliance period of the facility.

(d) The owner or operator shall determine whether there is statistically significant evidence of increased contamination for any chemical parameter or hazardous constituent specified in the permit, pursuant to Subsection R315-264-99(a), at a frequency specified under Subsection R315-264-99(f).

(1) In determining whether statistically significant

evidence of increased contamination exists, the owner or operator shall use the method(s) specified in the permit under Subsection R315-264-97(h). The methods(s) shall compare data collected at the compliance point(s) to a concentration limit developed in accordance with Section R315-264-94.

(2) The owner or operator shall determine whether there is statistically significant evidence of increased contamination at each monitoring well at the compliance point within a reasonable time period after completion of sampling. The Director shall specify that time period in the facility permit, after considering the complexity of the statistical test and the availability of laboratory facilities to perform the analysis of ground-water samples.

(e) The owner or operator shall determine the ground-water flow rate and direction in the uppermost aquifer at least annually.

(f) The Director shall specify the frequencies for collecting samples and conducting statistical tests to determine statistically significant evidence of increased contamination in accordance with Subsection R315-264-97(g).

(g) Annually, the owner or operator shall determine whether additional hazardous constituents from appendix IX of Rule R315-264, which could possibly be present but are not on the detection monitoring list in the permit, are actually present in the uppermost aquifer and, if so, at what concentration, pursuant to procedures in Subsection R315-264-98(f). To accomplish this, the owner or operator shall consult with the Director to determine on a case-by-case basis: which sample collection event during the year will involve enhanced sampling; the number of monitoring wells at the compliance point to undergo enhanced sampling; the number of samples to be collected from each of these monitoring wells; and, the specific constituents from appendix IX of Rule R315-264 for which these samples shall be analyzed. If the enhanced sampling event indicates that appendix IX constituents are present in the ground water that are not already identified in the permit as monitoring constituents, the owner or operator may resample within one month or at an alternative site-specific schedule approved by the Director, and repeat the analysis. If the second analysis confirms the presence of new constituents, the owner or operator shall report the concentration of these additional constituents to the Director within seven days after the completion of the second analysis and add them to the monitoring list. If the owner or operator chooses not to resample, then he or she shall report the concentrations of these additional constituents to the Director within seven days after completion of the initial analysis, and add them to the monitoring list.

(h) If the owner or operator determines pursuant to Subsection R315-264-99(d) that any concentration limits under Section R315-264-94 are being exceeded at any monitoring well at the point of compliance he or she shall:

(1) Notify the Director of this finding in writing within seven days. The notification shall indicate what concentration limits have been exceeded.

(2) Submit to the Director an application for a permit modification to establish a corrective action program meeting the requirements of Section R315-264-100 within 180 days, or within 90 days if an engineering feasibility study has been previously submitted to the Director under Subsection R315-264-98(g)(5). The application shall at a minimum include the following information:

(i) A detailed description of corrective actions that will achieve compliance with the ground-water protection standard specified in the permit under Subsection R315-264-99(a); and

(ii) A plan for a ground-water monitoring program that will demonstrate the effectiveness of the corrective action. Such a ground-water monitoring program may be based on a compliance monitoring program developed to meet the requirements of Section R315-264-99.

(i) If the owner or operator determines, pursuant to Subsection R315-264-99(d), that the ground-water concentration limits under Section R315-264-99 are being exceeded at any monitoring well at the point of compliance, he or she may demonstrate that a source other than a regulated unit caused the contamination or that the detection is an artifact caused by an error in sampling, analysis, or statistical evaluation or natural variation in the ground water. In making a demonstration under Subsection R315-264-99(h), the owner or operator shall:

(1) Notify the Director in writing within seven days that he intends to make a demonstration under Subsection R315-264-99(h);

(2) Within 90 days, submit a report to the Director which demonstrates that a source other than a regulated unit caused the standard to be exceeded or that the apparent noncompliance with the standards resulted from error in sampling, analysis, or evaluation;

(3) Within 90 days, submit to the Director an application for a permit modification to make any appropriate changes to the compliance monitoring program at the facility; and

(4) Continue to monitor in accord with the compliance monitoring program established under Section R315-264-99.

(j) If the owner or operator determines that the compliance monitoring program no longer satisfies the requirements of Section R315-264-99, he shall, within 90 days, submit an application for a permit modification to make any appropriate changes to the program.

R315-264-100. Corrective Action Program.

An owner or operator required to establish a corrective action program under Sections R315-264-90 through 101 shall, at a minimum, discharge the following responsibilities:

(a) The owner or operator shall take corrective action to ensure that regulated units are in compliance with the ground-water protection standard under Section R315-264-92. The Director shall specify the ground-water protection standard in the facility permit, including:

(1) A list of the hazardous constituents identified under Section R315-264-93;

(2) Concentration limits under Section R315-264-94 for each of those hazardous constituents;

(3) The compliance point under Section R315-264-95; and

(4) The compliance period under Section R315-264-96.

(b) The owner or operator shall implement a corrective action program that prevents hazardous constituents from exceeding their respective concentration limits at the compliance point by removing the hazardous waste constituents or treating them in place. The permit shall specify the specific measures that will be taken.

(c) The owner or operator shall begin corrective action within a reasonable time period after the ground-water protection standard is exceeded. The Director shall specify that time period in the facility permit. If a facility permit includes a corrective action program in addition to a compliance monitoring program, the permit shall specify when the corrective action will begin and such a requirement will operate in lieu of Subsection R315-264-99(i)(2).

(d) In conjunction with a corrective action program, the owner or operator shall establish and implement a ground-water monitoring program to demonstrate the effectiveness of the corrective action program. Such a monitoring program may be based on the requirements for a compliance monitoring program under Section R315-264-99 and shall be as effective as that program in determining compliance with the ground-water protection standard under Section R315-264-92 and in determining the success of a corrective action program under Subsection R315-264-100(e), where appropriate.

(e) In addition to the other requirements of Section R315-

264-100, the owner or operator shall conduct a corrective action program to remove or treat in place any hazardous constituents under Section R315-264-93 that exceed concentration limits under Section R315-264-94 in groundwater:

(1) Between the compliance point under Section R315-264-95 and the downgradient property boundary; and

(2) Beyond the facility boundary, where necessary to protect human health and the environment, unless the owner or operator demonstrates to the satisfaction of the Director that, despite the owner's or operator's best efforts, the owner or operator was unable to obtain the necessary permission to undertake such action. The owner/operator is not relieved of all responsibility to clean up a release that has migrated beyond the facility boundary where off-site access is denied. On-site measures to address such releases will be determined on a case-by-case basis.

(3) Corrective action measures under Subsection R315-264-100(e) shall be initiated and completed within a reasonable period of time considering the extent of contamination.

(4) Corrective action measures under Subsection R315-264-100(e) may be terminated once the concentration of hazardous constituents under Section R315-264-93 is reduced to levels below their respective concentration limits under Section R315-264-94.

(f) The owner or operator shall continue corrective action measures during the compliance period to the extent necessary to ensure that the ground-water protection standard is not exceeded. If the owner or operator is conducting corrective action at the end of the compliance period, he shall continue that corrective action for as long as necessary to achieve compliance with the ground-water protection standard. The owner or operator may terminate corrective action measures taken beyond the period equal to the active life of the waste management area, including the closure period, if he can demonstrate, based on data from the ground-water monitoring program under Subsection R315-264-100(d), that the ground-water protection standard of Section R315-264-92 has not been exceeded for a period of three consecutive years.

(g) The owner or operator shall report in writing to the Director on the effectiveness of the corrective action program. The owner or operator shall submit these reports annually.

(h) If the owner or operator determines that the corrective action program no longer satisfies the requirements Section R315-264-100, he shall, within 90 days, submit an application for a permit modification to make any appropriate changes to the program.

R315-264-101. Corrective Action for Solid Waste Management Units.

(a) The owner or operator of a facility seeking a permit for the treatment, storage or disposal of hazardous waste shall institute corrective action as necessary to protect human health and the environment for all releases of hazardous waste or constituents from any solid waste management unit at the facility, regardless of the time at which waste was placed in such unit.

(b) Corrective action shall be specified in the permit in accordance with Section R315-264-101 and Sections R315-264-550 through 555. The permit shall contain schedules of compliance for such corrective action, where such corrective action cannot be completed prior to issuance of the permit, and assurances of financial responsibility for completing such corrective action.

(c) The owner or operator shall implement corrective actions beyond the facility property boundary, where necessary to protect human health and the environment, unless the owner or operator demonstrates to the satisfaction of the Director that, despite the owner's or operator's best efforts, the owner or operator was unable to obtain the necessary permission to undertake such actions. The owner/operator is not relieved of all responsibility to clean up a release that has migrated beyond the facility boundary where off-site access is denied. On-site measures to address such releases shall be determined on a case-by-case basis. Assurances of financial responsibility for such corrective action shall be provided.

(d) Section R315-264-101 does not apply to remediation waste management sites unless they are part of a facility subject to a permit for treating, storing or disposing of hazardous wastes that are not remediation wastes.

R315-264-110. Closure and Post-Closure -- Applicability.

Except as Section R315-264-1 provides otherwise:

(a) Sections R315-264-111 through 115, which concern closure, apply to the owners and operators of all hazardous waste management facilities; and

(b) Sections R315-264-116 through 120, which concern post-closure care, apply to the owners and operators of:

(1) All hazardous waste disposal facilities;

(2) Waste piles and surface impoundments from which the owner or operator intends to remove the wastes at closure to the extent that these sections are made applicable to such facilities in Sections R315-264-228 or 258;

(3) Tank systems that are required under Section R315-264-197 to meet the requirements for landfills; and

(4) Containment buildings that are required under Section R315-264-1102 to meet the requirement for landfills.

(c) The Director may replace all or part of the requirements of Sections R315-264-110 through 120, including the unit-specific standards referenced in Subsection R315-264-111(c) applying to a regulated unit, with alternative requirements set out in a permit or in an enforceable document, as defined in Subsection R315-270-1(c)(7), where the Director determines that:

(1) The regulated unit is situated among solid waste management units, or areas of concern, a release has occurred, and both the regulated unit and one or more solid waste management unit(s), or areas of concern, are likely to have contributed to the release; and

(2) It is not necessary to apply the closure requirements of Sections R315-264-110 through 120, and those referenced herein, because the alternative requirements will protect human health and the environment and will satisfy the closure performance standard of Subsections R315-264-111(a) and (b).

R315-264-111. Closure Performance Standard.

The owner or operator shall close the facility in a manner that:

(a) Minimizes the need for further maintenance; and

(b) Controls, minimizes or eliminates, to the extent necessary to protect human health and the environment, post-closure escape of hazardous waste, hazardous constituents, leachate, contaminated run-off, or hazardous waste decomposition products to the ground or surface waters or to the atmosphere; and

(c) Complies with the closure requirements of Rule R315-264, including, but not limited to, the requirements of Sections R315-264-178, 197, 228, 258, 280, 310, 351, 601 through 603, and 1102.

R315-264-112. Closure plan; Amendment of Plan.

(a) Written plan.

(1) The owner or operator of a hazardous waste management facility shall have a written closure plan. In addition, certain surface impoundments and waste piles from which the owner or operator intends to remove or decontaminate the hazardous waste at partial or final closure are required by Subsections R315-264-228(c)(1)(i) and 258(c)(1)(i) to have contingent closure plans. The plan shall be submitted

with the permit application, in accordance with Subsection R315-270-14(b)(13), and approved by the Director as part of the permit issuance procedures under Rule R315-124. In accordance with Section R315-270-32, the approved closure plan shall become a condition of any permit.

(2) Plans shall be consistent with Sections R315-264-111 through 115 and the applicable requirements of Sections R315-264-90 through 101, Sections R315-264-178, 197, 228, 258, 280, 310, 351, 601, and 1102. Until final closure is completed and certified in accordance with Section R315-264-115, a copy of the approved plan and all approved revisions shall be furnished to the Director upon request, including requests by mail.

(b) Content of plan. The plan shall identify steps necessary to perform partial and/or final closure of the facility at any point during its active life. The closure plan shall include, at least:

(1) A description of how each hazardous waste management unit at the facility will be closed in accordance with Section R315-264-111;

(2) A description of how final closure of the facility will be conducted in accordance with Section R315-264-111. The description shall identify the maximum extent of the operations which will be unclosed during the active life of the facility; and

(3) An estimate of the maximum inventory of hazardous wastes ever on-site over the active life of the facility and a detailed description of the methods to be used during partial closures and final closure, including, but not limited to, methods for removing, transporting, treating, storing, or disposing of all hazardous wastes, and identification of the type(s) of the off-site hazardous waste management units to be used, if applicable; and

(4) A detailed description of the steps needed to remove or decontaminate all hazardous waste residues and contaminated containment system components, equipment, structures, and soils during partial and final closure, including, but not limited to, procedures for cleaning equipment and removing contaminated soils, methods for sampling and testing surrounding soils, and criteria for determining the extent of decontamination required to satisfy the closure performance standard; and

(5) A detailed description of other activities necessary during the closure period to ensure that all partial closures and final closure satisfy the closure performance standards, including, but not limited to, ground-water monitoring, leachate collection, and run-on and run-off control; and

(6) A schedule for closure of each hazardous waste management unit and for final closure of the facility. The schedule shall include, at a minimum, the total time required to close each hazardous waste management unit and the time required for intervening closure activities which will allow tracking of the progress of partial and final closure. For example, in the case of a landfill unit, estimates of the time required to treat or dispose of all hazardous waste inventory and of the time required to place a final cover shall be included.

(7) For facilities that use trust funds to establish financial assurance under Section R315-264-143 or Section R315-264-145 and that are expected to close prior to the expiration of the permit, an estimate of the expected year of final closure.

(8) For facilities where the Director has applied alternative requirements at a regulated unit under Subsections R315-264-90(f), 264-110(c), and/or Subsection R315-264-140(d), either the alternative requirements applying to the regulated unit, or a reference to the enforceable document containing those alternative requirements.

(c) Amendment of plan. The owner or operator shall submit a written notification of or request for a permit modification to authorize a change in operating plans, facility design, or the approved closure plan in accordance with the applicable procedures in Rules R315-124 and 270. The written notification or request shall include a copy of the amended closure plan for review or approval by the Director.

(1) The owner or operator may submit a written notification or request to the Director for a permit modification to amend the closure plan at any time prior to the notification of partial or final closure of the facility.

(2) The owner or operator shall submit a written notification of or request for a permit modification to authorize a change in the approved closure plan whenever:

(i) Changes in operating plans or facility design affect the closure plan, or

(ii) There is a change in the expected year of closure, if applicable, or

(iii) In conducting partial or final closure activities, unexpected events require a modification of the approved closure plan.

(iv) The owner or operator requests the Director to apply alternative requirements to a regulated unit under Subsections R315-264-90(f), 264-110(c), and/or Subsection R315-264-140(d).

(3) The owner or operator shall submit a written request for a permit modification including a copy of the amended closure plan for approval at least 60 days prior to the proposed change in facility design or operation, or no later than 60 days after an unexpected event has occurred which has affected the closure plan. If an unexpected event occurs during the partial or final closure period, the owner or operator shall request a permit modification no later than 30 days after the unexpected event. An owner or operator of a surface impoundment or waste pile that intends to remove all hazardous waste at closure and is not otherwise required to prepare a contingent closure plan under Subsection R315-264-228(c)(1)(i) or Subsection R315-264-258(c)(1)(i), shall submit an amended closure plan to the Director no later than 60 days from the date that the owner or operator or Director determines that the hazardous waste management unit shall be closed as a landfill, subject to the requirements of Section R315-264-310, or no later than 30 days from that date if the determination is made during partial or final closure. The Director shall approve, disapprove, or modify this amended plan in accordance with the procedures in Rules R315-124 and 270. In accordance with Section R315-270-32, the approved closure plan shall become a condition of any permit issued.

(4) The Director may request modifications to the plan under the conditions described in Subsection R315-264-112(c)(2). The owner or operator shall submit the modified plan within 60 days of the Director's request, or within 30 days if the change in facility conditions occurs during partial or final closure. Any modifications requested by the Director shall be approved in accordance with the procedures in Rules R315-124 and 270.

(d) Notification of partial closure and final closure.

(1) The owner or operator shall notify the Director in writing at least 60 days prior to the date on which he expects to begin closure of a surface impoundment, waste pile, land treatment or landfill unit, or final closure of a facility with such a unit. The owner or operator shall notify the Director in writing at least 45 days prior to the date on which he expects to begin final closure of a facility with only treatment or storage tanks, container storage, or incinerator units to be closed. The owner or operator shall notify the Director in writing at least 45 days prior to the date on which he expects to begin partial or final closure of a boiler or industrial furnace, whichever is earlier.

(2) The date when he "expects to begin closure" shall be either:

(i) No later than 30 days after the date on which any hazardous waste management unit receives the known final volume of hazardous wastes, or if there is a reasonable

possibility that the hazardous waste management unit will receive additional hazardous wastes, no later than one year after the date on which the unit received the most recent volume of hazardous wastes. If the owner or operator of a hazardous waste management unit can demonstrate to the Director that the hazardous waste management unit or facility has the capacity to receive additional hazardous wastes and he has taken all steps to prevent threats to human health and the environment, including compliance with all applicable permit requirements, the Director may approve an extension to this one-year limit; or

(ii) For units meeting the requirements of Subsection R315-264-113(d), no later than 30 days after the date on which the hazardous waste management unit receives the known final volume of non-hazardous wastes, or if there is a reasonable possibility that the hazardous waste management unit will receive additional non-hazardous wastes, no later than one year after the date on which the unit received the most recent volume of non-hazardous wastes. If the owner or operator can demonstrate to the Director that the hazardous waste management unit has the capacity to receive additional non-hazardous wastes and he has taken, and will continue to take, all steps to prevent threats to human health and the environment, including compliance with all applicable permit requirements, the Director may approve an extension to this one-year limit.

(3) If the facility's permit is terminated, or if the facility is otherwise ordered, by judicial decree or final administrative order, to cease receiving hazardous wastes or to close, then the requirements of Subsection R315-264-112(d) do not apply. However, the owner or operator shall close the facility in accordance with the deadlines established in Section R315-264-113.

(e) Removal of wastes and decontamination or dismantling of equipment. Nothing in Section R315-264-112 shall preclude the owner or operator from removing hazardous wastes and decontaminating or dismantling equipment in accordance with the approved partial or final closure plan at any time before or after notification of partial or final closure.

R315-264-113. Closure; Time Allowed for Closure.

(a) Within 90 days after receiving the final volume of hazardous wastes, or the final volume of non-hazardous wastes if the owner or operator complies with all applicable requirements in Subsections R315-264-113(d) and (e), at a hazardous waste management unit or facility, the owner or operator shall treat, remove from the unit or facility, or dispose of on-site, all hazardous wastes in accordance with the approved closure plan. The Director may approve a longer period if the owner or operator complies with all applicable requirements for requesting a modification to the permit and demonstrates that:

(1)(i) The activities required to comply with R315-264-113 will, of necessity, take longer than 90 days to complete; or

(ii)(A) The hazardous waste management unit or facility has the capacity to receive additional hazardous wastes, or has the capacity to receive non-hazardous wastes if the owner or operator complies with Subsections R315-264-113(d) and (e); and

(B) There is a reasonable likelihood that he or another person will recommence operation of the hazardous waste management unit or the facility within one year; and

(C) Closure of the hazardous waste management unit or facility would be incompatible with continued operation of the site; and

(2) He has taken and will continue to take all steps to prevent threats to human health and the environment, including compliance with all applicable permit requirements.

(b) The owner or operator shall complete partial and final closure activities in accordance with the approved closure plan and within 180 days after receiving the final volume of hazardous wastes, or the final volume of non-hazardous wastes if the owner or operator complies with all applicable requirements in Subsections R315-264-113(d) and (e), at the hazardous waste management unit or facility. The Director may approve an extension to the closure period if the owner or operator complies with all applicable requirements for requesting a modification to the permit and demonstrates that:

(1)(i) The partial or final closure activities will, of necessity, take longer than 180 days to complete; or

(ii)(A) The hazardous waste management unit or facility has the capacity to receive additional hazardous wastes, or has the capacity to receive non-hazardous wastes if the owner or operator complies with Subsections R315-264-113(d) and (e); and

(B) There is reasonable likelihood that he or another person will recommence operation of the hazardous waste management unit or the facility within one year; and

(C) Closure of the hazardous waste management unit or facility would be incompatible with continued operation of the site; and

(2) He has taken and will continue to take all steps to prevent threats to human health and the environment from the unclosed but not operating hazardous waste management unit or facility, including compliance with all applicable permit requirements.

(c) The demonstrations referred to in Subsections R315-264-113(a)(1) and (b)(1) shall be made as follows:

(1) The demonstrations in Subsection R315-264-113(a)(1) shall be made at least 30 days prior to the expiration of the 90-day period in Subsection R315-264-113(a); and

(2) The demonstration in Subsection R315-264-113(b)(1) shall be made at least 30 days prior to the expiration of the 180-day period in Subsection R315-264-113(b), unless the owner or operator is otherwise subject to the deadlines in Subsection R315-264-113(d).

(d) The Director may allow an owner or operator to receive only non-hazardous wastes in a landfill, land treatment, or surface impoundment unit after the final receipt of hazardous wastes at that unit if:

(1) The owner or operator requests a permit modification in compliance with all applicable requirements in Rules R315-270 and 124 and in the permit modification request demonstrates that:

(i) The unit has the existing design capacity as indicated on the part A application to receive non-hazardous wastes; and

(ii) There is a reasonable likelihood that the owner or operator or another person will receive non-hazardous wastes in the unit within one year after the final receipt of hazardous wastes; and

(iii) The non-hazardous wastes will not be incompatible with any remaining wastes in the unit, or with the facility design and operating requirements of the unit or facility under Rule R315-264; and

(iv) Closure of the hazardous waste management unit would be incompatible with continued operation of the unit or facility; and

(v) The owner or operator is operating and will continue to operate in compliance with all applicable permit requirements; and

(2) The request to modify the permit includes an amended waste analysis plan, ground-water monitoring and response program, human exposure assessment required under RCRA section 3019, and closure and post-closure plans, and updated cost estimates and demonstrations of financial assurance for closure and post-closure care as necessary and appropriate, to reflect any changes due to the presence of hazardous constituents in the non-hazardous wastes, and changes in closure activities, including the expected year of closure if applicable under Subsection R315-264-112(b)(7), as a result of the receipt of non-hazardous wastes following the final receipt

of hazardous wastes; and

(3) The request to modify the permit includes revisions, as necessary and appropriate, to affected conditions of the permit to account for the receipt of non-hazardous wastes following receipt of the final volume of hazardous wastes; and

(4) The request to modify the permit and the demonstrations referred to in Subsections R315-264-113(d)(1) and (d)(2) are submitted to the Director no later than 120 days prior to the date on which the owner or operator of the facility receives the known final volume of hazardous wastes at the unit, or no later than 90 days after the effective date of this rule in the state in which the unit is located, whichever is later.

(e) In addition to the requirements in Subsection R315-264-113(d), an owner or operator of a hazardous waste surface impoundment that is not in compliance with the liner and leachate collection system requirements in Subsection R315-264-221(c) or (d) shall:

(1) Submit with the request to modify the permit:

(i) A contingent corrective measures plan, unless a corrective action plan has already been submitted under Section R315-264-99; and

(ii) A plan for removing hazardous wastes in compliance with Subsection R315-264-113(e)(2); and

(2) Remove all hazardous wastes from the unit by removing all hazardous liquids, and removing all hazardous sludges to the extent practicable without impairing the integrity of the liner(s), if any.

(3) Removal of hazardous wastes shall be completed no later than 90 days after the final receipt of hazardous wastes. The Director may approve an extension to this deadline if the owner or operator demonstrates that the removal of hazardous wastes will, of necessity, take longer than the allotted period to complete and that an extension will not pose a threat to human health and the environment.

(4) If a release that is a statistically significant increase, or decrease in the case of pH, over background values for detection monitoring parameters or constituents specified in the permit or that exceeds the facility's ground-water protection standard at the point of compliance, if applicable, is detected in accordance with the requirements in Sections R315-264-90 through 101, the owner or operator of the unit:

(i) Shall implement corrective measures in accordance with the approved contingent corrective measures plan required by Subsection R315-264-113(e)(1) no later than one year after detection of the release, or approval of the contingent corrective measures plan, whichever is later;

(ii) May continue to receive wastes at the unit following detection of the release only if the approved corrective measures plan includes a demonstration that continued receipt of wastes will not impede corrective action; and

(iii) May be required by the Director to implement corrective measures in less than one year or to cease the receipt of wastes until corrective measures have been implemented if necessary to protect human health and the environment.

(5) During the period of corrective action, the owner or operator shall provide annual reports to the Director describing the progress of the corrective action program, compile all ground-water monitoring data, and evaluate the effect of the continued receipt of non-hazardous wastes on the effectiveness of the corrective action.

(6) The Director may require the owner or operator to commence closure of the unit if the owner or operator fails to implement corrective action measures in accordance with the approved contingent corrective measures plan within one year as required in Subsection R315-264-113(e)(4), or fails to make substantial progress in implementing corrective action and achieving the facility's ground-water protection standard or background levels if the facility has not yet established a ground-water protection standard.

(7) If the owner or operator fails to implement corrective measures as required in Subsection R315-264-113(e)(4), or if the Director determines that substantial progress has not been made pursuant to Subsection R315-264-113(e)(6) he shall:

(i) Notify the owner or operator in writing that the owner or operator shall begin closure in accordance with the deadlines in Subsections R315-264-113(a) and (b) and provide a detailed statement of reasons for this determination, and

(ii) Provide the owner or operator and the public, through a newspaper notice, the opportunity to submit written comments on the decision no later than 20 days after the date of the notice.

(iii) If the Director receives no written comments, the decision shall become final five days after the close of the comment period. The Director shall notify the owner or operator that the decision is final, and that a revised closure plan, if necessary, shall be submitted within 15 days of the final notice and that closure shall begin in accordance with the deadlines in Subsections R315-264-113 (a) and (b).

(iv) If the Director receives written comments on the decision, he shall make a final decision within 30 days after the end of the comment period, and provide the owner or operator in writing and the public through a newspaper notice, a detailed statement of reasons for the final decision. If the Director determines that substantial progress has not been made, closure shall be initiated in accordance with the deadlines in Subsections R315-264-113(a) and (b).

(v) The final determinations made by the Director under Subsections R315-264-113(e)(7)(iii) and (iv) are not subject to administrative appeal.

R315-264-114. Disposal or Decontamination of Equipment, Structures and Soils.

During the partial and final closure periods, all contaminated equipment, structures and soils shall be properly disposed of or decontaminated unless otherwise specified in Sections R315-264-197, 228, 258, 280 or 310. By removing any hazardous wastes or hazardous constituents during partial and final closure, the owner or operator may become a generator of hazardous waste and shall handle that waste in accordance with all applicable requirements of Rule R315-262.

R315-264-115. Certification of Closure.

Within 60 days of completion of closure of each hazardous waste surface impoundment, waste pile, land treatment, and landfill unit, and within 60 days of the completion of final closure, the owner or operator shall submit to the Director, by registered mail, a certification that the hazardous waste management unit or facility, as applicable, has been closed in accordance with the specifications in the approved closure plan. The certification shall be signed by the owner or operator and by a qualified Professional Engineer. Documentation supporting the Professional Engineer's certification shall be furnished to the Director upon request until he releases the owner or operator from the financial assurance requirements for closure under Subsection R315-264-143(i).

R315-264-116. Survey Plat.

No later than the submission of the certification of closure of each hazardous waste disposal unit, the owner or operator shall submit to the local zoning authority, or the authority with jurisdiction over local land use, and to the Director, a survey plat indicating the location and dimensions of landfill cells or other hazardous waste disposal units with respect to permanently surveyed benchmarks. This plat shall be prepared and certified by a professional land surveyor. The plat filed with the local zoning authority, or the authority with jurisdiction over local land use, shall contain a note, prominently displayed, which states the owner's or operator's obligation to restrict disturbance of the hazardous waste disposal unit in accordance

with the applicable Sections of R315-264-110 through 120.

R315-264-117. Post-Closure Care and Use of Property.

(a)(1) Post-closure care for each hazardous waste management unit subject to the requirements of Sections R315-264-117 through 120 shall begin after completion of closure of the unit and continue for 30 years after that date and shall consist of at least the following:

(i) Monitoring and reporting in accordance with the requirements of Sections R315-264-90 through 101, 220 through 232, 250 through 254, 256 through 259, 270 through 283, 300 through 317, and 600 through 603; and

(ii) Maintenance and monitoring of waste containment systems in accordance with the requirements of Sections R315-264-90 through 101, 220 through 232, 250 through 254, 256 through 259, 270 through 283, 300 through 317, and 600 through 603.

(2) Any time preceding partial closure of a hazardous waste management unit subject to post-closure care requirements or final closure, or any time during the post-closure period for a particular unit, the Director may, in accordance with the permit modification procedures in Rules R315-124 and 270:

(i) Shorten the post-closure care period applicable to the hazardous waste management unit, or facility, if all disposal units have been closed, if he finds that the reduced period is sufficient to protect human health and the environment, e.g., leachate or ground-water monitoring results, characteristics of the hazardous wastes, application of advanced technology, or alternative disposal, treatment, or re-use techniques indicate that the hazardous waste management unit or facility is secure; or

(ii) Extend the post-closure care period applicable to the hazardous waste management unit or facility if he finds that the extended period is necessary to protect human health and the environment, e.g., leachate or ground-water monitoring results indicate a potential for migration of hazardous wastes at levels which may be harmful to human health and the environment.

(b) The Director may require, at partial and final closure, continuation of any of the security requirements of Section R315-264-14 during part or all of the post-closure period when:

(1) Hazardous wastes may remain exposed after completion of partial or final closure; or

(2) Access by the public or domestic livestock may pose a hazard to human health.

(c) Post-closure use of property on or in which hazardous wastes remain after partial or final closure shall never be allowed to disturb the integrity of the final cover, liner(s), or any other components of the containment system, or the function of the facility's monitoring systems, unless the Director finds that the disturbance:

(1) Is necessary to the proposed use of the property, and will not increase the potential hazard to human health or the environment; or

(2) Is necessary to reduce a threat to human health or the environment.

(d) All post-closure care activities shall be in accordance with the provisions of the approved post-closure plan as specified in Section R315-264-118.

R315-264-118. Post-Closure Plan; Amendment of Plan.

(a) Written Plan. The owner or operator of a hazardous waste disposal unit shall have a written post-closure plan. In addition, certain surface impoundments and waste piles from which the owner or operator intends to remove or decontaminate the hazardous wastes at partial or final closure are required by Subsections R315-264-228(c)(1)(ii) and 264-258(c)(1)(ii) to have contingent post-closure plans. Owners or operators of surface impoundments and waste piles not otherwise required to prepare contingent post-closure plans under Subsections R315-264-228(c)(1)(ii) and 264-258(c)(1)(ii) shall submit a post-closure plan to the Director within 90 days from the date that the owner or operator or Director determines that the hazardous waste management unit shall be closed as a landfill, subject to the requirements of Sections R315-264-117 through 120. The plan shall be submitted with the permit application, in accordance with Subsection R315-270-14(b)(13), and approved by the Director as part of the permit issuance procedures under Rule R315-124. In accordance with Section R315-270-32, the approved post-closure plan shall become a condition of any RCRA permit issued.

(b) For each hazardous waste management unit subject to the requirements Section R315-264-118, the post-closure plan shall identify the activities that will be carried on after closure of each disposal unit and the frequency of these activities, and include at least:

(1) A description of the planned monitoring activities and frequencies at which they will be performed to comply with Sections R315-264-90 through 101, 220 through 232, 250 through 259, 270 through 283, 300 through 317, and 600 through 603 during the post-closure care period; and

(2) A description of the planned maintenance activities, and frequencies at which they will be performed, to ensure:

(i) The integrity of the cap and final cover or other containment systems in accordance with the requirements of Sections R315-264-90 through 101, 220 through 232, 250 through 259, 270 through 283, 300 through 317, and 600 through 603; and

(ii) The function of the monitoring equipment in accordance with the requirements of Sections R315-264-90 through 101, 220 through 232, 250 through 259, 270 through 283, 300 through 317, and 600 through 603; and

(3) The name, address, and phone number of the person or office to contact about the hazardous waste disposal unit or facility during the post-closure care period.

(4) For facilities where the Director has applied alternative requirements at a regulated unit under Subsections R315-264-90(f), 264-110(c), and/or 264-140(d), either the alternative requirements that apply to the regulated unit, or a reference to the enforceable document containing those requirements.

(c) Until final closure of the facility, a copy of the approved post-closure plan shall be furnished to the Director upon request, including request by mail. After final closure has been certified, the person or office specified in Subsection R315-264-118(b)(3) shall keep the approved post-closure plan during the remainder of the post-closure period.

(d) Amendment of plan. The owner or operator shall submit a written notification of or request for a permit modification to authorize a change in the approved post-closure plan in accordance with the applicable requirements in Rules R315-124 and 270. The written notification or request shall include a copy of the amended post-closure plan for review or approval by the Director.

(1) The owner or operator may submit a written notification or request to the Director for a permit modification to amend the post-closure plan at any time during the active life of the facility or during the post-closure care period.

(2) The owner or operator shall submit a written notification of or request for a permit modification to authorize a change in the approved post-closure plan whenever:

(i) Changes in operating plans or facility design affect the approved post-closure plan, or

(ii) There is a change in the expected year of final closure, if applicable, or

(iii) Events which occur during the active life of the facility, including partial and final closures, affect the approved post-closure plan.

(iv) The owner or operator requests the Director to apply alternative requirements to a regulated unit under Subsections

R315-264-90(f), 264-110(c), and/or 264-140(d).

(3) The owner or operator shall submit a written request for a permit modification at least 60 days prior to the proposed change in facility design or operation, or no later than 60 days after an unexpected event has occurred which has affected the post-closure plan. An owner or operator of a surface impoundment or waste pile that intends to remove all hazardous waste at closure and is not otherwise required to submit a contingent post-closure plan under Subsections R315-264-228(c)(1)(ii) 258(c)(1)(ii) shall submit a post-closure plan to the Director no later than 90 days after the date that the owner or operator or Director determines that the hazardous waste management unit shall be closed as a landfill, subject to the requirements of Section R315-264-310. The Director shall approve, disapprove or modify this plan in accordance with the procedures in Rules R315-124 and 270. In accordance with Section R315-270-32, the approved post-closure plan shall become a permit condition.

(4) The Director may request modifications to the plan under the conditions described in Subsection R315-264-118(d)(2). The owner or operator shall submit the modified plan no later than 60 days after the Director's request, or no later than 90 days if the unit is a surface impoundment or waste pile not previously required to prepare a contingent post-closure plan. Any modifications requested by the Director shall be approved, disapproved, or modified in accordance with the procedures in Rules R315-124 and 270.

R315-264-119. Post-Closure Notices.

(a) No later than 60 days after certification of closure of each hazardous waste disposal unit, the owner or operator shall submit to the local zoning authority, or the authority with jurisdiction over local land use, and to the Director a record of the type, location, and quantity of hazardous wastes disposed of within each cell or other disposal unit of the facility. For hazardous wastes disposed of before January 12, 1981, the owner or operator shall identify the type, location, and quantity of the hazardous wastes to the best of his knowledge and in accordance with any records he has kept.

(b) Within 60 days of certification of closure of the first hazardous waste disposal unit and within 60 days of certification of closure of the last hazardous waste disposal unit, the owner or operator shall:

(1) Record, in accordance with State law, a notation on the deed to the facility property-or on some other instrument which is normally examined during title search-that will in perpetuity notify any potential purchaser of the property that:

(i) The land has been used to manage hazardous wastes; and

(ii) Its use is restricted under Sections R315-264-110 through 120; and

(iii) The survey plat and record of the type, location, and quantity of hazardous wastes disposed of within each cell or other hazardous waste disposal unit of the facility required by Section R315-264-116 and Subsection R315-264-119(a) have been filed with the local zoning authority or the authority with jurisdiction over local land use and with the Director; and

(2) Submit a certification, signed by the owner or operator, that he has recorded the notation specified in Subsection R315-264-119(b)(1), including a copy of the document in which the notation has been placed, to the Director.

(c) If the owner or operator or any subsequent owner or operator of the land upon which a hazardous waste disposal unit is located wishes to remove hazardous wastes and hazardous waste residues, the liner, if any, or contaminated soils, he shall request a modification to the post-closure permit in accordance with the applicable requirements in Rules R315-124 and 270. The owner or operator shall demonstrate that the removal of hazardous wastes will satisfy the criteria of Subsection R315-264-117(c). By removing hazardous waste, the owner or operator may become a generator of hazardous waste and shall manage it in accordance with all applicable requirements of Rules R315-260 through 266, 268, 270, and 273. If he is granted a permit modification or otherwise granted approval to conduct such removal activities, the owner or operator may request that the Director approve either:

(1) The removal of the notation on the deed to the facility property or other instrument normally examined during title search; or

(2) The addition of a notation to the deed or instrument indicating the removal of the hazardous waste.

R315-264-120. Certification of Completion of Post-Closure Care.

No later than 60 days after completion of the established post-closure care period for each hazardous waste disposal unit, the owner or operator shall submit to the Director, by registered mail, a certification that the post-closure care period for the hazardous waste disposal unit was performed in accordance with the specifications in the approved post-closure plan. The certification shall be signed by the owner or operator and a qualified Professional Engineer. Documentation supporting the Professional Engineer's certification shall be furnished to the Director upon request until he releases the owner or operator from the financial assurance requirements for post-closure care under Subsection R315-264-145(i).

R315-264-140. Financial Requirements -- Applicability.

(a) The requirements of Sections R315-264-142, 143, 147 through 151 apply to owners and operators of all hazardous waste facilities, except as provided otherwise in Section R315-264-140 or in Section R315-264-1.

(b) The requirements of Sections R315-264-144 and 145 apply only to owners and operators of:

(1) Disposal facilities;

(2) Piles, and surface impoundments from which the owner or operator intends to remove the wastes at closure, to the extent that these sections are made applicable to such facilities in Sections R315-264-228 and 258;

(3) Tank systems that are required under Section R315-264-197 to meet the requirements for landfills; and

(4) Containment buildings that are required under Section R315-264-1102 to meet the requirements for landfills.

(c) States and the Federal government are exempt from the requirements of Sections R315-264-140 through 151.

(d) The Director may replace all or part of the requirements of Sections R315-264-140 through 151 applying to a regulated unit with alternative requirements for financial assurance set out in the permit or in an enforceable document, as defined in Subsection R315-270-1(c)(7), where the Director:

(1) Prescribes alternative requirements for the regulated unit under Subsection R315-264-90(f) and/or Subsection R315-264-110(c); and

(2) Determines that it is not necessary to apply the requirements of Sections R315-264-140 through 151 because the alternative financial assurance requirements will protect human health and the environment.

R315-264-141. Definitions of Terms as Used in Sections R315-264-140 through 151.

(a) Closure plan means the plan for closure prepared in accordance with the requirements of Section R315-264-112.

(b) Current closure cost estimate means the most recent of the estimates prepared in accordance with Subsections R315-264-142(a), (b), and (c).

(c) Current post-closure cost estimate means the most recent of the estimates prepared in accordance with Subsection R315-264-144(a), (b), and (c).

(d) Parent corporation means a corporation which directly owns at least 50 percent of the voting stock of the corporation which is the facility owner or operator; the latter corporation is deemed a "subsidiary" of the parent corporation.

(e) Post-closure plan means the plan for post-closure care prepared in accordance with the requirements of Sections R315-264-117 through 120.

(f) The following terms are used in the specifications for the financial tests for closure, post-closure care, and liability coverage. The definitions are intended to assist in the understanding of these regulations and are not intended to limit the meanings of terms in a way that conflicts with generally accepted accounting practices.

Assets means all existing and all probable future economic benefits obtained or controlled by a particular entity.

Current assets means cash or other assets or resources commonly identified as those which are reasonably expected to be realized in cash or sold or consumed during the normal operating cycle of the business.

Current liabilities means obligations whose liquidation is reasonably expected to require the use of existing resources properly classifiable as current assets or the creation of other current liabilities.

Current plugging and abandonment cost estimate means the most recent of the estimates prepared in accordance with 40 CFR 144.62(a), (b), and (c).

Independently audited refers to an audit performed by an independent certified public accountant in accordance with generally accepted auditing standards.

Liabilities means probable future sacrifices of economic benefits arising from present obligations to transfer assets or provide services to other entities in the future as a result of past transactions or events.

Net working capital means current assets minus current liabilities.

Net worth means total assets minus total liabilities and is equivalent to owner's equity.

Tangible net worth means the tangible assets that remain after deducting liabilities; such assets would not include intangibles such as goodwill and rights to patents or royalties.

(g) In the liability insurance requirements the terms bodily injury and property damage shall have the meanings given these terms by applicable State law. However, these terms do not include those liabilities which, consistent with standard industry practices, are excluded from coverage in liability policies for bodily injury and property damage. The Director intends the meanings of other terms used in the liability insurance requirements to be consistent with their common meanings within the insurance industry. The definitions given below of several of the terms are intended to assist in the understanding of these regulations and are not intended to limit their meanings in a way that conflicts with general insurance industry usage.

Accidental occurrence means an accident, including continuous or repeated exposure to conditions, which results in bodily injury or property damage neither expected nor intended from the standpoint of the insured.

Legal defense costs means any expenses that an insurer incurs in defending against claims of third parties brought under the terms and conditions of an insurance policy.

Nonsudden accidental occurrence means an occurrence which takes place over time and involves continuous or repeated exposure.

Sudden accidental occurrence means an occurrence which is not continuous or repeated in nature.

(h) Substantial business relationship means the extent of a business relationship necessary under applicable State law to make a guarantee contract issued incident to that relationship valid and enforceable. A "substantial business relationship" shall arise from a pattern of recent or ongoing business transactions, in addition to the guarantee itself, such that a currently existing business relationship between the guarantor and the owner or operator is demonstrated to the satisfaction of the Director.

R315-264-142. Cost Estimate for Closure.

(a) The owner or operator shall have a detailed written estimate, in current dollars, of the cost of closing the facility in accordance with the requirements in Sections R315-264-111 through 115 and applicable closure requirements in Sections R315-264-178, 197, 228, 258, 280, 310, 351, 601 through 603, and 1102.

(1) The estimate shall equal the cost of final closure at the point in the facility's active life when the extent and manner of its operation would make closure the most expensive, as indicated by its closure plan, see Subsection R315-264-112(b); and

(2) The closure cost estimate shall be based on the costs to the owner or operator of hiring a third party to close the facility. A third party is a party who is neither a parent nor a subsidiary of the owner or operator. See definition of parent corporation in Subsection R315-264-141(d). The owner or operator may use costs for on-site disposal if he can demonstrate that on-site disposal capacity will exist at all times over the life of the facility.

(3) The closure cost estimate may not incorporate any salvage value that may be realized with the sale of hazardous wastes, or non-hazardous wastes if applicable under Subsection R315-264-113(d), facility structures or equipment, land, or other assets associated with the facility at the time of partial or final closure.

(4) The owner or operator may not incorporate a zero cost for hazardous wastes, or non-hazardous wastes if applicable under Subsection R315-264-113(d), that might have economic value.

(b) During the active life of the facility, the owner or operator shall adjust the closure cost estimate for inflation within 60 days prior to the anniversary date of the establishment of the financial instrument(s) used to comply with Section R315-264-143. For owners and operators using the financial test or corporate guarantee, the closure cost estimate shall be updated for inflation within 30 days after the close of the firm's fiscal year and before submission of updated information to the Director as specified in Subsection R315-264-143(f)(3). The adjustment may be made by recalculating the maximum costs of closure in current dollars, or by using an inflation factor derived from the most recent Implicit Price Deflator for Gross National Product published by the U.S. Department of Commerce in its Survey of Current Business, as specified in Subsections R315-264-142(b)(1) and (2). The inflation factor is the result of dividing the latest published annual Deflator by the Deflator for the previous year.

(1) The first adjustment is made by multiplying the closure cost estimate by the inflation factor. The result is the adjusted closure cost estimate.

(2) Subsequent adjustments are made by multiplying the latest adjusted closure cost estimate by the latest inflation factor.

(c) During the active life of the facility, the owner or operator shall revise the closure cost estimate no later than 30 days after the Director has approved the request to modify the closure plan, if the change in the closure plan increases the cost of closure. The revised closure cost estimate shall be adjusted for inflation as specified in Subsection R315-264-142(b).

(d) The owner or operator shall keep the following at the facility during the operating life of the facility: The latest closure cost estimate prepared in accordance with Subsection R315-264-142(a) and (c) and, when this estimate has been adjusted in accordance with Subsection R315-264-142(b), the latest adjusted closure cost estimate

R315-264-143. Financial Assurance for Closure.

An owner or operator of each facility shall establish financial assurance for closure of the facility. He shall choose from the options as specified in Subsections R315-264-143(a) through (f).

(a) Closure trust fund.

(1) An owner or operator may satisfy the requirements of Section R315-264-143 by establishing a closure trust fund which conforms to the requirements of Subsection R315-264-143(a) and submitting an originally signed duplicate of the trust agreement to the Director. An owner or operator of a new facility shall submit the originally signed duplicate of the trust agreement to the Director at least 60 days before the date on which hazardous waste is first received for treatment, storage, or disposal. The trustee shall be an entity which has the authority to act as a trustee and whose trust operations are regulated and examined by a Federal or State agency.

(2) The wording of the trust agreement shall be identical to the wording specified in Subsection R315-264-151(a)(1), and the trust agreement shall be accompanied by a formal certification of acknowledgment, for example, see Subsection R315-264-151(a)(2). Schedule A of the trust agreement shall be updated within 60 days after a change in the amount of the current closure cost estimate covered by the agreement.

(3) Payments into the trust fund shall be made annually by the owner or operator over the term of the initial RCRA permit or over the remaining operating life of the facility as estimated in the closure plan, whichever period is shorter; this period is hereafter referred to as the "pay-in period." The payments into the closure trust fund shall be made as follows:

(i) For a new facility, the first payment shall be made before the initial receipt of hazardous waste for treatment, storage, or disposal. A receipt from the trustee for this payment shall be submitted by the owner or operator to the Director before this initial receipt of hazardous waste. The first payment shall be at least equal to the current closure cost estimate, except as provided in Subsection R315-264-143(g), divided by the number of years in the pay-in period. Subsequent payments shall be made no later than 30 days after each anniversary date of the first payment. The amount of each subsequent payment shall be determined by this formula:

Next Payment = (CE-CV)/Y

where CE is the current closure cost estimate, CV is the current value of the trust fund, and Y is the number of years remaining in the pay-in period.

(ii) If an owner or operator establishes a trust fund as specified in 40 CFR 265.143(a), which is adopted by reference; and the value of that trust fund is less than the current closure cost estimate when a permit is awarded for the facility, the amount of the current closure cost estimate still to be paid into the trust fund shall be paid in over the pay-in period as defined in Subsection R315-264-143(a)(3). Payments shall continue to be made no later than 30 days after each anniversary date of the first payment made pursuant to Rule R315-265. The amount of each payment shall be determined by this formula:

Next Payment = (CE-CV)/Y

where CE is the current closure cost estimate, CV is the current value of the trust fund, and Y is the number of years remaining in the pay-in period.

(4) The owner or operator may accelerate payments into the trust fund or he may deposit the full amount of the current closure cost estimate at the time the fund is established. However, he shall maintain the value of the fund at no less than the value that the fund would have if annual payments were made as specified in Subsection R315-264-143(a)(3).

(5) If the owner or operator establishes a closure trust fund after having used one or more alternate mechanisms specified in Section R315-264-143 or in 40 CFR 265.143, which is adopted by reference, his first payment shall be in at least the amount that the fund would contain if the trust fund were established initially and annual payments made according to specifications of Section R315-264-143 and 40 CFR 265.143(a), which is adopted by reference; as applicable.

(6) After the pay-in period is completed, whenever the current closure cost estimate changes, the owner or operator shall compare the new estimate with the trustee's most recent annual valuation of the trust fund. If the value of the fund is less than the amount of the new estimate, the owner or operator, within 60 days after the change in the cost estimate, shall either deposit an amount into the fund so that its value after this deposit at least equals the amount of the current closure cost estimate, or obtain other financial assurance as specified in Section R315-264-143 to cover the difference.

(7) If the value of the trust fund is greater than the total amount of the current closure cost estimate, the owner or operator may submit a written request to the Director for release of the amount in excess of the current closure cost estimate.

(8) If an owner or operator substitutes other financial assurance as specified in Section R315-264-143 for all or part of the trust fund, he may submit a written request to the Director for release of the amount in excess of the current closure cost estimate covered by the trust fund.

(9) Within 60 days after receiving a request from the owner or operator for release of funds as specified in Subsection R315-264-143(a)(7) or (8), the Director shall instruct the trustee to release to the owner or operator such funds as the Director specifies in writing.

(10) After beginning partial or final closure, an owner or operator or another person authorized to conduct partial or final closure may request reimbursements for partial or final closure expenditures by submitting itemized bills to the Director. The owner or operator may request reimbursements for partial closure only if sufficient funds are remaining in the trust fund to cover the maximum costs of closing the facility over its remaining operating life. Within 60 days after receiving bills for partial or final closure activities, the Director shall instruct the trustee to make reimbursements in those amounts as the Director specifies in writing, if the Director determines that the partial or final closure expenditures are in accordance with the approved closure plan, or otherwise justified. If the Director has reason to believe that the maximum cost of closure over the remaining life of the facility will be significantly greater than the value of the trust fund, he may withhold reimbursements of such amounts as he deems prudent until he determines, in accordance with Subsection R315-264-143(i) that the owner or operator is no longer required to maintain financial assurance for final closure of the facility. If the Director does not instruct the trustee to make such reimbursements, he shall provide the owner or operator with a detailed written statement of reasons.

(11) The Director shall agree to termination of the trust when:

(i) An owner or operator substitutes alternate financial assurance as specified in Section R315-264-143; or

(ii) The Director releases the owner or operator from the requirements of Section R315-264-143 in accordance with Subsection R315-264-143(i).

(b) Surety bond guaranteeing payment into a closure trust fund.

(1) An owner or operator may satisfy the requirements of Section R315-264-143 by obtaining a surety bond which conforms to the requirements of Subsection R315-264-143(b) and submitting the bond to the Director. An owner or operator of a new facility shall submit the bond to the Director at least 60 days before the date on which hazardous waste is first received for treatment, storage, or disposal. The bond shall be effective before this initial receipt of hazardous waste. The surety company issuing the bond shall, at a minimum, be among those listed as acceptable sureties on Federal bonds in Circular 570 of

the U.S. Department of the Treasury.

(2) The wording of the surety bond shall be identical to the wording specified in Subsection R315-264-151(b).

(3) The owner or operator who uses a surety bond to satisfy the requirements Section R315-264-143 shall also establish a standby trust fund. Under the terms of the bond, all payments made thereunder shall be deposited by the surety directly into the standby trust fund in accordance with instructions from the Director. This standby trust fund shall meet the requirements specified in Subsection R315-264-143(a), except that:

(i) An originally signed duplicate of the trust agreement shall be submitted to the Director with the surety bond; and

(ii) Until the standby trust fund is funded pursuant to the requirements of Section R315-264-143, the following are not required by these regulations:

(A) Payments into the trust fund as specified in Subsection R315-264-143(a);

(B) Updating of Schedule A of the trust agreement, see Subsection R315-264-151(a), to show current closure cost estimates;

(C) Annual valuations as required by the trust agreement; and

(D) Notices of nonpayment as required by the trust agreement.

(4) The bond shall guarantee that the owner or operator shall:

(i) Fund the standby trust fund in an amount equal to the penal sum of the bond before the beginning of final closure of the facility; or

(ii) Fund the standby trust fund in an amount equal to the penal sum within 15 days after an administrative order to begin final closure issued by the Director becomes final, or within 15 days after an order to begin final closure is issued by a U.S. district court or other court of competent jurisdiction; or

(iii) Provide alternate financial assurance as specified in Section R315-264-143, and obtain the Director's written approval of the assurance provided, within 90 days after receipt by both the owner or operator and the Director of a notice of cancellation of the bond from the surety.

(5) Under the terms of the bond, the surety shall become liable on the bond obligation when the owner or operator fails to perform as guaranteed by the bond.

(6) The penal sum of the bond shall be in an amount at least equal to the current closure cost estimate, except as provided in Subsection R315-264-143(g).

(7) Whenever the current closure cost estimate increases to an amount greater than the penal sum, the owner or operator, within 60 days after the increase, shall either cause the penal sum to be increased to an amount at least equal to the current closure cost estimate and submit evidence of such increase to the Director, or obtain other financial assurance as specified in Section R315-264-143 to cover the increase. Whenever the current closure cost estimate decreases, the penal sum may be reduced to the amount of the current closure cost estimate following written approval by the Director.

(8) Under the terms of the bond, the surety may cancel the bond by sending notice of cancellation by certified mail to the owner or operator and to the Director. Cancellation may not occur, however, during the 120 days beginning on the date of receipt of the notice of cancellation by both the owner or operator and the Director, as evidenced by the return receipts.

(9) The owner or operator may cancel the bond if the Director has given prior written consent based on his receipt of evidence of alternate financial assurance as specified in Section R315-264-143.

(c) Surety bond guaranteeing performance of closure.

(1) An owner or operator may satisfy the requirements of Section R315-264-143 by obtaining a surety bond which conforms to the requirements of Subsection R315-264-143(c) and submitting the bond to the Director. An owner or operator of a new facility shall submit the bond to the Director at least 60 days before the date on which hazardous waste is first received for treatment, storage, or disposal. The bond shall be effective before this initial receipt of hazardous waste. The surety company issuing the bond shall, at a minimum, be among those listed as acceptable sureties on Federal bonds in Circular 570 of the U.S. Department of the Treasury.

(2) The wording of the surety bond shall be identical to the wording specified in Subsection R315-264-151(c).

(3) The owner or operator who uses a surety bond to satisfy the requirements Section R315-264-143 shall also establish a standby trust fund. Under the terms of the bond, all payments made thereunder shall be deposited by the surety directly into the standby trust fund in accordance with instructions from the Director. This standby trust shall meet the requirements specified in Subsection R315-264-143(a), except that:

(i) An originally signed duplicate of the trust agreement shall be submitted to the Director with the surety bond; and

(ii) Unless the standby trust fund is funded pursuant to the requirements of Section R315-264-143, the following are not required by Section R315-264-143:

(A) Payments into the trust fund as specified in Subsection R315-264-143(a);

(B) Updating of Schedule A of the trust agreement, see Subsection R315-264-151(a), to show current closure cost estimates;

(C) Annual valuations as required by the trust agreement; and

(D) Notices of nonpayment as required by the trust agreement.

(4) The bond shall guarantee that the owner or operator shall:

(i) Perform final closure in accordance with the closure plan and other requirements of the permit for the facility whenever required to do so; or

(ii) Provide alternate financial assurance as specified in Section R315-264-143, and obtain the Director's written approval of the assurance provided, within 90 days after receipt by both the owner or operator and the Director of a notice of cancellation of the bond from the surety.

(5) Under the terms of the bond, the surety shall become liable on the bond obligation when the owner or operator fails to perform as guaranteed by the bond. Following a final administrative determination pursuant to section 3008 of RCRA that the owner or operator has failed to perform final closure in accordance with the approved closure plan and other permit requirements when required to do so, under the terms of the bond the surety shall perform final closure as guaranteed by the bond or shall deposit the amount of the penal sum into the standby trust fund.

(6) The penal sum of the bond shall be in an amount at least equal to the current closure cost estimate.

(7) Whenever the current closure cost estimate increases to an amount greater than the penal sum, the owner or operator, within 60 days after the increase, shall either cause the penal sum to be increased to an amount at least equal to the current closure cost estimate and submit evidence of such increase to the Director, or obtain other financial assurance as specified in Section R315-264-143. Whenever the current closure cost estimate decreases, the penal sum may be reduced to the amount of the current closure cost estimate following written approval by the Director.

(8) Under the terms of the bond, the surety may cancel the bond by sending notice of cancellation by certified mail to the owner or operator and to the Director. Cancellation may not occur, however, during the 120 days beginning on the date of

receipt of the notice of cancellation by both the owner or operator and the Director, as evidenced by the return receipts.

(9) The owner or operator may cancel the bond if the Director has given prior written consent. The Director shall provide such written consent when:

(i) An owner or operator substitutes alternate financial assurance as specified in Section R315-264-143; or

(ii) The Director releases the owner or operator from the requirements of Section R315-264-143 in accordance with Subsection R315-264-143(i).

(10) The surety shall not be liable for deficiencies in the performance of closure by the owner or operator after the Director releases the owner or operator from the requirements of Section R315-264-143 in accordance with Subsection R315-264-143(i).

(d) Closure letter of credit.

(1) An owner or operator may satisfy the requirements of Section R315-264-143 by obtaining an irrevocable standby letter of credit which conforms to the requirements of Subsection R315-264-143(d) and submitting the letter to the Director. An owner or operator of a new facility shall submit the letter of credit to the Director at least 60 days before the date on which hazardous waste is first received for treatment, storage, or disposal. The letter of credit shall be effective before this initial receipt of hazardous waste. The issuing institution shall be an entity which has the authority to issue letters of credit and whose letter-of-credit operations are regulated and examined by a Federal or State agency.

(2) The wording of the letter of credit shall be identical to the wording specified in Subsection R315-264-151(d).

(3) An owner or operator who uses a letter of credit to satisfy the requirements of Section R315-264-143 shall also establish a standby trust fund. Under the terms of the letter of credit, all amounts paid pursuant to a draft by the Director shall be deposited by the issuing institution directly into the standby trust fund in accordance with instructions from the Director. This standby trust fund shall meet the requirements of the trust fund specified in Subsection R315-264-143(a), except that:

(i) An originally signed duplicate of the trust agreement shall be submitted to the Director with the letter of credit; and

(ii) Unless the standby trust fund is funded pursuant to the requirements of Section R315-264-143, the following are not required by Rule R315-264:

(A) Payments into the trust fund as specified in Subsection R315-264-143(a);

(B) Updating of Schedule A of the trust agreement, see Subsection R315-264-151(a), to show current closure cost estimates;

(C) Annual valuations as required by the trust agreement; and

(D) Notices of nonpayment as required by the trust agreement.

(4) The letter of credit shall be accompanied by a letter from the owner or operator referring to the letter of credit by number, issuing institution, and date, and providing the following information: the EPA Identification Number, name, and address of the facility, and the amount of funds assured for closure of the facility by the letter of credit.

(5) The letter of credit shall be irrevocable and issued for a period of at least 1 year. The letter of credit shall provide that the expiration date shall be automatically extended for a period of at least 1 year unless, at least 120 days before the current expiration date, the issuing institution notifies both the owner or operator and the Director by certified mail of a decision not to extend the expiration date. Under the terms of the letter of credit, the 120 days shall begin on the date when both the owner or operator and the Director have received the notice, as evidenced by the return receipts.

(6) The letter of credit shall be issued in an amount at least equal to the current closure cost estimate, except as provided in Subsection R315-264-143(g).

(7) Whenever the current closure cost estimate increases to an amount greater than the amount of the credit, the owner or operator, within 60 days after the increase, shall either cause the amount of the credit to be increased so that it at least equals the current closure cost estimate and submit evidence of such increase to the Director, or obtain other financial assurance as specified in Section R315-264-143 to cover the increase. Whenever the current closure cost estimate decreases, the amount of the credit may be reduced to the amount of the current closure cost estimate following written approval by the Director.

(8) Following a final administrative determination pursuant to section 3008 of RCRA that the owner or operator has failed to perform final closure in accordance with the closure plan and other permit requirements when required to do so, the Director may draw on the letter of credit.

(9) If the owner or operator does not establish alternate financial assurance as specified in Section R315-264-143 and obtain written approval of such alternate assurance from the Director within 90 days after receipt by both the owner or operator and the Director of a notice from issuing institution that it has decided not to extend the letter of credit beyond the current expiration date, the Director shall draw on the letter of credit. The Director may delay the drawing if the issuing institution grants an extension of the term of the credit. During the last 30 days of any such extension the Director shall draw on the letter of credit if the owner or operator has failed to provide alternate financial assurance as specified in Section R315-264-143 and obtain written approval of such assurance from the Director.

(10) The Director shall return the letter of credit to the issuing institution for termination when:

(i) An owner or operator substitutes alternate financial assurance as specified in Section R315-264-143; or

(ii) The Director releases the owner or operator from the requirements of Section R315-264-143 in accordance with Subsection R315-264-143(i).

(e) Closure insurance.

(1) An owner or operator may satisfy the requirements of Section R315-264-143 by obtaining closure insurance which conforms to the requirements of this Subsection R315-264-143(e) and submitting a certificate of such insurance to the Director. An owner or operator of a new facility shall submit the certificate of insurance to the Director at least 60 days before the date on which hazardous waste is first received for treatment, storage, or disposal. The insurance shall be effective before this initial receipt of hazardous waste. At a minimum, the insurer shall be licensed to transact the business of insurance, or eligible to provide insurance as an excess or surplus lines insurer, in one or more States.

(2) The wording of the certificate of insurance shall be identical to the wording specified in Subsection R315-264-151(e).

(3) The closure insurance policy shall be issued for a face amount at least equal to the current closure cost estimate, except as provided in Subsection R315-264-143(g). The term "face amount" means the total amount the insurer is obligated to pay under the policy. Actual payments by the insurer shall not change the face amount, although the insurer's future liability shall be lowered by the amount of the payments.

(4) The closure insurance policy shall guarantee that funds shall be available to close the facility whenever final closure occurs. The policy shall also guarantee that once final closure begins, the insurer will be responsible for paying out funds, up to an amount equal to the face amount of the policy, upon the direction of the Director, to such party or parties as the Director specifies.

(5) After beginning partial or final closure, an owner or operator or any other person authorized to conduct closure may request reimbursements for closure expenditures by submitting itemized bills to the Director. The owner or operator may request reimbursements for partial closure only if the remaining value of the policy is sufficient to cover the maximum costs of closing the facility over its remaining operating life. Within 60 days after receiving bills for closure activities, the Director shall instruct the insurer to make reimbursements in such amounts as the Director specifies in writing, if the Director determines that the partial or final closure expenditures are in accordance with the approved closure plan or otherwise justified. If the Director has reason to believe that the maximum cost of closure over the remaining life of the facility will be significantly greater than the face amount of the policy, he may withhold reimbursements of such amounts as he deems prudent until he determines, in accordance with Subsection R315-264-143(i), that the owner or operator is no longer required to maintain financial assurance for final closure of the facility. If the Director does not instruct the insurer to make such reimbursements, he shall provide the owner or operator with a detailed written statement of reasons.

(6) The owner or operator shall maintain the policy in full force and effect until the Director consents to termination of the policy by the owner or operator as specified in Subsection R315-264-143(e)(10). Failure to pay the premium, without substitution of alternate financial assurance as specified in Section R315-264-143, shall constitute a significant violation of these regulations, warranting such remedy as the Director deems necessary. Such violation shall be deemed to begin upon receipt by the Director of a notice of future cancellation, termination, or failure to renew due to nonpayment of the premium, rather than upon the date of expiration.

(7) Each policy shall contain a provision allowing assignment of the policy to a successor owner or operator. Such assignment may be conditional upon consent of the insurer, provided such consent is not unreasonably refused.

(8) The policy shall provide that the insurer may not cancel, terminate, or fail to renew the policy except for failure to pay the premium. The automatic renewal of the policy shall, at a minimum, provide the insured with the option of renewal at the face amount of the expiring policy. If there is a failure to pay the premium, the insurer may elect to cancel, terminate, or fail to renew the policy by sending notice by certified mail to the owner or operator and the Director. Cancellation, termination, or failure to renew may not occur, however, during the 120 days beginning with the date of receipt of the notice by both the Director and the owner or operator, as evidenced by the return receipts. Cancellation, termination, or failure to renew may not occur and the policy shall remain in full force and effect in the event that on or before the date of expiration:

(i) The Director deems the facility abandoned; or

(ii) The permit is terminated or revoked or a new permit is denied; or

(iii) Closure is ordered by the Director or a U.S. district court or other court of competent jurisdiction; or

(iv) The owner or operator is named as debtor in a voluntary or involuntary proceeding under Title 11 (Bankruptcy), U.S. Code; or

(v) The premium due is paid.

(9) Whenever the current closure cost estimate increases to an amount greater than the face amount of the policy, the owner or operator, within 60 days after the increase, shall either cause the face amount to be increased to an amount at least equal to the current closure cost estimate and submit evidence of such increase to the Director, or obtain other financial assurance as specified in Section R315-264-143 to cover the increase. Whenever the current closure cost estimate decreases, the face amount may be reduced to the amount of the current closure cost estimate following written approval by the Director.

(10) The Director shall give written consent to the owner or operator that he may terminate the insurance policy when:

(i) An owner or operator substitutes alternate financial assurance as specified in Section R315-264-143; or

(ii) The Director releases the owner or operator from the requirements of Section R315-264-143 in accordance with Subsection R315-264-143(i).

(f) Financial test and corporate guarantee for closure.

(1) An owner or operator may satisfy the requirements of Section R315-264-143 by demonstrating that he passes a financial test as specified in Subsection R315-264-143(f). To pass this test the owner or operator shall meet the criteria of either Subsections R315-264-143(f)(1)(i) or (ii):

(i) The owner or operator shall have:

(A) Two of the following three ratios: a ratio of total liabilities to net worth less than 2.0; a ratio of the sum of net income plus depreciation, depletion, and amortization to total liabilities greater than 0.1; and a ratio of current assets to current liabilities greater than 1.5; and

(B) Net working capital and tangible net worth each at least six times the sum of the current closure and post-closure cost estimates and the current plugging and abandonment cost estimates; and

(C) Tangible net worth of at least $10 million; and

(D) Assets located in the United States amounting to at least 90 percent of total assets or at least six times the sum of the current closure and post-closure cost estimates and the current plugging and abandonment cost estimates.

(ii) The owner or operator shall have:

(A) A current rating for his most recent bond issuance of AAA, AA, A, or BBB as issued by Standard and Poor's or Aaa, Aa, A, or Baa as issued by Moody's; and

(B) Tangible net worth at least six times the sum of the current closure and post-closure cost estimates and the current plugging and abandonment cost estimates; and

(C) Tangible net worth of at least $10 million; and

(D) Assets located in the United States amounting to at least 90 percent of total assets or at least six times the sum of the current closure and post-closure cost estimates and the current plugging and abandonment cost estimates.

(2) The phrase "current closure and post-closure cost estimates" as used in Subsection R315-264-143(f)(1) refers to the cost estimates required to be shown in paragraphs 1-4 of the letter from the owner's or operator's chief financial officer, Subsection R315-264-151(f). The phrase "current plugging and abandonment cost estimates" as used in Subsection R315-264-143(f)(1) refers to the cost estimates required to be shown in paragraphs 1-4 of the letter from the owner's or operator's chief financial officer, 40 CFR 144.70(f).

(3) To demonstrate that he meets this test, the owner or operator shall submit the following items to the Director:

(i) A letter signed by the owner's or operator's chief financial officer and worded as specified in Subsection R315-264-151(f); and

(ii) A copy of the independent certified public accountant's report on examination of the owner's or operator's financial statements for the latest completed fiscal year; and

(iii) A special report from the owner's or operator's independent certified public accountant to the owner or operator stating that:

(A) He has compared the data which the letter from the chief financial officer specifies as having been derived from the independently audited, year-end financial statements for the latest fiscal year with the amounts in such financial statements; and

(B) In connection with that procedure, no matters came to his attention which caused him to believe that the specified data should be adjusted.

(4) An owner or operator of a new facility shall submit the

items specified in Subsection R315-264-143(f)(3) to the Director at least 60 days before the date on which hazardous waste is first received for treatment, storage, or disposal.

(5) After the initial submission of items specified in Subsection R315-264-143(f)(3), the owner or operator shall send updated information to the Director within 90 days after the close of each succeeding fiscal year. This information shall consist of all three items specified in Subsection R315-264-143(f)(3).

(6) If the owner or operator no longer meets the requirements of Subsection R315-264-143(f)(1), he shall send notice to the Director of intent to establish alternate financial assurance as specified in Section R315-264-143. The notice shall be sent by certified mail within 90 days after the end of the fiscal year for which the year-end financial data show that the owner or operator no longer meets the requirements. The owner or operator shall provide the alternate financial assurance within 120 days after the end of such fiscal year.

(7) The Director may, based on a reasonable belief that the owner or operator may no longer meet the requirements of Subsection R315-264-143(f)(1), require reports of financial condition at any time from the owner or operator in addition to those specified in Subsection R315-264-143(f)(3). If the Director finds, on the basis of such reports or other information, that the owner or operator no longer meets the requirements of Subsection R315-264-143(f)(1), the owner or operator shall provide alternate financial assurance as specified in Section R315-264-143 within 30 days after notification of such a finding.

(8) The Director may disallow use of this test on the basis of qualifications in the opinion expressed by the independent certified public accountant in his report on examination of the owner's or operator's financial statements, see Subsection R315-264-143(f)(3)(ii). An adverse opinion or a disclaimer of opinion shall be cause for disallowance. The Director shall evaluate other qualifications on an individual basis. The owner or operator shall provide alternate financial assurance as specified in Section R315-264-143 within 30 days after notification of the disallowance.

(9) The owner or operator is no longer required to submit the items specified in Subsection R315-264-143(f)(3) when:

(i) An owner or operator substitutes alternate financial assurance as specified in Section R315-264-143; or

(ii) The Director releases the owner or operator from the requirements of Section R315-264-143 in accordance with Subsection R315-264-143(i).

(10) An owner or operator may meet the requirements of Section R315-264-143 by obtaining a written guarantee. The guarantor shall be the direct or higher-tier parent corporation of the owner or operator, a firm whose parent corporation is also the parent corporation of the owner or operator, or a firm with a "substantial business relationship" with the owner or operator. The guarantor shall meet the requirements for owners or operators in Subsection R315-264-143(f)(1) through (8) and shall comply with the terms of the guarantee. The wording of the guarantee shall be identical to the wording specified in Subsection R315-264-151(h). The certified copy of the guarantee shall accompany the items sent to the Director as specified in Subsection R315-264-143(f)(3). One of these items shall be the letter from the guarantor's chief financial officer. If the guarantor's parent corporation is also the parent corporation of the owner or operator, the letter shall describe the value received in consideration of the guarantee. If the guarantor is a firm with a "substantial business relationship" with the owner or operator, this letter shall describe this "substantial business relationship" and the value received in consideration of the guarantee. The terms of the guarantee shall provide that:

(i) If the owner or operator fails to perform final closure of a facility covered by the corporate guarantee in accordance with the closure plan and other permit requirements whenever required to do so, the guarantor shall do so or establish a trust fund as specified in Subsection R315-264-143(a) in the name of the owner or operator.

(ii) The corporate guarantee shall remain in force unless the guarantor sends notice of cancellation by certified mail to the owner or operator and to the Director. Cancellation may not occur, however, during the 120 days beginning on the date of receipt of the notice of cancellation by both the owner or operator and the Director, as evidenced by the return receipts.

(iii) If the owner or operator fails to provide alternate financial assurance as specified in Section R315-264-143 and obtain the written approval of such alternate assurance from the Director within 90 days after receipt by both the owner or operator and the Director of a notice of cancellation of the corporate guarantee from the guarantor, the guarantor shall provide such alternative financial assurance in the name of the owner or operator.

(g) Use of multiple financial mechanisms. An owner or operator may satisfy the requirements of Section R315-264-143 by establishing more than one financial mechanism per facility. These mechanisms are limited to trust funds, surety bonds guaranteeing payment into a trust fund, letters of credit, and insurance. The mechanisms shall be as specified in Subsections R315-264-143(a), (b), (d), and (e), respectively, except that it is the combination of mechanisms, rather than the single mechanism, which shall provide financial assurance for an amount at least equal to the current closure cost estimate. If an owner or operator uses a trust fund in combination with a surety bond or a letter of credit, he may use the trust fund as the standby trust fund for the other mechanisms. A single standby trust fund may be established for two or more mechanisms. The Director may use any or all of the mechanisms to provide for closure of the facility.

(h) Use of a financial mechanism for multiple facilities. An owner or operator may use a financial assurance mechanism specified in Section R315-264-143 to meet the requirements of Section R315-264-143 for more than one facility. Evidence of financial assurance submitted to the Director shall include a list showing, for each facility, the EPA Identification Number, name, address, and the amount of funds for closure assured by the mechanism. If the facilities covered by the mechanism are in more than one State, identical evidence of financial assurance shall be submitted to and maintained with the State Agency regulating hazardous waste in states other than Utah or with the appropriate Regional Administrator if the facility is located in an unauthorized State. The amount of funds available through the mechanism shall be no less than the sum of funds that would be available if a separate mechanism had been established and maintained for each facility. In directing funds available through the mechanism for closure of any of the facilities covered by the mechanism, the Director may direct only the amount of funds designated for that facility, unless the owner or operator agrees to the use of additional funds available under the mechanism.

(i) Release of the owner or operator from the requirements of Section R315-264-143. Within 60 days after receiving certifications from the owner or operator and a qualified Professional Engineer that final closure has been completed in accordance with the approved closure plan, the Director shall notify the owner or operator in writing that he is no longer required by Section R315-264-143 to maintain financial assurance for final closure of the facility, unless the Director has reason to believe that final closure has not been in accordance with the approved closure plan. The Director shall provide the owner or operator a detailed written statement of any such reason to believe that closure has not been in accordance with the approved closure plan.

R315-264-144. Cost Estimate for Post-Closure Care.

(a) The owner or operator of a disposal surface impoundment, disposal miscellaneous unit, land treatment unit, or landfill unit, or of a surface impoundment or waste pile required under Sections R315-264-228 and 258 to prepare a contingent closure and post-closure plan, shall have a detailed written estimate, in current dollars, of the annual cost of post-closure monitoring and maintenance of the facility in accordance with the applicable post-closure regulations in Sections R315-264-117 through 120, 228, 258, 280, 310, and 603.

(1) The post-closure cost estimate shall be based on the costs to the owner or operator of hiring a third party to conduct post-closure care activities. A third party is a party who is neither a parent nor a subsidiary of the owner or operator. See definition of parent corporation in Subsection R315-264-141(d).

(2) The post-closure cost estimate is calculated by multiplying the annual post-closure cost estimate by the number of years of post-closure care required under Section R315-264-117.

(b) During the active life of the facility, the owner or operator shall adjust the post-closure cost estimate for inflation within 60 days prior to the anniversary date of the establishment of the financial instrument(s) used to comply with Section R315-264-145. For owners or operators using the financial test or corporate guarantee, the post-closure cost estimate shall be updated for inflation within 30 days after the close of the firm's fiscal year and before the submission of updated information to the Director as specified in Subsection R315-264-145(f)(5). The adjustment may be made by recalculating the post-closure cost estimate in current dollars or by using an inflation factor derived from the most recent Implicit Price Deflator for Gross National Product published by the U.S. Department of Commerce in its Survey of Current Business as specified in Subsections R315-264-145(b)(1) and (2). The inflation factor is the result of dividing the latest published annual Deflator by the Deflator for the previous year.

(1) The first adjustment is made by multiplying the post-closure cost estimate by the inflation factor. The result is the adjusted post-closure cost estimate.

(2) Subsequent adjustments are made by multiplying the latest adjusted post-closure cost estimate by the latest inflation factor.

(c) During the active life of the facility, the owner or operator shall revise the post-closure cost estimate within 30 days after the Director has approved the request to modify the post-closure plan, if the change in the post-closure plan increases the cost of post-closure care. The revised post-closure cost estimate shall be adjusted for inflation as specified in Subsection R315-264-144(b).

(d) The owner or operator shall keep the following at the facility during the operating life of the facility: The latest post-closure cost estimate prepared in accordance with Subsection R315-264-144(a) and (c) and, when this estimate has been adjusted in accordance with Subsection R315-264-144(b), the latest adjusted post-closure cost estimate.

R315-264-145. Financial Assurance for Post-Closure Care.

The owner or operator of a hazardous waste management unit subject to the requirements of Section R315-264-144 shall establish financial assurance for post-closure care in accordance with the approved post-closure plan for the facility 60 days prior to the initial receipt of hazardous waste or the effective date of the regulation, whichever is later. He shall choose from the following options:

(a) Post-closure trust fund.

(1) An owner or operator may satisfy the requirements of Section R315-264-144 by establishing a post-closure trust fund which conforms to the requirements of Subsection R315-264-145(a) and submitting an originally signed duplicate of the trust agreement to the Director. An owner or operator of a new facility shall submit the originally signed duplicate of the trust agreement to the Director at least 60 days before the date on which hazardous waste is first received for disposal. The trustee shall be an entity which has the authority to act as a trustee and whose trust operations are regulated and examined by a Federal or State agency.

(2) The wording of the trust agreement shall be identical to the wording specified in Subsection R315-264-151(a)(1), and the trust agreement shall be accompanied by a formal certification of acknowledgment, for example, see Subsection R315-264-151(a)(2). Schedule A of the trust agreement shall be updated within 60 days after a change in the amount of the current post-closure cost estimate covered by the agreement.

(3) Payments into the trust fund shall be made annually by the owner or operator over the term of the initial RCRA permit or over the remaining operating life of the facility as estimated in the closure plan, whichever period is shorter; this period is hereafter referred to as the "pay-in period." The payments into the post-closure trust fund shall be made as follows:

(i) For a new facility, the first payment shall be made before the initial receipt of hazardous waste for disposal. A receipt from the trustee for this payment shall be submitted by the owner or operator to the Director before this initial receipt of hazardous waste. The first payment shall be at least equal to the current post-closure cost estimate, except as provided in Subsection R315-264-145(g), divided by the number of years in the pay-in period. Subsequent payments shall be made no later than 30 days after each anniversary date of the first payment. The amount of each subsequent payment shall be determined by this formula:

Next payment = (CE-CV)/Y

where CE is the current post-closure cost estimate, CV is the current value of the trust fund, and Y is the number of years remaining in the pay-in period.

(ii) If an owner or operator establishes a trust fund as specified in 40 CFR 265.145(a); which is adopted by reference, and the value of that trust fund is less than the current post-closure cost estimate when a permit is awarded for the facility, the amount of the current post-closure cost estimate still to be paid into the fund shall be paid in over the pay-in period as defined in Subsection R315-264-145(a)(3). Payments shall continue to be made no later than 30 days after each anniversary date of the first payment made pursuant to R315-265. The amount of each payment shall be determined by this formula:

Next payment = (CE-CV)/Y

where CE is the current post-closure cost estimate, CV is the current value of the trust fund, and Y is the number of years remaining in the pay-in period.

(4) The owner or operator may accelerate payments into the trust fund or he may deposit the full amount of the current post-closure cost estimate at the time the fund is established. However, he shall maintain the value of the fund at no less than the value that the fund would have if annual payments were made as specified in Subsection R315-264-145(a)(3).

(5) If the owner or operator establishes a post-closure trust fund after having used one or more alternate mechanisms specified in Section R315-264-145 or in 40 CFR 265.145, which is adopted by reference; his first payment shall be in at least the amount that the fund would contain if the trust fund were established initially and annual payments made according to specifications of Subsection R315-264-145(a) and 40 CFR 265.145(a), which is adopted by reference; as applicable.

(6) After the pay-in period is completed, whenever the current post-closure cost estimate changes during the operating life of the facility, the owner or operator shall compare the new estimate with the trustee's most recent annual valuation of the trust fund. If the value of the fund is less than the amount of the new estimate, the owner or operator, within 60 days after the

change in the cost estimate, shall either deposit an amount into the fund so that its value after this deposit at least equals the amount of the current post-closure cost estimate, or obtain other financial assurance as specified in Section R315-264-145 to cover the difference.

(7) During the operating life of the facility, if the value of the trust fund is greater than the total amount of the current post-closure cost estimate, the owner or operator may submit a written request to the Director for release of the amount in excess of the current post-closure cost estimate.

(8) If an owner or operator substitutes other financial assurance as specified in Section R315-264-145 for all or part of the trust fund, he may submit a written request to the Director for release of the amount in excess of the current post-closure cost estimate covered by the trust fund.

(9) Within 60 days after receiving a request from the owner or operator for release of funds as specified in Subsection R315-264-145(a)(7) or (8), the Director shall instruct the trustee to release to the owner or operator such funds as the Director specifies in writing.

(10) During the period of post-closure care, the Director may approve a release of funds if the owner or operator demonstrates to the Director that the value of the trust fund exceeds the remaining cost of post-closure care.

(11) An owner or operator or any other person authorized to conduct post-closure care may request reimbursements for post-closure care expenditures by submitting itemized bills to the Director. Within 60 days after receiving bills for post-closure care activities, the Director shall instruct the trustee to make reimbursements in those amounts as the Director specifies in writing, if the Director determines that the post-closure care expenditures are in accordance with the approved post-closure plan or otherwise justified. If the Director does not instruct the trustee to make such reimbursements, he shall provide the owner or operator with a detailed written statement of reasons.

(12) The Director shall agree to termination of the trust when:

(i) An owner or operator substitutes alternate financial assurance as specified in Section R315-264-145; or

(ii) The Director releases the owner or operator from the requirements of Section R315-264-145 in accordance with Subsection R315-264-145(i).

(b) Surety bond guaranteeing payment into a post-closure trust fund.

(1) An owner or operator may satisfy the requirements of Section R315-264-145 by obtaining a surety bond which conforms to the requirements of Subsection R315-264-145(b) and submitting the bond to the Director. An owner or operator of a new facility shall submit the bond to the Director at least 60 days before the date on which hazardous waste is first received for disposal. The bond shall be effective before this initial receipt of hazardous waste. The surety company issuing the bond shall, at a minimum, be among those listed as acceptable sureties on Federal bonds in Circular 570 of the U.S. Department of the Treasury.

(2) The wording of the surety bond shall be identical to the wording specified in Subsection R315-264-151(b).

(3) The owner or operator who uses a surety bond to satisfy the requirements Section R315-264-145 shall also establish a standby trust fund. Under the terms of the bond, all payments made thereunder shall be deposited by the surety directly into the standby trust fund in accordance with instructions from the Director. This standby trust fund shall meet the requirements specified in Subsection R315-264-145(a), except that:

(i) An originally signed duplicate of the trust agreement shall be submitted to the Director with the surety bond; and

(ii) Until the standby trust fund is funded pursuant to the requirements Section R315-264-145, the following are not required by these regulations:

(A) Payments into the trust fund as specified in Subsection R315-264-145(a);

(B) Updating of Schedule A of the trust agreement, see Subsection R315-264-151(a), to show current post-closure cost estimates;

(C) Annual valuations as required by the trust agreement; and

(D) Notices of nonpayment as required by the trust agreement.

(4) The bond shall guarantee that the owner or operator shall:

(i) Fund the standby trust fund in an amount equal to the penal sum of the bond before the beginning of final closure of the facility; or

(ii) Fund the standby trust fund in an amount equal to the penal sum within 15 days after an administrative order to begin final closure issued by the Director becomes final, or within 15 days after an order to begin final closure is issued by a U.S. district court or other court of competent jurisdiction; or

(iii) Provide alternate financial assurance as specified in Section R315-264-145, and obtain the Director's written approval of the assurance provided, within 90 days after receipt by both the owner or operator and the Director of a notice of cancellation of the bond from the surety.

(5) Under the terms of the bond, the surety shall become liable on the bond obligation when the owner or operator fails to perform as guaranteed by the bond.

(6) The penal sum of the bond shall be in an amount at least equal to the current post-closure cost estimate, except as provided in Subsection R315-264-145(g).

(7) Whenever the current post-closure cost estimate increases to an amount greater than the penal sum, the owner or operator, within 60 days after the increase, shall either cause the penal sum to be increased to an amount at least equal to the current post-closure cost estimate and submit evidence of such increase to the Director, or obtain other financial assurance as specified in Section R315-264-145 to cover the increase. Whenever the current post-closure cost estimate decreases, the penal sum may be reduced to the amount of the current post-closure cost estimate following written approval by the Director.

(8) Under the terms of the bond, the surety may cancel the bond by sending notice of cancellation by certified mail to the owner or operator and to the Director. Cancellation may not occur, however, during the 120 days beginning on the date of receipt of the notice of cancellation by both the owner or operator and the Director, as evidenced by the return receipts.

(9) The owner or operator may cancel the bond if the Director has given prior written consent based on his receipt of evidence of alternate financial assurance as specified in Section R315-264-145.

(c) Surety bond guaranteeing performance of post-closure care.

(1) An owner or operator may satisfy the requirements of Section R315-264-145 by obtaining a surety bond which conforms to the requirements of Subsection R315-264-145(c) and submitting the bond to the Director. An owner or operator of a new facility shall submit the bond to the Director at least 60 days before the date on which hazardous waste is first received for disposal. The bond shall be effective before this initial receipt of hazardous waste. The surety company issuing the bond shall, at a minimum, be among those listed as acceptable sureties on Federal bonds in Circular 570 of the U.S. Department of the Treasury.

(2) The wording of the surety bond shall be identical to the wording specified in Subsection R315-264-151(c).

(3) The owner or operator who uses a surety bond to satisfy the requirements of Section R315-264-145 shall also establish a standby trust fund. Under the terms of the bond, all

payments made thereunder shall be deposited by the surety directly into the standby trust fund in accordance with instructions from the Director. This standby trust fund shall meet the requirements specified in Subsection R315-264-145(a), except that:

(i) An originally signed duplicate of the trust agreement shall be submitted to the Director with the surety bond; and

(ii) Unless the standby trust fund is funded pursuant to the requirements of Section R315-264-145, the following are not required by these regulations:

(A) Payments into the trust fund as specified in Subsection R315-264-145(a);

(B) Updating of Schedule A of the trust agreement, see Subsection R315-264-151(a), to show current post-closure cost estimates;

(C) Annual valuations as required by the trust agreement; and

(D) Notices of nonpayment as required by the trust agreement.

(4) The bond shall guarantee that the owner or operator shall:

(i) Perform post-closure care in accordance with the post-closure plan and other requirements of the permit for the facility; or

(ii) Provide alternate financial assurance as specified in Section R315-264-145, and obtain the Director's written approval of the assurance provided, within 90 days of receipt by both the owner or operator and the Director of a notice of cancellation of the bond from the surety.

(5) Under the terms of the bond, the surety shall become liable on the bond obligation when the owner or operator fails to perform as guaranteed by the bond. Following a final administrative determination pursuant to section 3008 of RCRA that the owner or operator has failed to perform post-closure care in accordance with the approved post-closure plan and other permit requirements, under the terms of the bond the surety shall perform post-closure care in accordance with the post-closure plan and other permit requirements or shall deposit the amount of the penal sum into the standby trust fund.

(6) The penal sum of the bond shall be in an amount at least equal to the current post-closure cost estimate.

(7) Whenever the current post-closure cost estimate increases to an amount greater than the penal sum during the operating life of the facility, the owner or operator, within 60 days after the increase, shall either cause the penal sum to be increased to an amount at least equal to the current post-closure cost estimate and submit evidence of such increase to the Director, or obtain other financial assurance as specified in Section R315-264-145. Whenever the current post-closure cost estimate decreases during the operating life of the facility, the penal sum may be reduced to the amount of the current post-closure cost estimate following written approval by the Director.

(8) During the period of post-closure care, the Director may approve a decrease in the penal sum if the owner or operator demonstrates to the Director that the amount exceeds the remaining cost of post-closure care.

(9) Under the terms of the bond, the surety may cancel the bond by sending notice of cancellation by certified mail to the owner or operator and to the Director. Cancellation may not occur, however, during the 120 days beginning on the date of receipt of the notice of cancellation by both the owner or operator and the Director, as evidenced by the return receipts.

(10) The owner or operator may cancel the bond if the Director has given prior written consent. The Director shall provide such written consent when:

(i) An owner or operator substitutes alternate financial assurance as specified in Section R315-264-145; or

(ii) The Director releases the owner or operator from the requirements of Section R315-264-145 in accordance with Subsection R315-264-145(i).

(11) The surety shall not be liable for deficiencies in the performance of post-closure care by the owner or operator after the Director releases the owner or operator from the requirements of Section R315-264-145 in accordance with Subsection R315-264-145(i).

(d) Post-closure letter of credit.

(1) An owner or operator may satisfy the requirements of Section R315-264-145 by obtaining an irrevocable standby letter of credit which conforms to the requirements of Subsection R315-264-145(d) and submitting the letter to the Director. An owner or operator of a new facility shall submit the letter of credit to the Director at least 60 days before the date on which hazardous waste is first received for disposal. The letter of credit shall be effective before this initial receipt of hazardous waste. The issuing institution shall be an entity which has the authority to issue letters of credit and whose letter-of-credit operations are regulated and examined by a Federal or State agency.

(2) The wording of the letter of credit shall be identical to the wording specified in Subsection R315-264-151(d).

(3) An owner or operator who uses a letter of credit to satisfy the requirements of Section R315-264-145 shall also establish a standby trust fund. Under the terms of the letter of credit, all amounts paid pursuant to a draft by the Director shall be deposited by the issuing institution directly into the standby trust fund in accordance with instructions from the Director. This standby trust fund shall meet the requirements of the trust fund specified in Subsection R315-264-145(a), except that:

(i) An originally signed duplicate of the trust agreement shall be submitted to the Director with the letter of credit; and

(ii) Unless the standby trust fund is funded pursuant to the requirements of Section R315-264-145, the following are not required by these regulations:

(A) Payments into the trust fund as specified in Subsection R315-264-145(a);

(B) Updating of Schedule A of the trust agreement, see Subsection R315-264-151(a), to show current post-closure cost estimates;

(C) Annual valuations as required by the trust agreement; and

(D) Notices of nonpayment as required by the trust agreement.

(4) The letter of credit shall be accompanied by a letter from the owner or operator referring to the letter of credit by number, issuing institution, and date, and providing the following information: the EPA Identification Number, name, and address of the facility, and the amount of funds assured for post-closure care of the facility by the letter of credit.

(5) The letter of credit shall be irrevocable and issued for a period of at least 1 year. The letter of credit shall provide that the expiration date shall be automatically extended for a period of at least 1 year unless, at least 120 days before the current expiration date, the issuing institution notifies both the owner or operator and the Director by certified mail of a decision not to extend the expiration date. Under the terms of the letter of credit, the 120 days shall begin on the date when both the owner or operator and the Director have received the notice, as evidenced by the return receipts.

(6) The letter of credit shall be issued in an amount at least equal to the current post-closure cost estimate, except as provided in Subsection R315-264-145(g).

(7) Whenever the current post-closure cost estimate increases to an amount greater than the amount of the credit during the operating life of the facility, the owner or operator, within 60 days after the increase, shall either cause the amount of the credit to be increased so that it at least equals the current post-closure cost estimate and submit evidence of such increase to the Director, or obtain other financial assurance as specified

in Section R315-264-145 to cover the increase. Whenever the current post-closure cost estimate decreases during the operating life of the facility, the amount of the credit may be reduced to the amount of the current post-closure cost estimate following written approval by the Director.

(8) During the period of post-closure care, the Director may approve a decrease in the amount of the letter of credit if the owner or operator demonstrates to the Director that the amount exceeds the remaining cost of post-closure care.

(9) Following a final administrative determination pursuant to section 3008 of RCRA that the owner or operator has failed to perform post-closure care in accordance with the approved post-closure plan and other permit requirements, the Director may draw on the letter of credit.

(10) If the owner or operator does not establish alternate financial assurance as specified in Section R315-264-145 and obtain written approval of such alternate assurance from the Director within 90 days after receipt by both the owner or operator and the Director of a notice from the issuing institution that it has decided not to extend the letter of credit beyond the current expiration date, the Director shall draw on the letter of credit. The Director may delay the drawing if the issuing institution grants an extension of the term of the credit. During the last 30 days of any such extension the Director shall draw on the letter of credit if the owner or operator has failed to provide alternate financial assurance as specified in Section R315-264-145 and obtain written approval of such assurance from the Director.

(11) The Director shall return the letter of credit to the issuing institution for termination when:

(i) An owner or operator substitutes alternate financial assurance as specified in Section R315-264-145; or

(ii) The Director releases the owner or operator from the requirements of Section R315-264-145 in accordance with Subsection R315-264-145(i).

(e) Post-closure insurance.

(1) An owner or operator may satisfy the requirements of Section R315-264-145 by obtaining post-closure insurance which conforms to the requirements of Subsection R315-264-145(e) and submitting a certificate of such insurance to the Director. An owner or operator of a new facility shall submit the certificate of insurance to the Director at least 60 days before the date on which hazardous waste is first received for disposal. The insurance shall be effective before this initial receipt of hazardous waste. At a minimum, the insurer shall be licensed to transact the business of insurance, or eligible to provide insurance as an excess or surplus lines insurer, in one or more States.

(2) The wording of the certificate of insurance shall be identical to the wording specified in Subsection R315-264-151(e).

(3) The post-closure insurance policy shall be issued for a face amount at least equal to the current post-closure cost estimate, except as provided in Subsection R315-264-145(g). The term "face amount" means the total amount the insurer is obligated to pay under the policy. Actual payments by the insurer shall not change the face amount, although the insurer's future liability will be lowered by the amount of the payments.

(4) The post-closure insurance policy shall guarantee that funds will be available to provide post-closure care of the facility whenever the post-closure period begins. The policy shall also guarantee that once post-closure care begins, the insurer will be responsible for paying out funds, up to an amount equal to the face amount of the policy, upon the direction of the Director, to such party or parties as the Director specifies.

(5) An owner or operator or any other person authorized to conduct post-closure care may request reimbursements for post-closure care expenditures by submitting itemized bills to the Director. Within 60 days after receiving bills for post-closure care activities, the Director shall instruct the insurer to make reimbursements in those amounts as the Director specifies in writing, if the Director determines that the post-closure care expenditures are in accordance with the approved post-closure plan or otherwise justified. If the Director does not instruct the insurer to make such reimbursements, he shall provide the owner or operator with a detailed written statement of reasons.

(6) The owner or operator shall maintain the policy in full force and effect until the Director consents to termination of the policy by the owner or operator as specified in Subsection R315-264-145(e)(11). Failure to pay the premium, without substitution of alternate financial assurance as specified in Section R315-264-145, shall constitute a significant violation of these regulations, warranting such remedy as the Director deems necessary. Such violation shall be deemed to begin upon receipt by the Director of a notice of future cancellation, termination, or failure to renew due to nonpayment of the premium, rather than upon the date of expiration.

(7) Each policy shall contain a provision allowing assignment of the policy to a successor owner or operator. Such assignment may be conditional upon consent of the insurer, provided such consent is not unreasonably refused.

(8) The policy shall provide that the insurer may not cancel, terminate, or fail to renew the policy except for failure to pay the premium. The automatic renewal of the policy shall, at a minimum, provide the insured with the option of renewal at the face amount of the expiring policy. If there is a failure to pay the premium, the insurer may elect to cancel, terminate, or fail to renew the policy by sending notice by certified mail to the owner or operator and the Director. Cancellation, termination, or failure to renew may not occur, however, during the 120 days beginning with the date of receipt of the notice by both the Director and the owner or operator, as evidenced by the return receipts. Cancellation, termination, or failure to renew may not occur and the policy shall remain in full force and effect in the event that on or before the date of expiration:

(i) The Director deems the facility abandoned; or

(ii) The permit is terminated or revoked or a new permit is denied; or

(iii) Closure is ordered by the Director or a U.S. district court or other court of competent jurisdiction; or

(iv) The owner or operator is named as debtor in a voluntary or involuntary proceeding under Title 11, Bankruptcy, U.S. Code; or

(v) The premium due is paid.

(9) Whenever the current post-closure cost estimate increases to an amount greater than the face amount of the policy during the operating life of the facility, the owner or operator, within 60 days after the increase, shall either cause the face amount to be increased to an amount at least equal to the current post-closure cost estimate and submit evidence of such increase to the Director, or obtain other financial assurance as specified in Section R315-264-145 to cover the increase. Whenever the current post-closure cost estimate decreases during the operating life of the facility, the face amount may be reduced to the amount of the current post-closure cost estimate following written approval by the Director.

(10) Commencing on the date that liability to make payments pursuant to the policy accrues, the insurer shall thereafter annually increase the face amount of the policy. Such increase shall be equivalent to the face amount of the policy, less any payments made, multiplied by an amount equivalent to 85 percent of the most recent investment rate or of the equivalent coupon-issue yield announced by the U.S. Treasury for 26-week Treasury securities.

(11) The Director shall give written consent to the owner or operator that he may terminate the insurance policy when:

(i) An owner or operator substitutes alternate financial

assurance as specified in Section R315-264-145; or

(ii) The Director releases the owner or operator from the requirements of Section R315-264-145 in accordance with Subsection R315-264-145(i).

(f) Financial test and corporate guarantee for post-closure care.

(1) An owner or operator may satisfy the requirements of Section R315-264-145 by demonstrating that he passes a financial test as specified in Subsection R315-264-145(f). To pass this test the owner or operator shall meet the criteria of either Subsection R315-264-145(f)(1)(i) or (ii):

(i) The owner or operator shall have:

(A) Two of the following three ratios: a ratio of total liabilities to net worth less than 2.0; a ratio of the sum of net income plus depreciation, depletion, and amortization to total liabilities greater than 0.1; and a ratio of current assets to current liabilities greater than 1.5; and

(B) Net working capital and tangible net worth each at least six times the sum of the current closure and post-closure cost estimates and the current plugging and abandonment cost estimates; and

(C) Tangible net worth of at least $10 million; and

(D) Assets in the United States amounting to at least 90 percent of his total assets or at least six times the sum of the current closure and post-closure cost estimates and the current plugging and abandonment cost estimates.

(ii) The owner or operator shall have:

(A) A current rating for his most recent bond issuance of AAA, AA, A, or BBB as issued by Standard and Poor's or Aaa, Aa, A or Baa as issued by Moody's; and

(B) Tangible net worth at least six times the sum of the current closure and post-closure cost estimates and the current plugging and abandonment cost estimates; and

(C) Tangible net worth of at least $10 million; and

(D) Assets located in the United States amounting to at least 90 percent of his total assets or at least six times the sum of the current closure and post-closure cost estimates and the current plugging and abandonment cost estimates.

(2) The phrase "current closure and post-closure cost estimates" as used in Subsection R315-264-145(f)(1) refers to the cost estimates required to be shown in paragraphs 1-4 of the letter from the owner's or operator's chief financial officer, Subsection R315-264-151(f). The phrase "current plugging and abandonment cost estimates" as used in Subsection R315-264-145(f)(1) refers to the cost estimates required to be shown in paragraphs 1-4 of the letter from the owner's or operator's chief financial officer, 40 CFR 144.70(f).

(3) To demonstrate that he meets this test, the owner or operator shall submit the following items to the Director:

(i) A letter signed by the owner's or operator's chief financial officer and worded as specified in Subsection R315-264-151(f); and

(ii) A copy of the independent certified public accountant's report on examination of the owner's or operator's financial statements for the latest completed fiscal year; and

(iii) A special report from the owner's or operator's independent certified public accountant to the owner or operator stating that:

(A) He has compared the data which the letter from the chief financial officer specifies as having been derived from the independently audited, year-end financial statements for the latest fiscal year with the amounts in such financial statements; and

(B) In connection with that procedure, no matters came to his attention which caused him to believe that the specified data should be adjusted.

(4) An owner or operator of a new facility shall submit the items specified in Subsection R315-264-145(f)(3) to the Director at least 60 days before the date on which hazardous waste is first received for disposal.

(5) After the initial submission of items specified in Subsection R315-264-145(f)(3), the owner or operator shall send updated information to the Director within 90 days after the close of each succeeding fiscal year. This information shall consist of all three items specified in Subsection R315-264-145(f)(3).

(6) If the owner or operator no longer meets the requirements of Subsection R315-264-145(f)(1), he shall send notice to the Director of intent to establish alternate financial assurance as specified in Section R315-264-145. The notice shall be sent by certified mail within 90 days after the end of the fiscal year for which the year-end financial data show that the owner or operator no longer meets the requirements. The owner or operator shall provide the alternate financial assurance within 120 days after the end of such fiscal year.

(7) The Director may, based on a reasonable belief that the owner or operator may no longer meet the requirements of Subsection R315-264-145(f)(1), require reports of financial condition at any time from the owner or operator in addition to those specified in Subsection R315-264-145(f)(3). If the Director finds, on the basis of such reports or other information, that the owner or operator no longer meets the requirements of Subsection R315-264-145(f)(1), the owner or operator shall provide alternate financial assurance as specified in Section R315-264-145 within 30 days after notification of such a finding.

(8) The Director may disallow use of this test on the basis of qualifications in the opinion expressed by the independent certified public accountant in his report on examination of the owner's or operator's financial statements, see Subsection R315-264-145(f)(3)(ii). An adverse opinion or a disclaimer of opinion shall be cause for disallowance. The Director shall evaluate other qualifications on an individual basis. The owner or operator shall provide alternate financial assurance as specified in Section R315-264-145 within 30 days after notification of the disallowance.

(9) During the period of post-closure care, the Director may approve a decrease in the current post-closure cost estimate for which this test demonstrates financial assurance if the owner or operator demonstrates to the Director that the amount of the cost estimate exceeds the remaining cost of post-closure care.

(10) The owner or operator is no longer required to submit the items specified in Subsection R315-264-145(f)(3) when:

(i) An owner or operator substitutes alternate financial assurance as specified in Section R315-264-145; or

(ii) The Director releases the owner or operator from the requirements of Section R315-264-145 in accordance with Subsection R315-264-145(i).

(11) An owner or operator may meet the requirements of Section R315-264-145 by obtaining a written guarantee. The guarantor shall be the direct or higher-tier parent corporation of the owner or operator, a firm whose parent corporation is also the parent corporation of the owner or operator, or a firm with a "substantial business relationship" with the owner or operator. The guarantor shall meet the requirements for owners or operators in Subsections R315-264-145(f)(1) through (9) and shall comply with the terms of the guarantee. The wording of the guarantee shall be identical to the wording specified in Subsection R315-264-151(h). A certified copy of the guarantee shall accompany the items sent to the Director as specified in Subsection R315-264-145(f)(3). One of these items shall be the letter from the guarantor's chief financial officer. If the guarantor's parent corporation is also the parent corporation of the owner or operator, the letter shall describe the value received in consideration of the guarantee. If the guarantor is a firm with a "substantial business relationship" with the owner or operator, this letter shall describe this "substantial business relationship" and the value received in consideration of the

guarantee. The terms of the guarantee shall provide that:

(i) If the owner or operator fails to perform post-closure care of a facility covered by the corporate guarantee in accordance with the post-closure plan and other permit requirements whenever required to do so, the guarantor shall do so or establish a trust fund as specified in Subsection R315-264-145(a) in the name of the owner or operator.

(ii) The corporate guarantee shall remain in force unless the guarantor sends notice of cancellation by certified mail to the owner or operator and to the Director. Cancellation may not occur, however, during the 120 days beginning on the date of receipt of the notice of cancellation by both the owner or operator and the Director, as evidenced by the return receipts.

(iii) If the owner or operator fails to provide alternate financial assurance as specified in Section R315-264-145 and obtain the written approval of such alternate assurance from the Director within 90 days after receipt by both the owner or operator and the Director of a notice of cancellation of the corporate guarantee from the guarantor, the guarantor shall provide such alternate financial assurance in the name of the owner or operator.

(g) Use of multiple financial mechanisms. An owner or operator may satisfy the requirements of Section R315-264-145 by establishing more than one financial mechanism per facility. These mechanisms are limited to trust funds, surety bonds guaranteeing payment into a trust fund, letters of credit, and insurance. The mechanisms shall be as specified in Subsections R315-264-145(a), (b), (d), and (e), respectively, except that it is the combination of mechanisms, rather than the single mechanism, which shall provide financial assurance for an amount at least equal to the current post-closure cost estimate. If an owner or operator uses a trust fund in combination with a surety bond or a letter of credit, he may use the trust fund as the standby trust fund for the other mechanisms. A single standby trust fund may be established for two or more mechanisms. The Director may use any or all of the mechanisms to provide for post-closure care of the facility.

(h) Use of a financial mechanism for multiple facilities. An owner or operator may use a financial assurance mechanism specified in Section R315-264-145 to meet the requirements of Section R315-264-145 for more than one facility. Evidence of financial assurance submitted to the Director shall include a list showing, for each facility, the EPA Identification Number, name, address, and the amount of funds for post-closure care assured by the mechanism. If the facilities covered by the mechanism are in more than one State, identical evidence of financial assurance shall be submitted to and maintained with the State Agency regulating hazardous waste in states other than Utah or with the appropriate Regional Administrator if the facility is located in an unauthorized State. The amount of funds available through the mechanism shall be no less than the sum of funds that would be available if a separate mechanism had been established and maintained for each facility. In directing funds available through the mechanism for post-closure care of any of the facilities covered by the mechanism, the Director may direct only the amount of funds designated for that facility, unless the owner or operator agrees to the use of additional funds available under the mechanism.

(i) Release of the owner or operator from the requirements of Section R315-264-145. Within 60 days after receiving certifications from the owner or operator and a qualified Professional Engineer that the post-closure care period has been completed for a hazardous waste disposal unit in accordance with the approved plan, the Director shall notify the owner or operator that he is no longer required to maintain financial assurance for post-closure of that unit, unless the Director has reason to believe that post-closure care has not been in accordance with the approved post-closure plan. The Director shall provide the owner or operator a detailed written statement of any such reason to believe that post-closure care has not been in accordance with the approved post-closure plan.

R315-264-146. Use of a Mechanism for Financial Assurance of Both Closure and Post-Closure Care.

An owner or operator may satisfy the requirements for financial assurance for both closure and post-closure care for one or more facilities by using a trust fund, surety bond, letter of credit, insurance, financial test, or corporate guarantee that meets the specifications for the mechanism in both Sections R315-264-143 and 145. The amount of funds available through the mechanism shall be no less than the sum of funds that would be available if a separate mechanism had been established and maintained for financial assurance of closure and of post-closure care.

R315-264-147. Liability Requirements.

(a) Coverage for sudden accidental occurrences. An owner or operator of a hazardous waste treatment, storage, or disposal facility, or a group of such facilities, shall demonstrate financial responsibility for bodily injury and property damage to third parties caused by sudden accidental occurrences arising from operations of the facility or group of facilities. The owner or operator shall have and maintain liability coverage for sudden accidental occurrences in the amount of at least $1 million per occurrence with an annual aggregate of at least $2 million, exclusive of legal defense costs. This liability coverage may be demonstrated as specified in Subsections R315-264-147(a)(1), (2), (3), (4), (5), or (6):

(1) An owner or operator may demonstrate the required liability coverage by having liability insurance as specified in Subsection R315-264-147(a).

(i) Each insurance policy shall be amended by attachment of the Hazardous Waste Facility Liability Endorsement or evidenced by a Certificate of Liability Insurance. The wording of the endorsement shall be identical to the wording specified in Subsection R315-264-151(i). The wording of the certificate of insurance shall be identical to the wording specified in Subsection R315-264-151(j). The owner or operator shall submit a signed duplicate original of the endorsement or the certificate of insurance to the Director. If requested by a Director, the owner or operator shall provide a signed duplicate original of the insurance policy. An owner or operator of a new facility shall submit the signed duplicate original of the Hazardous Waste Facility Liability Endorsement or the Certificate of Liability Insurance to the Director at least 60 days before the date on which hazardous waste is first received for treatment, storage, or disposal. The insurance shall be effective before this initial receipt of hazardous waste.

(ii) Each insurance policy shall be issued by an insurer which, at a minimum, is licensed to transact the business of insurance, or eligible to provide insurance as an excess or surplus lines insurer, in one or more States.

(2) An owner or operator may meet the requirements Section R315-264-146 by passing a financial test or using the guarantee for liability coverage as specified in Subsections R315-264-147(f) and (g).

(3) An owner or operator may meet the requirements of Section R315-264-147 by obtaining a letter of credit for liability coverage as specified in Subsection R315-264-147(h).

(4) An owner or operator may meet the requirements Section R315-264-146 by obtaining a surety bond for liability coverage as specified in Subsection R315-264-147(i).

(5) An owner or operator may meet the requirements Section R315-264-146 by obtaining a trust fund for liability coverage as specified in Subsection R315-264-147(j).

(6) An owner or operator may demonstrate the required liability coverage through the use of combinations of insurance, financial test, guarantee, letter of credit, surety bond, and trust

fund, except that the owner or operator may not combine a financial test covering part of the liability coverage requirement with a guarantee unless the financial statement of the owner or operator is not consolidated with the financial statement of the guarantor. The amounts of coverage demonstrated shall total at least the minimum amounts required by Section R315-264-147. If the owner or operator demonstrates the required coverage through the use of a combination of financial assurances under Subsection R315-264-147(a), the owner or operator shall specify at least one such assurance as "primary" coverage and shall specify other assurance as "excess" coverage.

(7) An owner or operator shall notify the Director in writing within 30 days whenever:

(i) A claim results in a reduction in the amount of financial assurance for liability coverage provided by a financial instrument authorized in Subsections R315-264-147(a)(1) through (a)(6); or

(ii) A Certification of Valid Claim for bodily injury or property damages caused by a sudden or non-sudden accidental occurrence arising from the operation of a hazardous waste treatment, storage, or disposal facility is entered between the owner or operator and third-party claimant for liability coverage under Subsections R315-264-147(a)(1) through (a)(6); or

(iii) A final court order establishing a judgment for bodily injury or property damage caused by a sudden or non-sudden accidental occurrence arising from the operation of a hazardous waste treatment, storage, or disposal facility is issued against the owner or operator or an instrument that is providing financial assurance for liability coverage under Subsections R315-264-147(a)(1) through (a)(6).

(b) Coverage for nonsudden accidental occurrences. An owner or operator of a surface impoundment, landfill, land treatment facility, or disposal miscellaneous unit that is used to manage hazardous waste, or a group of such facilities, shall demonstrate financial responsibility for bodily injury and property damage to third parties caused by nonsudden accidental occurrences arising from operations of the facility or group of facilities. The owner or operator shall have and maintain liability coverage for nonsudden accidental occurrences in the amount of at least $3 million per occurrence with an annual aggregate of at least $6 million, exclusive of legal defense costs. An owner or operator who shall meet the requirements Section R315-264-147 may combine the required per-occurrence coverage levels for sudden and nonsudden accidental occurrences into a single per-occurrence level, and combine the required annual aggregate coverage levels for sudden and nonsudden accidental occurrences into a single annual aggregate level. Owners or operators who combine coverage levels for sudden and nonsudden accidental occurrences shall maintain liability coverage in the amount of at least $4 million per occurrence and $8 million annual aggregate. This liability coverage may be demonstrated as specified in Subsections R315-264-147(b)(1), (2), (3), (4), (5), or (6):

(1) An owner or operator may demonstrate the required liability coverage by having liability insurance as specified in Subsection R315-264-147(b).

(i) Each insurance policy shall be amended by attachment of the Hazardous Waste Facility Liability Endorsement or evidenced by a Certificate of Liability Insurance. The wording of the endorsement shall be identical to the wording specified in Subsection R315-264-151(i). The wording of the certificate of insurance shall be identical to the wording specified in Subsection R315-264-151(j). The owner or operator shall submit a signed duplicate original of the endorsement or the certificate of insurance to the Director. If requested by a Director, the owner or operator shall provide a signed duplicate original of the insurance policy. An owner or operator of a new facility shall submit the signed duplicate original of the Hazardous Waste Facility Liability Endorsement or the Certificate of Liability Insurance to the Director at least 60 days before the date on which hazardous waste is first received for treatment, storage, or disposal. The insurance shall be effective before this initial receipt of hazardous waste.

(ii) Each insurance policy shall be issued by an insurer which, at a minimum, is licensed to transact the business of insurance, or eligible to provide insurance as an excess or surplus lines insurer, in one or more States.

(2) An owner or operator may meet the requirements Section R315-264-147 by passing a financial test or using the guarantee for liability coverage as specified in Subsections R315-264-147(f) and (g).

(3) An owner or operator may meet the requirements of Section R315-264-147 by obtaining a letter of credit for liability coverage as specified in Subsection R315-264-147(h).

(4) An owner or operator may meet the requirements of Section R315-264-147 by obtaining a surety bond for liability coverage as specified in Subsection R315-264-147(i).

(5) An owner or operator may meet the requirements of Section R315-264-147 by obtaining a trust fund for liability coverage as specified in Subsection R315-264-147(j).

(6) An owner or operator may demonstrate the required liability coverage through the use of combinations of insurance, financial test, guarantee, letter of credit, surety bond, and trust fund, except that the owner or operator may not combine a financial test covering part of the liability coverage requirement with a guarantee unless the financial statement of the owner or operator is not consolidated with the financial statement of the guarantor. The amounts of coverage demonstrated shall total at least the minimum amount required by Section R315-264-147. If the owner or operator demonstrates the required coverage through the use of a combination of financial assurances under Subsection R315-264-147(b), the owner or operator shall specify at least one such assurance as "primary" coverage and shall specify other assurance as "excess" coverage.

(7) An owner or operator shall notify the Director in writing within 30 days whenever:

(i) A Claim results in a reduction in the amount of financial assurance for liability coverage provided by a financial instrument authorized in Subsections R315-264-147(b)(1) through (b)(6); or

(ii) A Certification of Valid Claim for bodily injury or property damages caused by a sudden or non-sudden accidental occurrence arising from the operation of a hazardous waste treatment, storage, or disposal facility is entered between the owner or operator and third-party claimant for liability coverage under Subsections R315-264-147(b)(1) through (b)(6); or

(iii) A final court order establishing a judgment for bodily injury or property damage caused by a sudden or non-sudden accidental occurrence arising from the operation of a hazardous waste treatment, storage, or disposal facility is issued against the owner or operator or an instrument that is providing financial assurance for liability coverage under Subsections R315-264-147(b)(1) through (b)(6).

(c) Request for variance. If an owner or operator can demonstrate to the satisfaction of the Director that the levels of financial responsibility required by Subsection R315-264-147(a) or (b) are not consistent with the degree and duration of risk associated with treatment, storage, or disposal at the facility or group of facilities, the owner or operator may obtain a variance from the Director. The request for a variance shall be submitted to the Director as part of the application under Subsection R315-270-14 for a facility that does not have a permit, or pursuant to the procedures for permit modification under Subsection R315-124-5 for a facility that has a permit. If granted, the variance shall take the form of an adjusted level of required liability coverage, such level to be based on the Director's assessment of the degree and duration of risk associated with the ownership or operation of the facility or

group of facilities. The Director may require an owner or operator who requests a variance to provide such technical and engineering information as is deemed necessary by the Director to determine a level of financial responsibility other than that required by Subsection R315-264-147(a) or (b). Any request for a variance for a permitted facility shall be treated as a request for a permit modification under Subsections R315-270-41(a)(5) and R315-124-5.

(d) Adjustments by the Director. If the Director determines that the levels of financial responsibility required by Subsection R315-264-147(a) or (b) are not consistent with the degree and duration of risk associated with treatment, storage, or disposal at the facility or group of facilities, the Director may adjust the level of financial responsibility required under Subsection R315-264-147(a) or (b) as may be necessary to protect human health and the environment. This adjusted level shall be based on the Director's assessment of the degree and duration of risk associated with the ownership or operation of the facility or group of facilities. In addition, if the Director determines that there is a significant risk to human health and the environment from nonsudden accidental occurrences resulting from the operations of a facility that is not a surface impoundment, landfill, or land treatment facility, he may require that an owner or operator of the facility comply with Subsection R315-264-147(b). An owner or operator shall furnish to the Director, within a reasonable time, any information which the Director requests to determine whether cause exists for such adjustments of level or type of coverage. Any adjustment of the level or type of coverage for a facility that has a permit shall be treated as a permit modification under Subsections R315-270-41(a)(5) and Section R315-124-5.

(e) Period of coverage. Within 60 days after receiving certifications from the owner or operator and a qualified Professional Engineer that final closure has been completed in accordance with the approved closure plan, the Director shall notify the owner or operator in writing that he is no longer required by Section R315-264-147 to maintain liability coverage for that facility, unless the Director has reason to believe that closure has not been in accordance with the approved closure plan.

(f) Financial test for liability coverage.

(1) An owner or operator may satisfy the requirements of Section R315-264-147 by demonstrating that he passes a financial test as specified in Subsection R315-264-147(f). To pass this test the owner or operator shall meet the criteria of Subsection R315-264-147(f)(1)(i) or (ii):

(i) The owner or operator shall have:

(A) Net working capital and tangible net worth each at least six times the amount of liability coverage to be demonstrated by this test; and

(B) Tangible net worth of at least $10 million; and

(C) Assets in the United States amounting to either:

(I) At least 90 percent of his total assets; or

(II) at least six times the amount of liability coverage to be demonstrated by this test.

(ii) The owner or operator shall have:

(A) A current rating for his most recent bond issuance of AAA, AA, A, or BBB as issued by Standard and Poor's, or Aaa, Aa, A, or Baa as issued by Moody's; and

(B) Tangible net worth of at least $10 million; and

(C) Tangible net worth at least six times the amount of liability coverage to be demonstrated by this test; and

(D) Assets in the United States amounting to either:

(I) At least 90 percent of his total assets; or

(II) at least six times the amount of liability coverage to be demonstrated by this test.

(2) The phrase "amount of liability coverage" as used in Subsection R315-264-147(f)(1) refers to the annual aggregate amounts for which coverage is required under Section R315-264-147(a) and (b).

(3) To demonstrate that he meets this test, the owner or operator shall submit the following three items to the Director:

(i) A letter signed by the owner's or operator's chief financial officer and worded as specified in Subsection R315-264-151(g). If an owner or operator is using the financial test to demonstrate both assurance for closure or post-closure care, as specified by Subsections R315-264-143(f), 145(f); or 40 CFR 265.143(e), and 145(e), which are adopted by reference; and liability coverage, he shall submit the letter specified in Subsection R315-264-151(g) to cover both forms of financial responsibility; a separate letter as specified in Subsection R315-264-151(f) is not required.

(ii) A copy of the independent certified public accountant's report on examination of the owner's or operator's financial statements for the latest completed fiscal year.

(iii) A special report from the owner's or operator's independent certified public accountant to the owner or operator stating that:

(A) He has compared the data which the letter from the chief financial officer specifies as having been derived from the independently audited, year-end financial statements for the latest fiscal year with the amounts in such financial statements; and

(B) In connection with that procedure, no matters came to his attention which caused him to believe that the specified data should be adjusted.

(4) An owner or operator of a new facility shall submit the items specified in Subsection R315-264-147(f)(3) to the Director at least 60 days before the date on which hazardous waste is first received for treatment, storage, or disposal.

(5) After the initial submission of items specified in Subsection R315-264-147(f)(3), the owner or operator shall send updated information to the Director within 90 days after the close of each succeeding fiscal year. This information shall consist of all three items specified in Subsection R315-264-147(f)(3).

(6) If the owner or operator no longer meets the requirements of Subsection R315-264-147(f)(1), he shall obtain insurance, a letter of credit, a surety bond, a trust fund, or a guarantee for the entire amount of required liability coverage as specified in Section R315-264-147. Evidence of liability coverage shall be submitted to the Director within 90 days after the end of the fiscal year for which the year-end financial data show that the owner or operator no longer meets the test requirements.

(7) The Director may disallow use of this test on the basis of qualifications in the opinion expressed by the independent certified public accountant in his report on examination of the owner's or operator's financial statements, see Subsection R315-264-147(f)(3)(ii). An adverse opinion or a disclaimer of opinion shall be cause for disallowance. The Director shall evaluate other qualifications on an individual basis. The owner or operator shall provide evidence of insurance for the entire amount of required liability coverage as specified in Section R315-264-147 within 30 days after notification of disallowance.

(g) Guarantee for liability coverage.

(1) Subject to Subsection R315-264-147(g)(2), an owner or operator may meet the requirements of Section R315-264-147 by obtaining a written guarantee, hereinafter referred to as "guarantee." The guarantor shall be the direct or higher-tier parent corporation of the owner or operator, a firm whose parent corporation is also the parent corporation of the owner or operator, or a firm with a "substantial business relationship" with the owner or operator. The guarantor shall meet the requirements for owners or operators in Section R315-264-147(f)(1) through (f)(6). The wording of the guarantee shall be identical to the wording specified in Subsection R315-264-151(h)(2). A certified copy of the guarantee shall accompany

the items sent to the Director as specified in Subsection R315-264-147(f)(3). One of these items shall be the letter from the guarantor's chief financial officer. If the guarantor's parent corporation is also the parent corporation of the owner or operator, this letter shall describe the value received in consideration of the guarantee. If the guarantor is a firm with a "substantial business relationship" with the owner or operator, this letter shall describe this "substantial business relationship" and the value received in consideration of the guarantee.

(i) If the owner or operator fails to satisfy a judgment based on a determination of liability for bodily injury or property damage to third parties caused by sudden or nonsudden accidental occurrences, or both as the case may be, arising from the operation of facilities covered by this corporate guarantee, or fails to pay an amount agreed to in settlement of claims arising from or alleged to arise from such injury or damage, the guarantor shall do so up to the limits of coverage.

(ii) Reserved

(2)(i) In the case of corporations incorporated in the United States, a guarantee may be used to satisfy the requirements Section R315-264-147 only if the Attorneys General or Insurance Commissioners of the State in which the guarantor is incorporated have submitted a written statement to the Director that a guarantee executed as described in Section R315-264-147 and Subsection R315-264-151(h)(2) is a legally valid and enforceable obligation in that State.

(ii) In the case of corporations incorporated outside the United States, a guarantee may be used to satisfy the requirements Section R315-264-147 only if

(A) the non-U.S. corporation has identified a registered agent for service of process in Utah and in the State in which it has its principal place of business, and

(B) the Attorney General or Insurance Commissioner of the State in which the guarantor corporation has its principal place of business, has submitted a written statement to the Director that a guarantee executed as described in Section R315-264-147 and Subsection R315-264-151(h)(2) is a legally valid and enforceable obligation in that State.

(h) Letter of credit for liability coverage.

(1) An owner or operator may satisfy the requirements of Section R315-264-147 by obtaining an irrevocable standby letter of credit that conforms to the requirements of Subsection R315-264-147(h) and submitting a copy of the letter of credit to the Director.

(2) The financial institution issuing the letter of credit shall be an entity that has the authority to issue letters of credit and whose letter of credit operations are regulated and examined by a Federal or State agency.

(3) The wording of the letter of credit shall be identical to the wording specified in Subsection R315-264-151(k).

(4) An owner or operator who uses a letter of credit to satisfy the requirements Section R315-264-147 may also establish a standby trust fund. Under the terms of such a letter of credit, all amounts paid pursuant to a draft by the trustee of the standby trust shall be deposited by the issuing institution into the standby trust in accordance with instructions from the trustee. The trustee of the standby trust fund shall be an entity which has the authority to act as a trustee and whose trust operations are regulated and examined by a Federal or State agency.

(5) The wording of the standby trust fund shall be identical to the wording specified in Subsection R315-264-151(n).

(i) Surety bond for liability coverage.

(1) An owner or operator may satisfy the requirements of Section R315-264-147 by obtaining a surety bond that conforms to the requirements of Subsection R315-264-147(i) and submitting a copy of the bond to the Director.

(2) The surety company issuing the bond shall be among those listed as acceptable sureties on Federal bonds in the most recent Circular 570 of the U.S. Department of the Treasury.

(3) The wording of the surety bond shall be identical to the wording specified in Subsection R315-264-151(l).

(4) A surety bond may be used to satisfy the requirements Section R315-264-147 only if the Attorneys General or Insurance Commissioners of the State in which the surety is incorporated has submitted a written statement to the Director that a surety bond executed as described in Section R315-264-147 and Subsection R315-264-151(l) is a legally valid and enforceable obligation in that State.

(j) Trust fund for liability coverage.

(1) An owner or operator may satisfy the requirements of Section R315-264-147 by establishing a trust fund that conforms to the requirements of Subsection R315-264-147(j) and submitting an originally signed duplicate of the trust agreement to the Director.

(2) The trustee shall be an entity which has the authority to act as a trustee and whose trust operations are regulated and examined by a Federal or State agency.

(3) The trust fund for liability coverage shall be funded for the full amount of the liability coverage to be provided by the trust fund before it may be relied upon to satisfy the requirements of Section R315-264-147. If at any time after the trust fund is created the amount of funds in the trust fund is reduced below the full amount of the liability coverage to be provided, the owner or operator, by the anniversary date of the establishment of the fund, shall either add sufficient funds to the trust fund to cause its value to equal the full amount of liability coverage to be provided, or obtain other financial assurance as specified in Section R315-264-147 to cover the difference. For purposes of Subsection R315-264-147(j), "the full amount of the liability coverage to be provided" means the amount of coverage for sudden and/or nonsudden occurrences required to be provided by the owner or operator by Section R315-264-147, less the amount of financial assurance for liability coverage that is being provided by other financial assurance mechanisms being used to demonstrate financial assurance by the owner or operator.

(4) The wording of the trust fund shall be identical to the wording specified in Subsection R315-264-151(m).

(k) Notwithstanding any other provision of Rule R315-264, an owner or operator using liability insurance to satisfy the requirements of Section R315-264-147 may use, until October 16, 1982, a Hazardous Waste Facility Liability Endorsement or Certificate of Liability Insurance that does not certify that the insurer is licensed to transact the business of insurance, or eligible as an excess or surplus lines insurer, in one or more States.

R315-264-148. Incapacity of Owners or Operators, Guarantors, or Financial Institutions.

(a) An owner or operator shall notify the Director by certified mail of the commencement of a voluntary or involuntary proceeding under Title 11, Bankruptcy, U.S. Code, naming the owner or operator as debtor, within 10 days after commencement of the proceeding. A guarantor of a corporate guarantee as specified in Subsections R315-264-143(f) and 145(f) shall make such a notification if he is named as debtor, as required under the terms of the corporate guarantee, Subsection R315-264-151(h).

(b) An owner or operator who fulfills the requirements of Sections R315-264-143, 145, or 147 by obtaining a trust fund, surety bond, letter of credit, or insurance policy shall be deemed to be without the required financial assurance or liability coverage in the event of bankruptcy of the trustee or issuing institution, or a suspension or revocation of the authority of the trustee institution to act as trustee or of the institution issuing the surety bond, letter of credit, or insurance policy to issue such instruments. The owner or operator shall establish other

financial assurance or liability coverage within 60 days after such an event

R315-264-151. Financial Requirements -- Wording of the Instruments.

(a)(1) A trust agreement for a trust fund, as specified in Subsection R315-264-143(a) or Subsection R315-264-145(a) or 40 CFR 265.143(a) or 265.145(a), which are adopted by reference in Section R315-265-1; shall be worded as follows, except that instructions in parentheses,(), are to be replaced with the relevant information and the parentheses deleted:

Trust Agreement

Trust Agreement, the "Agreement," entered into as of (date) by and between (name of the owner or operator), a (name of State) (insert "corporation," "partnership," "association," or "proprietorship"), the "Grantor," and (name of corporate trustee), (insert "incorporated in the State of _____" or "a national bank"), the "Trustee."

Whereas, the Utah Waste Management and Radiation Control Board has established certain regulations applicable to the Grantor, requiring that an owner or operator of a hazardous waste management facility shall provide assurance that funds will be available when needed for closure and/or post-closure care of the facility,

Whereas, the Grantor has elected to establish a trust to provide all or part of such financial assurance for the facilities identified herein,

Whereas, the Grantor, acting through its duly authorized officers, has selected the Trustee to be the trustee under this agreement, and the Trustee is willing to act as trustee,

Now, Therefore, the Grantor and the Trustee agree as follows:

Section 1. Definitions. As used in this Agreement:

(a) The term "Grantor" means the owner or operator who enters into this Agreement and any successors or assigns of the Grantor.

(b) The term "Trustee" means the Trustee who enters into this Agreement and any successor Trustee.

(c) The term "Board" means the "Waste Management and Radiation Control Board" created pursuant to Utah Code Annotated 19-1-106.

(d) The term "Director" means the Director of the Division of Waste Management and Radiation Control, his successors, designees, and any subsequent entity of the State of Utah upon whom the duties of regulation and enforcement of regulations governing hazardous waste are granted.

Section 2. Identification of Facilities and Cost Estimates. This Agreement pertains to the facilities and cost estimates identified on attached Schedule A (on Schedule A, for each facility list the EPA Identification Number, name, address, and the current closure and/or post-closure cost estimates, or portions thereof, for which financial assurance is demonstrated by this Agreement).

Section 3. Establishment of Fund. The Grantor and the Trustee hereby establish a trust fund, the "Fund," for the benefit of the Director of the Utah Division of Waste Management and Radiation Control. The Grantor and the Trustee intend that no third party have access to the Fund except as herein provided. The Fund is established initially as consisting of the property, which is acceptable to the Trustee, described in Schedule B attached hereto. Such property and any other property subsequently transferred to the Trustee is referred to as the Fund, together with all earnings and profits thereon, less any payments or distributions made by the Trustee pursuant to this Agreement. The Fund shall be held by the Trustee, IN TRUST, as hereinafter provided. The Trustee shall not be responsible nor shall it undertake any responsibility for the amount or adequacy of, nor any duty to collect from the Grantor, any payments necessary to discharge any liabilities of the Grantor established by the Director.

Section 4. Payment for Closure and Post-Closure Care. The Trustee shall make payments from the Fund as the Director shall direct, in writing, to provide for the payment of the costs of closure and/or post-closure care of the facilities covered by this Agreement. The Trustee shall reimburse the Grantor or other persons as specified by the Director from the Fund for closure and post-closure expenditures in such amounts as the Director shall direct in writing. In addition, the Trustee shall refund to the Grantor such amounts as the Director specifies in writing. Upon refund, such funds shall no longer constitute part of the Fund as defined herein.

Section 5. Payments Comprising the Fund. Payments made to the Trustee for the Fund shall consist of cash or securities acceptable to the Trustee.

Section 6. Trustee Management. The Trustee shall invest and reinvest the principal and income of the Fund and keep the Fund invested as a single fund, without distinction between principal and income, in accordance with general investment policies and guidelines which the Grantor may communicate in writing to the Trustee from time to time, subject, however, to the provisions Section R315-264-151. In investing, reinvesting, exchanging, selling, and managing the Fund, the Trustee shall discharge his duties with respect to the trust fund solely in the interest of the beneficiary and with the care, skill, prudence, and diligence under the circumstances then prevailing which persons of prudence, acting in a like capacity and familiar with such matters, would use in the conduct of an enterprise of a like character and with like aims; except that:

(i) Securities or other obligations of the Grantor, or any other owner or operator of the facilities, or any of their affiliates as defined in the Investment Company Act of 1940, as amended, 15 U.S.C. 80a-2.(a), shall not be acquired or held, unless they are securities or other obligations of the Federal or a State government;

(ii) The Trustee is authorized to invest the Fund in time or demand deposits of the Trustee, to the extent insured by an agency of the Federal or State government; and

(iii) The Trustee is authorized to hold cash awaiting investment or distribution uninvested for a reasonable time and without liability for the payment of interest thereon.

Section 7. Commingling and Investment. The Trustee is expressly authorized in its discretion:

(a) To transfer from time to time any or all of the assets of the Fund to any common, commingled, or collective trust fund created by the Trustee in which the Fund is eligible to participate, subject to all of the provisions thereof, to be commingled with the assets of other trusts participating therein; and

(b) To purchase shares in any investment company registered under the Investment Company Act of 1940, 15 U.S.C. 80a-1 et seq., including one which may be created, managed, underwritten, or to which investment advice is rendered or the shares of which are sold by the Trustee. The Trustee may vote such shares in its discretion.

Section 8. Express Powers of Trustee. Without in any way limiting the powers and discretions conferred upon the Trustee by the other provisions of this Agreement or by law, the Trustee is expressly authorized and empowered:

(a) To sell, exchange, convey, transfer, or otherwise dispose of any property held by it, by public or private sale. No person dealing with the Trustee shall be bound to see to the application of the purchase money or to inquire into the validity or expediency of any such sale or other disposition;

(b) To make, execute, acknowledge, and deliver any and all documents of transfer and conveyance and any and all other instruments that may be necessary or appropriate to carry out the powers herein granted;

(c) To register any securities held in the Fund in its own

name or in the name of a nominee and to hold any security in bearer form or in book entry, or to combine certificates representing such securities with certificates of the same issue held by the Trustee in other fiduciary capacities, or to deposit or arrange for the deposit of such securities in a qualified central depositary even though, when so deposited, such securities may be merged and held in bulk in the name of the nominee of such depositary with other securities deposited therein by another person, or to deposit or arrange for the deposit of any securities issued by the United States Government, or any agency or instrumentality thereof, with a Federal Reserve bank, but the books and records of the Trustee shall at all times show that all such securities are part of the Fund;

(d) To deposit any cash in the Fund in interest-bearing accounts maintained or savings certificates issued by the Trustee, in its separate corporate capacity, or in any other banking institution affiliated with the Trustee, to the extent insured by an agency of the Federal or State government; and

(e) To compromise or otherwise adjust all claims in favor of or against the Fund.

Section 9. Taxes and Expenses. All taxes of any kind that may be assessed or levied against or in respect of the Fund and all brokerage commissions incurred by the Fund shall be paid from the Fund. All other expenses incurred by the Trustee in connection with the administration of this Trust, including fees for legal services rendered to the Trustee, the compensation of the Trustee to the extent not paid directly by the Grantor, and all other proper charges and disbursements of the Trustee shall be paid from the Fund.

Section 10. Annual Valuation. The Trustee shall annually, at least 30 days prior to the anniversary date of establishment of the Fund, furnish to the Grantor and to the appropriate Director a statement confirming the value of the Trust. Any securities in the Fund shall be valued at market value as of no more than 60 days prior to the anniversary date of establishment of the Fund. The failure of the Grantor to object in writing to the Trustee within 90 days after the statement has been furnished to the Grantor and the Director shall constitute a conclusively binding assent by the Grantor, barring the Grantor from asserting any claim or liability against the Trustee with respect to matters disclosed in the statement.

Section 11. Advice of Counsel. The Trustee may from time to time consult with counsel, who may be counsel to the Grantor, with respect to any question arising as to the construction of this Agreement or any action to be taken hereunder. The Trustee shall be fully protected, to the extent permitted by law, in acting upon the advice of counsel.

Section 12. Trustee Compensation. The Trustee shall be entitled to reasonable compensation for its services as agreed upon in writing from time to time with the Grantor.

Section 13. Successor Trustee. The Trustee may resign or the Grantor may replace the Trustee, but such resignation or replacement shall not be effective until the Grantor has appointed a successor trustee and this successor accepts the appointment. The successor trustee shall have the same powers and duties as those conferred upon the Trustee hereunder. Upon the successor trustee's acceptance of the appointment, the Trustee shall assign, transfer, and pay over to the successor trustee the funds and properties then constituting the Fund. If for any reason the Grantor cannot or does not act in the event of the resignation of the Trustee, the Trustee may apply to a court of competent jurisdiction for the appointment of a successor trustee or for instructions. The successor trustee shall specify the date on which it assumes administration of the trust in a writing sent to the Grantor, the Director, and the present Trustee by certified mail 10 days before such change becomes effective. Any expenses incurred by the Trustee as a result of any of the acts contemplated by this Section shall be paid as provided in Section 9.

Section 14. Instructions to the Trustee. All orders, requests, and instructions by the Grantor to the Trustee shall be in writing, signed by such persons as are designated in the attached Exhibit A or such other designees as the Grantor may designate by amendment to Exhibit A. The Trustee shall be fully protected in acting without inquiry in accordance with the Grantor's orders, requests, and instructions. All orders, requests, and instructions by the Director to the Trustee shall be in writing, signed by the Director, and the Trustee shall act and shall be fully protected in acting in accordance with such orders, requests, and instructions. The Trustee shall have the right to assume, in the absence of written notice to the contrary, that no event constituting a change or a termination of the authority of any person to act on behalf of the Grantor or EPA hereunder has occurred. The Trustee shall have no duty to act in the absence of such orders, requests, and instructions from the Grantor and/or the Director, except as provided for herein.

Section 15. Notice of Nonpayment. The Trustee shall notify the Grantor and the Director and the appropriate Regional Administrator(s), by certified mail within 10 days following the expiration of the 30-day period after the anniversary of the establishment of the Trust, if no payment is received from the Grantor during that period. After the pay-in period is completed, the Trustee shall not be required to send a notice of nonpayment.

Section 16. Amendment of Agreement. This Agreement may be amended by an instrument in writing executed by the Grantor, the Trustee, and the Director, or by the Trustee and the Director if the Grantor ceases to exist.

Section 17. Irrevocability and Termination. Subject to the right of the parties to amend this Agreement as provided in Section 16, this Trust shall be irrevocable and shall continue until terminated at the written agreement of the Grantor, the Trustee, and the Director, or by the Trustee and the Director, if the Grantor ceases to exist. Upon termination of the Trust, all remaining trust property, less final trust administration expenses, shall be delivered to the Grantor.

Section 18. Immunity and Indemnification. The Trustee shall not incur personal liability of any nature in connection with any act or omission, made in good faith, in the administration of this Trust, or in carrying out any directions by the Grantor or the Director issued in accordance with this Agreement. The Trustee shall be indemnified and saved harmless by the Grantor or from the Trust Fund, or both, from and against any personal liability to which the Trustee may be subjected by reason of any act or conduct in its official capacity, including all expenses reasonably incurred in its defense in the event the Grantor fails to provide such defense.

Section 19. Choice of Law. This Agreement shall be administered, construed, and enforced according to the laws of the State of Utah.

Section 20. Interpretation. As used in this Agreement, words in the singular include the plural and words in the plural include the singular. The descriptive headings for each Section of this Agreement shall not affect the interpretation or the legal efficacy of this Agreement.

In Witness Whereof the parties have caused this Agreement to be executed by their respective officers duly authorized and their corporate seals to be hereunto affixed and attested as of the date first above written: The parties below certify that the wording of this Agreement is identical to the wording specified in Subsection R315-264-151(a)(1) as such regulations were constituted on the date first above written.

(Signature of Grantor)
(Title)
Attest:
(Title)
(Seal)
(Signature of Trustee)

Attest:
(Title)
(Seal)

(2) The following is an example of the certification of acknowledgment which shall accompany the trust agreement for a trust fund as specified in Subsections R315-264-143(a) and 145(a) or 40 CFR 265.143(a) or 145(a), which is adopted by reference. State requirements may differ on the proper content of this acknowledgment.

State of
County of

On this (date), before me personally came (owner or operator) to me known, who, being by me duly sworn, did depose and say that she/he resides at (address), that she/he is (title) of (corporation), the corporation described in and which executed the above instrument; that she/he knows the seal of said corporation; that the seal affixed to such instrument is such corporate seal; that it was so affixed by order of the Board of Directors of said corporation, and that she/he signed her/his name thereto by like order.

(Signature of Notary Public)

(b) A surety bond guaranteeing payment into a trust fund, as specified in Subsection R315-264-143(b) or 145(b) or 40 CFR 265.143(b) or 145(b), which are adopted by reference, shall be worded as follows, except that instructions in parentheses, (), are to be replaced with the relevant information and the parentheses deleted:

Financial Guarantee Bond
Date bond executed:
Effective date:
Principal: (legal name and business address of owner or operator)
Type of Organization: (insert "individual," "joint venture," "partnership," or "corporation")
State of incorporation:
Surety(ies): (name(s) and business address(es))
EPA Identification Number, name, address and closure and/or post-closure amount(s) for each facility guaranteed by this bond (indicate closure and post-closure amounts separately):
Total penal sum of bond: $
Surety's bond number:

Know All Persons By These Presents, That we, the Principal and Surety(ies) hereto are firmly bound to the Director of the Utah Division of Waste Management and Radiation Control (hereinafter called Director), in the above penal sum for the payment of which we bind ourselves, our heirs, executors, administrators, successors, and assigns jointly and severally; provided that, where the Surety(ies) are corporations acting as co-sureties, we, the Sureties, bind ourselves in such sum "jointly and severally" only for the purpose of allowing a joint action or actions against any or all of us, and for all other purposes each Surety binds itself, jointly and severally with the Principal, for the payment of such sum only as is set forth opposite the name of such Surety, but if no limit of liability is indicated, the limit of liability shall be the full amount of the penal sum.

Whereas said Principal is required, under the Utah Solid and Hazardous Waste Act (the Act), to have a permit or interim status in order to own or operate each hazardous waste management facility identified above, and

Whereas said Principal is required to provide financial assurance for closure, or closure and post-closure care, as a condition of the permit or interim status, and

Whereas said Principal shall establish a standby trust fund as is required when a surety bond is used to provide such financial assurance;

Now, Therefore, the conditions of the obligation are such that if the Principal shall faithfully, before the beginning of final closure of each facility identified above, fund the standby trust fund in the amount(s) identified above for the facility,

Or, if the Principal shall fund the standby trust fund in such amount(s) within 15 days after a final order to begin closure is issued by an the Director or a U.S. district court or other court of competent jurisdiction,

Or, if the Principal shall provide alternate financial assurance, as specified in Sections R315-264-140 through 148 or 40 CFR 265.140 through 148, which are adopted by reference; as applicable, and obtain the Director's written approval of such assurance, within 90 days after the date notice of cancellation is received by both the Principal and the Director from the Surety(ies), then this obligation shall be null and void; otherwise it is to remain in full force and effect.

The Surety(ies) shall become liable on this bond obligation only when the Principal has failed to fulfill the conditions described above. Upon notification by an the Director that the Principal has failed to perform as guaranteed by this bond, the Surety(ies) shall place funds in the amount guaranteed for the facility(ies) into the standby trust fund as directed by the Director.

The liability of the Surety(ies) shall not be discharged by any payment or succession of payments hereunder, unless and until such payment or payments shall amount in the aggregate to the penal sum of the bond, but in no event shall the obligation of the Surety(ies) hereunder exceed the amount of said penal sum.

The Surety(ies) may cancel the bond by sending notice of cancellation by certified mail to the Principal and to the Director, provided, however, that cancellation shall not occur during the 120 days beginning on the date of receipt of the notice of cancellation by both the Principal and the Director, as evidenced by the return receipts.

The Principal may terminate this bond by sending written notice to the Surety(ies), provided, however, that no such notice shall become effective until the Surety(ies) receive(s) written authorization for termination of the bond by the Director.

(The following paragraph is an optional rider that may be included but is not required.)

Principal and Surety(ies) hereby agree to adjust the penal sum of the bond yearly so that it guarantees a new closure and/or post-closure amount, provided that the penal sum does not increase by more than 20 percent in any one year, and no decrease in the penal sum takes place without the written permission of the Director.

In Witness Whereof, the Principal and Surety(ies) have executed this Financial Guarantee Bond and have affixed their seals on the date set forth above.

The persons whose signatures appear below hereby certify that they are authorized to execute this surety bond on behalf of the Principal and Surety(ies) and that the wording of this surety bond is identical to the wording specified in Subsection R315-264-151(b) as such regulations were constituted on the date this bond was executed.

Principal
(Signature(s))
(Name(s))
(Title(s))
(Corporate seal)
Corporate Surety(ies)
(Name and address)
State of incorporation:
Liability limit: $
(Signature(s))
(Name(s) and title(s))
(Corporate seal)

(For every co-surety, provide signature(s), corporate seal, and other information in the same manner as for Surety above.)

Bond premium: $

(c) A surety bond guaranteeing performance of closure

and/or post-closure care, as specified in Subsection R315-264-143(c) or 145(c), shall be worded as follows, except that the instructions in parentheses,(), are to be replaced with the relevant information and the parentheses deleted:

Performance Bond

Date bond executed:

Effective date:

Principal: (legal name and business address of owner or operator)

Type of organization: (insert "individual," "joint venture," "partnership," or "corporation")

State of incorporation:

Surety(ies): (name(s) and business address(es))

EPA Identification Number, name, address, and closure and/or post-closure amount(s) for each facility guaranteed by this bond (indicate closure and post-closure amounts separately): _____

Total penal sum of bond: $

Surety's bond number:

Know All Persons By These Presents, That we, the Principal and Surety(ies) hereto are firmly bound to the Director of the Utah Division of Waste Management and Radiation Control (hereinafter called Director), in the above penal sum for the payment of which we bind ourselves, our heirs, executors, administrators, successors, and assigns jointly and severally; provided that, where the Surety(ies) are corporations acting as co-sureties, we, the Sureties, bind ourselves in such sum "jointly and severally" only for the purpose of allowing a joint action or actions against any or all of us, and for all other purposes each Surety binds itself, jointly and severally with the Principal, for the payment of such sum only as is set forth opposite the name of such Surety, but if no limit of liability is indicated, the limit of liability shall be the full amount of the penal sum.

Whereas said Principal is required, under the Utah Solid and Hazardous Waste Act (the Act), to have a permit in order to own or operate each hazardous waste management facility identified above, and

Whereas said Principal is required to provide financial assurance for closure, or closure and post-closure care, as a condition of the permit, and

Whereas said Principal shall establish a standby trust fund as is required when a surety bond is used to provide such financial assurance;

Now, Therefore, the conditions of this obligation are such that if the Principal shall faithfully perform closure, whenever required to do so, of each facility for which this bond guarantees closure, in accordance with the closure plan and other requirements of the permit as such plan and permit may be amended, pursuant to all applicable laws, statutes, rules, and regulations, as such laws, statutes, rules, and regulations may be amended,

And, if the Principal shall faithfully perform post-closure care of each facility for which this bond guarantees post-closure care, in accordance with the post-closure plan and other requirements of the permit, as such plan and permit may be amended, pursuant to all applicable laws, statutes, rules, and regulations, as such laws, statutes, rules, and regulations may be amended,

Or, if the Principal shall provide alternate financial assurance as specified in Sections R315-264-140 through 148, and obtain the Director's written approval of such assurance, within 90 days after the date notice of cancellation is received by both the Principal and the Director from the Surety(ies), then this obligation shall be null and void, otherwise it is to remain in full force and effect.

The Surety(ies) shall become liable on this bond obligation only when the Principal has failed to fulfill the conditions described above.

Upon notification by an Director that the Principal has been found in violation of the closure requirements of Rule R315-264, for a facility for which this bond guarantees performance of closure, the Surety(ies) shall either perform closure in accordance with the closure plan and other permit requirements or place the closure amount guaranteed for the facility into the standby trust fund as directed by the Director.

Upon notification by the Director that the Principal has been found in violation of the post-closure requirements of Rule R315-264 for a facility for which this bond guarantees performance of post-closure care, the Surety(ies) shall either perform post-closure care in accordance with the post-closure plan and other permit requirements or place the post-closure amount guaranteed for the facility into the standby trust fund as directed by the Director.

Upon notification by the Director that the Principal has failed to provide alternate financial assurance as specified in Sections 315-264-140 through 148, and obtain written approval of such assurance from the Director during the 90 days following receipt by both the Principal and the Director of a notice of cancellation of the bond, the Surety(ies) shall place funds in the amount guaranteed for the facility(ies) into the standby trust fund as directed by the Director.

The surety(ies) hereby waive(s) notification of amendments to closure plans, permits, applicable laws, statutes, rules, and regulations and agrees that no such amendment shall in any way alleviate its (their) obligation on this bond.

The liability of the Surety(ies) shall not be discharged by any payment or succession of payments hereunder, unless and until such payment or payments shall amount in the aggregate to the penal sum of the bond, but in no event shall the obligation of the Surety(ies) hereunder exceed the amount of said penal sum.

The Surety(ies) may cancel the bond by sending notice of cancellation by certified mail to the owner or operator and to the Director and the appropriate Regional Administrator, provided, however, that cancellation shall not occur during the 120 days beginning on the date of receipt of the notice of cancellation by both the Principal and the Director, as evidenced by the return receipts.

The principal may terminate this bond by sending written notice to the Surety(ies), provided, however, that no such notice shall become effective until the Surety(ies) receive(s) written authorization for termination of the bond by the Director.

(The following paragraph is an optional rider that may be included but is not required.)

Principal and Surety(ies) hereby agree to adjust the penal sum of the bond yearly so that it guarantees a new closure and/or post-closure amount, provided that the penal sum does not increase by more than 20 percent in any one year, and no decrease in the penal sum takes place without the written permission of the Director.

In Witness Whereof, The Principal and Surety(ies) have executed this Performance Bond and have affixed their seals on the date set forth above.

The persons whose signatures appear below hereby certify that they are authorized to execute this surety bond on behalf of the Principal and Surety(ies) and that the wording of this surety bond is identical to the wording specified in Subsection R315-264-151(c) as such regulation was constituted on the date this bond was executed.

Principal

(Signature(s))

(Name(s))

(Title(s))

(Corporate seal)

Corporate Surety(ies)

(Name and address)

State of incorporation:

Liability limit: $

(Signature(s))
(Name(s) and title(s))
(Corporate seal)
(For every co-surety, provide signature(s), corporate seal, and other information in the same manner as for Surety above.)
Bond premium: $

(d) A letter of credit, as specified in Subsection R315-264-143(d) or 145(d) or 40 CFR 265.143(c) or 145(c), which are adopted by reference, shall be worded as follows, except that instructions in parentheses, (), are to be replaced with the relevant information and the parentheses deleted:

Irrevocable Standby Letter of Credit
Director of the Division of Waste Management and Radiation Control
195 North 1950 West
P.O. Box 144880
Salt Lake City, UT 84114-4880

Dear Director: We hereby establish our Irrevocable Standby Letter of Credit No. ___ in your favor, at the request and for the account of (owner's or operator's name and address) up to the aggregate amount of (in words) U.S. dollars $___, available upon presentation of

(1) your sight draft, bearing reference to this letter of credit No. ___, and

(2) your signed statement reading as follows: "I certify that the amount of the draft is payable pursuant to regulations issued under authority of the Utah Solid and Hazardous Waste Act."

This letter of credit is effective as of (date) and shall expire on (date at least 1 year later), but such expiration date shall be automatically extended for a period of (at least 1 year) on (date) and on each successive expiration date, unless, at least 120 days before the current expiration date, we notify both you and (owner's or operator's name) by certified mail that we have decided not to extend this letter of credit beyond the current expiration date. In the event you are so notified, any unused portion of the credit shall be available upon presentation of your sight draft for 120 days after the date of receipt by both the Director and (owner's or operator's name), as shown on the signed return receipts.

Whenever this letter of credit is drawn on under and in compliance with the terms of this credit, we shall duly honor such draft upon presentation to us, and we shall deposit the amount of the draft directly into the standby trust fund of (owner's or operator's name) in accordance with the Director's instructions.

We certify that the wording of this letter of credit is identical to the wording specified in Subsection R315-264-151(d) as such regulations were constituted on the date shown immediately below.

(Signature(s) and title(s) of official(s) of issuing institution)
(Date)

This credit is subject to (insert "the most recent edition of the Uniform Customs and Practice for Documentary Credits, published and copyrighted by the International Chamber of Commerce," or "the Uniform Commercial Code").

(e) A certificate of insurance, as specified in Subsection R315-264-143(e) or 145(e) or 40 CFR 265.143(d) or 145(d), which are adopted by reference, shall be worded as follows, except that instructions in parentheses, (), are to be replaced with the relevant information and the parentheses deleted:

Certificate of Insurance for Closure or Post-Closure Care
Name and Address of Insurer
(herein called the "Insurer"):
Name and Address of Insured
(herein called the "Insured"):

Facilities Covered: (List for each facility: The EPA Identification Number, name, address, and the amount of insurance for closure and/or the amount for post-closure care (these amounts for all facilities covered shall total the face amount shown below).)

Face Amount:
Policy Number:
Effective Date:

The Insurer hereby certifies that it has issued to the Insured the policy of insurance identified above to provide financial assurance for (insert "closure" or "closure and post-closure care" or "post-closure care") for the facilities identified above. The Insurer further warrants that such policy conforms in all respects with the requirements of Subsections R315-264-143(e), or 145(e), or 40 CFR 265.143(d), and 145(d), which are adopted by reference, as applicable and as such regulations were constituted on the date shown immediately below. It is agreed that any provision of the policy inconsistent with such regulations is hereby amended to eliminate such inconsistency.

Whenever requested by the Director of the Utah Division of Waste Management and Radiation Control, the Insurer agrees to furnish to the Director a duplicate original of the policy listed above, including all endorsements thereon.

I hereby certify that the wording of this certificate is identical to the wording specified in Subsection R315-264-151(e) as such regulations were constituted on the date shown immediately below.

(Authorized signature for Insurer)
(Name of person signing)
(Title of person signing)
Signature of witness or notary:
(Date)

(f) A letter from the chief financial officer, as specified in Subsection R315-264-143(f) or 145(f), or 40 CFR 265.143(e) or 145(e), which are adopted by reference, shall be worded as follows, except that instructions in parentheses, (), are to be replaced with the relevant information and the parentheses deleted:

Letter From Chief Financial Officer
Director, Utah Division of Waste Management and Radiation Control.
195 North 1950 West
P.O. Box 144880
Salt Lake City, UT 84114-4880

I am the chief financial officer of (name and address of firm). This letter is in support of this firm's use of the financial test to demonstrate financial assurance for closure and/or post-closure costs, as specified in Sections R315-264-140 through 148 and 40 CFR 265.140 through 148, which are adopted by reference.

(Fill out the following five paragraphs regarding facilities and associated cost estimates. If your firm has no facilities that belong in a particular paragraph, write "None" in the space indicated. For each facility, include its EPA Identification Number, name, address, and current closure and/or post-closure cost estimates. Identify each cost estimate as to whether it is for closure or post-closure care).

1. This firm is the owner or operator of the following facilities for which financial assurance for closure or post-closure care is demonstrated through the financial test specified in Sections R315-264-140 through 148 and 40 CFR 265.140 through 148, which are adopted by reference. The current closure and/or post-closure cost estimates covered by the test are shown for each facility: ____.

2. This firm guarantees, through the guarantee specified in Sections R315-264-140 through 148 and 40 CFR 265.140 through 148, which are adopted by reference, the closure or post-closure care of the following facilities owned or operated by the guaranteed party. The current cost estimates for the closure or post-closure care so guaranteed are shown for each facility: ____. The firm identified above is (insert one or more: (1) The direct or higher-tier parent corporation of the owner or operator; (2) owned by the same parent corporation as the

parent corporation of the owner or operator, and receiving the following value in consideration of this guarantee ____; or (3) engaged in the following substantial business relationship with the owner or operator ____, and receiving the following value in consideration of this guarantee ____). (Attach a written description of the business relationship or a copy of the contract establishing such relationship to this letter).

3. In other jurisdictions, and states where the Director is not authorized to administer the financial requirements of R315-264-140 through 151 or 40 CFR 265.140 through 148, which are adopted by reference, this firm, as owner or operator or guarantor, is demonstrating financial assurance for the closure or post-closure care of the following facilities through the use of a test equivalent or substantially equivalent to the financial test specified in Sections R315-264-140 through 148 and 40 CFR 265.140 through 148, which are adopted by reference. The current closure and/or post-closure cost estimates covered by such a test are shown for each facility: ____.

4. This firm is the owner or operator of the following hazardous waste management facilities for which financial assurance for closure or, if a disposal facility, post-closure care, is not demonstrated either to EPA or a State through the financial test or any other financial assurance mechanism specified in Sections R315-264-140 through 148 and 40 CFR 265.140 through 148, which are adopted by reference, or equivalent or substantially equivalent State mechanisms. The current closure and/or post-closure cost estimates not covered by such financial assurance are shown for each facility: ____.

5. This firm is the owner or operator of the following UIC facilities for which financial assurance for plugging and abandonment is required under 40 CFR 144. The current closure cost estimates as required by 40 CFR 144.62 are shown for each facility: ____.

This firm (insert "is required" or "is not required") to file a Form 10K with the Securities and Exchange Commission (SEC) for the latest fiscal year.

The fiscal year of this firm ends on (month, day). The figures for the following items marked with an asterisk are derived from this firm's independently audited, year-end financial statements for the latest completed fiscal year, ended (date).

(Fill in Alternative I if the criteria of Subsection R315-264-143(f)(1)(i) or Subsection R315-264-145(f)(1)(i), or 40 CFR 265.143(e)(1)(i) or 145(e)(1)(i), which are adopted by reference, are used. Fill in Alternative II if the criteria of Subsection R315-264-143(f)(1)(ii) or 40 CFR 265.143(e)(1)(ii) or 145(e)(1)(ii) or 145(f)(1)(ii), which are adopted by reference, are used.)

Alternative I

1. Sum of current closure and post-closure cost estimate (total of all cost estimates shown in the five paragraphs above) $____

*2. Total liabilities (if any portion of the closure or post-closure cost estimates is included in total liabilities, you may deduct the amount of that portion from this line and add that amount to lines 3 and 4)$____

*3. Tangible net worth $____

*4. Net worth $____

*5. Current assets $____

*6. Current liabilities $____

7. Net working capital (line 5 minus line 6) $____

*8. The sum of net income plus depreciation, depletion, and amortization $____

*9. Total assets in U.S. (required only if less than 90% of firm's assets are located in the U.S.) $____

10. Is line 3 at least $10 million? (Yes/No) ____

11. Is line 3 at least 6 times line 1? (Yes/No) ____

12. Is line 7 at least 6 times line 1? (Yes/No) ____

*13. Are at least 90% of firm's assets located in the U.S.? If not, complete line 14 (Yes/No) ____

14. Is line 9 at least 6 times line 1? (Yes/No) ____

15. Is line 2 divided by line 4 less than 2.0? (Yes/No) ____

16. Is line 8 divided by line 2 greater than 0.1? (Yes/No) ____

17. Is line 5 divided by line 6 greater than 1.5? (Yes/No) ____

Alternative II

1. Sum of current closure and post-closure cost estimates (total of all cost estimates shown in the five paragraphs above) $____

2. Current bond rating of most recent issuance of this firm and name of rating service ____

3. Date of issuance of bond ____

4. Date of maturity of bond ____

*5. Tangible net worth (if any portion of the closure and post-closure cost estimates is included in "total liabilities" on your firm's financial statements, you may add the amount of that portion to this line) $____

*6. Total assets in U.S. (required only if less than 90% of firm's assets are located in the U.S.) $____

7. Is line 5 at least $10 million ? (Yes/No) ____

8. Is line 5 at least 6 times line 1? (Yes/No) ____

*9. Are at least 90% of firm's assets located in the U.S.? If not, complete line 10 (Yes/No) ____

10. Is line 6 at least 6 times line 1? (Yes/No) ____

I hereby certify that the wording of this letter is identical to the wording specified in Subsection R315-264-151(f) as such regulations were constituted on the date shown immediately below.

(Signature)

(Name)

(Title)

(Date)

(g) A letter from the chief financial officer, as specified in Subsection R315-264-147(f) or 40 CFR 265.147(f), which is adopted by reference, shall be worded as follows, except that instructions in parentheses, (), are to be replaced with the relevant information and the parentheses deleted.

Letter From Chief Financial Officer

Director, Utah Division of Waste Management and Radiation Control.

195 North 1950 West

P.O. Box 144880

Salt Lake City, UT 84114-4880

I am the chief financial officer of (firm's name and address). This letter is in support of the use of the financial test to demonstrate financial responsibility for liability coverage (insert "and closure and/or post-closure care" if applicable) as specified in Sections R315-264-140 through 148 and 40 CFR 265.140 through 148, which are adopted by reference.

(Fill out the following paragraphs regarding facilities and liability coverage. If there are no facilities that belong in a particular paragraph, write "None" in the space indicated. For each facility, include its EPA Identification Number, name, and address).

The firm identified above is the owner or operator of the following facilities for which liability coverage for (insert "sudden" or "nonsudden" or "both sudden and nonsudden") accidental occurrences is being demonstrated through the financial test specified in Sections R315-264-140 through 148 and 40 CFR 265.140 through 148, which are adopted by reference:____

The firm identified above guarantees, through the guarantee specified in Sections R315-264-140 through 148 and 40 CFR 265.140 through 148, which are adopted by reference, liability coverage for (insert "sudden" or "nonsudden" or "both sudden and nonsudden") accidental occurrences at the following

facilities owned or operated by the following: ____. The firm identified above is (insert one or more: (1) The direct or higher-tier parent corporation of the owner or operator; (2) owned by the same parent corporation as the parent corporation of the owner or operator, and receiving the following value in consideration of this guarantee ____; or (3) engaged in the following substantial business relationship with the owner or operator ____, and receiving the following value in consideration of this guarantee ____). (Attach a written description of the business relationship or a copy of the contract establishing such relationship to this letter.)

(If you are using the financial test to demonstrate coverage of both liability and closure and post-closure care, fill in the following five paragraphs regarding facilities and associated closure and post-closure cost estimates. If there are no facilities that belong in a particular paragraph, write "None" in the space indicated. For each facility, include its EPA identification number, name, address, and current closure and/or post-closure cost estimates. Identify each cost estimate as to whether it is for closure or post-closure care.)

1. The firm identified above owns or operates the following facilities for which financial assurance for closure or post-closure care or liability coverage is demonstrated through the financial test specified in Sections R315-264-140 through 148 and 40 CFR 265.140 through 148, which are adopted by reference. The current closure and/or post-closure cost estimate covered by the test are shown for each facility: ____.

2. The firm identified above guarantees, through the guarantee specified in Sections R315-264-140 through 148 and 40 CFR 265.140 through 148, which are adopted by reference, the closure and post-closure care or liability coverage of the following facilities owned or operated by the guaranteed party. The current cost estimates for closure or post-closure care so guaranteed are shown for each facility: ____.

3. In other jurisdictions, and states where the Director is not authorized to administer the financial requirements of R315-264-140 through 151 or 40 CFR 265.140 through 148, which are adopted by reference, this firm is demonstrating financial assurance for the closure or post-closure care of the following facilities through the use of a test equivalent or substantially equivalent to the financial test specified in Sections R315-264-140 through 148 and 40 CFR 265.140 through 148, which are adopted by reference. The current closure or post-closure cost estimates covered by such a test are shown for each facility: ____.

4. The firm identified above owns or operates the following hazardous waste management facilities for which financial assurance for closure or, if a disposal facility, post-closure care, is not demonstrated either to EPA or a State through the financial test or any other financial assurance mechanisms specified in Sections R315-264-140 through 148 and 40 CFR 265.140 through 148, which are adopted by reference, or equivalent or substantially equivalent State mechanisms. The current closure and/or post-closure cost estimates not covered by such financial assurance are shown for each facility: ____.

5. This firm is the owner or operator or guarantor of the following UIC facilities for which financial assurance for plugging and abandonment is required under 40 CFR 144 and is assured through a financial test. The current closure cost estimates as required by 40 CFR 144.62 are shown for each facility:____.

This firm (insert "is required" or "is not required") to file a Form 10K with the Securities and Exchange Commission (SEC) for the latest fiscal year.

The fiscal year of this firm ends on (month, day). The figures for the following items marked with an asterisk are derived from this firm's independently audited, year-end financial statements for the latest completed fiscal year, ended (date).

Part A. Liability Coverage for Accidental Occurrences

(Fill in Alternative I if the criteria of Subsection R315-264-147(f)(1)(i) or 40 CFR 265.147(f)(1)(i), which is adopted by reference, are used. Fill in Alternative II if the criteria of Subsection R315-264-147(f)(1)(ii) or 40 CFR 265.147(f)(1)(ii), which is adopted by reference, are used.)

Alternative I

1. Amount of annual aggregate liability coverage to be demonstrated $____.

*2. Current assets $____.

*3. Current liabilities $____.

4. Net working capital (line 2 minus line 3) $____.

*5. Tangible net worth $____.

*6. If less than 90% of assets are located in the U.S., give total U.S. assets $____.

7. Is line 5 at least $10 million? (Yes/No) ____.

8. Is line 4 at least 6 times line 1? (Yes/No) ____.

9. Is line 5 at least 6 times line 1? (Yes/No) ____.

*10. Are at least 90% of assets located in the U.S.? (Yes/No) ____. If not, complete line 11.

11. Is line 6 at least 6 times line 1? (Yes/No) ____.

Alternative II

1. Amount of annual aggregate liability coverage to be demonstrated $____.

2. Current bond rating of most recent issuance and name of rating service ____ ____.

3. Date of issuance of bond _____.

4. Date of maturity of bond _____.

*5. Tangible net worth $____.

*6. Total assets in U.S. (required only if less than 90% of assets are located in the U.S.) $____.

7. Is line 5 at least $10 million? (Yes/No) ____.

8. Is line 5 at least 6 times line 1? ____.

9. Are at least 90% of assets located in the U.S.? If not, complete line 10. (Yes/No) ____.

10. Is line 6 at least 6 times line 1? ____.

(Fill in part B if you are using the financial test to demonstrate assurance of both liability coverage and closure or post-closure care.)

Part B. Closure or Post-Closure Care and Liability Coverage

(Fill in Alternative I if the criteria of Subsection R315-264-143(f)(1)(i) or Subsection R315-264-145(f)(1)(i) and of Subsection R315-264-147(f)(1)(i) are used or if the criteria of 40 CFR 265.143(e)(1)(i) or 145(e)(1)(i), which are adopted by reference, and of 40 CFR 265.147(f)(1)(i), which is adopted by reference, are used. Fill in Alternative II if the criteria of Subsection R315-264-143(f)(1)(ii) or Subsection R315-264-145(f)(1)(ii) and of Subsection R315-264-147(f)(1)(ii) are used or if the criteria of 40 CFR 265.143(e)(1)(i) or 145(e)(1)(i), which are adopted by reference, and of 40 CFR 265.147(f)(1)(ii), which is adopted by reference, are used.)

Alternative I

1. Sum of current closure and post-closure cost estimates (total of all cost estimates listed above) $____

2. Amount of annual aggregate liability coverage to be demonstrated $____

3. Sum of lines 1 and 2 $____

*4. Total liabilities (if any portion of your closure or post-closure cost estimates is included in your total liabilities, you may deduct that portion from this line and add that amount to lines 5 and 6) $____

*5. Tangible net worth $____

*6. Net worth $____

*7. Current assets $____

*8. Current liabilities $____

9. Net working capital (line 7 minus line 8) $____

*10. The sum of net income plus depreciation, depletion,

and amortization $____

*11. Total assets in U.S. (required only if less than 90% of assets are located in the U.S.) $____

12. Is line 5 at least $10 million? (Yes/No)

13. Is line 5 at least 6 times line 3? (Yes/No)

14. Is line 9 at least 6 times line 3? (Yes/No)

*15. Are at least 90% of assets located in the U.S.? (Yes/No) If not, complete line 16.

16. Is line 11 at least 6 times line 3? (Yes/No)

17. Is line 4 divided by line 6 less than 2.0? (Yes/No)

18. Is line 10 divided by line 4 greater than 0.1? (Yes/No)

19. Is line 7 divided by line 8 greater than 1.5? (Yes/No)

Alternative II

1. Sum of current closure and post-closure cost estimates (total of all cost estimates listed above) $____

2. Amount of annual aggregate liability coverage to be demonstrated $____

3. Sum of lines 1 and 2 $____

4. Current bond rating of most recent issuance and name of rating service ____ ____

5. Date of issuance of bond _____

6. Date of maturity of bond _____

*7. Tangible net worth (if any portion of the closure or post-closure cost estimates is included in "total liabilities" on your financial statements you may add that portion to this line) $____

*8. Total assets in the U.S. (required only if less than 90% of assets are located in the U.S.) $____

9. Is line 7 at least $10 million? (Yes/No)

10. Is line 7 at least 6 times line 3? (Yes/No)

*11. Are at least 90% of assets located in the U.S.? (Yes/No) If not complete line 12.

12. Is line 8 at least 6 times line 3? (Yes/No)

I hereby certify that the wording of this letter is identical to the wording specified in Subsection R315-264-151(g) as such regulations were constituted on the date shown immediately below.

(Signature)

(Name)

(Title)

(Date)

(h)(1) A corporate guarantee, as specified in Subsection R315-264-143(f) or 145(f), or 40 CFR 265.143(e) or 145(e), which are adopted by reference, shall be worded as follows, except that instructions in parentheses, (), are to be replaced with the relevant information and the parentheses deleted:

Corporate Guarantee for Closure or Post-Closure Care

Guarantee made this (date) by (name of guaranteeing entity), a business corporation organized under the laws of the State of (insert name of State), herein referred to as guarantor. This guarantee is made on behalf of the (owner or operator) of (business address), which is (one of the following: "our subsidiary"; "a subsidiary of (name and address of common parent corporation), of which guarantor is a subsidiary"; or "an entity with which guarantor has a substantial business relationship, as defined in (either Subsection R315-264-141(h) or 40 CFR 265.141(h), which is adopted by reference,)" to the Director of the Utah Division of Waste Management and Radiation Control (Director).

Recitals

1. Guarantor meets or exceeds the financial test criteria and agrees to comply with the reporting requirements for guarantors as specified in Subsections R315-264-143(f) and 145(f) or 40 CFR 265.143(e) and 145(e), which are adopted by reference.

2. (Owner or operator) owns or operates the following hazardous waste management facility(ies) covered by this guarantee: (List for each facility: EPA Identification Number, name, and address. Indicate for each whether guarantee is for closure, post-closure care, or both.)

3. "Closure plans" and "post-closure plans" as used below refer to the plans maintained as required by Sections R315-264-110 through 120 and 40 CFR 265.110 through 120, which are adopted by reference, for the closure and post-closure care of facilities as identified above.

4. For value received from (owner or operator), guarantor guarantees to the Director that in the event that (owner or operator) fails to perform (insert "closure," "post-closure care" or "closure and post-closure care") of the above facility(ies) in accordance with the closure or post-closure plans and other permit or interim status requirements whenever required to do so, the guarantor shall do so or establish a trust fund as specified in Sections R315-264-140 through 148 or 40 CFR 265.140 through 148, which are adopted by reference, as applicable, in the name of (owner or operator) in the amount of the current closure or post-closure cost estimates as specified in Sections R315-264-140 through 148 or 40 CFR 265.140 through 148, which are adopted by reference.

5. Guarantor agrees that if, at the end of any fiscal year before termination of this guarantee, the guarantor fails to meet the financial test criteria, guarantor shall send within 90 days, by certified mail, notice to the Director and to (owner or operator) that he intends to provide alternate financial assurance as specified in Sections R315-264-140 through 148 or 40 CFR 265.140 through 148, which are adopted by reference, as applicable, in the name of (owner or operator). Within 120 days after the end of such fiscal year, the guarantor shall establish such financial assurance unless (owner or operator) has done so.

6. The guarantor agrees to notify the Director and the appropriate Regional Administrator by certified mail, of a voluntary or involuntary proceeding under Title 11, Bankruptcy, U.S. Code, naming guarantor as debtor, within 10 days after commencement of the proceeding.

7. Guarantor agrees that within 30 days after being notified by the Director of a determination that guarantor no longer meets the financial test criteria or that he is disallowed from continuing as a guarantor of closure or post-closure care, he shall establish alternate financial assurance as specified in Sections R315-264-140 through 148 or 40 CFR 265.140 through 148, which are adopted by reference, as applicable, in the name of (owner or operator) unless (owner or operator) has done so.

8. Guarantor agrees to remain bound under this guarantee notwithstanding any or all of the following: amendment or modification of the closure or post-closure plan, amendment or modification of the permit, the extension or reduction of the time of performance of closure or post-closure, or any other modification or alteration of an obligation of the owner or operator pursuant to Rules R315-264 or 265.

9. Guarantor agrees to remain bound under this guarantee for as long as (owner or operator) shall comply with the applicable financial assurance requirements of Sections R315-264-140 through 148 or 40 CFR 265.140 through 148, which are adopted by reference, for the above-listed facilities, except as provided in paragraph 10 of this agreement.

10. (Insert the following language if the guarantor is (a) a direct or higher-tier corporate parent, or (b) a firm whose parent corporation is also the parent corporation of the owner or operator):

Guarantor may terminate this guarantee by sending notice by certified mail to the Director and to (owner or operator)and to the appropriate Regional Administrator, provided that this guarantee may not be terminated unless and until (the owner or operator) obtains, and the Director approves, alternate closure and/or post-closure care coverage complying with Sections R315-264-143 and/or 264-145, or 40 CFR 265.143, and/or 145, which are adopted by reference.

(Insert the following language if the guarantor is a firm

qualifying as a guarantor due to its "substantial business relationship" with its owner or operator)

Guarantor may terminate this guarantee 120 days following the receipt of notification, through certified mail, by the Director and by (the owner or operator).

11. Guarantor agrees that if (owner or operator) fails to provide alternate financial assurance as specified in Sections R315-264-140 through 148 or 40 CFR 265.140 through 148, which are adopted by reference, as applicable, and obtain written approval of such assurance from the Director within 90 days after a notice of cancellation by the guarantor is received by the Director from guarantor, guarantor shall provide such alternate financial assurance in the name of (owner or operator).

12. Guarantor expressly waives notice of acceptance of this guarantee by the Director or by (owner or operator). Guarantor also expressly waives notice of amendments or modifications of the closure and/or post-closure plan and of amendments or modifications of the facility permit(s).

I hereby certify that the wording of this guarantee is identical to the wording specified in Subsection R315-264-151(h) as such regulations were constituted on the date first above written.

Effective date:

(Name of guarantor)

(Authorized signature for guarantor)

(Name of person signing)

(Title of person signing)

Signature of witness or notary:

(2) A guarantee, as specified in Subsection R315-264-147(g) or 40 CFR 265.147(g), which is adopted by reference, shall be worded as follows, except that instructions in parentheses, (), are to be replaced with the relevant information and the parentheses deleted:

Guarantee for Liability Coverage

Guarantee made this (date) by (name of guaranteeing entity), a business corporation organized under the laws of (if incorporated within the United States insert "the State of ____" and insert name of State; if incorporated outside the United States insert the name of the country in which incorporated, the principal place of business within the United States, and the name and address of the registered agent in the State of the principal place of business), herein referred to as guarantor. This guarantee is made on behalf of (owner or operator) of (business address), which is one of the following: "our subsidiary;" "a subsidiary of (name and address of common parent corporation), of which guarantor is a subsidiary;" or "an entity with which guarantor has a substantial business relationship, as defined in (either Subsection R315-264-141(h) or 40 CFR 265.141(h), which is adopted by reference,)", to any and all third parties who have sustained or may sustain bodily injury or property damage caused by (sudden and/or nonsudden) accidental occurrences arising from operation of the facility(ies) covered by this guarantee.

Recitals

1. Guarantor meets or exceeds the financial test criteria and agrees to comply with the reporting requirements for guarantors as specified in Subsection R315-264-147(g) and 40 CFR 265.147(g), which is adopted by reference.

2. (Owner or operator) owns or operates the following hazardous waste management facility(ies) covered by this guarantee: (List for each facility: EPA identification number, name, and address; and if guarantor is incorporated outside the United States list the name and address of the guarantor's registered agent in each State.) This corporate guarantee satisfies the third-party liability requirements for (insert "sudden" or "nonsudden" or "both sudden and nonsudden") accidental occurrences in above-named owner or operator facilities for coverage in the amount of (insert dollar amount) for each occurrence and (insert dollar amount) annual aggregate.

3. For value received from (owner or operator), guarantor guarantees to any and all third parties who have sustained or may sustain bodily injury or property damage caused by (sudden and/or nonsudden) accidental occurrences arising from operations of the facility(ies) covered by this guarantee that in the event that (owner or operator) fails to satisfy a judgment or award based on a determination of liability for bodily injury or property damage to third parties caused by (sudden and/or nonsudden) accidental occurrences, arising from the operation of the above-named facilities, or fails to pay an amount agreed to in settlement of a claim arising from or alleged to arise from such injury or damage, the guarantor shall satisfy such judgment(s), award(s) or settlement agreement(s) up to the limits of coverage identified above.

4. Such obligation does not apply to any of the following:

(a) Bodily injury or property damage for which (insert owner or operator) is obligated to pay damages by reason of the assumption of liability in a contract or agreement. This exclusion does not apply to liability for damages that (insert owner or operator) would be obligated to pay in the absence of the contract or agreement.

(b) Any obligation of (insert owner or operator) under a workers' compensation, disability benefits, or unemployment compensation law or any similar law.

(c) Bodily injury to:

(1) An employee of (insert owner or operator) arising from, and in the course of, employment by (insert owner or operator); or

(2) The spouse, child, parent, brother, or sister of that employee as a consequence of, or arising from, and in the course of employment by (insert owner or operator). This exclusion applies:

(A) Whether (insert owner or operator) may be liable as an employer or in any other capacity; and

(B) To any obligation to share damages with or repay another person who shall pay damages because of the injury to persons identified in paragraphs (1) and (2).

(d) Bodily injury or property damage arising out of the ownership, maintenance, use, or entrustment to others of any aircraft, motor vehicle or watercraft.

(e) Property damage to:

(1) Any property owned, rented, or occupied by (insert owner or operator);

(2) Premises that are sold, given away or abandoned by (insert owner or operator) if the property damage arises out of any part of those premises;

(3) Property loaned to (insert owner or operator);

(4) Personal property in the care, custody or control of (insert owner or operator);

(5) That particular part of real property on which (insert owner or operator) or any contractors or subcontractors working directly or indirectly on behalf of (insert owner or operator) are performing operations, if the property damage arises out of these operations.

5. Guarantor agrees that if, at the end of any fiscal year before termination of this guarantee, the guarantor fails to meet the financial test criteria, guarantor shall send within 90 days, by certified mail, notice to the Director and to (owner or operator) and to the appropriate Regional Administrator that he intends to provide alternate liability coverage as specified in Section R315-264-147 and 40 CFR 265.147, which is adopted by reference, as applicable, in the name of (owner or operator). Within 120 days after the end of such fiscal year, the guarantor shall establish such liability coverage unless (owner or operator) has done so.

6. The guarantor agrees to notify the Director and the appropriate Regional Administrator by certified mail of a voluntary or involuntary proceeding under title 11, Bankruptcy, U.S. Code, naming guarantor as debtor, within 10 days after

commencement of the proceeding.

7. Guarantor agrees that within 30 days after being notified by the Director of a determination that guarantor no longer meets the financial test criteria or that he is disallowed from continuing as a guarantor, he shall establish alternate liability coverage as specified in Section R315-264-147 or 40 CFR 265.147, which is adopted by reference, in the name of (owner or operator), unless (owner or operator) has done so.

8. Guarantor reserves the right to modify this agreement to take into account amendment or modification of the liability requirements set by Section R315-264-147 and 40 CFR 265.147, which is adopted by reference, provided that such modification shall become effective only if the Director does not disapprove the modification within 30 days of receipt of notification of the modification.

9. Guarantor agrees to remain bound under this guarantee for so long as (owner or operator) shall comply with the applicable requirements of Sections R315-264-147 and 40 CFR 265.147, which is adopted by reference, for the above-listed facility(ies), except as provided in paragraph 10 of this agreement.

10. (Insert the following language if the guarantor is (a) a direct or higher-tier corporate parent, or (b) a firm whose parent corporation is also the parent corporation of the owner or operator):

Guarantor may terminate this guarantee by sending notice by certified mail to the Director and to (owner or operator) and to the appropriate Regional Administrator, provided that this guarantee may not be terminated unless and until (the owner or operator) obtains, and the Director approves, alternate liability coverage complying with Sections R315-264-147 and/or 40 CFR 265.147, which is adopted by reference.

(Insert the following language if the guarantor is a firm qualifying as a guarantor due to its "substantial business relationship" with the owner or operator):

Guarantor may terminate this guarantee 120 days following receipt of notification, through certified mail, by the Director and by (the owner or operator).

11. Guarantor hereby expressly waives notice of acceptance of this guarantee by any party.

12. Guarantor agrees that this guarantee is in addition to and does not affect any other responsibility or liability of the guarantor with respect to the covered facilities.

13. The Guarantor shall satisfy a third-party liability claim only on receipt of one of the following documents:

(a) Certification from the Principal and the third-party claimant(s) that the liability claim should be paid. The certification shall be worded as follows, except that instructions in parentheses, (), are to be replaced with the relevant information and the parentheses deleted:

Certification of Valid Claim

The undersigned, as parties (insert Principal) and (insert name and address of third-party claimant(s)), hereby certify that the claim of bodily injury and/or property damage caused by a (sudden or nonsudden) accidental occurrence arising from operating (Principal's) hazardous waste treatment, storage, or disposal facility should be paid in the amount of $.

(Signatures)

Principal

(Notary) Date

(Signatures)

Claimant(s)

(Notary) Date

(b) A valid final court order establishing a judgment against the Principal for bodily injury or property damage caused by sudden or nonsudden accidental occurrences arising from the operation of the Principal's facility or group of facilities.

14. In the event of combination of this guarantee with another mechanism to meet liability requirements, this guarantee shall be considered (insert "primary" or "excess") coverage.

I hereby certify that the wording of the guarantee is identical to the wording specified in Subsection R315-264-151(h)(2) as such regulations were constituted on the date shown immediately below.

Effective date:

(Name of guarantor)

(Authorized signature for guarantor)

(Name of person signing)

(Title of person signing)

Signature of witness or notary:

(i) A hazardous waste facility liability endorsement as required in Section R315-264-147 or 40 CFR 265.147, which is adopted by reference, shall be worded as follows, except that instructions in parentheses, (), are to be replaced with the relevant information and the parentheses deleted:

Hazardous Waste Facility Liability Endorsement

1. This endorsement certifies that the policy to which the endorsement is attached provides liability insurance covering bodily injury and property damage in connection with the insured's obligation to demonstrate financial responsibility under Sections R315-264-147 or 40 CFR 265.147, which is adopted by reference. The coverage applies at (list EPA Identification Number, name, and address for each facility) for (insert "sudden accidental occurrences," "nonsudden accidental occurrences," or "sudden and nonsudden accidental occurrences"; if coverage is for multiple facilities and the coverage is different for different facilities, indicate which facilities are insured for sudden accidental occurrences, which are insured for nonsudden accidental occurrences, and which are insured for both). The limits of liability are (insert the dollar amount of the "each occurrence" and "annual aggregate" limits of the Insurer's liability), exclusive of legal defense costs.

2. The insurance afforded with respect to such occurrences is subject to all of the terms and conditions of the policy; provided, however, that any provisions of the policy inconsistent with subsections (a) through (e) of this Paragraph 2 are hereby amended to conform with subsections (a) through (e):

(a) Bankruptcy or insolvency of the insured shall not relieve the Insurer of its obligations under the policy to which this endorsement is attached.

(b) The Insurer is liable for the payment of amounts within any deductible applicable to the policy, with a right of reimbursement by the insured for any such payment made by the Insurer. This provision does not apply with respect to that amount of any deductible for which coverage is demonstrated as specified in Subsections R315-264-147(f) or 40 CFR 265.147(f), which is adopted by reference.

(c) Whenever requested by the Director of the Utah Division of Waste Management and Radiation Control (Director), the Insurer agrees to furnish to the Director a signed duplicate original of the policy and all endorsements.

(d) Cancellation of this endorsement, whether by the Insurer, the insured, a parent corporation providing insurance coverage for its subsidiary, or by a firm having an insurable interest in and obtaining liability insurance on behalf of the owner or operator of the hazardous waste management facility, shall be effective only upon written notice and only after the expiration of 60 days after a copy of such written notice is received by the Director and by the appropriate Regional Administrator.

(e) Any other termination of this endorsement shall be effective only upon written notice and only after the expiration of thirty (30) days after a copy of such written notice is received by the Director.

Attached to and forming part of policy No. ___ issued by (name of Insurer), herein called the Insurer, of (address of

Insurer) to (name of insured) of (address) this _____ day of _____, 19__. The effective date of said policy is _____ day of _____, 19__.

I hereby certify that the wording of this endorsement is identical to the wording specified in Subsection R315-264-151(i) as such regulation was constituted on the date first above written, and that the Insurer is licensed to transact the business of insurance, or eligible to provide insurance as an excess or surplus lines insurer, in one or more States.

(Signature of Authorized Representative of Insurer)

(Type name)

(Title), Authorized Representative of (name of Insurer)

(Address of Representative)

(j) A certificate of liability insurance as required in Section R315-264-147 or 40 CFR 265.147, which is adopted by reference, shall be worded as follows, except that the instructions in parentheses, (), are to be replaced with the relevant information and the parentheses deleted:

Hazardous Waste Facility Certificate of Liability Insurance

1. (Name of Insurer), (the "Insurer"), of (address of Insurer) hereby certifies that it has issued liability insurance covering bodily injury and property damage to (name of insured), (the "insured"), of (address of insured) in connection with the insured's obligation to demonstrate financial responsibility under Sections R315-264-147 or 40 CFR 265.147, which is adopted by reference. The coverage applies at (list EPA Identification Number, name, and address for each facility) for (insert "sudden accidental occurrences," "nonsudden accidental occurrences," or "sudden and nonsudden accidental occurrences"; if coverage is for multiple facilities and the coverage is different for different facilities, indicate which facilities are insured for sudden accidental occurrences, which are insured for nonsudden accidental occurrences, and which are insured for both). The limits of liability are (insert the dollar amount of the "each occurrence" and "annual aggregate" limits of the Insurer's liability), exclusive of legal defense costs. The coverage is provided under policy number ___, issued on (date). The effective date of said policy is (date).

2. The Insurer further certifies the following with respect to the insurance described in Paragraph 1:

(a) Bankruptcy or insolvency of the insured shall not relieve the Insurer of its obligations under the policy.

(b) The Insurer is liable for the payment of amounts within any deductible applicable to the policy, with a right of reimbursement by the insured for any such payment made by the Insurer. This provision does not apply with respect to that amount of any deductible for which coverage is demonstrated as specified in Subsection R315-264-147(f) or 40 CFR 265.147(f), which is adopted by reference.

(c) Whenever requested by the Director of the Utah Division of Waste Management and Radiation Control, the Insurer agrees to furnish to the Director a signed duplicate original of the policy and all endorsements.

(d) Cancellation of the insurance, whether by the insurer, the insured, a parent corporation providing insurance coverage for its subsidiary, or by a firm having an insurable interest in and obtaining liability insurance on behalf of the owner or operator of the hazardous waste management facility, shall be effective only upon written notice and only after the expiration of 60 days after a copy of such written notice is received by the Director and by the appropriate Regional Administrator.

(e) Any other termination of the insurance shall be effective only upon written notice and only after the expiration of thirty (30) days after a copy of such written notice is received by the Director.

I hereby certify that the wording of this instrument is identical to the wording specified in Subsection R315-264-151(j) as such regulation was constituted on the date first above written, and that the Insurer is licensed to transact the business of insurance, or eligible to provide insurance as an excess or surplus lines insurer, in one or more States.

(Signature of authorized representative of Insurer)

(Type name)

(Title), Authorized Representative of (name of Insurer)

(Address of Representative)

(k) A letter of credit, as specified in Subsection R315-264-147(h) or 40 CFR 265.147(h), which is adopted by reference, shall be worded as follows, except that instructions in parentheses, (), are to be replaced with the relevant information and the parentheses deleted:

Irrevocable Standby Letter of Credit

Director, Utah Division of Waste Management and Radiation Control

195 North 1950 West

P.O. Box 144880

Salt Lake City, UT 84114-4880

Dear Sir or Madam: We hereby establish our Irrevocable Standby Letter of Credit No. _____ in the favor of ("any and all third-party liability claimants" or insert name of trustee of the standby trust fund), at the request and for the account of (owner or operator's name and address) for third-party liability awards or settlements up to (in words) U.S. dollars $_____ per occurrence and the annual aggregate amount of (in words) U.S. dollars $_____, for sudden accidental occurrences and/or for third-party liability awards or settlements up to the amount of (in words) U.S. dollars $_____ per occurrence, and the annual aggregate amount of (in words) U.S. dollars $_____, for nonsudden accidental occurrences available upon presentation of a sight draft bearing reference to this letter of credit No. _____, and (insert the following language if the letter of credit is being used without a standby trust fund: (1) a signed certificate reading as follows:

Certificate of Valid Claim

The undersigned, as parties (insert principal) and (insert name and address of third party claimant(s)), hereby certify that the claim of bodily injury and/or property damage caused by a (sudden or nonsudden) accidental occurrence arising from operations of (principal's) hazardous waste treatment, storage, or disposal facility should be paid in the amount of $( ). We hereby certify that the claim does not apply to any of the following:

(a) Bodily injury or property damage for which (insert principal) is obligated to pay damages by reason of the assumption of liability in a contract or agreement. This exclusion does not apply to liability for damages that (insert principal) would be obligated to pay in the absence of the contract or agreement.

(b) Any obligation of (insert principal) under a workers' compensation, disability benefits, or unemployment compensation law or any similar law.

(c) Bodily injury to:

(1) An employee of (insert principal) arising from, and in the course of, employment by (insert principal); or

(2) The spouse, child, parent, brother or sister of that employee as a consequence of, or arising from, and in the course of employment by (insert principal).

This exclusion applies:

(A) Whether (insert principal) may be liable as an employer or in any other capacity; and

(B) To any obligation to share damages with or repay another person who shall pay damages because of the injury to persons identified in paragraphs (1) and (2).

(d) Bodily injury or property damage arising out of the ownership, maintenance, use, or entrustment to others of any aircraft, motor vehicle or watercraft.

(e) Property damage to:

(1) Any property owned, rented, or occupied by (insert principal);

(2) Premises that are sold, given away or abandoned by (insert principal) if the property damage arises out of any part of those premises;

(3) Property loaned to (insert principal);

(4) Personal property in the care, custody or control of (insert principal);

(5) That particular part of real property on which (insert principal) or any contractors or subcontractors working directly or indirectly on behalf of (insert principal) are performing operations, if the property damage arises out of these operations.

(Signatures)

Grantor

(Signatures)

Claimant(s) or

(2) a valid final court order establishing a judgment against the Grantor for bodily injury or property damage caused by sudden or nonsudden accidental occurrences arising from the operation of the Grantor's facility or group of facilities.)

This letter of credit is effective as of (date) and shall expire on (date at least one year later), but such expiration date shall be automatically extended for a period of (at least one year) on (date and on each successive expiration date, unless, at least 120 days before the current expiration date, we notify you, the Director of the Utah Division of Waste Management and Radiation Control, and (owner's or operator's name) and the appropriate Regional Administrator by certified mail that we have decided not to extend this letter of credit beyond the current expiration date.

Whenever this letter of credit is drawn on under and in compliance with the terms of this credit, we shall duly honor such draft upon presentation to us.

(Insert the following language if a standby trust fund is not being used: "In the event that this letter of credit is used in combination with another mechanism for liability coverage, this letter of credit shall be considered (insert "primary" or "excess" coverage)."

We certify that the wording of this letter of credit is identical to the wording specified in Subsection R315-264-151(k) as such regulations were constituted on the date shown immediately below. (Signature(s) and title(s) of official(s) of issuing institution) (Date).

This credit is subject to (insert "the most recent edition of the Uniform Customs and Practice for Documentary Credits, published and copyrighted by the International Chamber of Commerce," or "the Uniform Commercial Code").

(l) A surety bond, as specified in Subsection R315-264-147(i) or 40 CFR 265.147(i), which is adopted by reference, shall be worded as follows: except that instructions in parentheses, (), are to be replaced with the relevant information and the parentheses deleted:

Payment Bond

Surety Bond No. (Insert number)

Parties (Insert name and address of owner or operator), Principal, incorporated in (Insert State of incorporation) of (Insert city and State of principal place of business) and (Insert name and address of surety company(ies)), Surety Company(ies), of (Insert surety(ies) place of business).

EPA Identification Number, name, and address for each facility guaranteed by this bond: ____

Table

	Sudden accidental occurrences	Nonsudden accidental occurrences
Penal Sum Per Occurrence	(insert amount)	(insert amount)
Annual Aggregate	(insert amount)	(insert amount)

Purpose: This is an agreement between the Surety(ies) and the Principal under which the Surety(ies), its(their) successors and assignees, agree to be responsible for the payment of claims against the Principal for bodily injury and/or property damage to third parties caused by ("sudden" and/or "nonsudden") accidental occurrences arising from operations of the facility or group of facilities in the sums prescribed herein; subject to the governing provisions and the following conditions.

Governing Provisions:

(1) Section 3004 of the Resource Conservation and Recovery Act of 1976, as amended.

(2) Rules adopted by the Utah Waste Management and Radiation Control Board under the Utah Solid and Hazardous Waste Act, particularly ("Subsection R315-264-147" or "40 CFR 265.147, which is adopted by reference,") (if applicable).

Conditions:

(1) The Principal is subject to the applicable governing provisions that require the Principal to have and maintain liability coverage for bodily injury and property damage to third parties caused by ("sudden" and/or "nonsudden") accidental occurrences arising from operations of the facility or group of facilities. Such obligation does not apply to any of the following:

(a) Bodily injury or property damage for which (insert principal) is obligated to pay damages by reason of the assumption of liability in a contract or agreement. This exclusion does not apply to liability for damages that (insert principal) would be obligated to pay in the absence of the contract or agreement.

(b) Any obligation of (insert principal) under a workers' compensation, disability benefits, or unemployment compensation law or similar law.

(c) Bodily injury to:

(1) An employee of (insert principal) arising from, and in the course of, employment by (insert principal); or

(2) The spouse, child, parent, brother or sister of that employee as a consequence of, or arising from, and in the course of employment by (insert principal). This exclusion applies:

(A) Whether (insert principal) may be liable as an employer or in any other capacity; and

(B) To any obligation to share damages with or repay another person who shall pay damages because of the injury to persons identified in paragraphs (1) and (2).

(d) Bodily injury or property damage arising out of the ownership, maintenance, use, or entrustment to others of any aircraft, motor vehicle or watercraft.

(e) Property damage to:

(1) Any property owned, rented, or occupied by (insert principal);

(2) Premises that are sold, given away or abandoned by (insert principal) if the property damage arises out of any part of those premises;

(3) Property loaned to (insert principal);

(4) Personal property in the care, custody or control of (insert principal);

(5) That particular part of real property on which (insert principal) or any contractors or subcontractors working directly or indirectly on behalf of (insert principal) are performing operations, if the property damage arises out of these operations.

(2) This bond assures that the Principal shall satisfy valid third party liability claims, as described in condition 1.

(3) If the Principal fails to satisfy a valid third party liability claim, as described above, the Surety(ies) becomes liable on this bond obligation.

(4) The Surety(ies) shall satisfy a third party liability claim only upon the receipt of one of the following documents:

(a) Certification from the Principal and the third party claimant(s) that the liability claim should be paid. The certification shall be worded as follows, except that instructions in parentheses, (), are to be replaced with the relevant information and the parentheses deleted:

Certification of Valid Claim

The undersigned, as parties (insert name of Principal) and (insert name and address of third party claimant(s)), hereby certify that the claim of bodily injury and/or property damage caused by a (sudden or nonsudden) accidental occurrence arising from operating (Principal's) hazardous waste treatment, storage, or disposal facility should be paid in the amount of $( ).

(Signature)
Principal
(Notary) Date
(Signature(s))
Claimant(s)
(Notary) Date

or (b) A valid final court order establishing a judgment against the Principal for bodily injury or property damage caused by sudden or nonsudden accidental occurrences arising from the operation of the Principal's facility or group of facilities.

(5) In the event of combination of this bond with another mechanism for liability coverage, this bond shall be considered (insert "primary" or "excess") coverage.

(6) The liability of the Surety(ies) shall not be discharged by any payment or succession of payments hereunder, unless and until such payment or payments shall amount in the aggregate to the penal sum of the bond. In no event shall the obligation of the Surety(ies) hereunder exceed the amount of said annual aggregate penal sum, provided that the Surety(ies) furnish(es) notice to the Director forthwith of all claims filed and payments made by the Surety(ies) under this bond.

(7) The Surety(ies) may cancel the bond by sending notice of cancellation by certified mail to the Principal and the Director and the appropriate Regional Administrator, provided, however, that cancellation shall not occur during the 120 days beginning on the date of receipt of the notice of cancellation by the Principal and the Director, as evidenced by the return receipt.

(8) The Principal may terminate this bond by sending written notice to the Surety(ies) and to the Director.

(9) The Surety(ies) hereby waive(s) notification of amendments to applicable laws, statutes, rules and regulations and agree(s) that no such amendment shall in any way alleviate its (their) obligation on this bond.

(10) This bond is effective from (insert date) (12:01 a.m., standard time, at the address of the Principal as stated herein) and shall continue in force until terminated as described above.

In Witness Whereof, the Principal and Surety(ies) have executed this Bond and have affixed their seals on the date set forth above.

The persons whose signatures appear below hereby certify that they are authorized to execute this surety bond on behalf of the Principal and Surety(ies) and that the wording of this surety bond is identical to the wording specified in Subsection R315-264-151(1), as such regulations were constituted on the date this bond was executed.

PRINCIPAL
(Signature(s))
(Name(s))
(Title(s))
(Corporate Seal)
CORPORATE SURETY(IES)
(Name and address)
State of incorporation:
Liability Limit: $
(Signature(s))
(Name(s) and title(s))
(Corporate seal)

(For every co-surety, provide signature(s), corporate seal, and other information in the same manner as for Surety above.)

Bond premium: $

(m)(1) A trust agreement, as specified in Subsection R315-264-147(j) or 40 CFR 265.147(j), which is adopted by reference, shall be worded as follows, except that instructions in parentheses, (), are to be replaced with the relevant information and the parentheses deleted:

Trust Agreement

Trust Agreement, the "Agreement," entered into as of (date) by and between (name of the owner or operator) a (name of State) (insert "corporation," "partnership," "association," or "proprietorship"), the "Grantor," and (name of corporate trustee), (insert, "incorporated in the State of ____" or "a national bank"), the "trustee."

Whereas, the Utah Waste Management and Radiation Control Board, has established certain regulations applicable to the Grantor, requiring that an owner or operator of a hazardous waste management facility or group of facilities shall demonstrate financial responsibility for bodily injury and property damage to third parties caused by sudden accidental and/or nonsudden accidental occurrences arising from operations of the facility or group of facilities.

Whereas, the Grantor has elected to establish a trust to assure all or part of such financial responsibility for the facilities identified herein.

Whereas, the Grantor, acting through its duly authorized officers, has selected the Trustee to be the trustee under this agreement, and the Trustee is willing to act as trustee.

Now, therefore, the Grantor and the Trustee agree as follows:

Section 1. Definitions. As used in this Agreement:

(a) The term "Board", "Waste Management and Radiation Control Board" created pursuant to Utah Code Annotated 19-1-106.

(b) The term "Director" means the Director,of the Division of Waste Management and Radiation Control his successors, designees, and any subsequent entity of the State of Utah upon whom the duties of regulation and enforcement of regulations governing hazardous waste.

(c) The term "Grantor" means the owner or operator who enters into this Agreement and any successors or assigns of the Grantor.

(d) The term "Trustee" means the Trustee who enters into this Agreement and any successor Trustee.

Section 2. Identification of Facilities. This agreement pertains to the facilities identified on attached schedule A (on schedule A, for each facility list the EPA Identification Number, name, and address of the facility(ies) and the amount of liability coverage, or portions thereof, if more than one instrument affords combined coverage as demonstrated by this Agreement).

Section 3. Establishment of Fund. The Grantor and the Trustee hereby establish a trust fund, hereinafter the "Fund," for the benefit of any and all third parties injured or damaged by (sudden and/or nonsudden) accidental occurrences arising from operation of the facility(ies) covered by this guarantee, in the amounts of _____ (up to $1 million) per occurrence and _____ (up to $2 million) annual aggregate for sudden accidental occurrences and _____ (up to $3 million) per occurrence and _____ (up to $6 million) annual aggregate for nonsudden occurrences, except that the Fund is not established for the benefit of third parties for the following:

(a) Bodily injury or property damage for which (insert Grantor) is obligated to pay damages by reason of the assumption of liability in a contract or agreement. This exclusion does not apply to liability for damages that (insert Grantor) would be obligated to pay in the absence of the contract or agreement.

(b) Any obligation of (insert Grantor) under a workers' compensation, disability benefits, or unemployment compensation law or any similar law.

(c) Bodily injury to:

(1) An employee of (insert Grantor) arising from, and in the course of, employment by (insert Grantor); or

(2) The spouse, child, parent, brother or sister of that employee as a consequence of, or arising from, and in the course of employment by (insert Grantor).

This exclusion applies:

(A) Whether (insert Grantor) may be liable as an employer or in any other capacity; and

(B) To any obligation to share damages with or repay another person who shall pay damages because of the injury to persons identified in paragraphs (1) and (2).

(d) Bodily injury or property damage arising out of the ownership, maintenance, use, or entrustment to others of any aircraft, motor vehicle or watercraft.

(e) Property damage to:

(1) Any property owned, rented, or occupied by (insert Grantor);

(2) Premises that are sold, given away or abandoned by (insert Grantor) if the property damage arises out of any part of those premises;

(3) Property loaned to (insert Grantor);

(4) Personal property in the care, custody or control of (insert Grantor);

(5) That particular part of real property on which (insert Grantor) or any contractors or subcontractors working directly or indirectly on behalf of (insert Grantor) are performing operations, if the property damage arises out of these operations.

In the event of combination with another mechanism for liability coverage, the fund shall be considered (insert "primary" or "excess") coverage.

The Fund is established initially as consisting of the property, which is acceptable to the Trustee, described in Schedule B attached hereto. Such property and any other property subsequently transferred to the Trustee is referred to as the Fund, together with all earnings and profits thereon, less any payments or distributions made by the Trustee pursuant to this Agreement. The Fund shall be held by the Trustee, IN TRUST, as hereinafter provided. The Trustee shall not be responsible nor shall it undertake any responsibility for the amount or adequacy of, nor any duty to collect from the Grantor, any payments necessary to discharge any liabilities of the Grantor established by Director.

Section 4. Payment for Bodily Injury or Property Damage. The Trustee shall satisfy a third party liability claim by making payments from the Fund only upon receipt of one of the following documents;

(a) Certification from the Grantor and the third party claimant(s) that the liability claim should be paid. The certification shall be worded as follows, except that instructions in parentheses, (), are to be replaced with the relevant information and the parentheses deleted:

Certification of Valid Claim

The undersigned, as parties (insert Grantor) and (insert name and address of third party claimant(s)), hereby certify that the claim of bodily injury and/or property damage caused by a (sudden or nonsudden) accidental occurrence arising from operating (Grantor's) hazardous waste treatment, storage, or disposal facility should be paid in the amount of $( ).

(Signatures)

Grantor

(Signatures)

Claimant(s)

(b) A valid final court order establishing a judgment against the Grantor for bodily injury or property damage caused by sudden or nonsudden accidental occurrences arising from the operation of the Grantor's facility or group of facilities.

Section 5. Payments Comprising the Fund. Payments made to the Trustee for the Fund shall consist of cash or securities acceptable to the Trustee.

Section 6. Trustee Management. The Trustee shall invest and reinvest the principal and income, in accordance with general investment policies and guidelines which the Grantor may communicate in writing to the Trustee from time to time, subject, however, to the provisions Section R315-264-151. In investing, reinvesting, exchanging, selling, and managing the Fund, the Trustee shall discharge his duties with respect to the trust fund solely in the interest of the beneficiary and with the care, skill, prudence, and diligence under the circumstance then prevailing which persons of prudence, acting in a like capacity and familiar with such matters, would use in the conduct of an enterprise of a like character and with like aims; except that:

(i) Securities or other obligations of the Grantor, or any other owner or operator of the facilities, or any of their affiliates as defined in the Investment Company Act of 1940, as amended, 15 U.S.C. 80a-2.(a), shall not be acquired or held unless they are securities or other obligations of the Federal or a State government;

(ii) The Trustee is authorized to invest the Fund in time or demand deposits of the Trustee, to the extent insured by an agency of the Federal or State government; and

(iii) The Trustee is authorized to hold cash awaiting investment or distribution uninvested for a reasonable time and without liability for the payment of interest thereon.

Section 7. Commingling and Investment. The Trustee is expressly authorized in its discretion:

(a) To transfer from time to time any or all of the assets of the Fund to any common commingled, or collective trust fund created by the Trustee in which the fund is eligible to participate, subject to all of the provisions thereof, to be commingled with the assets of other trusts participating therein; and

(b) To purchase shares in any investment company registered under the Investment Company Act of 1940, 15 U.S.C. 81a-1 et seq., including one which may be created, managed, underwritten, or to which investment advice is rendered or the shares of which are sold by the Trustee. The Trustee may vote such shares in its discretion.

Section 8. Express Powers of Trustee. Without in any way limiting the powers and discretions conferred upon the Trustee by the other provisions of this Agreement or by law, the Trustee is expressly authorized and empowered:

(a) To sell, exchange, convey, transfer, or otherwise dispose of any property held by it, by public or private sale. No person dealing with the Trustee shall be bound to see to the application of the purchase money or to inquire into the validity or expediency of any such sale or other disposition;

(b) To make, execute, acknowledge, and deliver any and all documents of transfer and conveyance and any and all other instruments that may be necessary or appropriate to carry out the powers herein granted;

(c) To register any securities held in the Fund in its own name or in the name of a nominee and to hold any security in bearer form or in book entry, or to combine certificates representing such securities with certificates of the same issue held by the Trustee in other fiduciary capacities, or to deposit or arrange for the deposit of such securities in a qualified central depository even though, when so deposited, such securities may be merged and held in bulk in the name of the nominee of such depository with other securities deposited therein by another person, or to deposit or arrange for the deposit of any securities issued by the United States Government, or any agency or instrumentality thereof, with a Federal Reserve bank, but the books and records of the Trustee shall at all times show that all such securities are part of the Fund;

(d) To deposit any cash in the Fund in interest-bearing accounts maintained or savings certificates issued by the Trustee, in its separate corporate capacity, or in any other banking institution affiliated with the Trustee, to the extent

insured by an agency of the Federal or State government; and

(e) To compromise or otherwise adjust all claims in favor of or against the Fund.

Section 9. Taxes and Expenses. All taxes of any kind that may be assessed or levied against or in respect of the Fund and all brokerage commissions incurred by the Fund shall be paid from the Fund. All other expenses incurred by the Trustee in connection with the administration of this Trust, including fees for legal services rendered to the Trustee, the compensation of the Trustee to the extent not paid directly by the Grantor, and all other proper charges and disbursements of the Trustee shall be paid from the Fund.

Section 10. Annual Valuations. The Trustee shall annually, at least 30 days prior to the anniversary date of establishment of the Fund, furnish to the Grantor and to the Director a statement confirming the value of the Trust. Any securities in the Fund shall be valued at market value as of no more than 60 days prior to the anniversary date of establishment of the Fund. The failure of the Grantor to object in writing to the Trustee within 90 days after the statement has been furnished to the Grantor and the Director shall constitute a conclusively binding assent by the Grantor barring the Grantor from asserting any claim or liability against the Trustee with respect to matters disclosed in the statement.

Section 11. Advice of Counsel. The Trustee may from time to time consult with counsel, who may be counsel to the Grantor with respect to any question arising as to the construction of this Agreement or any action to be taken hereunder. The Trustee shall be fully protected, to the extent permitted by law, in acting upon the advice of counsel.

Section 12. Trustee Compensation. The Trustee shall be entitled to reasonable compensation for its services as agreed upon in writing from time to time with the Grantor.

Section 13. Successor Trustee. The Trustee may resign or the Grantor may replace the Trustee, but such resignation or replacement shall not be effective until the Grantor has appointed a successor trustee and this successor accepts the appointment. The successor trustee shall have the same powers and duties as those conferred upon the Trustee hereunder. Upon the successor trustee's acceptance of the appointment, the Trustee shall assign, transfer, and pay over to the successor trustee the funds and properties then constituting the Fund. If for any reason the Grantor cannot or does not act in the event of the resignation of the Trustee, the Trustee may apply to a court of competent jurisdiction for the appointment of a successor trustee or for instructions. The successor trustee shall specify the date on which it assumes administration of the trust in a writing sent to the Grantor, the Director, and the present Trustee by certified mail 10 days before such change becomes effective. Any expenses incurred by the Trustee as a result of any of the acts contemplated by this section shall be paid as provided in Section 9.

Section 14. Instructions to the Trustee. All orders, requests, and instructions by the Grantor to the Trustee shall be in writing, signed by such persons as are designated in the attached Exhibit A or such other designees as the Grantor may designate by amendments to Exhibit A. The Trustee shall be fully protected in acting without inquiry in accordance with the Grantor's orders, requests, and instructions. All orders, requests, and instructions by the Director to the Trustee shall be in writing, signed by the Director and the Trustee shall act and shall be fully protected in acting in accordance with such orders, requests, and instructions. The Trustee shall have the right to assume, in the absence of written notice to the contrary, that no event constituting a change or a termination of the authority of any person to act on behalf of the Grantor or the Director hereunder has occurred. The Trustee shall have no duty to act in the absence of such orders, requests, and instructions from the Grantor and/or the Director, except as provided for herein.

Section 15. Notice of Nonpayment. If a payment for bodily injury or property damage is made under Section 4 of this trust, the Trustee shall notify the Grantor of such payment and the amount(s) thereof within five (5) working days. The Grantor shall, on or before the anniversary date of the establishment of the Fund following such notice, either make payments to the Trustee in amounts sufficient to cause the trust to return to its value immediately prior to the payment of claims under Section 4, or shall provide written proof to the Trustee that other financial assurance for liability coverage has been obtained equalling the amount necessary to return the trust to its value prior to the payment of claims. If the Grantor does not either make payments to the Trustee or provide the Trustee with such proof, the Trustee shall within 10 working days after the anniversary date of the establishment of the Fund provide a written notice of nonpayment to the Director and to the appropriate Regional Administrator.

Section 16. Amendment of Agreement. This Agreement may be amended by an instrument in writing executed by the Grantor, the Trustee, and the Director, or by the Trustee and the Director if the Grantor ceases to exist.

Section 17. Irrevocability and Termination. Subject to the right of the parties to amend this Agreement as provided in Section 16, this Trust shall be irrevocable and shall continue until terminated at the written agreement of the Grantor, the Trustee, and the Director, or by the Trustee and the Director, if the Grantor ceases to exist. Upon termination of the Trust, all remaining trust property, less final trust administration expenses, shall be delivered to the Grantor.

The Director shall agree to termination of the Trust when the owner or operator substitutes alternate financial assurance as specified in this section.

Section 18. Immunity and Indemnification. The Trustee shall not incur personal liability of any nature in connection with any act or omission, made in good faith, in the administration of this Trust, or in carrying out any directions by the Grantor or the Director issued in accordance with this Agreement. The Trustee shall be indemnified and saved harmless by the Grantor or from the Trust Fund, or both, from and against any personal liability to which the Trustee may be subjected by reason of any act or conduct in its official capacity, including all expenses reasonably incurred in its defense in the event the Grantor fails to provide such defense.

Section 19. Choice of Law. This Agreement shall be administered, construed, and enforced according to the laws of the State of Utah.

Section 20. Interpretation. As used in this Agreement, words in the singular include the plural and words in the plural include the singular. The descriptive headings for each section of this Agreement shall not affect the interpretation or the legal efficacy of this Agreement.

In Witness Whereof the parties have caused this Agreement to be executed by their respective officers duly authorized and their corporate seals to be hereunto affixed and attested as of the date first above written. The parties below certify that the wording of this Agreement is identical to the wording specified in Subsection R315-264-151(m) as such regulations were constituted on the date first above written.

(Signature of Grantor)
(Title)
Attest:
(Title)
(Seal)
(Signature of Trustee)
Attest:
(Title)
(Seal)

(2) The following is an example of the certification of acknowledgement which shall accompany the trust agreement

for a trust fund as specified in Subsection R315-264-147(j) or 40 CFR 265.147(j), which is adopted by reference.

State of

County of

On this (date), before me personally came (owner or operator) to me known, who, being by me duly sworn, did depose and say that she/he resides at (address), that she/he is (title) of (corporation), the corporation described in and which executed the above instrument; that she/he knows the seal of said corporation; that the seal affixed to such instrument is such corporate seal; that it was so affixed by order of the Board of Directors of said corporation, and that she/he signed her/his name thereto by like order.

(Signature of Notary Public)

(n)(1) A standby trust agreement, as specified in Subsection R315-264-147(h) or 40 CFR 265.147(h), which is adopted by reference, shall be worded as follows, except that instructions in parentheses, (), are to be replaced with the relevant information and the parentheses deleted:

Standby Trust Agreement

Trust Agreement, the "Agreement," entered into as of (date) by and between (name of the owner or operator) a (name of a State) (insert "corporation," "partnership," "association," or "proprietorship"), the "Grantor," and (name of corporate trustee), (insert, "incorporated in the State of _____" or "a national bank"), the "trustee."

Whereas the Utah Waste Management and Radiation Control Board, in accordance with the Utah Solid and Hazardous Waste Act, has established certain regulations applicable to the Grantor, requiring that an owner or operator of a hazardous waste management facility or group of facilities shall demonstrate financial responsibility for bodily injury and property damage to third parties caused by sudden accidental and/or nonsudden accidental occurrences arising from operations of the facility or group of facilities.

Whereas, the Grantor has elected to establish a standby trust into which the proceeds from a letter of credit may be deposited to assure all or part of such financial responsibility for the facilities identified herein.

Whereas, the Grantor, acting through its duly authorized officers, has selected the Trustee to be the trustee under this agreement, and the Trustee is willing to act as trustee.

Now, therefore, the Grantor and the Trustee agree as follows:

Section 1. Definitions. As used in this Agreement:

(a) The term "Board", "Waste Management and Radiation Control Board" created pursuant to Utah Code Annotated 19-1-106.

(b) The term "Director" means the Director of the Division of Waste Management and Radiation Control, his successors, designees, and any subsequent entity of the State of Utah upon whom the duties of regulation and enforcement of regulations governing hazardous waste are granted.

(c) The term Grantor means the owner or operator who enters into this Agreement and any successors or assigns of the Grantor.

(d) The term Trustee means the Trustee who enters into this Agreement and any successor Trustee.

Section 2. Identification of Facilities. This agreement pertains to the facilities identified on attached schedule A (on schedule A, for each facility list the EPA Identification Number, name, and address of the facility(ies) and the amount of liability coverage, or portions thereof, if more than one instrument affords combined coverage as demonstrated by this Agreement).

Section 3. Establishment of Fund. The Grantor and the Trustee hereby establish a standby trust fund, hereafter the "Fund," for the benefit of any and all third parties injured or damaged by (sudden and/or nonsudden) accidental occurrences arising from operation of the facility(ies) covered by this guarantee, in the amounts of _____ (up to $1 million) per occurrence and _____ (up to $2 million) annual aggregate for sudden accidental occurrences and _____ (up to $3 million) per occurrence and _____ (up to $6 million) annual aggregate for nonsudden occurrences, except that the Fund is not established for the benefit of third parties for the following:

(a) Bodily injury or property damage for which (insert Grantor) is obligated to pay damages by reason of the assumption of liability in a contract or agreement. This exclusion does not apply to liability for damages that (insert Grantor) would be obligated to pay in the absence of the contract or agreement.

(b) Any obligation of (insert Grantor) under a workers' compensation, disability benefits, or unemployment compensation law or any similar law.

(c) Bodily injury to:

(1) An employee of (insert Grantor) arising from, and in the course of, employment by (insert Grantor); or

(2) The spouse, child, parent, brother or sister of that employee as a consequence of, or arising from, and in the course of employment by (insert Grantor).

This exclusion applies:

(A) Whether (insert Grantor) may be liable as an employer or in any other capacity; and

(B) To any obligation to share damages with or repay another person who shall pay damages because of the injury to persons identified in paragraphs (1) and (2).

(d) Bodily injury or property damage arising out of the ownership, maintenance, use, or entrustment to others of any aircraft, motor vehicle or watercraft.

(e) Property damage to:

(1) Any property owned, rented, or occupied by (insert Grantor);

(2) Premises that are sold, given away or abandoned by (insert Grantor) if the property damage arises out of any part of those premises;

(3) Property loaned by (insert Grantor);

(4) Personal property in the care, custody or control of (insert Grantor);

(5) That particular part of real property on which (insert Grantor) or any contractors or subcontractors working directly or indirectly on behalf of (insert Grantor) are performing operations, if the property damage arises out of these operations.

In the event of combination with another mechanism for liability coverage, the fund shall be considered (insert "primary" or "excess") coverage.

The Fund is established initially as consisting of the proceeds of the letter of credit deposited into the Fund. Such proceeds and any other property subsequently transferred to the Trustee is referred to as the Fund, together with all earnings and profits thereon, less any payments or distributions made by the Trustee pursuant to this Agreement. The Fund shall be held by the Trustee, IN TRUST, as hereinafter provided. The Trustee shall not be responsible nor shall it undertake any responsibility for the amount or adequacy of, nor any duty to collect from the Grantor, any payments necessary to discharge any liabilities of the Grantor established by the Director of the Utah Division of Waste Management and Radiation Control.

Section 4. Payment for Bodily Injury or Property Damage. The Trustee shall satisfy a third party liability claim by drawing on the letter of credit described in Schedule B and by making payments from the Fund only upon receipt of one of the following documents:

(a) Certification from the Grantor and the third party claimant(s) that the liability claim should be paid. The certification shall be worded as follows, except that instructions in parentheses, (), are to be replaced with the relevant information and the parentheses deleted:

Certification of Valid Claim

The undersigned, as parties (insert Grantor) and (insert name and address of third party claimant(s)), hereby certify that the claim of bodily injury and/or property damage caused by a (sudden or nonsudden) accidental occurrence arising from operating (Grantor's) hazardous waste treatment, storage, or disposal facility should be paid in the amount of $( ).

(Signature)

Grantor

(Signatures)

Claimant(s)

(b) A valid final court order establishing a judgment against the Grantor for bodily injury or property damage caused by sudden or nonsudden accidental occurrences arising from the operation of the Grantor's facility or group of facilities.

Section 5. Payments Comprising the Fund. Payments made to the Trustee for the Fund shall consist of the proceeds from the letter of credit drawn upon by the Trustee in accordance with the requirements of Subsection R315-264-151(k) and Section 4 of this Agreement.

Section 6. Trustee Management. The Trustee shall invest and reinvest the principal and income, in accordance with general investment policies and guidelines which the Grantor may communicate in writing to the Trustee from time to time, subject, however, to the provisions Section R315-264-151. In investing, reinvesting, exchanging, selling, and managing the Fund, the Trustee shall discharge his duties with respect to the trust fund solely in the interest of the beneficiary and with the care, skill, prudence, and diligence under the circumstances then prevailing which persons of prudence, acting in a like capacity and familiar with such matters, would use in the conduct of an enterprise of a like character and with like aims; except that:

(i) Securities or other obligations of the Grantor, or any other owner or operator of the facilities, or any of their affiliates as defined in the Investment Company Act of 1940, as amended, 15 U.S.C. 80a-2(a), shall not be acquired or held, unless they are securities or other obligations of the Federal or a State government;

(ii) The Trustee is authorized to invest the Fund in time or demand deposits of the Trustee, to the extent insured by an agency of the Federal or a State government; and

(iii) The Trustee is authorized to hold cash awaiting investment or distribution uninvested for a reasonable time and without liability for the payment of interest thereon.

Section 7. Commingling and Investment. The Trustee is expressly authorized in its discretion:

(a) To transfer from time to time any or all of the assets of the Fund to any common, commingled, or collective trust fund created by the Trustee in which the Fund is eligible to participate, subject to all of the provisions thereof, to be commingled with the assets of other trusts participating therein; and

(b) To purchase shares in any investment company registered under the Investment Company Act of 1940, 15 U.S.C. 80a-1 et seq., including one which may be created, managed, underwritten, or to which investment advice is rendered or the shares of which are sold by the Trustee. The Trustee may vote such shares in its discretion.

Section 8. Express Powers of Trustee. Without in any way limiting the powers and discretions conferred upon the Trustee by the other provisions of this Agreement or by law, the Trustee is expressly authorized and empowered:

(a) To sell, exchange, convey, transfer, or otherwise dispose of any property held by it, by public or private sale. No person dealing with the Trustee shall be bound to see to the application of the purchase money or to inquire into the validity or expediency of any such sale or other disposition;

(b) To make, execute, acknowledge, and deliver any and all documents of transfer and conveyance and any and all other instruments that may be necessary or appropriate to carry out the powers herein granted;

(c) To register any securities held in the Fund in its own name or in the name of a nominee and to hold any security in bearer form or in book entry, or to combine certificates representing such securities with certificates of the same issue held by the Trustee in other fiduciary capacities, or to deposit or arrange for the deposit of such securities in a qualified central depositary even though, when so deposited, such securities may be merged and held in bulk in the name of the nominee of such depositary with other securities deposited therein by another person, or to deposit or arrange for the deposit of any securities issued by the United States Government, or any agency or instrumentality thereof, with a Federal Reserve Bank, but the books and records of the Trustee shall at all times show that all such securities are part of the Fund;

(d) To deposit any cash in the Fund in interest-bearing accounts maintained or savings certificates issued by the Trustee, in its separate corporate capacity, or in any other banking institution affiliated with the Trustee, to the extent insured by an agency of the Federal or State government; and

(e) To compromise or otherwise adjust all claims in favor of or against the Fund.

Section 9. Taxes and Expenses. All taxes of any kind that may be assessed or levied against or in respect of the Fund and all brokerage commissions incurred by the Fund shall be paid from the Fund. All other expenses incurred by the Trustee in connection with the administration of this Trust, including fees for legal services rendered to the Trustee, the compensation of the Trustee to the extent not paid directly by the Grantor, and all other proper charges and disbursements to the Trustee shall be paid from the Fund.

Section 10. Advice of Counsel. The Trustee may from time to time consult with counsel, who may be counsel to the Grantor, with respect to any question arising as to the construction of this Agreement or any action to be taken hereunder. The Trustee shall be fully protected, to the extent permitted by law, in acting upon the advice of counsel.

Section 11. Trustee Compensation. The Trustee shall be entitled to reasonable compensation for its services as agreed upon in writing from time to time with the Grantor.

Section 12. Successor Trustee. The Trustee may resign or the Grantor may replace the Trustee, but such resignation or replacement shall not be effective until the Grantor has appointed a successor trustee and this successor accepts the appointment. The successor trustee shall have the same powers and duties as those conferred upon the Trustee hereunder. Upon the successor trustee's acceptance of the appointment, the Trustee shall assign, transfer, and pay over to the successor trustee the funds and properties then constituting the Fund. If for any reason the Grantor cannot or does not act in the event of the resignation of the Trustee, the Trustee may apply to a court of competent jurisdiction for the appointment of a successor trustee or for instructions. The successor trustee shall specify the date on which it assumes administration of the trust in a writing sent to the Grantor, the Director and the present Trustee by certified mail 10 days before such change becomes effective. Any expenses incurred by the Trustee as a result of any of the acts contemplated by this Section shall be paid as provided in Section 9.

Section 13. Instructions to the Trustee. All orders, requests, certifications of valid claims, and instructions to the Trustee shall be in writing, signed by such persons as are designated in the attached Exhibit A or such other designees as the Grantor may designate by amendments to Exhibit A. The Trustee shall be fully protected in acting without inquiry in accordance with the Grantor's orders, requests, and instructions. The Trustee shall have the right to assume, in the absence of written notice to the contrary, that no event constituting a change or a termination of the authority of any person to act on

behalf of the Grantor or the Director hereunder has occurred. The Trustee shall have no duty to act in the absence of such orders, requests, and instructions from the Grantor and/or the Director, except as provided for herein.

Section 14. Amendment of Agreement. This Agreement may be amended by an instrument in writing executed by the Grantor, the Trustee, and the Director, or by the Trustee and the Director if the Grantor ceases to exist.

Section 15. Irrevocability and Termination. Subject to the right of the parties to amend this Agreement as provided in Section 14, this Trust shall be irrevocable and shall continue until terminated at the written agreement of the Grantor, the Trustee, and the Director, or by the Trustee and the Director, if the Grantor ceases to exist. Upon termination of the Trust, all remaining trust property, less final trust administration expenses, shall be paid to the Grantor.

The Director shall agree to termination of the Trust when the owner or operator substitutes alternative financial assurance as specified in this section.

Section 16. Immunity and indemnification. The Trustee shall not incur personal liability of any nature in connection with any act or omission, made in good faith, in the administration of this Trust, or in carrying out any directions by the Grantor and the Director issued in accordance with this Agreement. The Trustee shall be indemnified and saved harmless by the Grantor or from the Trust Fund, or both, from and against any personal liability to which the Trustee may be subjected by reason of any act or conduct in its official capacity, including all expenses reasonably incurred in its defense in the event the Grantor fails to provide such defense.

Section 17. Choice of Law. This Agreement shall be administered, construed, and enforced according to the laws of the State of Utah.

Section 18. Interpretation. As used in this Agreement, words in the singular include the plural and words in the plural include the singular. The descriptive headings for each Section of this Agreement shall not affect the interpretation of the legal efficacy of this Agreement.

In Witness Whereof the parties have caused this Agreement to be executed by their respective officers duly authorized and their corporate seals to be hereunto affixed and attested as of the date first above written. The parties below certify that the wording of this Agreement is identical to the wording specified in Subsection R315-264-151(n) as such regulations were constituted on the date first above written.

(Signature of Grantor)
(Title)
Attest:
(Title)
(Seal)
(Signature of Trustee)
Attest:
(Title)
(Seal)

(2) The following is an example of the certification of acknowledgement which shall accompany the trust agreement for a standby trust fund as specified in Subsection R315-264-147(h) or 40 CFR 265.147(h) , which is adopted by reference.

State of
County of

On this (date), before me personally came (owner or operator) to me known, who, being by me duly sworn, did depose and say that she/he resides at (address), that she/he is (title) of (corporation), the corporation described in and which executed the above instrument; that she/he knows the seal of said corporation; that the seal affixed to such instrument is such corporate seal; that it was so affixed by order of the Board of Directors of said corporation, and that she/he signed her/his name thereto by like order.

(Signature of Notary Public)

R315-264-170. Use and Management of Containers -- Applicability.

The regulations in Sections R315-264-170 through 179 apply to owners and operators of all hazardous waste facilities that store hazardous waste in containers, except as Section R315-264-1 provides otherwise.

Under Section R315-261-7 and Subsection R315-261-33(c), if a hazardous waste is emptied from a container the residue remaining in the container is not considered a hazardous waste if the container is "empty" as defined in Section R315-261-7. In that event, management of the container is exempt from the requirements of Sections R315-264-170 through 179.

R315-264-171. Condition of Containers.

If a container holding hazardous waste is not in good condition, e.g., severe rusting, apparent structural defects, or if it begins to leak, the owner or operator shall transfer the hazardous waste from this container to a container that is in good condition or manage the waste in some other way that complies with the requirements of Rule R315-264.

R315-264-172. Compatibility of Waste with Containers.

The owner or operator shall use a container made of or lined with materials which will not react with, and are otherwise compatible with, the hazardous waste to be stored, so that the ability of the container to contain the waste is not impaired.

R315-264-173. Management of Containers.

(a) A container holding hazardous waste shall always be closed during storage, except when it is necessary to add or remove waste.

(b) A container holding hazardous waste shall not be opened, handled, or stored in a manner which may rupture the container or cause it to leak.

Comment: Reuse of containers in transportation is governed by U.S. Department of Transportation regulations including those set forth in 49 CFR 173.28.

R315-264-174. Use and Management of Containers -- Inspections.

At least weekly, the owner or operator shall inspect areas where containers are stored. The owner or operator shall look for leaking containers and for deterioration of containers and the containment system caused by corrosion or other factors.

See Subsection R315-264-15(c) and Section R315-264-171 for remedial action required if deterioration or leaks are detected.

R315-264-175. Containment.

(a) Container storage areas shall have a containment system that is designed and operated in accordance with Subsection R315-264-175(b), except as otherwise provided by Subsection R315-264-175(c).

(b) A containment system shall be designed and operated as follows:

(1) A base shall underlie the containers which is free of cracks or gaps and is sufficiently impervious to contain leaks, spills, and accumulated precipitation until the collected material is detected and removed;

(2) The base shall be sloped or the containment system shall be otherwise designed and operated to drain and remove liquids resulting from leaks, spills, or precipitation, unless the containers are elevated or are otherwise protected from contact with accumulated liquids;

(3) The containment system shall have sufficient capacity to contain 10% of the volume of containers or the volume of the largest container, whichever is greater. Containers that do not

contain free liquids need not be considered in this determination;

(4) Run-on into the containment system shall be prevented unless the collection system has sufficient excess capacity in addition to that required in Subsection R315-264-175(b)(3) to contain any run-on which might enter the system; and

(5) Spilled or leaked waste and accumulated precipitation shall be removed from the sump or collection area in as timely a manner as is necessary to prevent overflow of the collection system.

If the collected material is a hazardous waste under Rule R315-261, it shall be managed as a hazardous waste in accordance with all applicable requirements of Rules R315-262 through 266. If the collected material is discharged through a point source to waters of the United States, it is subject to the requirements of section 402 of the Clean Water Act, as amended.

(c) Storage areas that store containers holding only wastes that do not contain free liquids need not have a containment system defined by Subsection R315-264-175(b), except as provided by Subsection R315-264-175(d) or provided that:

(1) The storage area is sloped or is otherwise designed and operated to drain and remove liquid resulting from precipitation, or

(2) The containers are elevated or are otherwise protected from contact with accumulated liquid.

(d) Storage areas that store containers holding the wastes listed below that do not contain free liquids shall have a containment system defined by Subsection R315-264-175(b):

(1) F020, F021, F022, F023, F026 and F027.

R315-264-176. Special Requirements for Ignitable or Reactive Waste.

Containers holding ignitable or reactive waste shall be located at least 15 meters, 50 feet, from the facility's property line. See Subsection R315-264-17(a) for additional requirements.

R315-264-177. Special Requirements for Incompatible Wastes.

(a) Incompatible wastes, or incompatible wastes and materials, see appendix V of Rule R315-264 for examples, shall not be placed in the same container, unless Subsection R35-264-17(b) is complied with.

(b) Hazardous waste shall not be placed in an unwashed container that previously held an incompatible waste or material. As required by Section R315-264-13, the waste analysis plan shall include analyses needed to comply with Section R315-264-177. Also, Subsection R315-264-17(c) requires wastes analyses, trial tests or other documentation to assure compliance with Subsection R315-264-17(b). As required by Section R315-264-73, the owner or operator shall place the results of each waste analysis and trial test, and any documented information, in the operating record of the facility.

(c) A storage container holding a hazardous waste that is incompatible with any waste or other materials stored nearby in other containers, piles, open tanks, or surface impoundments shall be separated from the other materials or protected from them by means of a dike, berm, wall, or other device. The purpose of Section R315-264-177 is to prevent fires, explosions, gaseous emission, leaching, or other discharge of hazardous waste or hazardous waste constituents which could result from the mixing of incompatible wastes or materials if containers break or leak.

R315-264-178. Closure.

At closure, all hazardous waste and hazardous waste residues shall be removed from the containment system. Remaining containers, liners, bases, and soil containing or contaminated with hazardous waste or hazardous waste residues shall be decontaminated or removed. At closure, as throughout the operating period, unless the owner or operator can demonstrate in accordance with Subsection R315-261-3(d) that the solid waste removed from the containment system is not a hazardous waste, the owner or operator becomes a generator of hazardous waste and shall manage it in accordance with all applicable requirements of Rules R315-262 through 266.

R315-264-179. Air Emission Standards.

The owner or operator shall manage all hazardous waste placed in a container in accordance with the applicable requirements of Sections R315-264-1030 through 1036, 1050 through 1065, and 1080 through 1090.

R315-264-190. Tank Systems - Applicability.

The requirements of Sections R315-264-190 through 200 apply to owners and operators of facilities that use tank systems for storing or treating hazardous waste except as otherwise provided in Subsections R315-264-190(a), (b), and (c) or in Section R315-264-1.

(a) Tank systems that are used to store or treat hazardous waste which contains no free liquids and are situated inside a building with an impermeable floor are exempted from the requirements in Section R315-264-193. To demonstrate the absence or presence of free liquids in the stored/treated waste, the following test shall be used: Method 9095B, Paint Filter Liquids Test, as described in "Test Methods for Evaluating Solid Waste, Physical/Chemical Methods," EPA Publication SW-846, as incorporated by reference in R315-260-11.

(b) Tank systems, including sumps, as defined in Section R315-260-10, that serve as part of a secondary containment system to collect or contain releases of hazardous wastes are exempted from the requirements in Subsection R315-264-193(a).

(c) Tanks, sumps, and other such collection devices or systems used in conjunction with drip pads, as defined in Section R315-260-10 and regulated under Sections R315-264-570 through 575, shall meet the requirements of Sections R315-264-190 through 200.

R315-264-191. Tank Systems -- Assessment of Existing Tank System's Integrity.

(a) For each existing tank system that does not have secondary containment meeting the requirements of Section R315-264-193, the owner or operator shall determine that the tank system is not leaking or is otherwise fit for use. Except as provided in Subsection R315-264-191(c), the owner or operator shall obtain and keep on file at the facility a written assessment reviewed and certified by a qualified Professional Engineer, in accordance with Subsection R315-270-11(d), that attests to the tank system's integrity.

(b) This assessment shall determine that the tank system is adequately designed and has sufficient structural strength and compatibility with the waste(s) to be stored or treated, to ensure that it will not collapse, rupture, or fail. At a minimum, this assessment shall consider the following:

(1) Design standard(s), if available, according to which the tank and ancillary equipment were constructed;

(2) Hazardous characteristics of the waste(s) that have been and will be handled;

(3) Existing corrosion protection measures;

(4) Documented age of the tank system, if available (otherwise, an estimate of the age); and

(5) Results of a leak test, internal inspection, or other tank integrity examination such that:

(i) For non-enterable underground tanks, the assessment shall include a leak test that is capable of taking into account the effects of temperature variations, tank end deflection, vapor

pockets, and high water table effects, and

(ii) For other than non-enterable underground tanks and for ancillary equipment, this assessment shall include either a leak test, as described above, or other integrity examination that is certified by a qualified Professional Engineer in accordance with Subsection R315-270-11(d), that addresses cracks, leaks, corrosion, and erosion.

Note: The practices described in the American Petroleum Institute (API) Publication, Guide for Inspection of Refinery Equipment, Chapter XIII, "Atmospheric and Low-Pressure Storage Tanks," 4th edition, 1981, may be used, where applicable, as guidelines in conducting other than a leak test.

(c) Tank systems that store or treat materials that become hazardous wastes subsequent to July 14, 1986, shall conduct this assessment within 12 months after the date that the waste becomes a hazardous waste.

(d) If, as a result of the assessment conducted in accordance with Subsection R315-264-191(a), a tank system is found to be leaking or unfit for use, the owner or operator shall comply with the requirements of Section R315-264-196.

R315-264-192. Design and Installation of New Tank Systems or Components.

(a) Owners or operators of new tank systems or components shall obtain and submit to the Director, at time of submittal of part B information, a written assessment, reviewed and certified by a qualified Professional Engineer, in accordance with Subsection R315-270-11(d), attesting that the tank system has sufficient structural integrity and is acceptable for the storing and treating of hazardous waste. The assessment shall show that the foundation, structural support, seams, connections, and pressure controls, if applicable, are adequately designed and that the tank system has sufficient structural strength, compatibility with the waste(s) to be stored or treated, and corrosion protection to ensure that it will not collapse, rupture, or fail. This assessment, which shall be used by the Director to review and approve or disapprove the acceptability of the tank system design, shall include, at a minimum, the following information:

(1) Design standard(s) according to which tank(s) and/or the ancillary equipment are constructed;

(2) Hazardous characteristics of the waste(s) to be handled;

(3) For new tank systems or components in which the external shell of a metal tank or any external metal component of the tank system will be in contact with the soil or with water, a determination by a corrosion expert of:

(i) Factors affecting the potential for corrosion, including but not limited to:

(A) Soil moisture content;

(B) Soil pH;

(C) Soil sulfides level;

(D) Soil resistivity;

(E) Structure to soil potential;

(F) Influence of nearby underground metal structures, e.g., piping;

(G) Existence of stray electric current;

(H) Existing corrosion-protection measures, e.g., coating, cathodic protection, and

(ii) The type and degree of external corrosion protection that are needed to ensure the integrity of the tank system during the use of the tank system or component, consisting of one or more of the following:

(A) Corrosion-resistant materials of construction such as special alloys, fiberglass reinforced plastic, etc.;

(B) Corrosion-resistant coating, such as epoxy, fiberglass, etc., with cathodic protection, e.g., impressed current or sacrificial anodes; and

(C) Electrical isolation devices such as insulating joints, flanges, etc.

Note: The practices described in the National Association of Corrosion Engineers (NACE) standard, "Recommended Practice (RP-02-85)-Control of External Corrosion on Metallic Buried, Partially Buried, or Submerged Liquid Storage Systems," and the American Petroleum Institute (API) Publication 1632, "Cathodic Protection of Underground Petroleum Storage Tanks and Piping Systems," may be used, where applicable, as guidelines in providing corrosion protection for tank systems.

(4) For underground tank system components that are likely to be adversely affected by vehicular traffic, a determination of design or operational measures that will protect the tank system against potential damage; and

(5) Design considerations to ensure that:

(i) Tank foundations will maintain the load of a full tank;

(ii) Tank systems shall be anchored to prevent flotation or dislodgment where the tank system is placed in a saturated zone, or is located within a seismic fault zone subject to the standards of Subsection R315-264-18(a); and

(iii) Tank systems shall withstand the effects of frost heave.

(b) The owner or operator of a new tank system shall ensure that proper handling procedures are adhered to in order to prevent damage to the system during installation. Prior to covering, enclosing, or placing a new tank system or component in use, an independent, qualified, installation inspector or a qualified Professional Engineer, either of whom is trained and experienced in the proper installation of tanks systems or components, shall inspect the system for the presence of any of the following items:

(1) Weld breaks;

(2) Punctures;

(3) Scrapes of protective coatings;

(4) Cracks;

(5) Corrosion;

(6) Other structural damage or inadequate construction/installation. All discrepancies shall be remedied before the tank system is covered, enclosed, or placed in use.

(c) New tank systems or components that are placed underground and that are backfilled shall be provided with a backfill material that is a noncorrosive, porous, homogeneous substance and that is installed so that the backfill is placed completely around the tank and compacted to ensure that the tank and piping are fully and uniformly supported.

(d) All new tanks and ancillary equipment shall be tested for tightness prior to being covered, enclosed, or placed in use. If a tank system is found not to be tight, all repairs necessary to remedy the leak(s) in the system shall be performed prior to the tank system being covered, enclosed, or placed into use.

(e) Ancillary equipment shall be supported and protected against physical damage and excessive stress due to settlement, vibration, expansion, or contraction.

Note: The piping system installation procedures described in American Petroleum Institute (API) Publication 1615 (November 1979), "Installation of Underground Petroleum Storage Systems," or ANSI Standard B31.3, "Petroleum Refinery Piping," and ANSI Standard B31.4 "Liquid Petroleum Transportation Piping System," may be used, where applicable, as guidelines for proper installation of piping systems.

(f) The owner or operator shall provide the type and degree of corrosion protection recommended by an independent corrosion expert, based on the information provided under Subsection R315-264-192(a)(3), or other corrosion protection if the Director believes other corrosion protection is necessary to ensure the integrity of the tank system during use of the tank system. The installation of a corrosion protection system that is field fabricated shall be supervised by an independent corrosion expert to ensure proper installation.

(g) The owner or operator shall obtain and keep on file at

the facility written statements by those persons required to certify the design of the tank system and supervise the installation of the tank system in accordance with the requirements of Subsections R315-264-192(b) through (f), that attest that the tank system was properly designed and installed and that repairs, pursuant to Subsections R315-264-192(b) and (d), were performed. These written statements shall also include the certification statement as required in Subsection R315-270-11(d).

R315-264-193. Containment and Detection of Releases.

(a) In order to prevent the release of hazardous waste or hazardous constituents to the environment, secondary containment that meets the requirements of Section R315-264-193 shall be provided, except as provided in Subsections R315-264-193(f) and (g):

(1) For all new and existing tank systems or components, prior to their being put into service.

(2) For tank systems that store or treat materials that become hazardous wastes, within two years of the hazardous waste listing, or when the tank system has reached 15 years of age, whichever comes later.

(b) Secondary containment systems shall be:

(1) Designed, installed, and operated to prevent any migration of wastes or accumulated liquid out of the system to the soil, ground water, or surface water at any time during the use of the tank system; and

(2) Capable of detecting and collecting releases and accumulated liquids until the collected material is removed.

(c) To meet the requirements of Subsection R315-264-193(b), secondary containment systems shall be at a minimum:

(1) Constructed of or lined with materials that are compatible with the wastes(s) to be placed in the tank system and shall have sufficient strength and thickness to prevent failure owing to pressure gradients, including static head and external hydrological forces, physical contact with the waste to which it is exposed, climatic conditions, and the stress of daily operation, including stresses from nearby vehicular traffic.

(2) Placed on a foundation or base capable of providing support to the secondary containment system, resistance to pressure gradients above and below the system, and capable of preventing failure due to settlement, compression, or uplift;

(3) Provided with a leak-detection system that is designed and operated so that it will detect the failure of either the primary or secondary containment structure or the presence of any release of hazardous waste or accumulated liquid in the secondary containment system within 24 hours, or at the earliest practicable time if the owner or operator can demonstrate to the Director that existing detection technologies or site conditions shall not allow detection of a release within 24 hours; and

(4) Sloped or otherwise designed or operated to drain and remove liquids resulting from leaks, spills, or precipitation. Spilled or leaked waste and accumulated precipitation shall be removed from the secondary containment system within 24 hours, or in as timely a manner as is possible to prevent harm to human health and the environment, if the owner or operator can demonstrate to the Director that removal of the released waste or accumulated precipitation cannot be accomplished within 24 hours.

Note: If the collected material is a hazardous waste under Rule R315-261, it is subject to management as a hazardous waste in accordance with all applicable requirements of Rules R315-262 through 265. If the collected material is discharged through a point source to waters of the United States, it is subject to the requirements of sections 301, 304, and 402 of the Clean Water Act, as amended. If discharged to a Publicly Owned Treatment Works (POTW), it is subject to the requirements of section 307 of the Clean Water Act, as amended. If the collected material is released to the environment, it may be subject to the reporting requirements of 40 CFR part 302.

(d) Secondary containment for tanks shall include one or more of the following devices:

(1) A liner, external to the tank;

(2) A vault;

(3) A double-walled tank; or

(4) An equivalent device as approved by the Director.

(e) In addition to the requirements of Subsections R315-264-193(b), (c), and (d), secondary containment systems shall satisfy the following requirements:

(1) External liner systems shall be:

(i) Designed or operated to contain 100 percent of the capacity of the largest tank within its boundary;

(ii) Designed or operated to prevent run-on or infiltration of precipitation into the secondary containment system unless the collection system has sufficient excess capacity to contain run-on or infiltration. Such additional capacity shall be sufficient to contain precipitation from a 25-year, 24-hour rainfall event.

(iii) Free of cracks or gaps; and

(iv) Designed and installed to surround the tank completely and to cover all surrounding earth likely to come into contact with the waste if the waste is released from the tank(s), i.e., capable of preventing lateral as well as vertical migration of the waste.

(2) Vault systems shall be:

(i) Designed or operated to contain 100 percent of the capacity of the largest tank within its boundary;

(ii) Designed or operated to prevent run-on or infiltration of precipitation into the secondary containment system unless the collection system has sufficient excess capacity to contain run-on or infiltration. Such additional capacity shall be sufficient to contain precipitation from a 25-year, 24-hour rainfall event;

(iii) Constructed with chemical-resistant water stops in place at all joints, if any;

(iv) Provided with an impermeable interior coating or lining that is compatible with the stored waste and that shall prevent migration of waste into the concrete;

(v) Provided with a means to protect against the formation of and ignition of vapors within the vault, if the waste being stored or treated:

(A) Meets the definition of ignitable waste under Section R315-261-21; or

(B) Meets the definition of reactive waste under Section R315-261-23, and may form an ignitable or explosive vapor; and

(vi) Provided with an exterior moisture barrier or be otherwise designed or operated to prevent migration of moisture into the vault if the vault is subject to hydraulic pressure.

(3) Double-walled tanks shall be:

(i) Designed as an integral structure, i.e., an inner tank completely enveloped within an outer shell, so that any release from the inner tank is contained by the outer shell;

(ii) Protected, if constructed of metal, from both corrosion of the primary tank interior and of the external surface of the outer shell; and

(iii) Provided with a built-in continuous leak detection system capable of detecting a release within 24 hours, or at the earliest practicable time, if the owner or operator can demonstrate to the Director, and the Director concludes, that the existing detection technology or site conditions would not allow detection of a release within 24 hours.

Note: The provisions outlined in the Steel Tank Institute's (STI) "Standard for Dual Wall Underground Steel Storage Tanks" may be used as guidelines for aspects of the design of underground steel double-walled tanks.

(f) Ancillary equipment shall be provided with secondary

containment, e.g., trench, jacketing, double-walled piping, that meets the requirements of Subsections R315-264-193(b) and (c) except for:

(1) Aboveground piping, exclusive of flanges, joints, valves, and other connections, that are visually inspected for leaks on a daily basis;

(2) Welded flanges, welded joints, and welded connections, that are visually inspected for leaks on a daily basis;

(3) Sealless or magnetic coupling pumps and sealless valves, that are visually inspected for leaks on a daily basis; and

(4) Pressurized aboveground piping systems with automatic shut-off devices, e.g., excess flow check valves, flow metering shutdown devices, loss of pressure actuated shut-off devices, that are visually inspected for leaks on a daily basis.

(g) The owner or operator may obtain a variance from the requirements Section R315-264-193 if the Director finds, as a result of a demonstration by the owner or operator that alternative design and operating practices, together with location characteristics, will prevent the migration of any hazardous waste or hazardous constituents into the ground water; or surface water at least as effectively as secondary containment during the active life of the tank system or that in the event of a release that does migrate to ground water or surface water, no substantial present or potential hazard will be posed to human health or the environment. New underground tank systems may not, per a demonstration in accordance with Subsection R315-264-193(g)(2), be exempted from the secondary containment requirements Section R315-264-193.

(1) In deciding whether to grant a variance based on a demonstration of equivalent protection of ground water and surface water, the Director shall consider:

(i) The nature and quantity of the wastes;

(ii) The proposed alternate design and operation;

(iii) The hydrogeologic setting of the facility, including the thickness of soils present between the tank system and ground water; and

(iv) All other factors that would influence the quality and mobility of the hazardous constituents and the potential for them to migrate to ground water or surface water.

(2) In deciding whether to grant a variance based on a demonstration of no substantial present or potential hazard, the Director shall consider:

(i) The potential adverse effects on ground water, surface water, and land quality taking into account:

(A) The physical and chemical characteristics of the waste in the tank system, including its potential for migration,

(B) The hydrogeological characteristics of the facility and surrounding land,

(C) The potential for health risks caused by human exposure to waste constituents,

(D) The potential for damage to wildlife, crops, vegetation, and physical structures caused by exposure to waste constituents, and

(E) The persistence and permanence of the potential adverse effects;

(ii) The potential adverse effects of a release on ground-water quality, taking into account:

(A) The quantity and quality of ground water and the direction of ground-water flow,

(B) The proximity and withdrawal rates of ground-water users,

(C) The current and future uses of ground water in the area, and

(D) The existing quality of ground water, including other sources of contamination and their cumulative impact on the ground-water quality;

(iii) The potential adverse effects of a release on surface water quality, taking into account:

(A) The quantity and quality of ground water and the direction of ground-water flow,

(B) The patterns of rainfall in the region,

(C) The proximity of the tank system to surface waters,

(D) The current and future uses of surface waters in the area and any water quality standards established for those surface waters, and

(E) The existing quality of surface water, including other sources of contamination and the cumulative impact on surface-water quality; and

(iv) The potential adverse effects of a release on the land surrounding the tank system, taking into account:

(A) The patterns of rainfall in the region, and

(B) The current and future uses of the surrounding land.

(3) The owner or operator of a tank system, for which a variance from secondary containment had been granted in accordance with the requirements of Subsection R315-264-193(g)(1), at which a release of hazardous waste has occurred from the primary tank system but has not migrated beyond the zone of engineering control, as established in the variance, shall:

(i) Comply with the requirements of Section R315-264-196, except Subsection R315-264-193(d), and

(ii) Decontaminate or remove contaminated soil to the extent necessary to:

(A) Enable the tank system for which the variance was granted to resume operation with the capability for the detection of releases at least equivalent to the capability it had prior to the release; and

(B) Prevent the migration of hazardous waste or hazardous constituents to ground water or surface water; and

(iii) If contaminated soil cannot be removed or decontaminated in accordance with Subsection R315-264-193(g)(3)(ii), comply with the requirement of Subsection R315-264-197(b).

(4) The owner or operator of a tank system, for which a variance from secondary containment had been granted in accordance with the requirements of Subsection R315-264-193(g)(1), at which a release of hazardous waste has occurred from the primary tank system and has migrated beyond the zone of engineering control,as established in the variance, shall:

(i) Comply with the requirements of Subsections R315-264-196(a), (b), (c), and (d); and

(ii) Prevent the migration of hazardous waste or hazardous constituents to ground water or surface water, if possible, and decontaminate or remove contaminated soil. If contaminated soil cannot be decontaminated or removed or if ground water has been contaminated, the owner or operator shall comply with the requirements of Subsection R315-264-197(b); and

(iii) If repairing, replacing, or reinstalling the tank system, provide secondary containment in accordance with the requirements of Subsections R315-264-193(a) through (f) or reapply for a variance from secondary containment and meet the requirements for new tank systems in Section R315-264-192 if the tank system is replaced. The owner or operator shall comply with these requirements even if contaminated soil can be decontaminated or removed and ground water or surface water has not been contaminated.

(h) The following procedures shall be followed in order to request a variance from secondary containment:

(1) The Director shall be notified in writing by the owner or operator that he intends to conduct and submit a demonstration for a variance from secondary containment as allowed in Subsection R315-264-193(g) according to the following schedule:

(i) For existing tank systems, at least 24 months prior to the date that secondary containment shall be provided in accordance with Subsection R315-264-193(a).

(ii) For new tank systems, at least 30 days prior to entering into a contract for installation.

(2) As part of the notification, the owner or operator shall also submit to the Director a description of the steps necessary to conduct the demonstration and a timetable for completing each of the steps. The demonstration shall address each of the factors listed in Subsection R315-264-193(g)(1) or (g)(2);

(3) The demonstration for a variance shall be completed within 180 days after notifying the Director of an intent to conduct the demonstration; and

(4) If a variance is granted under Subsection R315-264-193(h), the Director shall require the permittee to construct and operate the tank system in the manner that was demonstrated to meet the requirements for the variance.

(i) All tank systems, until such time as secondary containment that meets the requirements Section R315-264-193 is provided, shall comply with the following:

(1) For non-enterable underground tanks, a leak test that meets the requirements of Subsection R315-264-191(b)(5) or other tank integrity method, as approved or required by the Director, shall be conducted at least annually.

(2) For other than non-enterable underground tanks, the owner or operator shall either conduct a leak test as in Subsection R315-264-193(i)(1) or develop a schedule and procedure for an assessment of the overall condition of the tank system by a qualified Professional Engineer. The schedule and procedure shall be adequate to detect obvious cracks, leaks, and corrosion or erosion that may lead to cracks and leaks. The owner or operator shall remove the stored waste from the tank, if necessary, to allow the condition of all internal tank surfaces to be assessed. The frequency of these assessments shall be based on the material of construction of the tank and its ancillary equipment, the age of the system, the type of corrosion or erosion protection used, the rate of corrosion or erosion observed during the previous inspection, and the characteristics of the waste being stored or treated.

(3) For ancillary equipment, a leak test or other integrity assessment as approved by the Director shall be conducted at least annually.

Note: The practices described in the American Petroleum Institute (API) Publication Guide for Inspection of Refinery Equipment, Chapter XIII, "Atmospheric and Low-Pressure Storage Tanks," 4th edition, 1981, may be used, where applicable, as guidelines for assessing the overall condition of the tank system.

(4) The owner or operator shall maintain on file at the facility a record of the results of the assessments conducted in accordance with Subsections R315-264-193(i)(1) through (i)(3).

(5) If a tank system or component is found to be leaking or unfit for use as a result of the leak test or assessment in Subsections R315-264-193(i)(1) through (i)(3), the owner or operator shall comply with the requirements of Section R315-264-196.

R315-264-194. General Operating Requirements.

(a) Hazardous wastes or treatment reagents shall not be placed in a tank system if they could cause the tank, its ancillary equipment, or the containment system to rupture, leak, corrode, or otherwise fail.

(b) The owner or operator shall use appropriate controls and practices to prevent spills and overflows from tank or containment systems. These include at a minimum:

(1) Spill prevention controls, e.g., check valves, dry disconnect couplings;

(2) Overfill prevention controls, e.g., level sensing devices, high level alarms, automatic feed cutoff, or bypass to a standby tank; and

(3) Maintenance of sufficient freeboard in uncovered tanks to prevent overtopping by wave or wind action or by precipitation.

(c) The owner or operator shall comply with the requirements of Section R315-264-196 if a leak or spill occurs in the tank system.

R315-264-195. Tank Systems -- Inspections.

(a) The owner or operator shall develop and follow a schedule and procedure for inspecting overfill controls.

(b) The owner or operator shall inspect at least once each operating day data gathered from monitoring and leak detection equipment, e.g., pressure or temperature gauges, monitoring wells, to ensure that the tank system is being operated according to its design.

Note: Subsection R315-264-15(c) requires the owner or operator to remedy any deterioration or malfunction he finds. Section R315-264-196 requires the owner or operator to notify the Director within 24 hours of confirming a leak. Also, 40 CFR part 302 may require the owner or operator to notify the National Response Center of a release.

(c) In addition, except as noted under Subsection R315-264-195(d), the owner or operator shall inspect at least once each operating day:

(1) Above ground portions of the tank system, if any, to detect corrosion or releases of waste.

(2) The construction materials and the area immediately surrounding the externally accessible portion of the tank system, including the secondary containment system, e.g., dikes, to detect erosion or signs of releases of hazardous waste, e.g., wet spots, dead vegetation.

(d) Owners or operators of tank systems that either use leak detection systems to alert facility personnel to leaks, or implement established workplace practices to ensure leaks are promptly identified, shall inspect at least weekly those areas described in Subsections R315-264-195(c)(1) and (c)(2). Use of the alternate inspection schedule shall be documented in the facility's operating record. This documentation shall include a description of the established workplace practices at the facility.

(e) Reserved

(f) Ancillary equipment that is not provided with secondary containment, as described in Subsections R315-264-193(f)(1) through (4), shall be inspected at least once each operating day.

(g) The owner or operator shall inspect cathodic protection systems, if present, according to, at a minimum, the following schedule to ensure that they are functioning properly:

(1) The proper operation of the cathodic protection system shall be confirmed within six months after initial installation and annually thereafter; and

(2) All sources of impressed current shall be inspected and/or tested, as appropriate, at least bimonthly, i.e., every other month.

Note: The practices described in the National Association of Corrosion Engineers (NACE) standard, "Recommended Practice (RP-02-85)-Control of External Corrosion on Metallic Buried, Partially Buried, or Submerged Liquid Storage Systems," and the American Petroleum Institute (API) Publication 1632, "Cathodic Protection of Underground Petroleum Storage Tanks and Piping Systems," may be used, where applicable, as guidelines in maintaining and inspecting cathodic protection systems.

(h) The owner or operator shall document in the operating record of the facility an inspection of those items in Subsections R315-264-195(a) through (c).

R315-264-196. Response to Leaks or Spills and Disposition of Leaking or Unfit-for-Use Tank Systems.

A tank system or secondary containment system from which there has been a leak or spill, or which is unfit for use, shall be removed from service immediately, and the owner or operator shall satisfy the following requirements:

(a) Cessation of use; prevent flow or addition of wastes.

The owner or operator shall immediately stop the flow of hazardous waste into the tank system or secondary containment system and inspect the system to determine the cause of the release.

(b) Removal of waste from tank system or secondary containment system.

(1) If the release was from the tank system, the owner/operator shall, within 24 hours after detection of the leak or, if the owner/operator demonstrates that it is not possible, at the earliest practicable time, remove as much of the waste as is necessary to prevent further release of hazardous waste to the environment and to allow inspection and repair of the tank system to be performed.

(2) If the material released was to a secondary containment system, all released materials shall be removed within 24 hours or in as timely a manner as is possible to prevent harm to human health and the environment.

(c) Containment of visible releases to the environment. The owner/operator shall immediately conduct a visual inspection of the release and, based upon that inspection:

(1) Prevent further migration of the leak or spill to soils or surface water; and

(2) Remove, and properly dispose of, any visible contamination of the soil or surface water.

(d) Notifications, reports.

(1) Any release to the environment, except as provided in Subsection R315-264-196(d)(2), shall be reported to the Director within 24 hours of its detection. If the release has been reported pursuant to 40 CFR part 302, that report shall satisfy this requirement.

(2) A leak or spill of hazardous waste is exempted from the requirements of Subsection R315-264-196(d) if it is:

(i) Less than or equal to a quantity of one (1) pound, and

(ii) Immediately contained and cleaned up.

(3) Within 30 days of detection of a release to the environment, a report containing the following information shall be submitted to the Director:

(i) Likely route of migration of the release;

(ii) Characteristics of the surrounding soil, soil composition, geology, hydrogeology, climate;

(iii) Results of any monitoring or sampling conducted in connection with the release, if available. If sampling or monitoring data relating to the release are not available within 30 days, these data shall be submitted to the Director as soon as they become available.

(iv) Proximity to downgradient drinking water, surface water, and populated areas; and

(v) Description of response actions taken or planned.

(e) Provision of secondary containment, repair, or closure.

(1) Unless the owner/operator satisfies the requirements of Subsection R315-264-196(e)(2) through (4), the tank system shall be closed in accordance with Section R315-264-197.

(2) If the cause of the release was a spill that has not damaged the integrity of the system, the owner/operator may return the system to service as soon as the released waste is removed and repairs, if necessary, are made.

(3) If the cause of the release was a leak from the primary tank system into the secondary containment system, the system shall be repaired prior to returning the tank system to service.

(4) If the source of the release was a leak to the environment from a component of a tank system without secondary containment, the owner/operator shall provide the component of the system from which the leak occurred with secondary containment that satisfies the requirements of Section R315-264-193 before it can be returned to service, unless the source of the leak is an aboveground portion of a tank system that can be inspected visually. If the source is an aboveground component that can be inspected visually, the component shall be repaired and may be returned to service without secondary containment as long as the requirements of Subsection R315-264-196(f) are satisfied. If a component is replaced to comply with the requirements of Subsection R315-264-196(e)(4), that component shall satisfy the requirements for new tank systems or components in Sections R315-264-192 and 193. Additionally, if a leak has occurred in any portion of a tank system component that is not readily accessible for visual inspection, e.g., the bottom of an inground or onground tank, the entire component shall be provided with secondary containment in accordance with Section R315-264-193 prior to being returned to use.

(f) Certification of major repairs. If the owner/operator has repaired a tank system in accordance with Subsection R315-264-196(e), and the repair has been extensive, e.g., installation of an internal liner; repair of a ruptured primary containment or secondary containment vessel, the tank system shall not be returned to service unless the owner/operator has obtained a certification by a qualified Professional Engineer in accordance with Subsection R315-270-11(d) that the repaired system is capable of handling hazardous wastes without release for the intended life of the system. This certification shall be placed in the operating record and maintained until closure of the facility.

Note: The Director may, on the basis of any information received that there is or has been a release of hazardous waste or hazardous constituents into the environment, issue an order requiring corrective action or such other response as deemed necessary to protect human health or the environment.

Note: See Subsection R315-264-15(c) for the requirements necessary to remedy a failure. Also, 40 CFR part 302 may require the owner or operator to notify the National Response Center of certain releases.

R315-264-197. Closure and Post-Closure Care.

(a) At closure of a tank system, the owner or operator shall remove or decontaminate all waste residues, contaminated containment system components, liners, etc., contaminated soils, and structures and equipment contaminated with waste, and manage them as hazardous waste, unless Subsection R315-261-3(d) applies. The closure plan, closure activities, cost estimates for closure, and financial responsibility for tank systems shall meet all of the requirements specified in Sections R315-264-110 through 120, 140 through 151.

(b) If the owner or operator demonstrates that not all contaminated soils can be practicably removed or decontaminated as required in Subsection R315-264-197(a), then the owner or operator shall close the tank system and perform post-closure care in accordance with the closure and post-closure care requirements that apply to landfills, Subsection R315-264-310. In addition, for the purposes of closure, post-closure, and financial responsibility, such a tank system is then considered to be a landfill, and the owner or operator shall meet all of the requirements for landfills specified in Sections R315-264-110 through 120, 140 through 151.

(c) If an owner or operator has a tank system that does not have secondary containment that meets the requirements of Subsections R315-264-193(b) through (f) and has not been granted a variance from the secondary containment requirements in accordance with Subsection R315-264-193(g), then:

(1) The closure plan for the tank system shall include both a plan for complying with Subsection R315-264-197(a) and a contingent plan for complying with Subsection R315-264-197(b).

(2) A contingent post-closure plan for complying with Subsection R315-264-197(b) shall be prepared and submitted as part of the permit application.

(3) The cost estimates calculated for closure and post-closure care shall reflect the costs of complying with the contingent closure plan and the contingent post-closure plan, if those costs are greater than the costs of complying with the

closure plan prepared for the expected closure under Subsection R315-264-197(a).

(4) Financial assurance shall be based on the cost estimates in Subsection R315-264-197(c)(3).

(5) For the purposes of the contingent closure and post-closure plans, such a tank system is considered to be a landfill, and the contingent plans shall meet all of the closure, post-closure, and financial responsibility requirements for landfills under Sections R315-264-110 through 120, 140 through 148, and 151.

R315-264-198. Special Requirements for Ignitable or Reactive Wastes.

(a) Ignitable or reactive waste shall not be placed in tank systems, unless:

(1) The waste is treated, rendered, or mixed before or immediately after placement in the tank system so that:

(i) The resulting waste, mixture, or dissolved material no longer meets the definition of ignitable or reactive waste under Sections R315-261-21 or 23, and

(ii) Subsection R315-264-17(b) is complied with; or

(2) The waste is stored or treated in such a way that it is protected from any material or conditions that may cause the waste to ignite or react; or

(3) The tank system is used solely for emergencies.

(b) The owner or operator of a facility where ignitable or reactive waste is stored or treated in a tank shall comply with the requirements for the maintenance of protective distances between the waste management area and any public ways, streets, alleys, or an adjoining property line that can be built upon as required in Tables 2-1 through 2-6 of the National Fire Protection Association's "Flammable and Combustible Liquids Code," (1977 or 1981), incorporated by reference, see Section R315-260-11.

R315-264-199. Special Requirements for Incompatible Wastes.

(a) Incompatible wastes, or incompatible wastes and materials, shall not be placed in the same tank system, unless Subsection R315-264-17(b) is complied with.

(b) Hazardous waste shall not be placed in a tank system that has not been decontaminated and that previously held an incompatible waste or material, unless Subsection R315-264-17(b) is complied with.

R315-264-200. Air Emission Standards.

The owner or operator shall manage all hazardous waste placed in a tank in accordance with the applicable requirements of Sections R315-264-1030 through 1036, 1050 through 1065 and 1080 through 1090.

R315-264-220. Surface Impoundments -- Applicability.

The regulations in Sections R315-264-220 through 223 and 226 through 232 apply to owners and operators of facilities that use surface impoundments to treat, store, or dispose of hazardous waste except as Section R315-264-1 provides otherwise.

R315-264-221. Design and Operating Requirements.

(a) Any surface impoundment that is not covered by Subsection R315-264-221(c) or 40 CFR 265.221, which is adopted by reference, shall have a liner for all portions of the impoundment, except for existing portions of such impoundments. The liner shall be designed, constructed, and installed to prevent any migration of wastes out of the impoundment to the adjacent subsurface soil or ground water or surface water at any time during the active life, including the closure period, of the impoundment. The liner may be constructed of materials that may allow wastes to migrate into the liner, but not into the adjacent subsurface soil or ground water or surface water, during the active life of the facility, provided that the impoundment is closed in accordance with Subsection R315-264-228(a)(1). For impoundments that will be closed in accordance with Subsection R315-264-228(a)(2), the liner shall be constructed of materials that can prevent wastes from migrating into the liner during the active life of the facility. The liner shall be:

(1) Constructed of materials that have appropriate chemical properties and sufficient strength and thickness to prevent failure due to pressure gradients, including static head and external hydrogeologic forces, physical contact with the waste or leachate to which they are exposed, climatic conditions, the stress of installation, and the stress of daily operation;

(2) Placed upon a foundation or base capable of providing support to the liner and resistance to pressure gradients above and below the liner to prevent failure of the liner due to settlement, compression, or uplift; and

(3) Installed to cover all surrounding earth likely to be in contact with the waste or leachate.

(b) The owner or operator shall be exempted from the requirements of Subsection R315-264-221(a) if the Director finds, based on a demonstration by the owner or operator, that alternate design and operating practices, together with location characteristics, shall prevent the migration of any hazardous constituents, see Subsection R315-264-93, into the ground water or surface water at any future time. In deciding whether to grant an exemption, the Director shall consider:

(1) The nature and quantity of the wastes;

(2) The proposed alternate design and operation;

(3) The hydrogeologic setting of the facility, including the attenuative capacity and thickness of the liners and soils present between the impoundment and ground water or surface water; and

(4) All other factors which would influence the quality and mobility of the leachate produced and the potential for it to migrate to ground water or surface water.

(c) The owner or operator of each new surface impoundment unit on which construction commences after January 29, 1992, each lateral expansion of a surface impoundment unit on which construction commences after July 29, 1992 and each replacement of an existing surface impoundment unit that is to commence reuse after July 29, 1992 shall install two or more liners and a leachate collection and removal system between such liners. "Construction commences" is as defined in Section R315-260-10 under "existing facility".

(1)(i) The liner system shall include:

(A) A top liner designed and constructed of materials, e.g., a geomembrane, to prevent the migration of hazardous constituents into such liner during the active life and post-closure care period; and

(B) A composite bottom liner, consisting of at least two components. The upper component shall be designed and constructed of materials, e.g., a geomembrane, to prevent the migration of hazardous constituents into this component during the active life and post-closure care period. The lower component shall be designed and constructed of materials to minimize the migration of hazardous constituents if a breach in the upper component were to occur. The lower component shall be constructed of at least 3 feet, 91 cm, of compacted soil material with a hydraulic conductivity of no more than 1×10^{-7} cm/sec.

(ii) The liners shall comply with Subsections R315-264-221(a)(1), (2), and (3).

(2) The leachate collection and removal system between the liners, and immediately above the bottom composite liner in the case of multiple leachate collection and removal systems, is

also a leak detection system. This leak detection system shall be capable of detecting, collecting, and removing leaks of hazardous constituents at the earliest practicable time through all areas of the top liner likely to be exposed to waste or leachate during the active life and post-closure care period. The requirements for a leak detection system in Subsection R315-264-221(c)(2) are satisfied by installation of a system that is, at a minimum:

(i) Constructed with a bottom slope of one percent or more;

(ii) Constructed of granular drainage materials with a hydraulic conductivity of 1 x 10−1 cm/sec or more and a thickness of 12 inches (30.5 cm) or more; or constructed of synthetic or geonet drainage materials with a transmissivity of 3 x 10−4 m^2/sec or more;

(iii) Constructed of materials that are chemically resistant to the waste managed in the surface impoundment and the leachate expected to be generated, and of sufficient strength and thickness to prevent collapse under the pressures exerted by overlying wastes and any waste cover materials or equipment used at the surface impoundment;

(iv) Designed and operated to minimize clogging during the active life and post-closure care period; and

(v) Constructed with sumps and liquid removal methods, e.g., pumps, of sufficient size to collect and remove liquids from the sump and prevent liquids from backing up into the drainage layer. Each unit shall have its own sump(s). The design of each sump and removal system shall provide a method for measuring and recording the volume of liquids present in the sump and of liquids removed.

(3) The owner or operator shall collect and remove pumpable liquids in the sumps to minimize the head on the bottom liner.

(4) The owner or operator of a leak detection system that is not located completely above the seasonal high water table shall demonstrate that the operation of the leak detection system will not be adversely affected by the presence of ground water.

(d) The Director may approve alternative design or operating practices to those specified in Subsection R315-264-221(c) if the owner or operator demonstrates to the Director that such design and operating practices, together with location characteristics:

(1) Will prevent the migration of any hazardous constituent into the ground water or surface water at least as effectively as the liners and leachate collection and removal system specified in Subsection R315-264-221(c); and

(2) Will allow detection of leaks of hazardous constituents through the top liner at least as effectively.

(e) The double liner requirement set forth in Subsection R315-264-221(c) may be waived by the Director for any monofill, if:

(1) The monofill contains only hazardous wastes from foundry furnace emission controls or metal casting molding sand, and such wastes do not contain constituents which would render the wastes hazardous for reasons other than the toxicity characteristic in Section R315-261-24; and

(2)(i)(A) The monofill has at least one liner for which there is no evidence that such liner is leaking. For the purposes of Subsection R315-264-221(e), the term "liner" means a liner designed, constructed, installed, and operated to prevent hazardous waste from passing into the liner at any time during the active life of the facility, or a liner designed, constructed, installed, and operated to prevent hazardous waste from migrating beyond the liner to adjacent subsurface soil, ground water, or surface water at any time during the active life of the facility. In the case of any surface impoundment which has been exempted from the requirements of Subsection R315-264-221(c) on the basis of a liner designed, constructed, installed, and operated to prevent hazardous waste from passing beyond the liner, at the closure of such impoundment, the owner or operator shall remove or decontaminate all waste residues, all contaminated liner material, and contaminated soil to the extent practicable. If all contaminated soil is not removed or decontaminated, the owner or operator of such impoundment will comply with appropriate post-closure requirements, including but not limited to ground-water monitoring and corrective action;

(B) The monofill is located more than one-quarter mile from an "underground source of drinking water," as that term is defined in Section R315-270-2; and

(C) The monofill is in compliance with generally applicable ground-water monitoring requirements for facilities with permits under Section 19-6-108; or

(ii) The owner or operator demonstrates that the monofill is located, designed and operated so as to assure that there will be no migration of any hazardous constituent into ground water or surface water at any future time.

(f) The owner or operator of any replacement surface impoundment unit is exempt from Subsection R315-264-221(c) if:

(1) The existing unit was constructed in compliance with the design standards of sections 3004 (o)(1)(A)(i) and (o)(5) of the Resource Conservation and Recovery Act; and

(2) There is no reason to believe that the liner is not functioning as designed.

(g) A surface impoundment shall be designed, constructed, maintained, and operated to prevent overtopping resulting from normal or abnormal operations; overfilling; wind and wave action; rainfall; run-on; malfunctions of level controllers, alarms, and other equipment; and human error.

(h) A surface impoundment shall have dikes that are designed, constructed, and maintained with sufficient structural integrity to prevent massive failure of the dikes. In ensuring structural integrity, it shall not be presumed that the liner system will function without leakage during the active life of the unit.

(i) The Director shall specify in the permit all design and operating practices that are necessary to ensure that the requirements of Section R315-264-221 are satisfied.

R315-264-222. Action Leakage Rate.

(a) The Director shall approve an action leakage rate for surface impoundment units subject to Subsections R315-264221(c) or (d). The action leakage rate is the maximum design flow rate that the leak detection system can remove without the fluid head on the bottom liner exceeding one foot. The action leakage rate shall include an adequate safety margin to allow for uncertainties in the design, e.g., slope, hydraulic conductivity, thickness of drainage material, construction, operation, and location of the leak detection system, waste and leachate characteristics, likelihood and amounts of other sources of liquids in the leak detection system, and proposed response actions, e.g., the action leakage rate shall consider decreases in the flow capacity of the system over time resulting from siltation and clogging, rib layover and creep of synthetic components of the system, overburden pressures, etc.

(b) To determine if the action leakage rate has been exceeded, the owner or operator shall convert the weekly or monthly flow rate from the monitoring data obtained under Subsection R315-264-226(d) to an average daily flow rate, gallons per acre per day, for each sump. Unless the Director approves a different calculation, the average daily flow rate for each sump shall be calculated weekly during the active life and closure period, and if the unit is closed in accordance with Subsection R315-264-228(b), monthly during the post-closure care period when monthly monitoring is required under Subsection R315-264-226(d).

R315-264-223. Response Actions.

(a) The owner or operator of surface impoundment units subject to Subsection R315-264-221(c) or (d) shall have an approved response action plan before receipt of waste. The response action plan shall set forth the actions to be taken if the action leakage rate has been exceeded. At a minimum, the response action plan shall describe the actions specified in Subsection R315-264-223(b).

(b) If the flow rate into the leak detection system exceeds the action leakage rate for any sump, the owner or operator shall:

(1) Notify the Director in writing of the exceedance within 7 days of the determination;

(2) Submit a preliminary written assessment to the Director within 14 days of the determination, as to the amount of liquids, likely sources of liquids, possible location, size, and cause of any leaks, and short-term actions taken and planned;

(3) Determine to the extent practicable the location, size, and cause of any leak;

(4) Determine whether waste receipt should cease or be curtailed, whether any waste should be removed from the unit for inspection, repairs, or controls, and whether or not the unit should be closed;

(5) Determine any other short-term and longer-term actions to be taken to mitigate or stop any leaks; and

(6) Within 30 days after the notification that the action leakage rate has been exceeded, submit to the Director the results of the analyses specified in Subsections R315-264-223(b)(3), (4), and (5), the results of actions taken, and actions planned. Monthly thereafter, as long as the flow rate in the leak detection system exceeds the action leakage rate, the owner or operator shall submit to the Director a report summarizing the results of any remedial actions taken and actions planned.

(c) To make the leak and/or remediation determinations in Subsections R315-264-223(b)(3), (4), and (5), the owner or operator shall:

(1)(i) Assess the source of liquids and amounts of liquids by source,

(ii) Conduct a fingerprint, hazardous constituent, or other analyses of the liquids in the leak detection system to identify the source of liquids and possible location of any leaks, and the hazard and mobility of the liquid; and

(iii) Assess the seriousness of any leaks in terms of potential for escaping into the environment; or

(2) Document why such assessments are not needed.

R315-264-226. Monitoring and Inspection.

(a) During construction and installation, liners, except in the case of existing portions of surface impoundments exempt from Subsection R315-264-221(a), and cover systems, e.g., membranes, sheets, or coatings, shall be inspected for uniformity, damage, and imperfections, e.g., holes, cracks, thin spots, or foreign materials. Immediately after construction or installation:

(1) Synthetic liners and covers shall be inspected to ensure tight seams and joints and the absence of tears, punctures, or blisters; and

(2) Soil-based and admixed liners and covers shall be inspected for imperfections including lenses, cracks, channels, root holes, or other structural non-uniformities that may cause an increase in the permeability of the liner or cover.

(b) While a surface impoundment is in operation, it shall be inspected weekly and after storms to detect evidence of any of the following:

(1) Deterioration, malfunctions, or improper operation of overtopping control systems;

(2) Sudden drops in the level of the impoundment's contents; and

(3) Severe erosion or other signs of deterioration in dikes or other containment devices.

(c) Prior to the issuance of a permit, and after any extended period of time, at least six months, during which the impoundment was not in service, the owner or operator shall obtain a certification from a qualified engineer that the impoundment's dike, including that portion of any dike which provides freeboard, has structural integrity. The certification shall establish, in particular, that the dike:

(1) Will withstand the stress of the pressure exerted by the types and amounts of wastes to be placed in the impoundment; and

(2) Will not fail due to scouring or piping, without dependence on any liner system included in the surface impoundment construction.

(d)(1) An owner or operator required to have a leak detection system under Subsection R315-264-221(c) or (d) shall record the amount of liquids removed from each leak detection system sump at least once each week during the active life and closure period.

(2) After the final cover is installed, the amount of liquids removed from each leak detection system sump shall be recorded at least monthly. If the liquid level in the sump stays below the pump operating level for two consecutive months, the amount of liquids in the sumps shall be recorded at least quarterly. If the liquid level in the sump stays below the pump operating level for two consecutive quarters, the amount of liquids in the sumps shall be recorded at least semi-annually. If at any time during the post-closure care period the pump operating level is exceeded at units on quarterly or semi-annual recording schedules, the owner or operator shall return to monthly recording of amounts of liquids removed from each sump until the liquid level again stays below the pump operating level for two consecutive months.

(3) "Pump operating level" is a liquid level proposed by the owner or operator and approved by the Director based on pump activation level, sump dimensions, and level that avoids backup into the drainage layer and minimizes head in the sump.

R315-264-227. Emergency Repairs; Contingency Plans.

(a) A surface impoundment shall be removed from service in accordance with Subsection R315-264-227(b) when:

(1) The level of liquids in the impoundment suddenly drops and the drop is not known to be caused by changes in the flows into or out of the impoundment; or

(2) The dike leaks.

(b) When a surface impoundment shall be removed from service as required by Subsection R315-264-227(a), the owner or operator shall:

(1) Immediately shut off the flow or stop the addition of wastes into the impoundment;

(2) Immediately contain any surface leakage which has occurred or is occurring;

(3) Immediately stop the leak;

(4) Take any other necessary steps to stop or prevent catastrophic failure;

(5) If a leak cannot be stopped by any other means, empty the impoundment; and

(6) Notify the Director of the problem in writing within seven days after detecting the problem.

(c) As part of the contingency plan required in Sections R315-264-50 through 56, the owner or operator shall specify a procedure for complying with the requirements of Subsection R315-264-227(b).

(d) No surface impoundment that has been removed from service in accordance with the requirements of Section R315-264-227 may be restored to service unless the portion of the impoundment which was failing is repaired and the following steps are taken:

(1) If the impoundment was removed from service as the result of actual or imminent dike failure, the dike's structural

integrity shall be recertified in accordance with Subsection R315-264-226(c).

(2) If the impoundment was removed from service as the result of a sudden drop in the liquid level, then:

(i) For any existing portion of the impoundment, a liner shall be installed in compliance with Subsection R315-264-221(a); and

(ii) For any other portion of the impoundment, the repaired liner system shall be certified by a qualified engineer as meeting the design specifications approved in the permit.

(e) A surface impoundment that has been removed from service in accordance with the requirements of Section R315-264-227 and that is not being repaired shall be closed in accordance with the provisions of Section R315-264-228.

R315-264-228. Closure and Post-Closure Care.

(a) At closure, the owner or operator shall:

(1) Remove or decontaminate all waste residues, contaminated containment system components, liners, etc., contaminated subsoils, and structures and equipment contaminated with waste and leachate, and manage them as hazardous waste unless Subsection R315-261-3(d) applies; or

(2)(i) Eliminate free liquids by removing liquid wastes or solidifying the remaining wastes and waste residues;

(ii) Stabilize remaining wastes to a bearing capacity sufficient to support final cover; and

(iii) Cover the surface impoundment with a final cover designed and constructed to:

(A) Provide long-term minimization of the migration of liquids through the closed impoundment;

(B) Function with minimum maintenance;

(C) Promote drainage and minimize erosion or abrasion of the final cover;

(D) Accommodate settling and subsidence so that the cover's integrity is maintained; and

(E) Have a permeability less than or equal to the permeability of any bottom liner system or natural subsoils present.

(b) If some waste residues or contaminated materials are left in place at final closure, the owner or operator shall comply with all post-closure requirements contained in Sections R315-264-117 through 120, including maintenance and monitoring throughout the post- closure care period, specified in the permit under Section R315-264-117. The owner or operator shall:

(1) Maintain the integrity and effectiveness of the final cover, including making repairs to the cap as necessary to correct the effects of settling, subsidence, erosion, or other events;

(2) Maintain and monitor the leak detection system in accordance with Subsections R315-264-221(c)(2)(iv) and (3) and 226(d), and comply with all other applicable leak detection system requirements of Rule R315-264;

(3) Maintain and monitor the ground-water monitoring system and comply with all other applicable requirements of Sections R315-264-90 through 101; and

(4) Prevent run-on and run-off from eroding or otherwise damaging the final cover.

(c)(1) If an owner or operator plans to close a surface impoundment in accordance with Subsection R315-264-228(a)(1), and the impoundment does not comply with the liner requirements of Subsection R315-264-221(a) and is not exempt from them in accordance with Subsection R315-264-221(b), then:

(i) The closure plan for the impoundment under Section R315-264-112 shall include both a plan for complying with Subsection R315-264-228(a)(1) and a contingent plan for complying with Subsection R315-264-228(a)(2) in case not all contaminated subsoils can be practicably removed at closure; and

(ii) The owner or operator shall prepare a contingent post-closure plan under Section R315-264-118 for complying with Subsection R315-264-228(b) in case not all contaminated subsoils can be practicably removed at closure.

(2) The cost estimates calculated under Sections R315-264-142 and 264-144 for closure and post-closure care of an impoundment subject to Subsection R315-264-228(c) shall include the cost of complying with the contingent closure plan and the contingent post-closure plan, but are not required to include the cost of expected closure under Subsection R315-264-228(a)(1).

R315-264-229. Special Requirements for Ignitable or Reactive Waste.

Ignitable or reactive waste shall not be placed in a surface impoundment, unless the waste and impoundment satisfy all applicable requirements of Rule R315-268, and:

(a) The waste is treated, rendered, or mixed before or immediately after placement in the impoundment so that:

(1) The resulting waste, mixture, or dissolution of material no longer meets the definition of ignitable or reactive waste under Sections R315-261-21 or 23; and

(2) Subsection R315-264-17(b) is complied with; or

(b) The waste is managed in such a way that it is protected from any material or conditions which may cause it to ignite or react; or

(c) The surface impoundment is used solely for emergencies.

R315-264-230. Special Requirements for Incompatible Wastes.

Incompatible wastes, or incompatible wastes and materials, see appendix V of Rule R315-264 for examples, shall not be placed in the same surface impoundment, unless Subsection R315-264-17(b) is complied with.

R315-264-231. Special Requirements for Hazardous Wastes F020, F021, F022, F023, F026, and F027.

(a) Hazardous Wastes F020, F021, F022, F023, F026, and F027 shall not be placed in a surface impoundment unless the owner or operator operates the surface impoundment in accordance with a management plan for these wastes that is approved by the Director pursuant to the standards set out in Subsection R315-264-231(a), and in accord with all other applicable requirements of Rule R315-264. The factors to be considered are:

(1) The volume, physical, and chemical characteristics of the wastes, including their potential to migrate through soil or to volatilize or escape into the atmosphere;

(2) The attenuative properties of underlying and surrounding soils or other materials;

(3) The mobilizing properties of other materials co-disposed with these wastes; and

(4) The effectiveness of additional treatment, design, or monitoring techniques.

(b) The Director may determine that additional design, operating, and monitoring requirements are necessary for surface impoundments managing hazardous wastes F020, F021, F022, F023, F026, and F027 in order to reduce the possibility of migration of these wastes to ground water, surface water, or air so as to protect human health and the environment.

R315-264-232. Air Emission Standards.

The owner or operator shall manage all hazardous waste placed in a surface impoundment in accordance with the applicable requirements of Sections R315-264-1050 through 1065 and 1080 through 1090.

R315-264-250. Waste Piles -- Applicability.

(a) The regulations in Sections R315-264-250 through 254 and 256 through 259 apply to owners and operators of facilities that store or treat hazardous waste in piles, except as Section R315-264-1 provides otherwise.

(b) The regulations in Sections R315-264-250 through 254 and 256 through 259 do not apply to owners or operators of waste piles that are closed with wastes left in place. Such waste piles are subject to regulation under Sections R315-264-300 through 304, 309 and 310, and 312 through 317, Landfills.

(c) The owner or operator of any waste pile that is inside or under a structure that provides protection from precipitation so that neither run-off nor leachate is generated is not subject to regulation under Section R315-264-251 or under Sections R315-264-90 through 101, provided that:

(1) Liquids or materials containing free liquids are not placed in the pile;

(2) The pile is protected from surface water run-on by the structure or in some other manner;

(3) The pile is designed and operated to control dispersal of the waste by wind, where necessary, by means other than wetting; and

(4) The pile will not generate leachate through decomposition or other reactions.

R315-264-251. Design and Operating Requirements.

(a) A waste pile, except for an existing portion of a waste pile, shall have:

(1) A liner that is designed, constructed, and installed to prevent any migration of wastes out of the pile into the adjacent subsurface soil or ground water or surface water at any time during the active life, including the closure period, of the waste pile. The liner may be constructed of materials that may allow waste to migrate into the liner itself, but not into the adjacent subsurface soil or ground water or surface water, during the active life of the facility. The liner shall be:

(i) Constructed of materials that have appropriate chemical properties and sufficient strength and thickness to prevent failure due to pressure gradients, including static head and external hydrogeologic forces, physical contact with the waste or leachate to which they are exposed, climatic conditions, the stress of installation, and the stress of daily operation;

(ii) Placed upon a foundation or base capable of providing support to the liner and resistance to pressure gradients above and below the liner to prevent failure of the liner due to settlement, compression, or uplift; and

(iii) Installed to cover all surrounding earth likely to be in contact with the waste or leachate; and

(2) A leachate collection and removal system immediately above the liner that is designed, constructed, maintained, and operated to collect and remove leachate from the pile. The Director shall specify design and operating conditions in the permit to ensure that the leachate depth over the liner does not exceed 30 cm, one foot. The leachate collection and removal system shall be:

(i) Constructed of materials that are:

(A) Chemically resistant to the waste managed in the pile and the leachate expected to be generated; and

(B) Of sufficient strength and thickness to prevent collapse under the pressures exerted by overlaying wastes, waste cover materials, and by any equipment used at the pile; and

(ii) Designed and operated to function without clogging through the scheduled closure of the waste pile.

(b) The owner or operator shall be exempted from the requirements of Subsection R315-264-251(a), if the Director finds, based on a demonstration by the owner or operator, that alternate design and operating practices, together with location characteristics, will prevent the migration of any hazardous constituents, see Section R315-264-93, into the ground water or surface water at any future time. In deciding whether to grant an exemption, the Director shall consider:

(1) The nature and quantity of the wastes;

(2) The proposed alternate design and operation;

(3) The hydrogeologic setting of the facility, including attenuative capacity and thickness of the liners and soils present between the pile and ground water or surface water; and

(4) All other factors which would influence the quality and mobility of the leachate produced and the potential for it to migrate to ground water or surface water.

(c) The owner or operator of each new waste pile unit, each lateral expansion of a waste pile unit, and each replacement of an existing waste pile unit shall install two or more liners and a leachate collection and removal system above and between such liners.

(1)(i) The liner system shall include:

(A) A top liner designed and constructed of materials, e.g., a geomembrane, to prevent the migration of hazardous constituents into such liner during the active life and post-closure care period; and

(B) A composite bottom liner, consisting of at least two components. The upper component shall be designed and constructed of materials, e.g., a geomembrane, to prevent the migration of hazardous constituents into this component during the active life and post-closure care period. The lower component shall be designed and constructed of materials to minimize the migration of hazardous constituents if a breach in the upper component were to occur. The lower component shall be constructed of at least 3 feet, 91 cm, of compacted soil material with a hydraulic conductivity of no more than 1×10^{-7} cm/sec.

(ii) The liners shall comply with Subsections R315-264-251(a)(1)(i), (ii), and (iii).

(2) The leachate collection and removal system immediately above the top liner shall be designed, constructed, operated, and maintained to collect and remove leachate from the waste pile during the active life and post-closure care period. The Director shall specify design and operating conditions in the permit to ensure that the leachate depth over the liner does not exceed 30 cm, one foot. The leachate collection and removal system shall comply with Subsections R315-264-251(c)(3)(iii) and (iv).

(3) The leachate collection and removal system between the liners, and immediately above the bottom composite liner in the case of multiple leachate collection and removal systems, is also a leak detection system. This leak detection system shall be capable of detecting, collecting, and removing leaks of hazardous constituents at the earliest practicable time through all areas of the top liner likely to be exposed to waste or leachate during the active life and post-closure care period. The requirements for a leak detection system in Subsection R315-264-251(c) are satisfied by installation of a system that is, at a minimum:

(i) Constructed with a bottom slope of one percent or more;

(ii) Constructed of granular drainage materials with a hydraulic conductivity of 1×10^{-2} cm/sec or more and a thickness of 12 inches, 30.5 cm, or more; or constructed of synthetic or geonet drainage materials with a transmissivity of 3×10^{-5} m^2/sec or more:

(iii) Constructed of materials that are chemically resistant to the waste managed in the waste pile and the leachate expected to be generated, and of sufficient strength and thickness to prevent collapse under the pressures exerted by overlying wastes, waste cover materials, and equipment used at the waste pile;

(iv) Designed and operated to minimize clogging during the active life and post-closure care period; and

(v) Constructed with sumps and liquid removal methods, e.g., pumps, of sufficient size to collect and remove liquids from

the sump and prevent liquids from backing up into the drainage layer. Each unit shall have its own sump(s). The design of each sump and removal system shall provide a method for measuring and recording the volume of liquids present in the sump and of liquids removed.

(4) The owner or operator shall collect and remove pumpable liquids in the leak detection system sumps to minimize the head on the bottom liner.

(5) The owner or operator of a leak detection system that is not located completely above the seasonal high water table shall demonstrate that the operation of the leak detection system will not be adversely affected by the presence of ground water.

(d) The Director may approve alternative design or operating practices to those specified in Subsection R315-264-251(c) if the owner or operator demonstrates to the Director that such design and operating practices, together with location characteristics:

(1) Will prevent the migration of any hazardous constituent into the ground water or surface water at least as effectively as the liners and leachate collection and removal systems specified in Subsection R315-264-251(c); and

(2) Will allow detection of leaks of hazardous constituents through the top liner at least as effectively.

(e) Subsection R315-264-251(c) does not apply to monofills that are granted a waiver by the Director in accordance with Section R315-264-221(e).

(f) The owner or operator of any replacement waste pile unit is exempt from Subsection R315-264-251(c) if:

(1) The existing unit was constructed in compliance with the design standards of section 3004(o)(1)(A)(i) and 3004(o)(5) of the Resource Conservation and Recovery Act; and

(2) There is no reason to believe that the liner is not functioning as designed.

(g) The owner or operator shall design, construct, operate, and maintain a run-on control system capable of preventing flow onto the active portion of the pile during peak discharge from at least a 25-year storm.

(h) The owner or operator shall design, construct, operate, and maintain a run-off management system to collect and control at least the water volume resulting from a 24-hour, 25-year storm.

(i) Collection and holding facilities, e.g., tanks or basins, associated with run-on and run-off control systems shall be emptied or otherwise managed expeditiously after storms to maintain design capacity of the system.

(j) If the pile contains any particulate matter which may be subject to wind dispersal, the owner or operator shall cover or otherwise manage the pile to control wind dispersal.

(k) The Director shall specify in the permit all design and operating practices that are necessary to ensure that the requirements of Section R315-264-251 are satisfied.

R315-264-252. Action Leakage Rate.

(a) The Director shall approve an action leakage rate for waste pile units subject to Subsections R315-264-251(c) or (d). The action leakage rate is the maximum design flow rate that the leak detection system can remove without the fluid head on the bottom liner exceeding one foot. The action leakage rate shall include an adequate safety margin to allow for uncertainties in the design, e.g., slope, hydraulic conductivity, thickness of drainage material, construction, operation, and location of the leak detection system, waste and leachate characteristics, likelihood and amounts of other sources of liquids in the leak detection system, and proposed response actions, e.g., the action leakage rate shall consider decreases in the flow capacity of the system over time resulting from siltation and clogging, rib layover and creep of synthetic components of the system, overburden pressures, etc.

(b) To determine if the action leakage rate has been exceeded, the owner or operator shall convert the weekly flow rate from the monitoring data obtained under Subsection R315-264-254(c) to an average daily flow rate, gallons per acre per day, for each sump. Unless the Director approves a different calculation, the average daily flow rate for each sump shall be calculated weekly during the active life and closure period.

R315-264-253. Response Actions.

(a) The owner or operator of waste pile units subject to Subsections R315-264-251(c) or (d) shall have an approved response action plan before receipt of waste. The response action plan shall set forth the actions to be taken if the action leakage rate has been exceeded. At a minimum, the response action plan shall describe the actions specified in Subsection R315-264-253(b).

(b) If the flow rate into the leak detection system exceeds the action leakage rate for any sump, the owner or operator shall:

(1) Notify the Director in writing of the exceedance within 7 days of the determination;

(2) Submit a preliminary written assessment to the Director within 14 days of the determination, as to the amount of liquids, likely sources of liquids, possible location, size, and cause of any leaks, and short-term actions taken and planned;

(3) Determine to the extent practicable the location, size, and cause of any leak;

(4) Determine whether waste receipt should cease or be curtailed, whether any waste should be removed from the unit for inspection, repairs, or controls, and whether or not the unit should be closed;

(5) Determine any other short-term and long-term actions to be taken to mitigate or stop any leaks; and

(6) Within 30 days after the notification that the action leakage rate has been exceeded, submit to the Director the results of the analyses specified in Subsections R315-264-253(b)(3), (4), and (5), the results of actions taken, and actions planned. Monthly thereafter, as long as the flow rate in the leak detection system exceeds the action leakage rate, the owner or operator shall submit to the Director a report summarizing the results of any remedial actions taken and actions planned.

(c) To make the leak and/or remediation determinations in Subsections R315-264-253(b)(3), (4), and (5), the owner or operator shall:

(1)(i) Assess the source of liquids and amounts of liquids by source,

(ii) Conduct a fingerprint, hazardous constituent, or other analyses of the liquids in the leak detection system to identify the source of liquids and possible location of any leaks, and the hazard and mobility of the liquid; and

(iii) Assess the seriousness of any leaks in terms of potential for escaping into the environment; or

(2) Document why such assessments are not needed.

R315-264-254. Monitoring and Inspection.

(a) During construction or installation, liners, except in the case of existing portions of piles exempt from Subsection R315-264-251(a), and cover systems, e.g., membranes, sheets, or coatings, shall be inspected for uniformity, damage, and imperfections, e.g., holes, cracks, thin spots, or foreign materials. Immediately after construction or installation:

(1) Synthetic liners and covers shall be inspected to ensure tight seams and joints and the absence of tears, punctures, or blisters; and

(2) Soil-based and admixed liners and covers shall be inspected for imperfections including lenses, cracks, channels, root holes, or other structural non-uniformities that may cause an increase in the permeability of the liner or cover.

(b) While a waste pile is in operation, it shall be inspected weekly and after storms to detect evidence of any of the

following:

(1) Deterioration, malfunctions, or improper operation of run-on and run-off control systems;

(2) Proper functioning of wind dispersal control systems, where present; and

(3) The presence of leachate in and proper functioning of leachate collection and removal systems, where present.

(c) An owner or operator required to have a leak detection system under Subsection R315-264-251(c) shall record the amount of liquids removed from each leak detection system sump at least once each week during the active life and closure period.

R315-264-256. Special Requirements for Ignitable or Reactive Waste.

Ignitable or reactive waste shall not be placed in a waste pile unless the waste and waste pile satisfy all applicable requirements of Rule R315-268, and:

(a) The waste is treated, rendered, or mixed before or immediately after placement in the pile so that:

(1) The resulting waste, mixture, or dissolution of material no longer meets the definition of ignitable or reactive waste under Sections R315-261-21 or 23; and

(2) Subsection R315-264-17(b) is complied with; or

(b) The waste is managed in such a way that it is protected from any material or conditions which may cause it to ignite or react.

R315-264-257. Special Requirements for Incompatible Wastes.

(a) Incompatible wastes, or incompatible wastes and materials, see appendix V of Rule R315-264 for examples, shall not be placed in the same pile, unless Subsection R315-264-17(b) is complied with.

(b) A pile of hazardous waste that is incompatible with any waste or other material stored nearby in containers, other piles, open tanks, or surface impoundments shall be separated from the other materials, or protected from them by means of a dike, berm, wall, or other device.

(c) Hazardous waste shall not be piled on the same base where incompatible wastes or materials were previously piled, unless the base has been decontaminated sufficiently to ensure compliance with Subsection R315-264-17(b).

R315-264-258. Closure and Post-Closure Care.

(a) At closure, the owner or operator shall remove or decontaminate all waste residues, contaminated containment system components, liners, etc., contaminated subsoils, and structures and equipment contaminated with waste and leachate, and manage them as hazardous waste unless Subsection R315-261-3(d) applies.

(b) If, after removing or decontaminating all residues and making all reasonable efforts to effect removal or decontamination of contaminated components, subsoils, structures, and equipment as required in Subsection R315-264-258(a), the owner or operator finds that not all contaminated subsoils can be practicably removed or decontaminated, he shall close the facility and perform post-closure care in accordance with the closure and post-closure care requirements that apply to landfills, Section R315-264-310.

(c)(1) The owner or operator of a waste pile that does not comply with the liner requirements of Subsection R315-264-251(a)(1) and is not exempt from them in accordance with Subsections R315-264-250(c) or 251(b), shall:

(i) Include in the closure plan for the pile under Section R315-264-112 both a plan for complying with Subsection R315-264-258(a) and a contingent plan for complying with Subsection R315-264-258(b) in case not all contaminated subsoils can be practicably removed at closure; and

(ii) Prepare a contingent post-closure plan under Section R315-264-118 for complying with Subsection R315-264-258(b) in case not all contaminated subsoils can be practicably removed at closure.

(2) The cost estimates calculated under Sections R315-264-142 and 144 for closure and post-closure care of a pile subject to this Subsection R315-264-258(c) shall include the cost of complying with the contingent closure plan and the contingent post-closure plan, but are not required to include the cost of expected closure under Subsection R315-264-258(a).

R315-264-259. Special Requirements for Hazardous Wastes F020, F021, F022, F023, F026, and F027.

(a) Hazardous Wastes F020, F021, F022, F023, F026, and F027 shall not be placed in waste piles that are not enclosed, as defined in Subsection R315-264-250(c), unless the owner or operator operates the waste pile in accordance with a management plan for these wastes that is approved by the Director pursuant to the standards set out in Subsection R315-264-259(a), and in accord with all other applicable requirements of Rule R315-264. The factors to be considered are:

(1) The volume, physical, and chemical characteristics of the wastes, including their potential to migrate through soil or to volatilize or escape into the atmosphere;

(2) The attenuative properties of underlying and surrounding soils or other materials;

(3) The mobilizing properties of other materials co-disposed with these wastes; and

(4) The effectiveness of additional treatment, design, or monitoring techniques.

(b) The Director may determine that additional design, operating, and monitoring requirements are necessary for piles managing hazardous wastes F020, F021, F022, F023, F026, and F027 in order to reduce the possibility of migration of these wastes to ground water, surface water, or air so as to protect human health and the environment.

R315-264-270. Land Treatment -- Applicability.

The regulations in Sections R315-264-270 through 283 apply to owners and operators of facilities that treat or dispose of hazardous waste in land treatment units, except as Section R315-264-1 provides otherwise.

R315-264-271. Treatment Program.

(a) An owner or operator subject to Sections R315-264-270 through 283 shall establish a land treatment program that is designed to ensure that hazardous constituents placed in or on the treatment zone are degraded, transformed, or immobilized within the treatment zone. The Director shall specify in the facility permit the elements of the treatment program, including:

(1) The wastes that are capable of being treated at the unit based on a demonstration under Section R315-264-272;

(2) Design measures and operating practices necessary to maximize the success of degradation, transformation, and immobilization processes in the treatment zone in accordance with Subsection R315-264-273(a); and

(3) Unsaturated zone monitoring provisions meeting the requirements of Section R315-264-278.

(b) The Director shall specify in the facility permit the hazardous constituents that shall be degraded, transformed, or immobilized under Sections R315-264-270 through 283. Hazardous constituents are constituents identified in appendix VIII of Rule R315-261 that are reasonably expected to be in, or derived from, waste placed in or on the treatment zone.

(c) The Director shall specify the vertical and horizontal dimensions of the treatment zone in the facility permit. The treatment zone is the portion of the unsaturated zone below and including the land surface in which the owner or operator intends to maintain the conditions necessary for effective

degradation, transformation, or immobilization of hazardous constituents. The maximum depth of the treatment zone shall be:

(1) No more than 1.5 meters, 5 feet, from the initial soil surface; and

(2) More than 1 meter, 3 feet, above the seasonal high water table.

R315-264-272. Treatment Demonstration.

(a) For each waste that will be applied to the treatment zone, the owner or operator shall demonstrate, prior to application of the waste, that hazardous constituents in the waste can be completely degraded, transformed, or immobilized in the treatment zone.

(b) In making this demonstration, the owner or operator may use field tests, laboratory analyses, available data, or, in the case of existing units, operating data. If the owner or operator intends to conduct field tests or laboratory analyses in order to make the demonstration required under Subsection R315-264-272(a), he shall obtain a treatment or disposal permit under Section R315-270-63. The Director shall specify in this permit the testing, analytical, design, and operating requirements, including the duration of the tests and analyses, and, in the case of field tests, the horizontal and vertical dimensions of the treatment zone, monitoring procedures, closure and clean-up activities, necessary to meet the requirements in Subsection R315-264-272(c).

(c) Any field test or laboratory analysis conducted in order to make a demonstration under Subsection R315-264-272(a) shall:

(1) Accurately simulate the characteristics and operating conditions for the proposed land treatment unit including:

(i) The characteristics of the waste, including the presence of appendix VIII of Rule R315-261 constituents;

(ii) The climate in the area;

(iii) The topography of the surrounding area;

(iv) The characteristics of the soil in the treatment zone, including depth; and

(v) The operating practices to be used at the unit.

(2) Be likely to show that hazardous constituents in the waste to be tested will be completely degraded, transformed, or immobilized in the treatment zone of the proposed land treatment unit; and

(3) Be conducted in a manner that protects human health and the environment considering:

(i) The characteristics of the waste to be tested;

(ii) The operating and monitoring measures taken during the course of the test;

(iii) The duration of the test;

(iv) The volume of waste used in the test;

(v) In the case of field tests, the potential for migration of hazardous constituents to ground water or surface water.

R315-264-273. Design and Operating Requirements.

The Director shall specify in the facility permit how the owner or operator will design, construct, operate, and maintain the land treatment unit in compliance with Section R315-264-273.

(a) The owner or operator shall design, construct, operate, and maintain the unit to maximize the degradation, transformation, and immobilization of hazardous constituents in the treatment zone. The owner or operator shall design, construct, operate, and maintain the unit in accord with all design and operating conditions that were used in the treatment demonstration under Section R315-264-272. At a minimum, the Director shall specify the following in the facility permit:

(1) The rate and method of waste application to the treatment zone;

(2) Measures to control soil pH;

(3) Measures to enhance microbial or chemical reactions, e.g., fertilization, tilling; and

(4) Measures to control the moisture content of the treatment zone.

(b) The owner or operator shall design, construct, operate, and maintain the treatment zone to minimize run-off of hazardous constituents during the active life of the land treatment unit.

(c) The owner or operator shall design, construct, operate, and maintain a run-on control system capable of preventing flow onto the treatment zone during peak discharge from at least a 25-year storm.

(d) The owner or operator shall design, construct, operate, and maintain a run-off management system to collect and control at least the water volume resulting from a 24-hour, 25-year storm.

(e) Collection and holding facilities, e.g., tanks or basins, associated with run-on and run-off control systems shall be emptied or otherwise managed expeditiously after storms to maintain the design capacity of the system.

(f) If the treatment zone contains particulate matter which may be subject to wind dispersal, the owner or operator shall manage the unit to control wind dispersal.

(g) The owner or operator shall inspect the unit weekly and after storms to detect evidence of:

(1) Deterioration, malfunctions, or improper operation of run-on and run-off control systems; and

(2) Improper functioning of wind dispersal control measures.

R315-264-276. Food-Chain Crops.

The Director may allow the growth of food-chain crops in or on the treatment zone only if the owner or operator satisfies the conditions of Section R315-264-276. The Director shall specify in the facility permit the specific food-chain crops which may be grown.

(a)(1) The owner or operator shall demonstrate that there is no substantial risk to human health caused by the growth of such crops in or on the treatment zone by demonstrating, prior to the planting of such crops, that hazardous constituents other than cadmium:

(i) Will not be transferred to the food or feed portions of the crop by plant uptake or direct contact, and will not otherwise be ingested by food-chain animals, e.g., by grazing; or

(ii) Will not occur in greater concentrations in or on the food or feed portions of crops grown on the treatment zone than in or on identical portions of the same crops grown on untreated soils under similar conditions in the same region.

(2) The owner or operator shall make the demonstration required under Subsection R315-264-276(a) prior to the planting of crops at the facility for all constituents identified in appendix VIII of Rule R315-261 that are reasonably expected to be in, or derived from, waste placed in or on the treatment zone.

(3) In making a demonstration under Subsection R315-264-276(a), the owner or operator may use field tests, greenhouse studies, available data, or, in the case of existing units, operating data, and shall:

(i) Base the demonstration on conditions similar to those present in the treatment zone, including soil characteristics, e.g., pH, cation exchange capacity, specific wastes, application rates, application methods, and crops to be grown; and

(ii) Describe the procedures used in conducting any tests, including the sample selection criteria, sample size, analytical methods, and statistical procedures.

(4) If the owner or operator intends to conduct field tests or greenhouse studies in order to make the demonstration required under Subsection R315-264-276(a), he shall obtain a permit for conducting such activities.

(b) The owner or operator shall comply with the following conditions if cadmium is contained in wastes applied to the treatment zone:

(1)(i) The pH of the waste and soil mixture shall be 6.5 or greater at the time of each waste application, except for waste containing cadmium at concentrations of 2 mg/kg, dry weight, or less;

(ii) The annual application of cadmium from waste shall not exceed 0.5 kilograms per hectare, kg/ha, on land used for tobacco, leafy vegetables, or root crops grown for human consumption or any other food-chain crop;

(iii) The cumulative application of cadmium from waste shall not exceed 5 kg/ha if the waste and soil mixture has a pH of less than 6.5; and

(iv) If the waste and soil mixture has a pH of 6.5 or greater or is maintained at a pH of 6.5 or greater during crop growth, the cumulative application of cadmium from waste shall not exceed: 5 kg/ha if soil cation exchange capacity (CEC) is less than 5 meq/100g; 10 kg/ha if soil CEC is 5-15 meq/100g; and 20 kg/ha if soil CEC is greater than 15 meq/100g; or

(2)(i) Animal feed shall be the only food-chain crop produced;

(ii) The pH of the waste and soil mixture shall be 6.5 or greater at the time of waste application or at the time the crop is planted, whichever occurs later, and this pH level shall be maintained whenever food-chain crops are grown;

(iii) There shall be an operating plan which demonstrates how the animal feed will be distributed to preclude ingestion by humans. The operating plan shall describe the measures to be taken to safeguard against possible health hazards from cadmium entering the food chain, which may result from alternative land uses; and

(iv) Future property owners shall be notified by a stipulation in the land record or property deed which states that the property has received waste at high cadmium application rates and that food-chain crops shall not be grown except in compliance with Subsection R315-264-276(b)(2).

R315-264-278. Unsaturated Zone Monitoring.

An owner or operator subject to Sections R315-270 through 283 shall establish an unsaturated zone monitoring program to discharge the following responsibilities:

(a) The owner or operator shall monitor the soil and soil-pore liquid to determine whether hazardous constituents migrate out of the treatment zone.

(1) The Director shall specify the hazardous constituents to be monitored in the facility permit. The hazardous constituents to be monitored are those specified under Section R315-264-271(b).

(2) The Director may require monitoring for principal hazardous constituents (PHCs) in lieu of the constituents specified under Section R315-264-271(b). PHCs are hazardous constituents contained in the wastes to be applied at the unit that are the most difficult to treat, considering the combined effects of degradation, transformation, and immobilization. The Director shall establish PHCs if he finds, based on waste analyses, treatment demonstrations, or other data, that effective degradation, transformation, or immobilization of the PHCs will assure treatment at at least equivalent levels for the other hazardous constituents in the wastes.

(b) The owner or operator shall install an unsaturated zone monitoring system that includes soil monitoring using soil cores and soil-pore liquid monitoring using devices such as lysimeters. The unsaturated zone monitoring system shall consist of a sufficient number of sampling points at appropriate locations and depths to yield samples that:

(1) Represent the quality of background soil-pore liquid quality and the chemical make-up of soil that has not been affected by leakage from the treatment zone; and

(2) Indicate the quality of soil-pore liquid and the chemical make-up of the soil below the treatment zone.

(c) The owner or operator shall establish a background value for each hazardous constituent to be monitored under Subsection R315-264-278(a). The permit shall specify the background values for each constituent or specify the procedures to be used to calculate the background values.

(1) Background soil values may be based on a one-time sampling at a background plot having characteristics similar to those of the treatment zone.

(2) Background soil-pore liquid values shall be based on at least quarterly sampling for one year at a background plot having characteristics similar to those of the treatment zone.

(3) The owner or operator shall express all background values in a form necessary for the determination of statistically significant increases under Subsection R315-264-278(f).

(4) In taking samples used in the determination of all background values, the owner or operator shall use an unsaturated zone monitoring system that complies with Subsection R315-264-278(b)(1).

(d) The owner or operator shall conduct soil monitoring and soil-pore liquid monitoring immediately below the treatment zone. The Director shall specify the frequency and timing of soil and soil-pore liquid monitoring in the facility permit after considering the frequency, timing, and rate of waste application, and the soil permeability. The owner or operator shall express the results of soil and soil-pore liquid monitoring in a form necessary for the determination of statistically significant increases under Subsection R315-264-278(f).

(e) The owner or operator shall use consistent sampling and analysis procedures that are designed to ensure sampling results that provide a reliable indication of soil-pore liquid quality and the chemical make-up of the soil below the treatment zone. At a minimum, the owner or operator shall implement procedures and techniques for:

(1) Sample collection;

(2) Sample preservation and shipment;

(3) Analytical procedures; and

(4) Chain of custody control.

(f) The owner or operator shall determine whether there is a statistically significant change over background values for any hazardous constituent to be monitored under Subsection R315-264-278(a) below the treatment zone each time he conducts soil monitoring and soil-pore liquid monitoring under Subsection R315-264-278(d).

(1) In determining whether a statistically significant increase has occurred, the owner or operator shall compare the value of each constituent, as determined under Subsection R315-264-278(d), to the background value for that constituent according to the statistical procedure specified in the facility permit under Subsection R315-264-278(e).

(2) The owner or operator shall determine whether there has been a statistically significant increase below the treatment zone within a reasonable time period after completion of sampling. The Director shall specify that time period in the facility permit after considering the complexity of the statistical test and the availability of laboratory facilities to perform the analysis of soil and soil-pore liquid samples.

(3) The owner or operator shall determine whether there is a statistically significant increase below the treatment zone using a statistical procedure that provides reasonable confidence that migration from the treatment zone will be identified. The Director shall specify a statistical procedure in the facility permit that he finds:

(i) Is appropriate for the distribution of the data used to establish background values; and

(ii) Provides a reasonable balance between the probability of falsely identifying migration from the treatment zone and the probability of failing to identify real migration from the

treatment zone.

(g) If the owner or operator determines, pursuant to Subsection R315-264-278(f), that there is a statistically significant increase of hazardous constituents below the treatment zone, he shall:

(1) Notify the Director of this finding in writing within seven days. The notification shall indicate what constituents have shown statistically significant increases.

(2) Within 90 days, submit to the Director an application for a permit modification to modify the operating practices at the facility in order to maximize the success of degradation, transformation, or immobilization processes in the treatment zone.

(h) If the owner or operator determines, pursuant to Subsection R315-264-278(f), that there is a statistically significant increase of hazardous constituents below the treatment zone, he may demonstrate that a source other than regulated units caused the increase or that the increase resulted from an error in sampling, analysis, or evaluation. While the owner or operator may make a demonstration under Subsection R315-264-278(h) in addition to, or in lieu of, submitting a permit modification application under Subsection R315-264-278(g)(2), he is not relieved of the requirement to submit a permit modification application within the time specified in Subsection R315-264-278(g)(2) unless the demonstration made under Subsection R315-264-278(h) successfully shows that a source other than regulated units caused the increase or that the increase resulted from an error in sampling, analysis, or evaluation. In making a demonstration under Subsection R315-264-278(h), the owner or operator shall:

(1) Notify the Director in writing within seven days of determining a statistically significant increase below the treatment zone that he intends to make a determination under Subsection R315-264-278(h);

(2) Within 90 days, submit a report to the Director demonstrating that a source other than the regulated units caused the increase or that the increase resulted from error in sampling, analysis, or evaluation;

(3) Within 90 days, submit to the Director an application for a permit modification to make any appropriate changes to the unsaturated zone monitoring program at the facility; and

(4) Continue to monitor in accordance with the unsaturated zone monitoring program established under Section R315-264-278.

R315-264-279. Recordkeeping.

The owner or operator shall include hazardous waste application dates and rates in the operating record required under Section R315-264-73.

R315-264-280. Closure and Post-Closure Care.

(a) During the closure period the owner or operator shall:

(1) Continue all operations, including pH control, necessary to maximize degradation, transformation, or immobilization of hazardous constituents within the treatment zone as required under Subsection R315-264-273(a), except to the extent such measures are inconsistent with Subsection R315-264-280(a)(8).

(2) Continue all operations in the treatment zone to minimize run-off of hazardous constituents as required under Subsection R315-264-273(b);

(3) Maintain the run-on control system required under Subsection R315-264-273(c);

(4) Maintain the run-off management system required under Subsection R315-264-273(d);

(5) Control wind dispersal of hazardous waste if required under Subsection R315-264-273(f);

(6) Continue to comply with any prohibitions or conditions concerning growth of food-chain crops under Section R315-264-276;

(7) Continue unsaturated zone monitoring in compliance with Section R315-264-278, except that soil-pore liquid monitoring may be terminated 90 days after the last application of waste to the treatment zone; and

(8) Establish a vegetative cover on the portion of the facility being closed at such time that the cover will not substantially impede degradation, transformation, or immobilization of hazardous constituents in the treatment zone. The vegetative cover shall be capable of maintaining growth without extensive maintenance.

(b) For the purpose of complying with Section R315-264-115, when closure is completed the owner or operator may submit to the Director certification by an independent, qualified soil scientist, in lieu of a qualified Professional Engineer, that the facility has been closed in accordance with the specifications in the approved closure plan.

(c) During the post-closure care period the owner or operator shall:

(1) Continue all operations, including pH control, necessary to enhance degradation and transformation and sustain immobilization of hazardous constituents in the treatment zone to the extent that such measures are consistent with other post-closure care activities;

(2) Maintain a vegetative cover over closed portions of the facility;

(3) Maintain the run-on control system required under Subsection R315-264-273(c);

(4) Maintain the run-off management system required under Subsection R315-264-273(d);

(5) Control wind dispersal of hazardous waste if required under Subsection R315-264-273(f);

(6) Continue to comply with any prohibitions or conditions concerning growth of food-chain crops under Section R315-264-276; and

(7) Continue unsaturated zone monitoring in compliance with Section R315-264-278, exect that soil-pore liquid monitoring may be terminated 90 days after the last application of waste to the treatment zone.

(d) The owner or operator is not subject to regulation under Subsections R315-264-280(a)(8) and (c) if the Director finds that the level of hazardous constituents in the treatment zone soil does not exceed the background value of those constituents by an amount that is statistically significant when using the test specified in Subsection R315-264-280(d)(3). The owner or operator may submit such a demonstration to the Director at any time during the closure or post-closure care periods. For the purposes of Subsection R315-264-280(d):

(1) The owner or operator shall establish background soil values and determine whether there is a statistically significant increase over those values for all hazardous constituents specified in the facility permit under Subsection R315-264-271(b).

(i) Background soil values may be based on a one-time sampling of a background plot having characteristics similar to those of the treatment zone.

(ii) The owner or operator shall express background values and values for hazardous constituents in the treatment zone in a form necessary for the determination of statistically significant increases under Subsection R315-264-280(d)(3).

(2) In taking samples used in the determination of background and treatment zone values, the owner or operator shall take samples at a sufficient number of sampling points and at appropriate locations and depths to yield samples that represent the chemical make-up of soil that has not been affected by leakage from the treatment zone and the soil within the treatment zone, respectively.

(3) In determining whether a statistically significant increase has occurred, the owner or operator shall compare the

value of each constituent in the treatment zone to the background value for that constituent using a statistical procedure that provides reasonable confidence that constituent presence in the treatment zone will be identified. The owner or operator shall use a statistical procedure that:

(i) Is appropriate for the distribution of the data used to establish background values; and

(ii) Provides a reasonable balance between the probability of falsely identifying hazardous constituent presence in the treatment zone and the probability of failing to identify real presence in the treatment zone.

(e) The owner or operator is not subject to regulation under Sections R315-264-90 through 101 if the Director finds that the owner or operator satisfies Subsection R315-264-280(d) and if unsaturated zone monitoring under Section R315-264-278 indicates that hazardous constituents have not migrated beyond the treatment zone during the active life of the land treatment unit.

R315-264-281. Special Requirements for Ignitable or Reactive Waste.

The owner or operator shall not apply ignitable or reactive waste to the treatment zone unless the waste and the treatment zone meet all applicable requirements of Rule R315-268, and:

(a) The waste is immediately incorporated into the soil so that:

(1) The resulting waste, mixture, or dissolution of material no longer meets the definition of ignitable or reactive waste under Sections R315-261-21 or 23; and

(2) Subsection R315-264-17(b) is complied with; or

(b) The waste is managed in such a way that it is protected from any material or conditions which may cause it to ignite or react.

R315-264-282. Special Requirements for Incompatible Wastes.

The owner or operator shall not place incompatible wastes, or incompatible wastes and materials, see appendix V of Rule R315-264 for examples, in or on the same treatment zone, unless Subsection R315-264-17(b) is complied with.

R315-264-283. Special Requirements for Hazardous Wastes F020, F021, F022, F023, F026, and F027.

(a) Hazardous Wastes F020, F021, F022, F023, F026, and F027 shall not be placed in a land treatment unit unless the owner or operator operates the facility in accordance with a management plan for these wastes that is approved by the Director pursuant to the standards set out in Subsection R315-264-283(a), and in accord with all other applicable requirements of Rule R315-264. The factors to be considered are:

(1) The volume, physical, and chemical characteristics of the wastes, including their potential to migrate through soil or to volatilize or escape into the atmosphere;

(2) The attenuative properties of underlying and surrounding soils or other materials;

(3) The mobilizing properties of other materials co-disposed with these wastes; and

(4) The effectiveness of additional treatment, design, or monitoring techniques.

(b) The Director may determine that additional design, operating, and monitoring requirements are necessary for land treatment facilities managing hazardous wastes F020, F021, F022, F023, F026, and F027 in order to reduce the possibility of migration of these wastes to ground water, surface water, or air so as to protect human health and the environment.

R315-264-300. Landfills -- Applicability.

The regulations in Sections R315-264-300 through 317 apply to owners and operators of facilities that dispose of hazardous waste in landfills, except as Section R315-264-1 provides otherwise.

R315-264-301. Design and Operating Requirements.

(a) Any landfill that is not covered by Subsection R315-264-301(c) or 40 CFR 265.301(a), which is adopted by reference, shall have a liner system for all portions of the landfill, except for portions of such landfill that existed on or prior to October 10, 1984. The liner system shall have:

(1) A liner that is designed, constructed, and installed to prevent any migration of wastes out of the landfill to the adjacent subsurface soil or ground water or surface water at anytime during the active life, including the closure period, of the landfill. The liner shall be constructed of materials that prevent wastes from passing into the liner during the active life of the facility. The liner shall be:

(i) Constructed of materials that have appropriate chemical properties and sufficient strength and thickness to prevent failure due to pressure gradients, including static head and external hydrogeologic forces, physical contact with the waste or leachate to which they are exposed, climatic conditions, the stress of installation, and the stress of daily operation;

(ii) Placed upon a foundation or base capable of providing support to the liner and resistance to pressure gradients above and below the liner to prevent failure of the liner due to settlement, compression, or uplift; and

(iii) Installed to cover all surrounding earth likely to be in contact with the waste or leachate; and

(2) A leachate collection and removal system immediately above the liner that is designed, constructed, maintained, and operated to collect and remove leachate from the landfill. The Director shall specify design and operating conditions in the permit to ensure that the leachate depth over the liner does not exceed 30 cm, one foot. The leachate collection and removal system shall be:

(i) Constructed of materials that are:

(A) Chemically resistant to the waste managed in the landfill and the leachate expected to be generated; and

(B) Of sufficient strength and thickness to prevent collapse under the pressures exerted by overlying wastes, waste cover materials, and by any equipment used at the landfill; and

(ii) Designed and operated to function without clogging through the scheduled closure of the landfill.

(b) The owner or operator shall be exempted from the requirements of Subsection R315-264-301(a) if the Director finds, based on a demonstration by the owner or operator, that alternative design and operating practices, together with location characteristics, will prevent the migration of any hazardous constituents, see Section R315-264-93, into the ground water or surface water at any future time. In deciding whether to grant an exemption, the Director shall consider:

(1) The nature and quantity of the wastes;

(2) The proposed alternate design and operation;

(3) The hydrogeologic setting of the facility, including the attenuative capacity and thickness of the liners and soils present between the landfill and ground water or surface water; and

(4) All other factors which would influence the quality and mobility of the leachate produced and the potential for it to migrate to ground water or surface water.

(c) The owner or operator of each new landfill unit on which construction commences after January 29, 1992, each lateral expansion of a landfill unit on which construction commences after July 29, 1992, and each replacement of an existing landfill unit that is to commence reuse after July 29, 1992 shall install two or more liners and a leachate collection and removal system above and between such liners. "Construction commences" is as defined in Section R315-260-10 under "existing facility".

(1)(i) The liner system shall include:

(A) A top liner designed and constructed of materials, e.g., a geomembrane, to prevent the migration of hazardous constituents into such liner during the active life and post-closure care period; and

(B) A composite bottom liner, consisting of at least two components. The upper component shall be designed and constructed of materials, e.g., a geomembrane, to prevent the migration of hazardous constituents into this component during the active life and post-closure care period. The lower component shall be designed and constructed of materials to minimize the migration of hazardous constituents if a breach in the upper component were to occur. The lower component shall be constructed of at least 91 cm, 3 feet, of compacted soil material with a hydraulic conductivity of no more than 1 x 10−7 cm/sec.

(ii) The liners shall comply with Subsections R315-264-301(a)(1)(i), (ii), and (iii).

(2) The leachate collection and removal system immediately above the top liner shall be designed, constructed, operated, and maintained to collect and remove leachate from the landfill during the active life and post-closure care period. The Director shall specify design and operating conditions in the permit to ensure that the leachate depth over the liner does not exceed 30 cm, one foot. The leachate collection and removal system shall comply with Subsections R315-264-301(c)(3)(iii) and (iv).

(3) The leachate collection and removal system between the liners, and immediately above the bottom composite liner in the case of multiple leachate collection and removal systems, is also a leak detection system. This leak detection system shall be capable of detecting, collecting, and removing leaks of hazardous constituents at the earliest practicable time through all areas of the top liner likely to be exposed to waste or leachate during the active life and post-closure care period. The requirements for a leak detection system in Subsection R315-264-301(c) are satisfied by installation of a system that is, at a minimum:

(i) Constructed with a bottom slope of one percent or more;

(ii) Constructed of granular drainage materials with a hydraulic conductivity of 1×10−2 cm/sec or more and a thickness of 30.5 cm, 12 inches, or more; or constructed of synthetic or geonet drainage materials with a transmissivity of 3 x 10−5 m2/sec or more;

(iii) Constructed of materials that are chemically resistant to the waste managed in the landfill and the leachate expected to be generated, and of sufficient strength and thickness to prevent collapse under the pressures exerted by overlying wastes, waste cover materials, and equipment used at the landfill;

(iv) Designed and operated to minimize clogging during the active life and post-closure care period; and

(v) Constructed with sumps and liquid removal methods, e.g., pumps, of sufficient size to collect and remove liquids from the sump and prevent liquids from backing up into the drainage layer. Each unit shall have its own sump(s). The design of each sump and removal system shall provide a method for measuring and recording the volume of liquids present in the sump and of liquids removed.

(4) The owner or operator shall collect and remove pumpable liquids in the leak detection system sumps to minimize the head on the bottom liner.

(5) The owner or operator of a leak detection system that is not located completely above the seasonal high water table shall demonstrate that the operation of the leak detection system will not be adversely affected by the presence of ground water.

(d) The Director may approve alternative design or operating practices to those specified in Subsection R315-264-301(c) if the owner or operator demonstrates to the Director that such design and operating practices, together with location characteristics:

(1) Will prevent the migration of any hazardous constituent into the ground water or surface water at least as effectively as the liners and leachate collection and removal systems specified in Subsection R315-264-301(c); and

(2) Will allow detection of leaks of hazardous constituents through the top liner at least as effectively.

(e) The double liner requirement set forth in Subsection R315-264-301(c) may be waived by the Director for any monofill, if:

(1) The monofill contains only hazardous wastes from foundry furnace emission controls or metal casting molding sand, and such wastes do not contain constituents which would render the wastes hazardous for reasons other than the Toxicity Characteristic in Section R315-261-24, with EPA Hazardous Waste Numbers D004 through D017; and

(2)(i)(A) The monofill has at least one liner for which there is no evidence that such liner is leaking;

(B) The monofill is located more than one-quarter mile from an "underground source of drinking water," as that term is defined in Section R315-270-2); and

(C) The monofill is in compliance with generally applicable ground-water monitoring requirements for facilities with permits under Section 19-6-108; or

(ii) The owner or operator demonstrates that the monofill is located, designed and operated so as to assure that there will be no migration of any hazardous constituent into ground water or surface water at any future time.

(f) The owner or operator of any replacement landfill unit is exempt from Subsection R315-264-301(c) if:

(1) The existing unit was constructed in compliance with the design standards of section 3004(o)(1)(A)(i) and (o)(5) of the Resource Conservation and Recovery Act; and

(2) There is no reason to believe that the liner is not functioning as designed.

(g) The owner or operator shall design, construct, operate, and maintain a run-on control system capable of preventing flow onto the active portion of the landfill during peak discharge from at least a 24-hour, 25-year storm.

(h) The owner or operator shall design, construct, operate, and maintain a run-off management system to collect and control at least the water volume resulting from a 24-hour, 25-year storm.

(i) Collection and holding facilities, e.g., tanks or basins, associated with run-on and run-off control systems shall be emptied or otherwise managed expeditiously after storms to maintain design capacity of the system.

(j) If the landfill contains any particulate matter which may be subject to wind dispersal, the owner or operator shall cover or otherwise manage the landfill to control wind dispersal.

(k) The Director shall specify in the permit all design and operating practices that are necessary to ensure that the requirements of Section R315-264-301 are satisfied.

R315-264-302. Action Leakage Rate.

(a) The Director shall approve an action leakage rate for landfill units subject to Subsections R315-264-301(c) or (d). The action leakage rate is the maximum design flow rate that the leak detection system can remove without the fluid head on the bottom liner exceeding 30.5 cm, l foot. The action leakage rate shall include an adequate safety margin to allow for uncertainties in the design, e.g., slope, hydraulic conductivity, thickness of drainage material, construction, operation, and location of the leak detection system, waste and leachate characteristics, likelihood and amounts of other sources of liquids in the leak detection system, and proposed response actions, e.g., the action leakage rate shall consider decreases in the flow capacity of the system over time resulting from siltation

and clogging, rib layover and creep of synthetic components of the system, overburden pressures, etc.

(b) To determine if the action leakage rate has been exceeded, the owner or operator shall convert the weekly or monthly flow rate from the monitoring data obtained under Subsection R315-264-303(c) to an average daily flow rate, gallons per acre per day, for each sump. Unless the Director approves a different calculation, the average daily flow rate for each sump shall be calculated weekly during the active life and closure period, and monthly during the post-closure care period when monthly monitoring is required under Subsection R315-264-303(c).

R315-264-303. Monitoring and Inspection.

(a) During construction or installation, liners, except in the case of existing portions of landfills exempt from Subsection R315-264-301(a) and cover systems, e.g., membranes, sheets, or coatings, shall be inspected for uniformity, damage, and imperfections, e.g., holes, cracks, thin spots, or foreign materials. Immediately after construction or installation:

(1) Synthetic liners and covers shall be inspected to ensure tight seams and joints and the absence of tears, punctures, or blisters; and

(2) Soil-based and admixed liners and covers shall be inspected for imperfections including lenses, cracks, channels, root holes, or other structural non-uniformities that may cause an increase in the permeability of the liner or cover.

(b) While a landfill is in operation, it shall be inspected weekly and after storms to detect evidence of any of the following:

(1) Deterioration, malfunctions, or improper operation of run-on and run-off control systems;

(2) Proper functioning of wind dispersal control systems, where present; and

(3) The presence of leachate in and proper functioning of leachate collection and removal systems, where present.

(c)(1) An owner or operator required to have a leak detection system under Subsection R315-264-301(c) or (d) shall record the amount of liquids removed from each leak detection system sump at least once each week during the active life and closure period.

(2) After the final cover is installed, the amount of liquids removed from each leak detection system sump shall be recorded at least monthly. If the liquid level in the sump stays below the pump operating level for two consecutive months, the amount of liquids in the sumps shall be recorded at least quarterly. If the liquid level in the sump stays below the pump operating level for two consecutive quarters, the amount of liquids in the sumps shall be recorded at least semi-annually. If at any time during the post-closure care period the pump operating level is exceeded at units on quarterly or semi-annual recording schedules, the owner or operator shall return to monthly recording of amounts of liquids removed from each sump until the liquid level again stays below the pump operating level for two consecutive months.

(3) "Pump operating level" is a liquid level proposed by the owner or operator and approved by the Director based on pump activation level, sump dimensions, and level that avoids backup into the drainage layer and minimizes head in the sump.

R315-264-304. Response Actions.

(a) The owner or operator of landfill units subject to Subsections R315-264-301(c) or (d) shall have an approved response action plan before receipt of waste. The response action plan shall set forth the actions to be taken if the action leakage rate has been exceeded. At a minimum, the response action plan shall describe the actions specified in Subsection R315-264-304(b).

(b) If the flow rate into the leak detection system exceeds the action leakage rate for any sump, the owner or operator shall:

(1) Notify the Director in writing of the exceedance within 7 days of the determination;

(2) Submit a preliminary written assessment to the Director within 14 days of the determination, as to the amount of liquids, likely sources of liquids, possible location, size, and cause of any leaks, and short-term actions taken and planned;

(3) Determine to the extent practicable the location, size, and cause of any leak;

(4) Determine whether waste receipt should cease or be curtailed, whether any waste should be removed from the unit for inspection, repairs, or controls, and whether or not the unit should be closed;

(5) Determine any other short-term and longer-term actions to be taken to mitigate or stop any leaks; and

(6) Within 30 days after the notification that the action leakage rate has been exceeded, submit to the Director the results of the analyses specified in Subsections R315-264-304(b)(3), (4), and (5), the results of actions taken, and actions planned. Monthly thereafter, as long as the flow rate in the leak detection system exceeds the action leakage rate, the owner or operator shall submit to the Director a report summarizing the results of any remedial actions taken and actions planned.

(c) To make the leak and/or remediation determinations in Subsections R315-264-304(b)(3), (4), and (5), the owner or operator shall:

(1)(i) Assess the source of liquids and amounts of liquids by source,

(ii) Conduct a fingerprint, hazardous constituent, or other analyses of the liquids in the leak detection system to identify the source of liquids and possible location of any leaks, and the hazard and mobility of the liquid; and

(iii) Assess the seriousness of any leaks in terms of potential for escaping into the environment; or

(2) Document why such assessments are not needed.

R315-264-309. Surveying and Recordkeeping.

The owner or operator of a landfill shall maintain the following items in the operating record required under Section R315-264-73:

(a) On a map, the exact location and dimensions, including depth, of each cell with respect to permanently surveyed benchmarks; and

(b) The contents of each cell and the approximate location of each hazardous waste type within each cell.

R315-264-310. Closure and Post-Closure Care.

(a) At final closure of the landfill or upon closure of any cell, the owner or operator shall cover the landfill or cell with a final cover designed and constructed to:

(1) Provide long-term minimization of migration of liquids through the closed landfill;

(2) Function with minimum maintenance;

(3) Promote drainage and minimize erosion or abrasion of the cover;

(4) Accommodate settling and subsidence so that the cover's integrity is maintained; and

(5) Have a permeability less than or equal to the permeability of any bottom liner system or natural subsoils present.

(b) After final closure, the owner or operator shall comply with all post-closure requirements contained in Sections R315-264-117 through 120, including maintenance and monitoring throughout the post-closure care period, specified in the permit under Section R315-264-117. The owner or operator shall:

(1) Maintain the integrity and effectiveness of the final cover, including making repairs to the cap as necessary to correct the effects of settling, subsidence, erosion, or other

events;

(2) Continue to operate the leachate collection and removal system until leachate is no longer detected;

(3) Maintain and monitor the leak detection system in accordance with Subsections R315-264-301(c)(3)(iv) and (4) and R315-264-303(c), and comply with all other applicable leak detection system requirements of Rul3 R315-264;

(4) Maintain and monitor the ground-water monitoring system and comply with all other applicable requirements of Sections R315-264-90 through 101;

(5) Prevent run-on and run-off from eroding or otherwise damaging the final cover; and

(6) Protect and maintain surveyed benchmarks used in complying with Section R315-264-309.

R315-264-312. Special Requirements for Ignitable or Reactive Waste.

(a) Except as provided in Subsection R315-264-312(b), and in Section R316-264-316, ignitable or reactive waste shall not be placed in a landfill, unless the waste and landfill meet all applicable requirements of Rule R315-268, and:

(1) The resulting waste, mixture, or dissolution of material no longer meets the definition of ignitable or reactive waste under Sections R315-261-21 or 23; and

(2) Subsection R315-264-17(b) is complied with.

(b) Except for prohibited wastes which remain subject to treatment standards in Sections R315-268-40 through 49, ignitable wastes in containers may be landfilled without meeting the requirements of Subsection R315-264-312(a), provided that the wastes are disposed of in such a way that they are protected from any material or conditions which may cause them to ignite. At a minimum, ignitable wastes shall be disposed of in non-leaking containers which are carefully handled and placed so as to avoid heat, sparks, rupture, or any other condition that might cause ignition of the wastes; shall be covered daily with soil or other non-combustible material to minimize the potential for ignition of the wastes; and shall not be disposed of in cells that contain or will contain other wastes which may generate heat sufficient to cause ignition of the waste.

R315-264-313. Special Requirements for Incompatible Wastes.

Incompatible wastes, or incompatible wastes and materials, (see appendix V of Rule R315-264 for examples) shall not be placed in the same landfill cell, unless Subsection R315-264-17(b) is complied with.

R315-264-314. Special Requirements for Bulk and Containerized Liquids.

(a) The placement of bulk or non-containerized liquid hazardous waste or hazardous waste containing free liquids, whether or not sorbents have been added, in any landfill is prohibited.

(b) To demonstrate the absence or presence of free liquids in either a containerized or a bulk waste, the following test shall be used: Method 9095B, Paint Filter Liquids Test, as described in "Test Methods for Evaluating Solid Waste, Physical/Chemical Methods," EPA Publication SW-846, as incorporated by reference in Section R315-260-11.

(c) Containers holding free liquids shall not be placed in a landfill unless:

(1) All free-standing liquid:

(i) Has been removed by decanting, or other methods;

(ii) Has been mixed with sorbent or solidified so that free-standing liquid is no longer observed; or

(iii) Has been otherwise eliminated; or

(2) The container is very small, such as an ampule; or

(3) The container is designed to hold free liquids for use other than storage, such as a battery or capacitor; or

(4) The container is a lab pack as defined in Section R316-264-316 and is disposed of in accordance with Section R316-264-316.

(d) Sorbents used to treat free liquids to be disposed of in landfills shall be nonbiodegradable. Nonbiodegradable sorbents are: materials listed or described in Subsection R315-264-314(d)(1); materials that pass one of the tests in Subsection R315-264-314(d)(2); or materials that are determined by the Director to be nonbiodegradable through the Rule R315-260 petition process.

(1) Nonbiodegradable sorbents.

(i) Inorganic minerals, other inorganic materials, and elemental carbon, e.g., aluminosilicates, clays, smectites, Fuller's earth, bentonite, calcium bentonite, montmorillonite, calcined montmorillonite, kaolinite, micas - illite, vermiculites, zeolites; calcium carbonate (organic free limestone; oxides/hydroxides, alumina, lime, silica - sand, diatomaceous earth; perlite - volcanic glass; expanded volcanic rock; volcanic ash; cement kiln dust; fly ash; rice hull ash; activated charcoal/activated carbon; or

(ii) High molecular weight synthetic polymers, e.g., polyethylene, high density polyethylene (HDPE), polypropylene, polystyrene, polyurethane, polyacrylate, polynorborene, polyisobutylene, ground synthetic rubber, cross-linked allylstyrene and tertiary butyl copolymers. This does not include polymers derived from biological material or polymers specifically designed to be degradable; or

(iii) Mixtures of these nonbiodegradable materials.

(2) Tests for nonbiodegradable sorbents.

(i) The sorbent material is determined to be nonbiodegradable under ASTM Method G21-70 (1984a)-Standard Practice for Determining Resistance of Synthetic Polymer Materials to Fungi; or

(ii) The sorbent material is determined to be nonbiodegradable under ASTM Method G22-76 (1984b)-Standard Practice for Determining Resistance of Plastics to Bacteria; or

(iii) The sorbent material is determined to be non-biodegradable under OECD test 301B: CO2 Evolution - Modified Sturm Test.

(e) The placement of any liquid which is not a hazardous waste in a landfill is prohibited unless the owner or operator of such landfill demonstrates to the Director, or the Director determines that:

(1) The only reasonably available alternative to the placement in such landfill is placement in a landfill or unlined surface impoundment, whether or not permitted or operating under interim status, which contains, or may reasonably be anticipated to contain, hazardous waste; and

(2) Placement in such owner or operator's landfill will not present a risk of contamination of any "underground source of drinking water," as that term is defined in Section R315-270-2.

R315-264-315. Special Requirements for Containers.

Unless they are very small, such as an ampule, containers shall be either:

(a) At least 90 percent full when placed in the landfill; or

(b) Crushed, shredded, or similarly reduced in volume to the maximum practical extent before burial in the landfill.

R315-264-316. Disposal of Small Containers of Hazardous Waste in Overpacked Drums (Lab Packs).

Small containers of hazardous waste in overpacked drums, lab packs, may be placed in a landfill if the following requirements are met:

(a) Hazardous waste shall be packaged in non-leaking inside containers. The inside containers shall be of a design and constructed of a material that will not react dangerously with, be decomposed by, or be ignited by the contained waste. Inside

containers shall be tightly and securely sealed. The inside containers shall be of the size and type specified in the Department of Transportation hazardous materials regulations, 49 CFR parts 173, 178, and 179, if those regulations specify a particular inside container for the waste.

(b) The inside containers shall be overpacked in an open head Department of Transportation-specification metal shipping container, 49 CFR parts 178 and 179, of no more than 416-liter, 110 gallon, capacity and surrounded by, at a minimum, a sufficient quantity of sorbent material, determined to be nonbiodegradable in accordance with Subsection R315-264-314(d), to completely sorb all of the liquid contents of the inside containers. The metal outer container shall be full after it has been packed with inside containers and sorbent material.

(c) The sorbent material used shall not be capable of reacting dangerously with, being decomposed by, or being ignited by the contents of the inside containers, in accordance with Subsection R315-264-17(b).

(d) Incompatible wastes, as defined in Section R315-260-10, shall not be placed in the same outside container.

(e) Reactive wastes, other than cyanide- or sulfide-bearing waste as defined in Subsection R315-261-23(a)(5), shall be treated or rendered non-reactive prior to packaging in accordance with Subsections R315-264-316(a) through (d). Cyanide- and sulfide-bearing reactive waste may be packed in accordance with Subsections R315-264-316(a) through (d) without first being treated or rendered non-reactive.

(f) Such disposal is in compliance with the requirements of Rule R315-268. Persons who incinerate lab packs according to the requirements in Subsection R315-268-42(c)(1) may use fiber drums in place of metal outer containers. Such fiber drums shall meet the Department of Transportation specifications in 49 CFR 173.12 and be overpacked according to the requirements in Subsection R315-264-316(b).

R315-264-317. Special Requirements for Hazardous Wastes F020, F021, F022, F023, F026, and F027.

(a) Hazardous Wastes F020, F021, F022, F023, F026, and F027 shall not be placed in a landfill unless the owner or operator operates the landfill in accord with a management plan for these wastes that is approved by the Director pursuant to the standards set out in Section R315-264-317, and in accord with all other applicable requirements of Rule R315-264. The factors to be considered are:

(1) The volume, physical, and chemical characteristics of the wastes, including their potential to migrate through the soil or to volatilize or escape into the atmosphere;

(2) The attenuative properties of underlying and surrounding soils or other materials;

(3) The mobilizing properties of other materials co-disposed with these wastes; and

(4) The effectiveness of additional treatment, design, or monitoring requirements.

(b) The Director may determine that additional design, operating, and monitoring requirements are necessary for landfills managing hazardous wastes F020, F021, F022, F023, F026, and F027 in order to reduce the possibility of migration of these wastes to ground water, surface water, or air so as to protect human health and the environment.

R315-264-340. Incinerator -- Applicability.

(a) The regulations of Sections R315-264-340 through 351 apply to owners and operators of hazardous waste incinerators, as defined in Section R315-260-10, except as Section R315-264-1 provides otherwise.

(b) Integration of the MACT standards.

(1) Except as provided by Subsections R315-264-340(b)(2) through (b)(4), the standards of Rule R315-264 do not apply to a new hazardous waste incineration unit that becomes subject to RCRA permit requirements after October 12, 2005; or no longer apply when an owner or operator of an existing hazardous waste incineration unit demonstrates compliance with the maximum achievable control technology (MACT) requirements of Section R307-214-2 by conducting a comprehensive performance test and submitting to the Director a Notification of Compliance under Section R307-14-2 documenting compliance with the requirements of Section R307-14-2. Nevertheless, even after this demonstration of compliance with the MACT standards, RCRA permit conditions that were based on the standards of Rule R315-264 shall continue to be in effect until they are removed from the permit or the permit is terminated or revoked, unless the permit expressly provides otherwise.

(2) The MACT standards do not replace the closure requirements of Section R315-264-351 or the applicable requirements of Sections R315-264-1 through 4, 10 though 19, 30 through 37, 50 through 56, 70 through 77, 90 through 101, 110 through 120, 140 through 151, 1050 through 1065 and 1080 through 1090.

(3) The particulate matter standard of Subsection R315-264-343(c) remains in effect for incinerators that elect to comply with the alternative to the particulate matter standard under Section R307-214-2.

(4) The following requirements remain in effect for startup, shutdown, and malfunction events if you elect to comply with Subsection R35-270-235(a)(1)(i) to minimize emissions of toxic compounds from these events:

(i) Subsection R315-264-345(a) requiring that an incinerator operate in accordance with operating requirements specified in the permit; and

(ii) Subsection R315-264-345(c) requiring compliance with the emission standards and operating requirements during startup and shutdown if hazardous waste is in the combustion chamber, except for particular hazardous wastes.

(c) After consideration of the waste analysis included with part B of the permit application, the Director, in establishing the permit conditions, shall exempt the applicant from all requirements of Sections R315-264-340 through 351 except Section R315-264-341, Waste analysis, and Section R315-264-351, Closure,

(1) If the Director finds that the waste to be burned is:

(i) Listed as a hazardous waste in Sections R315-261-30 through 35 solely because it is ignitable, Hazard Code I, corrosive, Hazard Code C, or both; or

(ii) Listed as a hazardous waste in Sections R315-261-30 through 35 solely because it is reactive, Hazard Code R, for characteristics other than those listed in Subsections R315-261-23(a)(4) and (5), and will not be burned when other hazardous wastes are present in the combustion zone; or

(iii) A hazardous waste solely because it possesses the characteristic of ignitability, corrosivity, or both, as determined by the test for characteristics of hazardous wastes under Sections R315-261-20 through 24; or

(iv) A hazardous waste solely because it possesses any of the reactivity characteristics described by Subsections R315-261-23(a)(1), (2), (3), (6), (7), and (8), and will not be burned when other hazardous wastes are present in the combustion zone; and

(2) If the waste analysis shows that the waste contains none of the hazardous constituents listed in Rule R315-261, appendix VIII, which would reasonably be expected to be in the waste.

(d) If the waste to be burned is one which is described by Subsections R315-264-340(b)(1)(i), (ii), (iii), or (iv) and contains insignificant concentrations of the hazardous constituents listed in Rule R315-261, appendix VIII, then the Director may, in establishing permit conditions, exempt the applicant from all requirements of Sections R315-264-340

through 351, except Section R315-264-341, Waste analysis, and Section R315-264-351, Closure, after consideration of the waste analysis included with part B of the permit application, unless the Director finds that the waste will pose a threat to human health and the environment when burned in an incinerator.

(e) The owner or operator of an incinerator may conduct trial burns subject only to the requirements of Section R315-270-62, Short term and incinerator permits.

R315-264-341. Waste Analysis.

(a) As a portion of the trial burn plan required by Section R315-270-62, or with part B of the permit application, the owner or operator shall have included an analysis of the waste feed sufficient to provide all information required by Subsection R315-270-62(b) or Section R315-270-19. Owners or operators of new hazardous waste incinerators shall provide the information required by Subsection R315-270-62(c) or Section R315-270-19 to the greatest extent possible.

(b) Throughout normal operation the owner or operator shall conduct sufficient waste analysis to verify that waste feed to the incinerator is within the physical and chemical composition limits specified in his permit, under Subsection R315-264-345(b).

R315-264-342. Principal Organic Hazardous Constituents.

(a) Principal organic hazardous constituents in the waste feed shall be treated to the extent required by the performance standard of Section R315-264-343.

(b)(1) One or more principal organic hazardous constituents shall be specified in the facility's permit, from among those constituents listed in appendix VIII of Rule R315-261 for each waste feed to be burned. This specification shall be based on the degree of difficulty of incineration of the organic constituents in the waste and on their concentration or mass in the waste feed, considering the results of waste analyses and trial burns or alternative data submitted with part B of the facility's permit application. Organic constituents which represent the greatest degree of difficulty of incineration will be those most likely to be designated as principal organic hazardous constituents. Constituents are more likely to be designated as principal organic hazardous constituents if they are present in large quantities or concentrations in the waste.

(2) Trial principal organic hazardous constituents shall be designated for performance of trial burns in accordance with the procedure specified in Section R315-270-62 for obtaining trial burn permits.

R315-264-343. Performance Standards.

An incinerator burning hazardous waste shall be designed, constructed, and maintained so that, when operated in accordance with operating requirements specified under Section R315-264-345, it shall meet the following performance standards:

(a)(1) Except as provided in Subsection R315-264-343(a)(2), an incinerator burning hazardous waste shall achieve a destruction and removal efficiency of 99.99% for each principal organic hazardous constituent designated, under Section R315-264-342, in its permit for each waste feed. Destruction and removal efficiency is determined for each principal organic hazardous constituent from the following equation:

Destruction and removal efficiency = ((Win-Wout)/Win)x100%

where:

Win = mass feed rate of one principal organic hazardous constituent in the waste stream feeding the incinerator

and

Wout = mass emission rate of the same principal organic hazardous constituent present in exhaust emissions prior to release to the atmosphere.

(2) An incinerator burning hazardous wastes F020, F021, F022, F023, F026, or F027 shall achieve a destruction and removal efficiency of 99.9999% for each principal organic hazardous constituent designated, under Section R315-264-342, in its permit. This performance shall be demonstrated on principal organic hazardous constituents that are more difficult to incinerate than tetra-, penta-, and hexachlorodibenzo-p-dioxins and dibenzofurans. Destruction and removal efficiency is determined for each principal organic hazardous constituent from the equation in Subsection R315-264-343(a)(1).

(b) An incinerator burning hazardous waste and producing stack emissions of more than 1.8 kilograms per hour, 4 pounds per hour, of hydrogen chloride shall control hydrogen chloride emissions such that the rate of emission is no greater than the larger of either 1.8 kilograms per hour or 1% of the hydrogen chloride in the stack gas prior to entering any pollution control equipment.

(c) An incinerator burning hazardous waste shall not emit particulate matter in excess of 180 milligrams per dry standard cubic meter, 0.08 grains per dry standard cubic foot, when corrected for the amount of oxygen in the stack gas according to the formula:

$Pc = Pm \times (14/(21-Y))$

Where Pc is the corrected concentration of particulate matter, Pm is the measured concentration of particulate matter, and Y is the measured concentration of oxygen in the stack gas, using the Orsat method for oxygen analysis of dry flue gas, presented in 40 CFR 60, appendix A Method 3, which is adopted and incorporated by Section R307-221-3. This correction procedure is to be used by all hazardous waste incinerators except those operating under conditions of oxygen enrichment. For these facilities, the Director shall select an appropriate correction procedure, to be specified in the facility permit.

(d) For purposes of permit enforcement, compliance with the operating requirements specified in the permit, under Section R315-264-345, shall be regarded as compliance with Section R315-264-343. However, evidence that compliance with those permit conditions is insufficient to ensure compliance with the performance requirements of Section R315-264-343 may be "information" justifying modification, revocation, or reissuance of a permit under Section R315-270-41.

R315-264-344. Hazardous Waste Incinerator Permits.

(a) The owner or operator of a hazardous waste incinerator may burn only wastes specified in his permit and only under operating conditions specified for those wastes under Section R315-264-345, except:

(1) In approved trial burns under Section R315-270-62; or

(2) Under exemptions created by Section R315-264-340.

(b) Other hazardous wastes may be burned only after operating conditions have been specified in a new permit or a permit modification as applicable. Operating requirements for new wastes may be based on either trial burn results or alternative data included with part B of a permit application under Section R315-270-19.

(c) The permit for a new hazardous waste incinerator shall establish appropriate conditions for each of the applicable requirements of Sections R315-264-340 through 351, including but not limited to allowable waste feeds and operating conditions necessary to meet the requirements of Section R315-264-345, sufficient to comply with the following standards:

(1) For the period beginning with initial introduction of hazardous waste to the incinerator and ending with initiation of the trial burn, and only for the minimum time required to establish operating conditions required in Subsection R315-264-344(c)(2), not to exceed a duration of 720 hours operating time for treatment of hazardous waste, the operating requirements

shall be those most likely to ensure compliance with the performance standards of Section R315-264-343, based on the Director's engineering judgment. The Director may extend the duration of this period once for up to 720 additional hours when good cause for the extension is demonstrated by the applicant.

(2) For the duration of the trial burn, the operating requirements shall be sufficient to demonstrate compliance with the performance standards of Section R315-264-343 and shall be in accordance with the approved trial burn plan;

(3) For the period immediately following completion of the trial burn, and only for the minimum period sufficient to allow sample analysis, data computation, and submission of the trial burn results by the applicant, and review of the trial burn results and modification of the facility permit by the Director, the operating requirements shall be those most likely to ensure compliance with the performance standards of Section R315-264-343, based on the Director's engineering judgment.

(4) For the remaining duration of the permit, the operating requirements shall be those demonstrated, in a trial burn or by alternative data specified in Subsection R315-270-19(c), as sufficient to ensure compliance with the performance standards of Section R315-264-343.

R315-264-345. Operating Requirements.

(a) An incinerator shall be operated in accordance with operating requirements specified in the permit. These shall be specified on a case-by-case basis as those demonstrated, in a trial burn or in alternative data as specified in Subsection R315-264-344(b) and included with part B of a facility's permit application, to be sufficient to comply with the performance standards of Section R315-264-343.

(b) Each set of operating requirements shall specify the composition of the waste feed, including acceptable variations in the physical or chemical properties of the waste feed which will not affect compliance with the performance requirement of Section R315-264-343, to which the operating requirements apply. For each such waste feed, the permit shall specify acceptable operating limits including the following conditions:

(1) Carbon monoxide level in the stack exhaust gas;

(2) Waste feed rate;

(3) Combustion temperature;

(4) An appropriate indicator of combustion gas velocity;

(5) Allowable variations in incinerator system design or operating procedures; and

(6) Such other operating requirements as are necessary to ensure that the performance standards of Section R315-264-343 are met.

(c) During start-up and shut-down of an incinerator, hazardous waste, except wastes exempted in accordance with Section R315-264-340, shall not be fed into the incinerator unless the incinerator is operating within the conditions of operation, temperature, air feed rate, etc., specified in the permit.

(d) Fugitive emissions from the combustion zone shall be controlled by:

(1) Keeping the combustion zone totally sealed against fugitive emissions; or

(2) Maintaining a combustion zone pressure lower than atmospheric pressure; or

(3) An alternate means of control demonstrated, with part B of the permit application, to provide fugitive emissions control equivalent to maintenance of combustion zone pressure lower than atmospheric pressure.

(e) An incinerator shall be operated with a functioning system to automatically cut off waste feed to the incinerator when operating conditions deviate from limits established under Subsection R315-264-345(a).

(f) An incinerator shall cease operation when changes in waste feed, incinerator design, or operating conditions exceed limits designated in its permit.

R315-264-347. Monitoring and Inspections.

(a) The owner or operator shall conduct, as a minimum, the following monitoring while incinerating hazardous waste:

(1) Combustion temperature, waste feed rate, and the indicator of combustion gas velocity specified in the facility permit shall be monitored on a continuous basis.

(2) Carbon monoxide shall be monitored on a continuous basis at a point in the incinerator downstream of the combustion zone and prior to release to the atmosphere.

(3) Upon request by the Director, sampling and analysis of the waste and exhaust emissions shall be conducted to verify that the operating requirements established in the permit achieve the performance standards of Section R315-264-343.

(b) The incinerator and associated equipment, pumps, valves, conveyors, pipes, etc., shall be subjected to thorough visual inspection, at least daily, for leaks, spills, fugitive emissions, and signs of tampering.

(c) The emergency waste feed cutoff system and associated alarms shall be tested at least weekly to verify operability, unless the applicant demonstrates to the Director that weekly inspections will unduly restrict or upset operations and that less frequent inspection will be adequate. At a minimum, operational testing shall be conducted at least monthly.

(d) This monitoring and inspection data shall be recorded and the records shall be placed in the operating record required by Section R315-264-73 and maintained in the operating record for five years.

R315-264-351. Closure.

At closure the owner or operator shall remove all hazardous waste and hazardous waste residues, including, but not limited to, ash, scrubber waters, and scrubber sludges, from the incinerator site.

At closure, as throughout the operating period, unless the owner or operator can demonstrate, in accordance with Subsection R315-261-3(d), that the residue removed from the incinerator is not a hazardous waste, the owner or operator becomes a generator of hazardous waste and shall manage it in accordance with applicable requirements of Rules R315-262 through 266.

R315-264-550. Applicability of Corrective Action Management Unit (CAMU) Regulations.

(a) Except as provided in Subsection R315-264-550(b), CAMUs are subject to the requirements of Section R315-264-552.

(b) CAMUs that were approved before April 22, 2002, or for which substantially complete applications (or equivalents) were submitted to the Agency on or before November 20, 2000, are subject to the requirements in Section R315-264-551 for grandfathered CAMUs; CAMU waste, activities, and design shall not be subject to the standards in Section R315-264-552, so long as the waste, activities, and design remain within the general scope of the CAMU as approved.

R315-264-551. Grandfathered Corrective Action Management Units (CAMUs).

(a) To implement remedies under Section R315-264-101 or RCRA Section 3008(h), or to implement remedies at a permitted facility that is not subject to Section R315-264-101, the Director may designate an area at the facility as a corrective action management unit under the requirements in Section R315-264-551. Corrective action management unit means an area within a facility that is used only for managing remediation wastes for implementing corrective action or cleanup at the facility. A CAMU shall be located within the contiguous property under the control of the owner or operator where the wastes to be managed in the CAMU originated. One or more CAMUs may be designated at a facility.

(1) Placement of remediation wastes into or within a CAMU does not constitute land disposal of hazardous wastes.

(2) Consolidation or placement of remediation wastes into or within a CAMU does not constitute creation of a unit subject to minimum technology requirements.

(b)(1) The Director may designate a regulated unit, as defined in Subsection R315-264-90(a)(2), as a CAMU, or may incorporate a regulated unit into a CAMU, if:

(i) The regulated unit is closed or closing, meaning it has begun the closure process under Section R315-264-113 or 40 CFR 265.113, which is adopted by reference; and

(ii) Inclusion of the regulated unit will enhance implementation of effective, protective and reliable remedial actions for the facility.

(2) The requirements of Sections R315-264-90 through 101, 110 through 120, and 140 through 151 and the unit-specific requirements of Rules R315-264 or 265 that applied to that regulated unit shall continue to apply to that portion of the CAMU after incorporation into the CAMU.

(c) The Director shall designate a CAMU in accordance with the following:

(1) The CAMU shall facilitate the implementation of reliable, effective, protective, and cost-effective remedies;

(2) Waste management activities associated with the CAMU shall not create unacceptable risks to humans or to the environment resulting from exposure to hazardous wastes or hazardous constituents;

(3) The CAMU shall include uncontaminated areas of the facility, only if including such areas for the purpose of managing remediation waste is more protective than management of such wastes at contaminated areas of the facility;

(4) Areas within the CAMU, where wastes remain in place after closure of the CAMU, shall be managed and contained so as to minimize future releases, to the extent practicable;

(5) The CAMU shall expedite the timing of remedial activity implementation, when appropriate and practicable;

(6) The CAMU shall enable the use, when appropriate, of treatment technologies, including innovative technologies, to enhance the long-term effectiveness of remedial actions by reducing the toxicity, mobility, or volume of wastes that will remain in place after closure of the CAMU; and

(7) The CAMU shall, to the extent practicable, minimize the land area of the facility upon which wastes will remain in place after closure of the CAMU.

(d) The owner/operator shall provide sufficient information to enable the Director to designate a CAMU in accordance with the criteria in Section R315-264-552.

(e) The Director shall specify, in the permit or order, requirements for CAMUs to include the following:

(1) The areal configuration of the CAMU.

(2) Requirements for remediation waste management to include the specification of applicable design, operation and closure requirements.

(3) Requirements for ground water monitoring that are sufficient to:

(i) Continue to detect and to characterize the nature, extent, concentration, direction, and movement of existing releases of hazardous constituents in ground water from sources located within the CAMU; and

(ii) Detect and subsequently characterize releases of hazardous constituents to ground water that may occur from areas of the CAMU in which wastes will remain in place after closure of the CAMU.

(4) Closure and post-closure requirements.

(i) Closure of corrective action management units shall:

(A) Minimize the need for further maintenance; and

(B) Control, minimize, or eliminate, to the extent necessary to protect human health and the environment, for areas where wastes remain in place, post-closure escape of hazardous waste, hazardous constituents, leachate, contaminated runoff, or hazardous waste decomposition products to the ground, to surface waters, or to the atmosphere.

(ii) Requirements for closure of CAMUs shall include the following, as appropriate and as deemed necessary by the Director for a given CAMU:

(A) Requirements for excavation, removal, treatment or containment of wastes;

(B) For areas in which wastes will remain after closure of the CAMU, requirements for capping of such areas; and

(C) Requirements for removal and decontamination of equipment, devices, and structures used in remediation waste management activities within the CAMU.

(iii) In establishing specific closure requirements for CAMUs under Subsection R315-264-552(e), the Director shall consider the following factors:

(A) CAMU characteristics;

(B) Volume of wastes which remain in place after closure;

(C) Potential for releases from the CAMU;

(D) Physical and chemical characteristics of the waste;

(E) Hydrological and other relevant environmental conditions at the facility which may influence the migration of any potential or actual releases; and

(F) Potential for exposure of humans and environmental receptors if releases were to occur from the CAMU.

(iv) Post-closure requirements as necessary to protect human health and the environment, to include, for areas where wastes will remain in place, monitoring and maintenance activities, and the frequency with which such activities shall be performed to ensure the integrity of any cap, final cover, or other containment system.

(f) The Director shall document the rationale for designating CAMUs and shall make such documentation available to the public.

(g) Incorporation of a CAMU into an existing permit shall be approved by the Director according to the procedures for permit modifications under Section R315-270-41, or according to the permit modification procedures of Section R315-270-42.

(h) The designation of a CAMU does not change the Director's existing authority to address clean-up levels, media-specific points of compliance to be applied to remediation at a facility, or other remedy selection decisions.

R315-264-552. Corrective Action Management Units (CAMU).

(a) To implement remedies under Subsection R315-264-101 or RCRA Section 3008(h), or to implement remedies at a permitted facility that is not subject to Subsection R315-264-101, the Director may designate an area at the facility as a corrective action management unit under the requirements in Section R315-264-552. Corrective action management unit means an area within a facility that is used only for managing CAMU-eligible wastes for implementing corrective action or cleanup at the facility. A CAMU shall be located within the contiguous property under the control of the owner or operator where the wastes to be managed in the CAMU originated. One or more CAMUs may be designated at a facility.

(1) CAMU-eligible waste means:

(i) All solid and hazardous wastes, and all media, including ground water, surface water, soils, and sediments, and debris, that are managed for implementing cleanup. As-generated wastes, either hazardous or non-hazardous, from ongoing industrial operations at a site are not CAMU-eligible wastes.

(ii) Wastes that would otherwise meet the description in Subsection R315-264-552(a)(1)(i) are not "CAMU-Eligible Wastes" where:

(A) The wastes are hazardous wastes found during cleanup in intact or substantially intact containers, tanks, or other non-

land-based units found above ground, unless the wastes are first placed in the tanks, containers or non-land-based units as part of cleanup, or the containers or tanks are excavated during the course of cleanup; or

(B) The Director exercises the discretion in Subsection R315-264-552(a)(2) to prohibit the wastes from management in a CAMU.

(iii) Notwithstanding Subsection R315-264-552(a)(1)(i), where appropriate, as-generated non-hazardous waste may be placed in a CAMU where such waste is being used to facilitate treatment or the performance of the CAMU.

(2) The Director may prohibit, where appropriate, the placement of waste in a CAMU where the Director has or receives information that such wastes have not been managed in compliance with applicable land disposal treatment standards of Rule R315-268, or applicable unit design requirements of Rule R315-264, or applicable unit design requirements of Rule R315-265, or that non-compliance with other applicable requirements of Rules R315-260 through 266, 268, 270 and 273 likely contributed to the release of the waste.

(3) Prohibition against placing liquids in CAMUs.

(i) The placement of bulk or noncontainerized liquid hazardous waste or free liquids contained in hazardous waste, whether or not sorbents have been added, in any CAMU is prohibited except where placement of such wastes facilitates the remedy selected for the waste.

(ii) The requirements in Subsection R315-264-314(c) for placement of containers holding free liquids in landfills apply to placement in a CAMU except where placement facilitates the remedy selected for the waste.

(iii) The placement of any liquid which is not a hazardous waste in a CAMU is prohibited unless such placement facilitates the remedy selected for the waste or a demonstration is made pursuant to Subsection R315-264-314(e).

(iv) The absence or presence of free liquids in either a containerized or a bulk waste shall be determined in accordance with Subsection R315-264-314(b). Sorbents used to treat free liquids in CAMUs shall meet the requirements of Subsection R315-264-314(d).

(4) Placement of CAMU-eligible wastes into or within a CAMU does not constitute land disposal of hazardous wastes.

(5) Consolidation or placement of CAMU-eligible wastes into or within a CAMU does not constitute creation of a unit subject to minimum technology requirements.

(b)(1) The Director may designate a regulated unit, as defined in Subsection R315-264-90(a)(2), as a CAMU, or may incorporate a regulated unit into a CAMU, if:

(i) The regulated unit is closed or closing, meaning it has begun the closure process under Section R315-264-113 or 40 CFR 265.113, which is adopted by reference; and

(ii) Inclusion of the regulated unit will enhance implementation of effective, protective and reliable remedial actions for the facility.

(2) The requirements of Sections R315-264-90 through 101, 110 through 120, and 140 through 151 and the unit-specific requirements of Rules R315-264 or 265 that applied to the regulated unit shall continue to apply to that portion of the CAMU after incorporation into the CAMU.

(c) The Director shall designate a CAMU that will be used for storage and/or treatment only in accordance with Subsection R315-264-552(f). The Director shall designate all other CAMUs in accordance with the following:

(1) The CAMU shall facilitate the implementation of reliable, effective, protective, and cost-effective remedies;

(2) Waste management activities associated with the CAMU shall not create unacceptable risks to humans or to the environment resulting from exposure to hazardous wastes or hazardous constituents;

(3) The CAMU shall include uncontaminated areas of the facility, only if including such areas for the purpose of managing CAMU-eligible waste is more protective than management of such wastes at contaminated areas of the facility;

(4) Areas within the CAMU, where wastes remain in place after closure of the CAMU, shall be managed and contained so as to minimize future releases, to the extent practicable;

(5) The CAMU shall expedite the timing of remedial activity implementation, when appropriate and practicable;

(6) The CAMU shall enable the use, when appropriate, of treatment technologies, including innovative technologies, to enhance the long-term effectiveness of remedial actions by reducing the toxicity, mobility, or volume of wastes that will remain in place after closure of the CAMU; and

(7) The CAMU shall, to the extent practicable, minimize the land area of the facility upon which wastes will remain in place after closure of the CAMU.

(d) The owner/operator shall provide sufficient information to enable the Director to designate a CAMU in accordance with the criteria in Section R315-264-552. This shall include, unless not reasonably available, information on:

(1) The origin of the waste and how it was subsequently managed, including a description of the timing and circumstances surrounding the disposal and/or release;

(2) Whether the waste was listed or identified as hazardous at the time of disposal and/or release; and

(3) Whether the disposal and/or release of the waste occurred before or after the land disposal requirements of Rule R315-268 were in effect for the waste listing or characteristic.

(e) The Director shall specify, in the permit or order, requirements for CAMUs to include the following:

(1) The areal configuration of the CAMU.

(2) Except as provided in Subsection R315-264-552(g), requirements for CAMU-eligible waste management to include the specification of applicable design, operation, treatment and closure requirements.

(3) Minimum design requirements. CAMUs, except as provided in Subsection R315-264-552(f), into which wastes are placed shall be designed in accordance with the following:

(i) Unless the Director approves alternate requirements under Subsection R315-264-552(e)(3)(ii), CAMUs that consist of new, replacement, or laterally expanded units shall include a composite liner and a leachate collection system that is designed and constructed to maintain less than a 30-cm depth of leachate over the liner. For purposes of Section R315-264-552, composite liner means a system consisting of two components; the upper component shall consist of a minimum 30-mil flexible membrane liner (FML), and the lower component shall consist of at least a two-foot layer of compacted soil with a hydraulic conductivity of no more than 1 x 10-7 cm/sec. FML components consisting of high density polyethylene (HDPE) shall be at least 60 mil thick. The FML component shall be installed in direct and uniform contact with the compacted soil component;

(ii) Alternate requirements. The Director may approve alternate requirements if:

(A) The Director finds that alternate design and operating practices, together with location characteristics, will prevent the migration of any hazardous constituents into the ground water or surface water at least as effectively as the liner and leachate collection systems in Subsection R315-264-552(e)(3)(i); or

(B) The CAMU is to be established in an area with existing significant levels of contamination, and the Director finds that an alternative design, including a design that does not include a liner, would prevent migration from the unit that would exceed long-term remedial goals.

(4) Minimum treatment requirements: Unless the wastes will be placed in a CAMU for storage and/or treatment only in accordance with Subsection R315-264-552(f), CAMU-eligible wastes that, absent Section R315-264-552, would be subject to

the treatment requirements of Rule R315-268, and that the Director determines contain principal hazardous constituents shall be treated to the standards specified in Subsection R315-264-552(e)(4)(iii).

(i) Principal hazardous constituents are those constituents that the Director determines pose a risk to human health and the environment substantially higher than the cleanup levels or goals at the site.

(A) In general, the Director shall designate as principal hazardous constituents:

(I) Carcinogens that pose a potential direct risk from ingestion or inhalation at the site at or above 10^{-3}; and

(II) Non-carcinogens that pose a potential direct risk from ingestion or inhalation at the site an order of magnitude or greater over their reference dose.

(B) The Director shall also designate constituents as principal hazardous constituents, where appropriate, when risks to human health and the environment posed by the potential migration of constituents in wastes to ground water are substantially higher than cleanup levels or goals at the site; when making such a designation, the Director may consider such factors as constituent concentrations, and fate and transport characteristics under site conditions.

(C) The Director may also designate other constituents as principal hazardous constituents that the Director determines pose a risk to human health and the environment substantially higher than the cleanup levels or goals at the site.

(ii) In determining which constituents are "principal hazardous constituents," the Director shall consider all constituents which, absent Section R315-264-552, would be subject to the treatment requirements in Rule R315-268.

(iii) Waste that the Director determines contains principal hazardous constituents shall meet treatment standards determined in accordance with Subsections R315-264-552(e)(4)(iv) or (e)(4)(v).

(iv) Treatment standards for wastes placed in CAMUs.

(A) For non-metals, treatment shall achieve 90 percent reduction in total principal hazardous constituent concentrations, except as provided by Subsection R315-264-552(e)(4)(iv)(C).

(B) For metals, treatment shall achieve 90 percent reduction in principal hazardous constituent concentrations as measured in leachate from the treated waste or media, tested according to the TCLP, or 90 percent reduction in total constituent concentrations, when a metal removal treatment technology is used, except as provided by Subsection R315-264-552(e)(4)(iv)(C).

(C) When treatment of any principal hazardous constituent to a 90 percent reduction standard would result in a concentration less than 10 times the Universal Treatment Standard for that constituent, treatment to achieve constituent concentrations less than 10 times the Universal Treatment Standard is not required. Universal Treatment Standards are identified in Section R315-268-48 Table UTS.

(D) For waste exhibiting the hazardous characteristic of ignitability, corrosivity or reactivity, the waste shall also be treated to eliminate these characteristics.

(E) For debris, the debris shall be treated in accordance with Section R315-268-45, or by methods or to levels established under Subsections R315-264-552(e)(4)(iv)(A) through (D) or Subsection R315-264-552(e)(4)(v), whichever the Director determines is appropriate.

(F) Alternatives to TCLP. For metal bearing wastes for which metals removal treatment is not used, the Director may specify a leaching test other than the TCLP, SW846 Method 1311, Rule R315-260-11(c)(3)(v), to measure treatment effectiveness, provided the Director determines that an alternative leach testing protocol is appropriate for use, and that the alternative more accurately reflects conditions at the site that affect leaching.

(v) Adjusted standards. The Director may adjust the treatment level or method in Subsection R315-264-552(e)(4)(iv) to a higher or lower level, based on one or more of the following factors, as appropriate. The adjusted level or method shall be protective of human health and the environment:

(A) The technical impracticability of treatment to the levels or by the methods in Subsection R315-264-552(e)(4)(iv);

(B) The levels or methods in Subsection R315-264-552(e)(4)(iv) would result in concentrations of principal hazardous constituents (PHCs) that are significantly above or below cleanup standards applicable to the site, established either site-specifically, or promulgated under state or federal law;

(C) The views of the affected local community on the treatment levels or methods in Subsection R315-264-552(e)(4)(iv) as applied at the site, and, for treatment levels, the treatment methods necessary to achieve these levels;

(D) The short-term risks presented by the on-site treatment method necessary to achieve the levels or treatment methods in Subsection R315-264-552(e)(4)(iv);

(E) The long-term protection offered by the engineering design of the CAMU and related engineering controls:

(I) Where the treatment standards in Subsection R315-264-552(e)(4)(iv) are substantially met and the principal hazardous constituents in the waste or residuals are of very low mobility; or

(II) Where cost-effective treatment has been used and the CAMU meets the Subtitle C liner and leachate collection requirements for new land disposal units at Subsections R315-264-301(c) and (d); or

(III) Where, after review of appropriate treatment technologies, the Director determines that cost-effective treatment is not reasonably available, and the CAMU meets the Subtitle C liner and leachate collection requirements for new land disposal units at Subsection R315-264-301(c) and (d); or

(IV) Where cost-effective treatment has been used and the principal hazardous constituents in the treated wastes are of very low mobility; or

(V) Where, after review of appropriate treatment technologies, the Director determines that cost-effective treatment is not reasonably available, the principal hazardous constituents in the wastes are of very low mobility, and either the CAMU meets or exceeds the liner standards for new, replacement, or laterally expanded CAMUs in Subsections R315-264-552(e)(3)(i) and (ii), or the CAMU provides substantially equivalent or greater protection.

(vi) The treatment required by the treatment standards shall be completed prior to, or within a reasonable time after, placement in the CAMU.

(vii) For the purpose of determining whether wastes placed in CAMUs have met site-specific treatment standards, the Director may, as appropriate, specify a subset of the principal hazardous constituents in the waste as analytical surrogates for determining whether treatment standards have been met for other principal hazardous constituents. This specification shall be based on the degree of difficulty of treatment and analysis of constituents with similar treatment properties.

(5) Except as provided in Subsection R315-264-552(f), requirements for ground water monitoring and corrective action that are sufficient to:

(i) Continue to detect and to characterize the nature, extent, concentration, direction, and movement of existing releases of hazardous constituents in ground water from sources located within the CAMU; and

(ii) Detect and subsequently characterize releases of hazardous constituents to ground water that may occur from areas of the CAMU in which wastes will remain in place after closure of the CAMU; and

(iii) Require notification to the Director and corrective

action as necessary to protect human health and the environment for releases to ground water from the CAMU.

(6) Except as provided in Subsection R315-264-552(f), closure and post-closure requirements:

(i) Closure of corrective action management units shall:

(A) Minimize the need for further maintenance; and

(B) Control, minimize, or eliminate, to the extent necessary to protect human health and the environment, for areas where wastes remain in place, post-closure escape of hazardous wastes, hazardous constituents, leachate, contaminated runoff, or hazardous waste decomposition products to the ground, to surface waters, or to the atmosphere.

(ii) Requirements for closure of CAMUs shall include the following, as appropriate and as deemed necessary by the Director for a given CAMU:

(A) Requirements for excavation, removal, treatment or containment of wastes; and

(B) Requirements for removal and decontamination of equipment, devices, and structures used in CAMU-eligible waste management activities within the CAMU.

(iii) In establishing specific closure requirements for CAMUs under Subsection R315-264-552(e), the Director shall consider the following factors:

(A) CAMU characteristics;

(B) Volume of wastes which remain in place after closure;

(C) Potential for releases from the CAMU;

(D) Physical and chemical characteristics of the waste;

(E) Hydrogeological and other relevant environmental conditions at the facility which may influence the migration of any potential or actual releases; and

(F) Potential for exposure of humans and environmental receptors if releases were to occur from the CAMU.

(iv) Cap requirements:

(A) At final closure of the CAMU, for areas in which wastes will remain after closure of the CAMU, with constituent concentrations at or above remedial levels or goals applicable to the site, the owner or operator shall cover the CAMU with a final cover designed and constructed to meet the following performance criteria, except as provided in Subsection R315-264-552(e)(6)(iv)(B):

(1) Provide long-term minimization of migration of liquids through the closed unit;

(2) Function with minimum maintenance;

(3) Promote drainage and minimize erosion or abrasion of the cover;

(4) Accommodate settling and subsidence so that the cover's integrity is maintained; and

(5) Have a permeability less than or equal to the permeability of any bottom liner system or natural subsoils present.

(B) The Director may determine that modifications to Subsection R315-264-552(e)(6)(iv)(A) are needed to facilitate treatment or the performance of the CAMU, e.g., to promote biodegradation.

(v) Post-closure requirements as necessary to protect human health and the environment, to include, for areas where wastes will remain in place, monitoring and maintenance activities, and the frequency with which such activities shall be performed to ensure the integrity of any cap, final cover, or other containment system.

(f) CAMUs used for storage and/or treatment only are CAMUs in which wastes will not remain after closure. Such CAMUs shall be designated in accordance with all of the requirements of Section R315-264-552, except as follows.

(1) CAMUs that are used for storage and/or treatment only and that operate in accordance with the time limits established in the staging pile regulations at Subsections R315-264-554(d)(1)(iii), (h), and (i) are subject to the requirements for staging piles at Subsections R315-264-554(d)(1)(i) and (ii), (d)(2), (e) and (f), (j), and (k) in lieu of the performance standards and requirements for CAMUs in Subsections R315-264-552(c) and (e)(3) through (6).

(2) CAMUs that are used for storage and/or treatment only and that do not operate in accordance with the time limits established in the staging pile regulations at Subsections R315-264-554(d)(1)(iii), (h), and (i):

(i) Shall operate in accordance with a time limit, established by the Director, that is no longer than necessary to achieve a timely remedy selected for the waste, and

(ii) Are subject to the requirements for staging piles at Subsection R315-264-554(d)(1)(i) and (ii), (d)(2), (e) and (f), (j), and (k) in lieu of the performance standards and requirements for CAMUs in Subsection R315-264-552(c) and (e)(4) and (6).

(g) CAMUs into which wastes are placed where all wastes have constituent levels at or below remedial levels or goals applicable to the site do not have to comply with the requirements for liners at Subsection R315-264-552(e)(3)(i), caps at Subsection R315-264-552(e)(6)(iv), ground water monitoring requirements at Subsection R315-264-552(e)(5) or, for treatment and/or storage-only CAMUs, the design standards at Subsection R315-264-552(f).

(h) The Director shall provide public notice and a reasonable opportunity for public comment before designating a CAMU. Such notice shall include the rationale for any proposed adjustments under Subsection R315-264-552(e)(4)(v) to the treatment standards in Subsection R315-264-552(e)(4)(iv).

(i) Notwithstanding any other provision of Section R315-264-552, the Director may impose additional requirements as necessary to protect human health and the environment.

(j) Incorporation of a CAMU into an existing permit shall be approved by the Director according to the procedures for permit modifications under Section R315-270-41, or according to the permit modification procedures of Section R315-270-42.

(k) The designation of a CAMU does not change the Director's existing authority to address clean-up levels, media-specific points of compliance to be applied to remediation at a facility, or other remedy selection decisions.

R315-264-553. Temporary Units (TU).

(a) For temporary tanks and container storage areas used to treat or store hazardous remediation wastes during remedial activities required under Section R315-264-101 or RCRA 3008(h), or at a permitted facility that is not subject to Section R315-264-101, the Director may designate a unit at the facility, as a temporary unit. A temporary unit shall be located within the contiguous property under the control of the owner/operator where the wastes to be managed in the temporary unit originated. For temporary units, the Director may replace the design, operating, or closure standard applicable to these units under Rule R315-264 or 265 with alternative requirements which protect human health and the environment.

(b) Any temporary unit to which alternative requirements are applied in accordance with Subsection R315-264-553(a) shall be:

(1) Located within the facility boundary; and

(2) Used only for treatment or storage of remediation wastes.

(c) In establishing standards to be applied to a temporary unit, the Director shall consider the following factors:

(1) Length of time such unit will be in operation;

(2) Type of unit;

(3) Volumes of wastes to be managed;

(4) Physical and chemical characteristics of the wastes to be managed in the unit;

(5) Potential for releases from the unit;

(6) Hydrogeological and other relevant environmental

conditions at the facility which may influence the migration of any potential releases; and

(7) Potential for exposure of humans and environmental receptors if releases were to occur from the unit.

(d) The Director shall specify in the permit or order the length of time a temporary unit will be allowed to operate, to be no longer than a period of one year. The Director shall also specify the design, operating, and closure requirements for the unit.

(e) The Director may extend the operational period of a temporary unit once for no longer than a period of one year beyond that originally specified in the permit or order, if the Director determines that:

(1) Continued operation of the unit will not pose a threat to human health and the environment; and

(2) Continued operation of the unit is necessary to ensure timely and efficient implementation of remedial actions at the facility.

(f) Incorporation of a temporary unit or a time extension for a temporary unit into an existing permit shall be:

(1) Approved in accordance with the procedures for permit modifications under Section R315-270-41; or

(2) Requested by the owner/operator as a Class II modification according to the procedures under Section R315-270-42.

(g) The Director shall document the rationale for designating a temporary unit and for granting time extensions for temporary units and shall make such documentation available to the public.

R315-264-554. Staging Piles.

Section R315-264-554 is written in a special format to make it easier to understand the regulatory requirements. Like other regulations, this establishes enforceable legal requirements. For Section R315-264-554 "I" and "you" refer to the owner/operator.

(a) What is a staging pile? A staging pile is an accumulation of solid, non-flowing remediation waste, as defined in Section R315-260-10, that is not a containment building and is used only during remedial operations for temporary storage at a facility. A staging pile shall be located within the contiguous property under the control of the owner/operator where the wastes to be managed in the staging pile originated. Staging piles shall be designated by the Director according to the requirements in Section R315-264-554.

(1) For the purposes of Section R315-264-554, storage includes mixing, sizing, blending, or other similar physical operations as long as they are intended to prepare the wastes for subsequent management or treatment.

(b) When may I use a staging pile? You may use a staging pile to store hazardous remediation waste, or remediation waste otherwise subject to land disposal restrictions, only if you follow the standards and design criteria the Director has designated for that staging pile. The Director shall designate the staging pile in a permit or, at an interim status facility, in a closure plan or order, consistent with Subsections R315-270-72(a)(5) and (b)(5). The Director shall establish conditions in the permit, closure plan, or order that comply with Subsection R315-264-554(d) through (k).

(c) What information shall I provide to get a staging pile designated? When seeking a staging pile designation, you shall provide:

(1) Sufficient and accurate information to enable the Director to impose standards and design criteria for your staging pile according to Section R315-264-554(d) through (k);

(2) Certification by a qualified Professional Engineer for technical data, such as design drawings and specifications, and engineering studies, unless the Director determines, based on information that you provide, that this certification is not necessary to ensure that a staging pile will protect human health and the environment; and

(3) Any additional information the Director determines is necessary to protect human health and the environment.

(d) What performance criteria shall a staging pile satisfy? The Director shall establish the standards and design criteria for the staging pile in the permit, closure plan, or order.

(1) The standards and design criteria shall comply with the following:

(i) The staging pile shall facilitate a reliable, effective and protective remedy;

(ii) The staging pile shall be designed so as to prevent or minimize releases of hazardous wastes and hazardous constituents into the environment, and minimize or adequately control cross-media transfer, as necessary to protect human health and the environment, for example, through the use of liners, covers, run-off/run-on controls, as appropriate; and

(iii) The staging pile shall not operate for more than two years, except when the Director grants an operating term extension under Subsection R315-264-554(i), entitled "May I receive an operating extension for a staging pile?". You shall measure the two-year limit, or other operating term specified by the Director in the permit, closure plan, or order, from the first time you place remediation waste into a staging pile. You shall maintain a record of the date when you first placed remediation waste into the staging pile for the life of the permit, closure plan, or order, or for three years, whichever is longer.

(2) In setting the standards and design criteria, the Director shall consider the following factors:

(i) Length of time the pile will be in operation;

(ii) Volumes of wastes you intend to store in the pile;

(iii) Physical and chemical characteristics of the wastes to be stored in the unit;

(iv) Potential for releases from the unit;

(v) Hydrogeological and other relevant environmental conditions at the facility that may influence the migration of any potential releases; and

(vi) Potential for human and environmental exposure to potential releases from the unit;

(e) May a staging pile receive ignitable or reactive remediation waste? You shall not place ignitable or reactive remediation waste in a staging pile unless:

(1) You have treated, rendered or mixed the remediation waste before you placed it in the staging pile so that:

(i) The remediation waste no longer meets the definition of ignitable or reactive under Sections R315-261-21 or 23; and

(ii) You have complied with Subsection R315-264-17(b); or

(2) You manage the remediation waste to protect it from exposure to any material or condition that may cause it to ignite or react.

(f) How do I handle incompatible remediation wastes in a staging pile? The term "incompatible waste" is defined in Section R315-260-10. You shall comply with the following requirements for incompatible wastes in staging piles:

(1) You shall not place incompatible remediation wastes in the same staging pile unless you have complied with Subsection R315-264-17(b);

(2) If remediation waste in a staging pile is incompatible with any waste or material stored nearby in containers, other piles, open tanks or land disposal units, for example, surface impoundments, you shall separate the incompatible materials, or protect them from one another by using a dike, berm, wall or other device; and

(3) You shall not pile remediation waste on the same base where incompatible wastes or materials were previously piled, unless the base has been decontaminated sufficiently to comply with Subsection R315-264-17(b).

(g) Are staging piles subject to Land Disposal Restrictions

and Minimum Technological Requirements? No. Placing hazardous remediation wastes into a staging pile does not constitute land disposal of hazardous wastes or create a unit that is subject to the minimum technological requirements of RCRA 3004(o).

(h) How long may I operate a staging pile? The Director may allow a staging pile to operate for up to two years after hazardous remediation waste is first placed into the pile. You shall use a staging pile no longer than the length of time designated by the Director in the permit, closure plan, or order, the "operating term", except as provided in Subsection R315-264-554(i).

(i) May I receive an operating extension for a staging pile?

(1) The Director may grant one operating term extension of up to 180 days beyond the operating term limit contained in the permit, closure plan, or order, see Subsection R315-264-554(l) for modification procedures. To justify to the Director the need for an extension, you shall provide sufficient and accurate information to enable the Director to determine that continued operation of the staging pile:

(i) Will not pose a threat to human health and the environment; and

(ii) Is necessary to ensure timely and efficient implementation of remedial actions at the facility.

(2) The Director may, as a condition of the extension, specify further standards and design criteria in the permit, closure plan, or order, as necessary, to ensure protection of human health and the environment.

(j) What is the closure requirement for a staging pile located in a previously contaminated area?

(1) Within 180 days after the operating term of the staging pile expires, you shall close a staging pile located in a previously contaminated area of the site by removing or decontaminating all:

(i) Remediation waste;

(ii) Contaminated containment system components; and

(iii) Structures and equipment contaminated with waste and leachate.

(2) You shall also decontaminate contaminated subsoils in a manner and according to a schedule that the Director determines will protect human health and the environment.

(3) The Director shall include the above requirements in the permit, closure plan, or order in which the staging pile is designated.

(k) What is the closure requirement for a staging pile located in an uncontaminated area?

(1) Within 180 days after the operating term of the staging pile expires, you shall close a staging pile located in an uncontaminated area of the site according to Subsections R315-264-258(a) and 264-111; or according to 40 CFR 265.258(a) and 265.111, which are adopted by reference.

(2) The Director shall include the above requirement in the permit, closure plan, or order in which the staging pile is designated.

(l) How may my existing permit, for example, Remedial Action Plan, closure plan, or order be modified to allow me to use a staging pile?

(1) To modify a permit, other than a Remedial Action Plan, to incorporate a staging pile or staging pile operating term extension, either:

(i) The Director shall approve the modification under the procedures for permit modifications in Section R315-270-41; or

(ii) You shall request a Class 2 modification under Section R315-270-42.

(2) To modify a Remedial Action Plan to incorporate a staging pile or staging pile operating term extension, you shall comply with the Remedial Action Plan modification requirements under Sections R315-270-170 and 175.

(3) To modify a closure plan to incorporate a staging pile or staging pile operating term extension, you shall follow the applicable requirements under Section R315-264-112(c) or 40 CFR 265.112(c), which is adopted by reference.

(4) To modify an order to incorporate a staging pile or staging pile operating term extension, you shall follow the terms of the order and the applicable provisions of Subsection R315-270-72(a)(5) or (b)(5).

(m) Is information about the staging pile available to the public? The Director shall document the rationale for designating a staging pile or staging pile operating term extension and make this documentation available to the public.

R315-264-555. Disposal of CAMU-Eligible Wastes in Permitted Hazardous Waste Landfills.

(a) The Director may approve placement of CAMU-eligible wastes in hazardous waste landfills not located at the site from which the waste originated, without the wastes meeting the requirements of Rule R315-268, if the conditions in Subsections R315-264-555(a)(1) through (3) are met:

(1) The waste meets the definition of CAMU-eligible waste in Subsection R315-264-552(a)(1) and (2).

(2) The Director identifies principal hazardous constitutes in such waste, in accordance with Subsection R315-264-552(e)(4)(i) and (ii), and requires that such principal hazardous constituents are treated to any of the following standards specified for CAMU-eligible wastes:

(i) The treatment standards under Subsection R315-264-552(e)(4)(iv); or

(ii) Treatment standards adjusted in accordance with Subsection R315-264-552(e)(4)(v)(A), (C), (D) or (E)(I); or

(iii) Treatment standards adjusted in accordance with Subsection R315-264-552(e)(4)(v)(E)(II), where treatment has been used and that treatment significantly reduces the toxicity or mobility of the principal hazardous constituents in the waste, minimizing the short-term and long-term threat posed by the waste, including the threat at the remediation site.

(3) The landfill receiving the CAMU-eligible waste shall have a permit issued under Section 19-6-108, meet the requirements for new landfills in Sections R315-264-300 through 317, and be authorized to accept CAMU-eligible wastes; for the purposes of this requirement, "permit" does not include interim status.

(b) The person seeking approval shall provide sufficient information to enable the Director to approve placement of CAMU-eligible waste in accordance with Subsection R315-264-555(a). Information required by Subsections R315-264-552(d)(1) through (3) for CAMU applications shall be provided, unless not reasonably available.

(c) The Director shall provide public notice and a reasonable opportunity for public comment before approving CAMU eligible waste for placement in an off-site permitted hazardous waste landfill, consistent with the requirements for CAMU approval at Subsection R315-264-552(h). The approval shall be specific to a single remediation.

(d) Applicable hazardous waste management requirements in Rule R315-264, including recordkeeping requirements to demonstrate compliance with treatment standards approved under Section R315-264-555, for CAMU-eligible waste shall be incorporated into the receiving facility permit through permit issuance or a permit modification, providing notice and an opportunity for comment and a hearing. Notwithstanding Subsection R315-270-4(a), a landfill may not receive hazardous CAMU-eligible waste under Section R315-264-555 unless its permit specifically authorizes receipt of such waste.

(e) For each remediation, CAMU-eligible waste may not be placed in an off-site landfill authorized to receive CAMU-eligible waste in accordance with Subsection R315-264-555(d) until the following additional conditions have been met:

(1) The landfill owner/operator notifies the Director and

persons on the facility mailing list, maintained in accordance with Subsection R315-124-10(c)(1)(ix), of his or her intent to receive CAMU-eligible waste in accordance with Section R315-264-555; the notice shall identify the source of the remediation waste, the principal hazardous constituents in the waste, and treatment requirements.

(2) Persons on the facility mailing list may provide comments, including objections to the receipt of the CAMU-eligible waste, to the Director within 15 days of notification.

(3) The Director may object to the placement of the CAMU-eligible waste in the landfill within 30 days of notification; the Director may extend the review period an additional 30 days because of public concerns or insufficient information.

(4) CAMU-eligible wastes may not be placed in the landfill until the Director has notified the facility owner/operator that he or she does not object to its placement.

(5) If the Director objects to the placement or does not notify the facility owner/operator that he or she has chosen not to object, the facility may not receive the waste, notwithstanding Subsection R315-270-4(a), until the objection has been resolved, or the owner/operator obtains a permit modification in accordance with the procedures of Section R315-270-42 specifically authorizing receipt of the waste.

(6) As part of the permit issuance or permit modification process of Subsection R315-264-555(d), the Director may modify, reduce, or eliminate the notification requirements of Subsection R315-264-555(e) as they apply to specific categories of CAMU-eligible waste, based on minimal risk.

(f) Generators of CAMU-eligible wastes sent off-site to a hazardous waste landfill under Section R315-264-555 shall comply with the requirements of Subsection R315-268-7(a)(4); off-site facilities treating CAMU-eligible wastes to comply with Section R315-264-555 shall comply with the requirements of Subsection R315-268-7(b)(4), except that the certification shall be with respect to the treatment requirements of Subsection R315-264-555(a)(2).

(g) For the purposes of Section R315-264-555 only, the "design of the CAMU" in Subsection R315-264-552(e)(4)(v)(E) means design of the permitted hazardous waste landfill.

R315-264-570. Drip Pads -- Applicability.

(a) The requirements of Sections R315-264-570 through 575 apply to owners and operators of facilities that use new or existing drip pads to convey treated wood drippage, precipitation, and/or surface water run-off to an associated collection system. Existing drip pads are those constructed before December 6, 1990 and those for which the owner or operator has a design and has entered into binding financial or other agreements for construction prior to December 6, 1990 for all HSWA drip pads or July 30, 1993 for all non-HSWA drip pads. All other drip pads are new drip pads. The requirement at Subsection R315-264-573(b)(3) to install a leak collection system applies only to those drip pads that are constructed after December 24, 1992 except for those constructed after December 24, 1992 for which the owner or operator has a design and has entered into binding financial or other agreements for construction prior to December 24, 1992 for all HSWA drip pads or July 30, 1993 for all non-HSWA drip pads.

(b) The owner or operator of any drip pad that is inside or under a structure that provides protection from precipitation so that neither run-off nor run-on is generated is not subject to regulation under Subsection R315-264-573(e) or Subsection R315-264-573(f), as appropriate.

(c) The requirements of Sections R315-264-570 through 575 are not applicable to the management of infrequent and incidental drippage in storage yards provided that:

(1) The owner or operator maintains and complies with a written contingency plan that describes how the owner or operator will respond immediately to the discharge of such infrequent and incidental drippage. At a minimum, the contingency plan shall describe how the owner or operator will do the following:

(i) Clean up the drippage;

(ii) Document the cleanup of the drippage;

(iii) Retain documents regarding cleanup for three years; and

(iv) Manage the contaminated media in a manner consistent with Utah regulations.

R315-264-571. Assessment of Existing Drip Pad Integrity.

(a) For each existing drip pad as defined in Subsection R315-264-570, the owner or operator shall evaluate the drip pad and determine whether it meets all of the requirements of Sections R315-264-570 through 575, except the requirements for liners and leak detection systems of Subsection R315-264-573(b). The owner or operator shall obtain and keep on file at the facility a written assessment of the drip pad, reviewed and certified by a qualified Professional Engineer that attests to the results of the evaluation. The assessment shall be reviewed, updated and re-certified annually until all upgrades, repairs, or modifications necessary to achieve compliance with all the standards of Section R315-264-573 are complete. The evaluation shall document the extent to which the drip pad meets each of the design and operating standards of Section R315-264-573, except the standards for liners and leak detection systems, specified in Subsection R315-264-573(b).

(b) The owner or operator shall develop a written plan for upgrading, repairing, and modifying the drip pad to meet the requirements of Subsection R315-264-573(b) and submit the plan to the Director no later than 2 years before the date that all repairs, upgrades, and modifications are complete. This written plan shall describe all changes to be made to the drip pad in sufficient detail to document compliance with all the requirements of Section R315-264-573. The plan shall be reviewed and certified by a qualified Professional Engineer.

(c) Upon completion of all upgrades, repairs, and modifications, the owner or operator shall submit to the Director, the as-built drawings for the drip pad together with a certification by a qualified Professional Engineer attesting that the drip pad conforms to the drawings.

(d) If the drip pad is found to be leaking or unfit for use, the owner or operator shall comply with the provisions of Subsection R315-264-573(m) or close the drip pad in accordance with Section R315-264-575.

R315-264-572. Design and Installation of New Drip Pads.

Owners and operators of new drip pads shall ensure that the pads are designed, installed, and operated in accordance with one of the following:

(a) all of the requirements of Section R315-264-573, except 573(a)(4) and Subsections R315-264-574 and 575, or

(b) all of the requirements of Sections R315-264-573, except 573(b), 574 and 575.

R315-264-573. Design and Operating Requirements.

(a) Drip pads shall:

(1) Be constructed of non-earthen materials, excluding wood and non-structurally supported asphalt;

(2) Be sloped to free-drain treated wood drippage, rain and other waters, or solutions of drippage and water or other wastes to the associated collection system;

(3) Have a curb or berm around the perimeter;

(4)(i) Have a hydraulic conductivity of less than or equal to 1×10^{-7} centimeters per second, e.g., existing concrete drip pads shall be sealed, coated, or covered with a surface material with a hydraulic conductivity of less than or equal to 1×10^{-7} centimeters per second such that the entire surface where

drippage occurs or may run across is capable of containing such drippage and mixtures of drippage and precipitation, materials, or other wastes while being routed to an associated collection system. This surface material shall be maintained free of cracks and gaps that could adversely affect its hydraulic conductivity, and the material shall be chemically compatible with the preservatives that contact the drip pad. The requirements of this provision apply only to existing drip pads and those drip pads for which the owner or operator elects to comply with Subsection R315-264-572(b) instead of Subsection R315-264-572(a).

(ii) The owner or operator shall obtain and keep on file at the facility a written assessment of the drip pad, reviewed and certified by a qualified Professional Engineer that attests to the results of the evaluation. The assessment shall be reviewed, updated and recertified annually. The evaluation shall document the extent to which the drip pad meets the design and operating standards of Section R315-264-573, except for Subsection R315-264-573(b).

(5) Be of sufficient structural strength and thickness to prevent failure due to physical contact, climatic conditions, the stress of daily operations, e.g., variable and moving loads such as vehicle traffic, movement of wood, etc.

Note: The Director will generally consider applicable standards established by professional organizations generally recognized by the industry such as the American Concrete Institute or the American Society of Testing and Materials in judging the structural integrity requirement of Subsection R315-264-573(a).

(b) If an owner/operator elects to comply with Subsection R315-264-572(a) instead of Subsection R315-264-572(b), the drip pad shall have:

(1) A synthetic liner installed below the drip pad that is designed, constructed, and installed to prevent leakage from the drip pad into the adjacent subsurface soil or groundwater or surface water at any time during the active life, including the closure period, of the drip pad. The liner shall be constructed of materials that will prevent waste from being absorbed into the liner and to prevent releases into the adjacent subsurface soil or groundwater or surface water during the active life of the facility. The liner shall be:

(i) Constructed of materials that have appropriate chemical properties and sufficient strength and thickness to prevent failure due to pressure gradients, including static head and external hydrogeologic forces; physical contact with the waste or drip pad leakage to which they are exposed; climatic conditions; the stress of installation; and the stress of daily operation, including stresses from vehicular traffic on the drip pad;

(ii) Placed upon a foundation or base capable of providing support to the liner and resistance to pressure gradients above and below the liner to prevent failure of the liner due to settlement, compression or uplift; and

(iii) Installed to cover all surrounding earth that could come in contact with the waste or leakage; and

(2) A leakage detection system immediately above the liner that is designed, constructed, maintained and operated to detect leakage from the drip pad. The leakage detection system shall be:

(i) Constructed of materials that are:

(A) Chemically resistant to the waste managed in the drip pad and the leakage that might be generated; and

(B) Of sufficient strength and thickness to prevent collapse under the pressures exerted by overlaying materials and by any equipment used at the drip pad;

(ii) Designed and operated to function without clogging through the scheduled closure of the drip pad; and

(iii) Designed so that it will detect the failure of the drip pad or the presence of a release of hazardous waste or accumulated liquid at the earliest practicable time.

(3) A leakage collection system immediately above the liner that is designed, constructed, maintained and operated to collect leakage from the drip pad such that it can be removed from below the drip pad. The date, time, and quantity of any leakage collected in this system and removed shall be documented in the operating log.

(c) Drip pads shall be maintained such that they remain free of cracks, gaps, corrosion, or other deterioration that could cause hazardous waste to be released from the drip pad.

Note: See Subsection R315-264-573(m) for remedial action required if deterioration or leakage is detected.

(d) The drip pad and associated collection system shall be designed and operated to convey, drain, and collect liquid resulting from drippage or precipitation in order to prevent run-off.

(e) Unless protected by a structure, as described in Subsection R315-264-570(b), the owner or operator shall design, construct, operate and maintain a run-on control system capable of preventing flow onto the drip pad during peak discharge from at least a 24-hour, 25-year storm, unless the system has sufficient excess capacity to contain any run-off that might enter the system.

(f) Unless protected by a structure or cover as described in Subsection R315-264-570(b), the owner or operator shall design, construct, operate and maintain a run-off management system to collect and control at least the water volume resulting from a 24-hour, 25-year storm.

(g) The drip pad shall be evaluated to determine that it meets the requirements of Subsections R315-264-573(a) through (f) and the owner or operator shall obtain a statement from a qualified Professional Engineer certifying that the drip pad design meets the requirements of Section R315-264-573.

(h) Drippage and accumulated precipitation shall be removed from the associated collection system as necessary to prevent overflow onto the drip pad.

(i) The drip pad surface shall be cleaned thoroughly in a manner and frequency such that accumulated residues of hazardous waste or other materials are removed, with residues being properly managed as hazardous waste, so as to allow weekly inspections of the entire drip pad surface without interference or hindrance from accumulated residues of hazardous waste or other materials on the drip pad. The owner or operator shall document the date and time of each cleaning and the cleaning procedure used in the facility's operating log. The owner/operator shall determine if the residues are hazardous as per Section R315-262-11 and, if so, shall manage them under Rules R315-261 through 268, 270, and section 3010 of RCRA.

(j) Drip pads shall be operated and maintained in a manner to minimize tracking of hazardous waste or hazardous waste constituents off the drip pad as a result of activities by personnel or equipment.

(k) After being removed from the treatment vessel, treated wood from pressure and non-pressure processes shall be held on the drip pad until drippage has ceased. The owner or operator shall maintain records sufficient to document that all treated wood is held on the pad following treatment in accordance with this requirement.

(l) Collection and holding units associated with run-on and run-off control systems shall be emptied or otherwise managed as soon as possible after storms to maintain design capacity of the system.

(m) Throughout the active life of the drip pad and as specified in the permit, if the owner or operator detects a condition that may have caused or has caused a release of hazardous waste, the condition shall be repaired within a reasonably prompt period of time following discovery, in accordance with the following procedures:

(1) Upon detection of a condition that may have caused or has caused a release of hazardous waste, e.g., upon detection of leakage in the leak detection system, the owner or operator shall:

(i) Enter a record of the discovery in the facility operating log;

(ii) Immediately remove the portion of the drip pad affected by the condition from service;

(iii) Determine what steps shall be taken to repair the drip pad and clean up any leakage from below the drip pad, and establish a schedule for accomplishing the repairs;

(iv) Within 24 hours after discovery of the condition, notify the Director of the condition and, within 10 working days, provide written notice to the Director with a description of the steps that will be taken to repair the drip pad and clean up any leakage, and the schedule for accomplishing this work.

(2) The Director shall review the information submitted, make a determination regarding whether the pad shall be removed from service completely or partially until repairs and cleanup are complete and notify the owner or operator of the determination and the underlying rationale in writing.

(3) Upon completing all repairs and cleanup, the owner or operator shall notify the Director in writing and provide a certification signed by an independent, qualified registered professional engineer, that the repairs and cleanup have been completed according to the written plan submitted in accordance with Subsection R315-264-573(m)(1)(iv).

(n) Should a permit be necessary, the Director shall specify in the permit all design and operating practices that are necessary to ensure that the requirements of Section R315-264-573 are satisfied.

(o) The owner or operator shall maintain, as part of the facility operating log, documentation of past operating and waste handling practices. This shall include identification of preservative formulations used in the past, a description of drippage management practices, and a description of treated wood storage and handling practices.

R315-264-574. Inspections.

(a) During construction or installation, liners and cover systems, e.g., membranes, sheets, or coatings, shall be inspected for uniformity, damage and imperfections, e.g., holes, cracks, thin spots, or foreign materials. Immediately after construction or installation, liners shall be inspected and certified as meeting the requirements in Section R315-264-573 by a qualified Professional Engineer. This certification shall be maintained at the facility as part of the facility operating record. After installation, liners and covers shall be inspected to ensure tight seams and joints and the absence of tears, punctures, or blisters.

(b) While a drip pad is in operation, it shall be inspected weekly and after storms to detect evidence of any of the following:

(1) Deterioration, malfunctions or improper operation of run-on and run-off control systems;

(2) The presence of leakage in and proper functioning of leak detection system.

(3) Deterioration or cracking of the drip pad surface.

Note: See Section R315-264-573(m) for remedial action required if deterioration or leakage is detected.

R315-264-575. Closure.

(a) At closure, the owner or operator shall remove or decontaminate all waste residues, contaminated containment system components, pad, liners, etc., contaminated subsoils, and structures and equipment contaminated with waste and leakage, and manage them as hazardous waste.

(b) If, after removing or decontaminating all residues and making all reasonable efforts to effect removal or decontamination of contaminated components, subsoils, structures, and equipment as required in Subsection R315-264-575(a), the owner or operator finds that not all contaminated subsoils can be practicably removed or decontaminated, he shall close the facility and perform post-closure care in accordance with closure and post-closure care requirements that apply to landfills, Section R315-264-310. For permitted units, the requirement to have a permit continues throughout the post-closure period. In addition, for the purpose of closure, post-closure, and financial responsibility, such a drip pad is then considered to be landfill, and the owner or operator shall meet all of the requirements for landfills specified in Sections R315-264-110 through 120 and 140 through 151.

(c)(1) The owner or operator of an existing drip pad, as defined in Section R315-264-570, that does not comply with the liner requirements of Subsection R315-264-573(b)(1) shall:

(i) Include in the closure plan for the drip pad under Section R315-264-112 both a plan for complying with Subsection R315-264-575(a) and a contingent plan for complying with Subsection R315-264-575(b) in case not all contaminated subsoils can be practicably removed at closure; and

(ii) Prepare a contingent post-closure plan under Section R315-264-118 for complying with Subsection R315-264-575(b) in case not all contaminated subsoils can be practicably removed at closure.

(2) The cost estimates calculated under Sections R315-264-112 and 144 for closure and post-closure care of a drip pad subject to Subsection R315-264-575(c) shall include the cost of complying with the contingent closure plan and the contingent post-closure plan, but are not required to include the cost of expected closure under Subsection R315-264-575(a).

R315-264-600. Miscellaneous Units -- Applicability.

The requirements in Sections R315-264-600 through 603 apply to owners and operators of facilities that treat, store, or dispose of hazardous waste in miscellaneous units, except as Section R315-264-1 provides otherwise.

R315-264-601. Environmental Performance Standards.

A miscellaneous unit shall be located, designed, constructed, operated, maintained, and closed in a manner that will ensure protection of human health and the environment. Permits for miscellaneous units are to contain such terms and provisions as necessary to protect human health and the environment, including, but not limited to, as appropriate, design and operating requirements, detection and monitoring requirements, and requirements for responses to releases of hazardous waste or hazardous constituents from the unit. Permit terms and provisions shall include those requirements of Sections R315-264-170 through 179, 190 through 200, 220 through 232, 250 through 259, 270 through 283, 300 through 317, 340 through 351, 1030 through 1036, 1050 through 1065, 1080 through 1090, Rule 270, Subsection R307-214-2(39), and Rule R317-7 that are appropriate for the miscellaneous unit being permitted. Protection of human health and the environment includes, but is not limited to:

(a) Prevention of any releases that may have adverse effects on human health or the environment due to migration of waste constituents in the ground water or subsurface environment, considering:

(1) The volume and physical and chemical characteristics of the waste in the unit, including its potential for migration through soil, liners, or other containing structures;

(2) The hydrologic and geologic characteristics of the unit and the surrounding area;

(3) The existing quality of ground water, including other sources of contamination and their cumulative impact on the ground water;

(4) The quantity and direction of ground-water flow;

(5) The proximity to and withdrawal rates of current and

potential ground-water users;

(6) The patterns of land use in the region;

(7) The potential for deposition or migration of waste constituents into subsurface physical structures, and into the root zone of food-chain crops and other vegetation;

(8) The potential for health risks caused by human exposure to waste constituents; and

(9) The potential for damage to domestic animals, wildlife, crops, vegetation, and physical structures caused by exposure to waste constituents;

(b) Prevention of any releases that may have adverse effects on human health or the environment due to migration of waste constituents in surface water, or wetlands or on the soil surface considering:

(1) The volume and physical and chemical characteristics of the waste in the unit;

(2) The effectiveness and reliability of containing, confining, and collecting systems and structures in preventing migration;

(3) The hydrologic characteristics of the unit and the surrounding area, including the topography of the land around the unit;

(4) The patterns of precipitation in the region;

(5) The quantity, quality, and direction of ground-water flow;

(6) The proximity of the unit to surface waters;

(7) The current and potential uses of nearby surface waters and any water quality standards established for those surface waters;

(8) The existing quality of surface waters and surface soils, including other sources of contamination and their cumulative impact on surface waters and surface soils;

(9) The patterns of land use in the region;

(10) The potential for health risks caused by human exposure to waste constituents; and

(11) The potential for damage to domestic animals, wildlife, crops, vegetation, and physical structures caused by exposure to waste constituents.

(c) Prevention of any release that may have adverse effects on human health or the environment due to migration of waste constituents in the air, considering:

(1) The volume and physical and chemical characteristics of the waste in the unit, including its potential for the emission and dispersal of gases, aerosols and particulates;

(2) The effectiveness and reliability of systems and structures to reduce or prevent emissions of hazardous constituents to the air;

(3) The operating characteristics of the unit;

(4) The atmospheric, meteorologic, and topographic characteristics of the unit and the surrounding area;

(5) The existing quality of the air, including other sources of contamination and their cumulative impact on the air;

(6) The potential for health risks caused by human exposure to waste constituents; and

(7) The potential for damage to domestic animals, wildlife, crops, vegetation, and physical structures caused by exposure to waste constituents.

R315-264-602. Monitoring, Analysis, Inspection, Response, Reporting, and Corrective Action.

Monitoring, testing, analytical data, inspections, response, and reporting procedures and frequencies shall ensure compliance with Sections R315-264-601, 15, 33, 75, 76, 77, and 101 as well as meet any additional requirements needed to protect human health and the environment as specified in the permit.

R315-264-603. Post-Closure Care.

A miscellaneous unit that is a disposal unit shall be maintained in a manner that complies with Section R315-264-601 during the post-closure care period. In addition, if a treatment or storage unit has contaminated soils or ground water that cannot be completely removed or decontaminated during closure, then that unit shall also meet the requirements of Section R315-264-601 during post-closure care. The post-closure plan under Section R315-264-118 shall specify the procedures that will be used to satisfy this requirement.

R315-264-1030. Air Emission Standards for Process Vents -- Applicability.

(a) The regulations in Sections R315-1030 through 1036 apply to owners and operators of facilities that treat, store, or dispose of hazardous wastes, except as provided in Section R315-264-1.

(b) Except for Subsections R315-264-1034(d) and (e), Sections R315-1030 through 1036 apply to process vents associated with distillation, fractionation, thin-film evaporation, solvent extraction, or air or steam stripping operations that manage hazardous wastes with organic concentrations of at least 10 ppmw, if these operations are conducted in one of the following:

(1) A unit that is subject to the permitting requirements of Rule R315-270, or

(2) A unit, including a hazardous waste recycling unit, that is not exempt from permitting under the provisions of Section R315-262-17, i.e., a hazardous waste recycling unit that is not a 90-day tank or container, and that is located at a hazardous waste management facility otherwise subject to the permitting requirements of Rule R315-270, or

(3) A unit that is exempt from permitting under the provisions of Subsection R315-262-34(a), i.e., a "90-day" tank or container, and is not a recycling unit under the provisions of Section R315-261-6.

(c) For the owner and operator of a facility subject to Sections R315-264-1030 through R315-264-1036 and who received a final permit under Section 19-6-108 prior to December 6, 1996, the requirements of Sections R315-264-1030 through 1036 shall be incorporated into the permit when the permit is reissued in accordance with the requirements of Section R315-124-15 or reviewed in accordance with the requirements of Subsection R315-270-50(d). Until such date when the owner and operator receive a final permit incorporating the requirements of Sections R315-264-1030 through R315-264-1036, the owner and operator are subject to the requirements of 40 CFR 265.1030 through 265.1035, which is adopted by reference in Section R315-265-1.

Note: The requirements of Sections R315-264-1032 through 1036 apply to process vents on hazardous waste recycling units previously exempt under Subsection R315-261-6(c)(1). Other exemptions under Section R315-261-4, and Subsection R35-264-1(g) are not affected by these requirements.

(d) The requirements of Subpart AA 40 CFR do not apply to the pharmaceutical manufacturing facility, commonly referred to as the Stonewall Plant, located at Route 340 South, Elkton, Virginia, provided that facility is operated in compliance with the requirements contained in a permit issued pursuant to 40 CFR 52.2454. The requirements of Supbart AA 40 CFR shall apply to the facility upon termination of the permit issued pursuant to the 40 CFR 52.2454.

(e) The requirements of Sections R315-264-1030 through 1036 do not apply to the process vents at a facility where the facility owner or operator certifies that all of the process vents that would otherwise be subject to Sections R315-264-1030 through 1036 are equipped with and operating air emission controls in accordance with the process vent requirements of an applicable regulation codified under the Utah Air Conservation Act. The documentation of compliance under regulations codified under the Utah Air Conservation Act shall be kept

with, or made readily available with, the facility operating record.

R315-264-1031. Definitions.

As used in Sections R315-264-1030 through 1036, all terms not defined herein shall have the meaning given them in RCRA and Rules R315-260 through 266.

(a) Air stripping operation is a desorption operation employed to transfer one or more volatile components from a liquid mixture into a gas (air) either with or without the application of heat to the liquid. Packed towers, spray towers, and bubble-cap, sieve, or valve-type plate towers are among the process configurations used for contacting the air and a liquid.

(b) Bottoms receiver means a container or tank used to receive and collect the heavier bottoms fractions of the distillation feed stream that remain in the liquid phase.

(c) Closed-vent system means a system that is not open to the atmosphere and that is composed of piping, connections, and, if necessary, flow-inducing devices that transport gas or vapor from a piece or pieces of equipment to a control device.

(d) Condenser means a heat-transfer device that reduces a thermodynamic fluid from its vapor phase to its liquid phase.

(e) Connector means flanged, screwed, welded, or other joined fittings used to connect two pipelines or a pipeline and a piece of equipment. For the purposes of reporting and recordkeeping, connector means flanged fittings that are not covered by insulation or other materials that prevent location of the fittings.

(f) Continuous recorder means a data-recording device recording an instantaneous data value at least once every 15 minutes.

(g) Control device means an enclosed combustion device, vapor recovery system, or flare. Any device the primary function of which is the recovery or capture of solvents or other organics for use, reuse, or sale, e.g., a primary condenser on a solvent recovery unit, is not a control device.

(h) Control device shutdown means the cessation of operation of a control device for any purpose.

(i) Distillate receiver means a container or tank used to receive and collect liquid material (condensed) from the overhead condenser of a distillation unit and from which the condensed liquid is pumped to larger storage tanks or other process units.

(j) Distillation operation means an operation, either batch or continuous, separating one or more feed stream(s) into two or more exit streams, each exit stream having component concentrations different from those in the feed stream(s). The separation is achieved by the redistribution of the components between the liquid and vapor phase as they approach equilibrium within the distillation unit.

(k) Double block and bleed system means two block valves connected in series with a bleed valve or line that can vent the line between the two block valves.

(l) Equipment means each valve, pump, compressor, pressure relief device, sampling connection system, open-ended valve or line, or flange or other connector, and any control devices or systems required by Sections R315-264-1030 through 1036.

(m) Flame zone means the portion of the combustion chamber in a boiler occupied by the flame envelope.

(n) Flow indicator means a device that indicates whether gas flow is present in a vent stream.

(o) First attempt at repair means to take rapid action for the purpose of stopping or reducing leakage of organic material to the atmosphere using best practices.

(p) Fractionation operation means a distillation operation or method used to separate a mixture of several volatile components of different boiling points in successive stages, each stage removing from the mixture some proportion of one of the components.

(q) Hazardous waste management unit shutdown means a work practice or operational procedure that stops operation of a hazardous waste management unit or part of a hazardous waste management unit. An unscheduled work practice or operational procedure that stops operation of a hazardous waste management unit or part of a hazardous waste management unit for less than 24 hours is not a hazardous waste management unit shutdown. The use of spare equipment and technically feasible bypassing of equipment without stopping operation are not hazardous waste management unit shutdowns.

(r) Hot well means a container for collecting condensate as in a steam condenser serving a vacuum-jet or steam-jet ejector.

(s) In gas/vapor service means that the piece of equipment contains or contacts a hazardous waste stream that is in the gaseous state at operating conditions.

(t) In heavy liquid service means that the piece of equipment is not in gas/vapor service or in light liquid service.

(u) In light liquid service means that the piece of equipment contains or contacts a waste stream where the vapor pressure of one or more of the organic components in the stream is greater than 0.3 kilopascals (kPa) at 20 degrees C, the total concentration of the pure organic components having a vapor pressure greater than 0.3 kilopascals (kPa) at 20 degrees C is equal to or greater than 20 percent by weight, and the fluid is a liquid at operating conditions.

(v) In situ sampling systems means nonextractive samplers or in-line samplers.

(w) In vacuum service means that equipment is operating at an internal pressure that is at least 5 kPa below ambient pressure.

(x) Malfunction means any sudden failure of a control device or a hazardous waste management unit or failure of a hazardous waste management unit to operate in a normal or usual manner, so that organic emissions are increased.

(y) Open-ended valve or line means any valve, except pressure relief valves, having one side of the valve seat in contact with hazardous waste and one side open to the atmosphere, either directly or through open piping.

(z) Pressure release means the emission of materials resulting from the system pressure being greater than the set pressure of the pressure relief device.

(aa) Process heater means a device that transfers heat liberated by burning fuel to fluids contained in tubes, including all fluids except water that are heated to produce steam.

(bb) Process vent means any open-ended pipe or stack that is vented to the atmosphere either directly, through a vacuum-producing system, or through a tank (e.g., distillate receiver, condenser, bottoms receiver, surge control tank, separator tank, or hot well) associated with hazardous waste distillation, fractionation, thin-film evaporation, solvent extraction, or air or steam stripping operations.

(cc) Repaired means that equipment is adjusted, or otherwise altered, to eliminate a leak.

(dd) Sampling connection system means an assembly of equipment within a process or waste management unit used during periods of representative operation to take samples of the process or waste fluid. Equipment used to take non-routine grab samples is not considered a sampling connection system.

(ee) Sensor means a device that measures a physical quantity or the change in a physical quantity, such as temperature, pressure, flow rate, pH, or liquid level.

(ff) Separator tank means a device used for separation of two immiscible liquids.

(gg) Solvent extraction operation means an operation or method of separation in which a solid or solution is contacted with a liquid solvent, the two being mutually insoluble, to preferentially dissolve and transfer one or more components into

the solvent.

(hh) Startup means the setting in operation of a hazardous waste management unit or control device for any purpose.

(ii) Steam stripping operation means a distillation operation in which vaporization of the volatile constituents of a liquid mixture takes place by the introduction of steam directly into the charge.

(jj) Surge control tank means a large-sized pipe or storage reservoir sufficient to contain the surging liquid discharge of the process tank to which it is connected.

(kk) Thin-film evaporation operation means a distillation operation that employs a heating surface consisting of a large diameter tube that may be either straight or tapered, horizontal or vertical. Liquid is spread on the tube wall by a rotating assembly of blades that maintain a close clearance from the wall or actually ride on the film of liquid on the wall.

(ll) Vapor incinerator means any enclosed combustion device that is used for destroying organic compounds and does not extract energy in the form of steam or process heat.

(mm) Vented means discharged through an opening, typically an open-ended pipe or stack, allowing the passage of a stream of liquids, gases, or fumes into the atmosphere. The passage of liquids, gases, or fumes is caused by mechanical means such as compressors or vacuum-producing systems or by process-related means such as evaporation produced by heating and not caused by tank loading and unloading, working losses, or by natural means such as diurnal temperature changes.

R315-264-1032. Standards: Process Vents.

(a) The owner or operator of a facility with process vents associated with distillation, fractionation, thin-film evaporation, solvent extraction, or air or steam stripping operations managing hazardous wastes with organic concentrations of at least 10 ppmw shall either:

(1) Reduce total organic emissions from all affected process vents at the facility below 1.4 kg/h (3 lb/h) and 2.8 Mg/yr (3.1 tons/yr), or

(2) Reduce, by use of a control device, total organic emissions from all affected process vents at the facility by 95 weight percent.

(b) If the owner or operator installs a closed-vent system and control device to comply with the provisions of Subsection R315-264-1032(a) the closed-vent system and control device shall meet the requirements of Section R315-264-1033.

(c) Determinations of vent emissions and emission reductions or total organic compound concentrations achieved by add-on control devices may be based on engineering calculations or performance tests. If performance tests are used to determine vent emissions, emission reductions, or total organic compound concentrations achieved by add-on control devices, the performance tests shall conform with the requirements of Subsection R315-264-1034(c).

(d) When an owner or operator and the Director do not agree on determinations of vent emissions and/or emission reductions or total organic compound concentrations achieved by add-on control devices based on engineering calculations, the procedures in Subsection R315-264-1034(c) shall be used to resolve the disagreement.

R315-264-1033. Standards: Closed-Vent Systems and Control Devices.

(a)(1) Owners or operators of closed-vent systems and control devices used to comply with provisions of Sections R315-264-1030 through 1036 shall comply with the provisions of Section R315-264-1033.

(2)(i) The owner or operator of an existing facility who cannot install a closed-vent system and control device to comply with the provisions of Sections R315-264-1030 through 1036 on the effective date that the facility becomes subject to the provisions of Sections R315-264-1030 through 1036 shall prepare an implementation schedule that includes dates by which the closed-vent system and control device will be installed and in operation. The controls shall be installed as soon as possible, but the implementation schedule may allow up to 30 months after the effective date that the facility becomes subject to Sections R315-264-1030 through 1036 for installation and startup.

(ii) Any unit that begins operation after December 21, 1990, and is subject to the provisions of Sections R315-264-1030 through 1036 when operation begins, shall comply with the rules immediately, i.e., shall have control devices installed and operating on startup of the affected unit; the 30-month implementation schedule does not apply.

(iii) The owner or operator of any facility in existence on the effective date of a statutory or regulatory amendment that renders the facility subject to Sections R315-264-1030 through 1036 shall comply with all requirements of Sections R315-264-1030 through 1036 as soon as practicable but no later than 30 months after the amendment's effective date. When control equipment required by Sections R315-264-1030 through 1036 cannot be installed and begin operation by the effective date of the amendment, the facility owner or operator shall prepare an implementation schedule that includes the following information: Specific calendar dates for award of contracts or issuance of purchase orders for the control equipment, initiation of on-site installation of the control equipment, completion of the control equipment installation, and performance of any testing to demonstrate that the installed equipment meets the applicable standards of Sections R315-264-1030 through 1036. The owner or operator shall enter the implementation schedule in the operating record or in a permanent, readily available file located at the facility.

(iv) Owners and operators of facilities and units that become newly subject to the requirements of Sections R315-264-1030 through 1036 after December 8, 1997, due to an action other than those described in Subsection R315-264-1033(a)(2)(iii) shall comply with all applicable requirements immediately, i.e., shall have control devices installed and operating on the date the facility or unit becomes subject to Sections R315-264-1030 through 1036; the 30-month implementation schedule does not apply.

(b) A control device involving vapor recovery, e.g., a condenser or adsorber, shall be designed and operated to recover the organic vapors vented to it with an efficiency of 95 weight percent or greater unless the total organic emission limits of Subsection R315-264-1032(a)(1) for all affected process vents can be attained at an efficiency less than 95 weight percent.

(c) An enclosed combustion device, e.g., a vapor incinerator, boiler, or process heater, shall be designed and operated to reduce the organic emissions vented to it by 95 weight percent or greater; to achieve a total organic compound concentration of 20 ppmv, expressed as the sum of the actual compounds, not carbon equivalents, on a dry basis corrected to 3 percent oxygen; or to provide a minimum residence time of 0.50 seconds at a minimum temperature of 760 degrees C. If a boiler or process heater is used as the control device, then the vent stream shall be introduced into the flame zone of the boiler or process heater.

(d)(1) A flare shall be designed for and operated with no visible emissions as determined by the methods specified in Subsection R315-264-1033(e)(1), except for periods not to exceed a total of 5 minutes during any 2 consecutive hours.

(2) A flare shall be operated with a flame present at all times, as determined by the methods specified in Subsection R315-264-1033(f)(2)(iii).

(3) A flare shall be used only if the net heating value of the gas being combusted is 11.2 MJ/scm (300 Btu/scf) or greater if

the flare is steam-assisted or air-assisted; or if the net heating value of the gas being combusted is 7.45 MJ/scm (200 Btu/scf) or greater if the flare is nonassisted. The net heating value of the gas being combusted shall be determined by the methods specified in Subsection R315-264-1033(e)(2).

(4)(i) A steam-assisted or nonassisted flare shall be designed for and operated with an exit velocity, as determined by the methods specified in Subsection R315-264-1033(e)(3), less than 18.3 m/s (60 ft/s), except as provided in Subsections R315-264-133(d)(4)(ii) and (iii).

(ii) A steam-assisted or nonassisted flare designed for and operated with an exit velocity, as determined by the methods specified in Subsection R315-264-1033(e)(3), equal to or greater than 18.3 m/s (60 ft/s) but less than 122 m/s (400 ft/s) is allowed if the net heating value of the gas being combusted is greater than 37.3 MJ/scm (1,000 Btu/scf).

(iii) A steam-assisted or nonassisted flare designed for and operated with an exit velocity, as determined by the methods specified in Subsection R315-264-1033(e)(3), less than the velocity, Vmax, as determined by the method specified in Subsection R315-264-1033(e)(4) and less than 122 m/s (400 ft/s) is allowed.

(5) An air-assisted flare shall be designed and operated with an exit velocity less than the velocity, Vmax, as determined by the method specified in Subsection R315-264-1033(e)(5).

(6) A flare used to comply with Section R315-24-1033 shall be steam-assisted, air-assisted, or nonassisted.

(e)(1) Reference Method 22 in 40 CFR part 60 shall be used to determine the compliance of a flare with the visible emission provisions of Sections R315-264-1030 through 1036. The observation period is 2 hours and shall be used according to Method 22.

(2) The net heating value of the gas being combusted in a flare shall be calculated using the following equation:

Ht = K times the summation product of Ci and Hi from i equals 1 to n

where:

Ht = Net heating value of the sample, MJ/scm; where the net enthalpy per mole of offgas is based on combustion at 25 degrees C and 760 mm Hg, but the standard temperature for determining the volume corresponding to 1 mol is 20 degrees C;

K = Constant, 1.74×10^{-7} (1/ppm) (g mol/scm) (MJ/kcal) where standard temperature for (g mol/scm) is 20 degrees C;

Ci = Concentration of sample component i in ppm on a wet basis, as measured for organics by Reference Method 18 in 40 CFR part 60 and measured for hydrogen and carbon monoxide by ASTM D 1946-82, incorporated by reference as specified in Section R315-260-11; and

Hi = Net heat of combustion of sample component i, kcal/9 mol at 25 degrees C and 760 mm Hg. The heats of combustion may be determined using ASTM D 2382-83, incorporated by reference as specified in Section R315-260-11, if published values are not available or cannot be calculated.

(3) The actual exit velocity of a flare shall be determined by dividing the volumetric flow rate, in units of standard temperature and pressure, as determined by Reference Methods 2, 2A, 2C, or 2D in 40 CFR part 60 as appropriate, by the unobstructed (free) cross-sectional area of the flare tip.

(4) The maximum allowed velocity in m/s, Vmax, for a flare complying with Subsection R315-264-1033(d)(4)(iii) shall be determined by the following equation:

Log10(Vmax) = (HT+28.8)/31.7

where:

28.8 = Constant,

31.7 = Constant,

HT = The net heating value as determined in Subsection R315-264-1033(e)(2).

(5) The maximum allowed velocity in m/s, Vmax, for an air-assisted flare shall be determined by the following equation:

Vmax = 8.706+0.7084 (HT)

where:

8.706 = Constant,

0.7084 = Constant,

HT = The net heating value as determined in Subsection R315-264-1033(e)(2).

(f) The owner or operator shall monitor and inspect each control device required to comply with Section R315-264-1033 to ensure proper operation and maintenance of the control device by implementing the following requirements:

(1) Install, calibrate, maintain, and operate according to the manufacturer's specifications a flow indicator that provides a record of vent stream flow from each affected process vent to the control device at least once every hour. The flow indicator sensor shall be installed in the vent stream at the nearest feasible point to the control device inlet but before the point at which the vent streams are combined.

(2) Install, calibrate, maintain, and operate according to the manufacturer's specifications a device to continuously monitor control device operation as specified below:

(i) For a thermal vapor incinerator, a temperature monitoring device equipped with a continuous recorder. The device shall have an accuracy of plus or minus 1 percent of the temperature being monitored in degrees C or +/- 0.5 degrees C, whichever is greater. The temperature sensor shall be installed at a location in the combustion chamber downstream of the combustion zone.

(ii) For a catalytic vapor incinerator, a temperature monitoring device equipped with a continuous recorder. The device shall be capable of monitoring temperature at two locations and have an accuracy of plus or minus 1 percent of the temperature being monitored in degrees C or +/- 0.5 degrees C, whichever is greater. One temperature sensor shall be installed in the vent stream at the nearest feasible point to the catalyst bed inlet and a second temperature sensor shall be installed in the vent stream at the nearest feasible point to the catalyst bed outlet.

(iii) For a flare, a heat sensing monitoring device equipped with a continuous recorder that indicates the continuous ignition of the pilot flame.

(iv) For a boiler or process heater having a design heat input capacity less than 44 MW, a temperature monitoring device equipped with a continuous recorder. The device shall have an accuracy of plus or minus 1 percent of the temperature being monitored in degrees C or plus or minus 0.5 degrees C, whichever is greater. The temperature sensor shall be installed at a location in the furnace downstream of the combustion zone.

(v) For a boiler or process heater having a design heat input capacity greater than or equal to 44 MW, a monitoring device equipped with a continuous recorder to measure a parameter(s) that indicates good combustion operating practices are being used.

(vi) For a condenser, either:

(A) A monitoring device equipped with a continuous recorder to measure the concentration level of the organic compounds in the exhaust vent stream from the condenser, or

(B) A temperature monitoring device equipped with a continuous recorder. The device shall be capable of monitoring temperature with an accuracy of plus or minus 1 percent of the temperature being monitored in degrees Celsius, or plus or minus 0.5 degrees C, whichever is greater. The temperature sensor shall be installed at a location in the exhaust vent stream from the condenser exit, i.e., product side.

(vii) For a carbon adsorption system that regenerates the carbon bed directly in the control device such as a fixed-bed carbon adsorber, either:

(A) A monitoring device equipped with a continuous recorder to measure the concentration level of the organic

compounds in the exhaust vent stream from the carbon bed, or

(B) A monitoring device equipped with a continuous recorder to measure a parameter that indicates the carbon bed is regenerated on a regular, predetermined time cycle.

(3) Inspect the readings from each monitoring device required by Subsections R315-24-1033(f)(1) and (2) at least once each operating day to check control device operation and, if necessary, immediately implement the corrective measures necessary to ensure the control device operates in compliance with the requirements of Section R315-264-1033.

(g) An owner or operator using a carbon adsorption system such as a fixed-bed carbon adsorber that regenerates the carbon bed directly onsite in the control device shall replace the existing carbon in the control device with fresh carbon at a regular, predetermined time interval that is no longer than the carbon service life established as a requirement of Subsection R315-264-1035(b)(4)(iii)(F).

(h) An owner or operator using a carbon adsorption system such as a carbon canister that does not regenerate the carbon bed directly onsite in the control device shall replace the existing carbon in the control device with fresh carbon on a regular basis by using one of the following procedures:

(1) Monitor the concentration level of the organic compounds in the exhaust vent stream from the carbon adsorption system on a regular schedule, and replace the existing carbon with fresh carbon immediately when carbon breakthrough is indicated. The monitoring frequency shall be daily or at an interval no greater than 20 percent of the time required to consume the total carbon working capacity established as a requirement of Subsection R315-264-1035(b)(4)(iii)(G), whichever is longer.

(2) Replace the existing carbon with fresh carbon at a regular, predetermined time interval that is less than the design carbon replacement interval established as a requirement of Subsection R315-264-1035(b)(4)(iii)(G).

(i) An alternative operational or process parameter may be monitored if it can be demonstrated that another parameter will ensure that the control device is operated in conformance with these standards and the control device's design specifications.

(j) An owner or operator of an affected facility seeking to comply with the provisions of Rule R315-264 by using a control device other than a thermal vapor incinerator, catalytic vapor incinerator, flare, boiler, process heater, condenser, or carbon adsorption system is required to develop documentation including sufficient information to describe the control device operation and identify the process parameter or parameters that indicate proper operation and maintenance of the control device.

(k) A closed-vent system shall meet either of the following design requirements:

(1) A closed-vent system shall be designed to operate with no detectable emissions, as indicated by an instrument reading of less than 500 ppmv above background as determined by the procedure in Subsection R315-264-1034(b), and by visual inspections; or

(2) A closed-vent system shall be designed to operate at a pressure below atmospheric pressure. The system shall be equipped with at least one pressure gauge or other pressure measurement device that can be read from a readily accessible location to verify that negative pressure is being maintained in the closed-vent system when the control device is operating.

(l) The owner or operator shall monitor and inspect each closed-vent system required to comply with Section R315-264-1033 to ensure proper operation and maintenance of the closed-vent system by implementing the following requirements:

(1) Each closed-vent system that is used to comply with Subsection R315-264-1033(k)(1) shall be inspected and monitored in accordance with the following requirements:

(i) An initial leak detection monitoring of the closed-vent system shall be conducted by the owner or operator on or before the date that the system becomes subject to Section R315-264-1033. The owner or operator shall monitor the closed-vent system components and connections using the procedures specified in Subsection R315-264-1034(b) to demonstrate that the closed-vent system operates with no detectable emissions, as indicated by an instrument reading of less than 500 ppmv above background.

(ii) After initial leak detection monitoring required in Subsection R315-264-1033(l)(1)(i), the owner or operator shall inspect and monitor the closed-vent system as follows:

(A) Closed-vent system joints, seams, or other connections that are permanently or semi-permanently sealed, e.g., a welded joint between two sections of hard piping or a bolted and gasketed ducting flange, shall be visually inspected at least once per year to check for defects that could result in air pollutant emissions. The owner or operator shall monitor a component or connection using the procedures specified in Subsection R315-264-1034(b) to demonstrate that it operates with no detectable emissions following any time the component is repaired or replaced, e.g., a section of damaged hard piping is replaced with new hard piping, or the connection is unsealed, e.g., a flange is unbolted.

(B) Closed-vent system components or connections other than those specified in Subsection R315-264-1033(l)(1)(ii)(A) shall be monitored annually and at other times as requested by the Director, except as provided for in Subsection R315-264-1033(o), using the procedures specified in Subsection R315-264-1034(b) to demonstrate that the components or connections operate with no detectable emissions.

(iii) In the event that a defect or leak is detected, the owner or operator shall repair the defect or leak in accordance with the requirements of Subsection R315-264-1033(l)(3).

(iv) The owner or operator shall maintain a record of the inspection and monitoring in accordance with the requirements specified in Subsection R315-264-1035.

(2) Each closed-vent system that is used to comply with Subsection R315-264-1033(k)(2) shall be inspected and monitored in accordance with the following requirements:

(i) The closed-vent system shall be visually inspected by the owner or operator to check for defects that could result in air pollutant emissions. Defects include, but are not limited to, visible cracks, holes, or gaps in ductwork or piping or loose connections.

(ii) The owner or operator shall perform an initial inspection of the closed-vent system on or before the date that the system becomes subject to Section R315-264-1033. Thereafter, the owner or operator shall perform the inspections at least once every year.

(iii) In the event that a defect or leak is detected, the owner or operator shall repair the defect in accordance with the requirements of Subsection R315-264-1033(l)(3).

(iv) The owner or operator shall maintain a record of the inspection and monitoring in accordance with the requirements specified in Subsection R315-264-1035.

(3) The owner or operator shall repair all detected defects as follows:

(i) Detectable emissions, as indicated by visual inspection, or by an instrument reading greater than 500 ppmv above background, shall be controlled as soon as practicable, but not later than 15 calendar days after the emission is detected, except as provided for in Subsection R315-264-1033(l)(3)(iii).

(ii) A first attempt at repair shall be made no later than 5 calendar days after the emission is detected.

(iii) Delay of repair of a closed-vent system for which leaks have been detected is allowed if the repair is technically infeasible without a process unit shutdown, or if the owner or operator determines that emissions resulting from immediate repair would be greater than the fugitive emissions likely to result from delay of repair. Repair of such equipment shall be

completed by the end of the next process unit shutdown.

(iv) The owner or operator shall maintain a record of the defect repair in accordance with the requirements specified in Section R315-264-1035.

(m) Closed-vent systems and control devices used to comply with provisions of Sections R315-264-1033 through 1036 shall be operated at all times when emissions may be vented to them.

(n) The owner or operator using a carbon adsorption system to control air pollutant emissions shall document that all carbon that is a hazardous waste and that is removed from the control device is managed in one of the following manners, regardless of the average volatile organic concentration of the carbon:

(1) Regenerated or reactivated in a thermal treatment unit that meets one of the following:

(i) The owner or operator of the unit has been issued a final permit under Rule R315-270 which implements the requirements of Sections R315-264-600 through 603; or

(ii) The unit is equipped with and operating air emission controls in accordance with the applicable requirements of Sections R315-264-1030 through 1036 and 1080 through 1090 or 40 CFR 265.1030 through 1035 and 1080 through 1090, which are adopted by reference; or

(iii) The unit is equipped with and operating air emission controls in accordance with a national emission standard for hazardous air pollutants under Section R315-307-214-1, which incorporates 40 CFR part 61 or Section R307-214-2, which incorporates 40 CFR part 63.

(2) Incinerated in a hazardous waste incinerator for which the owner or operator either:

(i) Has been issued a final permit under Rule R315-270 which implements the requirements of Sections R315-264-340 through 351; or

(ii) Has designed and operates the incinerator in accordance with the interim status requirements of 40 CFR 265.340 through 352, which are adopted by reference.

(3) Burned in a boiler or industrial furnace for which the owner or operator either:

(i) Has been issued a final permit under Rule R315-270 which implements the requirements of Sections R315-266-100 through 112; or

(ii) Has designed and operates the boiler or industrial furnace in accordance with the interim status requirements of Sections R315-266-100 through 112.

(o) Any components of a closed-vent system that are designated, as described in Subsection R315-264-1035(c)(9), as unsafe to monitor are exempt from the requirements of Subsection R315-264-1033(l)(1)(ii)(B) if:

(1) The owner or operator of the closed-vent system determines that the components of the closed-vent system are unsafe to monitor because monitoring personnel would be exposed to an immediate danger as a consequence of complying with Subsection R315-264-1033(l)(1)(ii)(B); and

(2) The owner or operator of the closed-vent system adheres to a written plan that requires monitoring the closed-vent system components using the procedure specified in Subsection R315-264-1033(l)(1)(ii)(B) as frequently as practicable during safe-to-monitor times.

R315-264-1034. Test Methods and Procedures.

(a) Each owner or operator subject to the provisions of Sections R315-264-1030 through 1036 shall comply with the test methods and procedures requirements provided in Section R315-264-1034.

(b) When a closed-vent system is tested for compliance with no detectable emissions, as required in Subsection R315-264-1033(l), the test shall comply with the following requirements:

(1) Monitoring shall comply with Reference Method 21 in 40 CFR part 60.

(2) The detection instrument shall meet the performance criteria of Reference Method 21.

(3) The instrument shall be calibrated before use on each day of its use by the procedures specified in Reference Method 21.

(4) Calibration gases shall be:

(i) Zero air, less than 10 ppm of hydrocarbon in air.

(ii) A mixture of methane or n-hexane and air at a concentration of approximately, but less than, 10,000 ppm methane or n-hexane.

(5) The background level shall be determined as set forth in Reference Method 21.

(6) The instrument probe shall be traversed around all potential leak interfaces as close to the interface as possible as described in Reference Method 21.

(7) The arithmetic difference between the maximum concentration indicated by the instrument and the background level is compared with 500 ppm for determining compliance.

(c) Performance tests to determine compliance with Subsection R315-264-1032(a) and with the total organic compound concentration limit of Subsection R315-264-1033(c) shall comply with the following:

(1) Performance tests to determine total organic compound concentrations and mass flow rates entering and exiting control devices shall be conducted and data reduced in accordance with the following reference methods and calculation procedures:

(i) Method 2 in 40 CFR part 60 for velocity and volumetric flow rate.

(ii) Method 18 or Method 25A in 40 CFR part 60, appendix A, for organic content. If Method 25A is used, the organic HAP used as the calibration gas shall be the single organic HAP representing the largest percent by volume of the emissions. The use of Method 25A is acceptable if the response from the high-level calibration gas is at least 20 times the standard deviation of the response from the zero calibration gas when the instrument is zeroed on the most sensitive scale.

(iii) Each performance test shall consist of three separate runs; each run conducted for at least 1 hour under the conditions that exist when the hazardous waste management unit is operating at the highest load or capacity level reasonably expected to occur. For the purpose of determining total organic compound concentrations and mass flow rates, the average of results of all runs shall apply. The average shall be computed on a time-weighted basis.

(iv) Total organic mass flow rates shall be determined by the following equation:

(A) For sources utilizing Method 18.

The equation found in 40 CFR 264.1034(c)(1)(iv)(A), 2015 edition, is adopted and incorporated by reference.

Where:

Eh = Total organic mass flow rate, kg/h;

Q2sd = Volumetric flow rate of gases entering or exiting control device, as determined by Method 2, dscm/h;

n = Number of organic compounds in the vent gas;

Ci = Organic concentration in ppm, dry basis, of compound i in the vent gas, as determined by Method 18;

MWi = Molecular weight of organic compound i in the vent gas, kg/kg-mol;

0.0416 = Conversion factor for molar volume, kg-mol/m3, at 293 K and 760 mm Hg;

10^{-6} = Conversion from ppm

(B) For sources utilizing Method 25A.

$Eh = (Q)(C)(MW)(0.0416)(10^{-6})$

Where:

Eh = Total organic mass flow rate, kg/h;

Q = Volumetric flow rate of gases entering or exiting control device, as determined by Method 2, dscm/h;

C = Organic concentration in ppm, dry basis, as determined by Method 25A;

MW = Molecular weight of propane, 44;

0.0416 = Conversion factor for molar volume, kg-mol/m3, at 293 K and 760 mm Hg;

10^{-6} = Conversion from ppm.

(v) The annual total organic emission rate shall be determined by the following equation:

EA = (Eh)(H)

where:

EA = Total organic mass emission rate, kg/y;

Eh = Total organic mass flow rate for the process vent, kg/h;

H = Total annual hours of operations for the affected unit, h.

(vi) Total organic emissions from all affected process vents at the facility shall be determined by summing the hourly total organic mass emission rates, Eh as determined in Subsection R315-264-1034(c)(1)(iv), and by summing the annual total organic mass emission rates, EA, as determined in Subsection R315-264-1034(c)(1)(v), for all affected process vents at the facility.

(2) The owner or operator shall record such process information as may be necessary to determine the conditions of the performance tests. Operations during periods of startup, shutdown, and malfunction shall not constitute representative conditions for the purpose of a performance test.

(3) The owner or operator of an affected facility shall provide, or cause to be provided, performance testing facilities as follows:

(i) Sampling ports adequate for the test methods specified in Subsection R315-264-1034(c)(1).

(ii) Safe sampling platform(s).

(iii) Safe access to sampling platform(s).

(iv) Utilities for sampling and testing equipment.

(4) For the purpose of making compliance determinations, the time-weighted average of the results of the three runs shall apply. In the event that a sample is accidentally lost or conditions occur in which one of the three runs shall be discontinued because of forced shutdown, failure of an irreplaceable portion of the sample train, extreme meteorological conditions, or other circumstances beyond the owner or operator's control, compliance may, upon the Director's approval, be determined using the average of the results of the two other runs.

(d) To show that a process vent associated with a hazardous waste distillation, fractionation, thin-film evaporation, solvent extraction, or air or steam stripping operation is not subject to the requirements of Sections R315-264-1030 through 1036, the owner or operator shall make an initial determination that the time-weighted, annual average total organic concentration of the waste managed by the waste management unit is less than 10 ppmw using one of the following two methods:

(1) Direct measurement of the organic concentration of the waste using the following procedures:

(i) The owner or operator shall take a minimum of four grab samples of waste for each waste stream managed in the affected unit under process conditions expected to cause the maximum waste organic concentration.

(ii) For waste generated onsite, the grab samples shall be collected at a point before the waste is exposed to the atmosphere such as in an enclosed pipe or other closed system that is used to transfer the waste after generation to the first affected distillation, fractionation, thin-film evaporation, solvent extraction, or air or steam stripping operation. For waste generated offsite, the grab samples shall be collected at the inlet to the first waste management unit that receives the waste provided the waste has been transferred to the facility in a closed system such as a tank truck and the waste is not diluted or mixed with other waste.

(iii) Each sample shall be analyzed and the total organic concentration of the sample shall be computed using Method 9060A, incorporated by reference under Section R315-260-11, of "Test Methods for Evaluating Solid Waste, Physical/Chemical Methods," EPA Publication SW-846, or analyzed for its individual organic constituents.

(iv) The arithmetic mean of the results of the analyses of the four samples shall apply for each waste stream managed in the unit in determining the time-weighted, annual average total organic concentration of the waste. The time-weighted average is to be calculated using the annual quantity of each waste stream processed and the mean organic concentration of each waste stream managed in the unit.

(2) Using knowledge of the waste to determine that its total organic concentration is less than 10 ppmw. Documentation of the waste determination is required. Examples of documentation that shall be used to support a determination under this provision include production process information documenting that no organic compounds are used, information that the waste is generated by a process that is identical to a process at the same or another facility that has previously been demonstrated by direct measurement to generate a waste stream having a total organic content less than 10 ppmw, or prior speciation analysis results on the same waste stream where it can also be documented that no process changes have occurred since that analysis that could affect the waste total organic concentration.

(e) The determination that distillation, fractionation, thin-film evaporation, solvent extraction, or air or steam stripping operations manage hazardous wastes with time-weighted, annual average total organic concentrations less than 10 ppmw shall be made as follows:

(1) By the effective date that the facility becomes subject to the provisions of Sections R315-264-1030 through 1036 or by the date when the waste is first managed in a waste management unit, whichever is later, and

(2) For continuously generated waste, annually, or

(3) Whenever there is a change in the waste being managed or a change in the process that generates or treats the waste.

(f) When an owner or operator and the Director do not agree on whether a distillation, fractionation, thin-film evaporation, solvent extraction, or air or steam stripping operation manages a hazardous waste with organic concentrations of at least 10 ppmw based on knowledge of the waste, the dispute may be resolved by using direct measurement as specified at Subsection R315-264-1034(d)(1).

R315-264-1035. Recordkeeping Requirements.

(a)(1) Each owner or operator subject to the provisions of Sections R315-264-1030 through 1036 shall comply with the recordkeeping requirements of Section R315-264-1035.

(2) An owner or operator of more than one hazardous waste management unit subject to the provisions of Sections R315-264-1030 through 1036 may comply with the recordkeeping requirements for these hazardous waste management units in one recordkeeping system if the system identifies each record by each hazardous waste management unit.

(b) Owners and operators shall record the following information in the facility operating record:

(1) For facilities that comply with the provisions of Subsection R315-264-1033(a)(2), an implementation schedule that includes dates by which the closed-vent system and control device will be installed and in operation. The schedule shall also include a rationale of why the installation cannot be completed at an earlier date. The implementation schedule shall

be in the facility operating record by the effective date that the facility becomes subject to the provisions of Sections R315-264-1030 through 1036.

(2) Up-to-date documentation of compliance with the process vent standards in Section R315-264-1032, including:

(i) Information and data identifying all affected process vents, annual throughput and operating hours of each affected unit, estimated emission rates for each affected vent and for the overall facility, i.e., the total emissions for all affected vents at the facility, and the approximate location within the facility of each affected unit, e.g., identify the hazardous waste management units on a facility plot plan.

(ii) Information and data supporting determinations of vent emissions and emission reductions achieved by add-on control devices based on engineering calculations or source tests. For the purpose of determining compliance, determinations of vent emissions and emission reductions shall be made using operating parameter values, e.g., temperatures, flow rates, or vent stream organic compounds and concentrations, that represent the conditions that result in maximum organic emissions, such as when the waste management unit is operating at the highest load or capacity level reasonably expected to occur. If the owner or operator takes any action, e.g., managing a waste of different composition or increasing operating hours of affected waste management units, that would result in an increase in total organic emissions from affected process vents at the facility, then a new determination is required.

(3) Where an owner or operator chooses to use test data to determine the organic removal efficiency or total organic compound concentration achieved by the control device, a performance test plan. The test plan shall include:

(i) A description of how it is determined that the planned test is going to be conducted when the hazardous waste management unit is operating at the highest load or capacity level reasonably expected to occur. This shall include the estimated or design flow rate and organic content of each vent stream and define the acceptable operating ranges of key process and control device parameters during the test program.

(ii) A detailed engineering description of the closed-vent system and control device including:

(A) Manufacturer's name and model number of control device.

(B) Type of control device.

(C) Dimensions of the control device.

(D) Capacity.

(E) Construction materials.

(iii) A detailed description of sampling and monitoring procedures, including sampling and monitoring locations in the system, the equipment to be used, sampling and monitoring frequency, and planned analytical procedures for sample analysis.

(4) Documentation of compliance with Section R315-264-1033 shall include the following information:

(i) A list of all information references and sources used in preparing the documentation.

(ii) Records, including the dates, of each compliance test required by Subsection R315-264-1033(k).

(iii) If engineering calculations are used, a design analysis, specifications, drawings, schematics, and piping and instrumentation diagrams based on the appropriate sections of "APTI Course 415: Control of Gaseous Emissions," incorporated by reference as specified in Section R315-260-11, or other engineering texts acceptable to the Director that present basic control device design information. Documentation provided by the control device manufacturer or vendor that describes the control device design in accordance with Subsections R315-264-1035(b)(4)(iii)(A) through (b)(4)(iii)(G) may be used to comply with this requirement. The design analysis shall address the vent stream characteristics and control device operation parameters as specified below.

(A) For a thermal vapor incinerator, the design analysis shall consider the vent stream composition, constituent concentrations, and flow rate. The design analysis shall also establish the design minimum and average temperature in the combustion zone and the combustion zone residence time.

(B) For a catalytic vapor incinerator, the design analysis shall consider the vent stream composition, constituent concentrations, and flow rate. The design analysis shall also establish the design minimum and average temperatures across the catalyst bed inlet and outlet.

(C) For a boiler or process heater, the design analysis shall consider the vent stream composition, constituent concentrations, and flow rate. The design analysis shall also establish the design minimum and average flame zone temperatures, combustion zone residence time, and description of method and location where the vent stream is introduced into the combustion zone.

(D) For a flare, the design analysis shall consider the vent stream composition, constituent concentrations, and flow rate. The design analysis shall also consider the requirements specified in Subsection R315-264-1033(d).

(E) For a condenser, the design analysis shall consider the vent stream composition, constituent concentrations, flow rate, relative humidity, and temperature. The design analysis shall also establish the design outlet organic compound concentration level, design average temperature of the condenser exhaust vent stream, and design average temperatures of the coolant fluid at the condenser inlet and outlet.

(F) For a carbon adsorption system such as a fixed-bed adsorber that regenerates the carbon bed directly onsite in the control device, the design analysis shall consider the vent stream composition, constituent concentrations, flow rate, relative humidity, and temperature. The design analysis shall also establish the design exhaust vent stream organic compound concentration level, number and capacity of carbon beds, type and working capacity of activated carbon used for carbon beds, design total steam flow over the period of each complete carbon bed regeneration cycle, duration of the carbon bed steaming and cooling/drying cycles, design carbon bed temperature after regeneration, design carbon bed regeneration time, and design service life of carbon.

(G) For a carbon adsorption system such as a carbon canister that does not regenerate the carbon bed directly onsite in the control device, the design analysis shall consider the vent stream composition, constituent concentrations, flow rate, relative humidity, and temperature. The design analysis shall also establish the design outlet organic concentration level, capacity of carbon bed, type and working capacity of activated carbon used for carbon bed, and design carbon replacement interval based on the total carbon working capacity of the control device and source operating schedule.

(iv) A statement signed and dated by the owner or operator certifying that the operating parameters used in the design analysis reasonably represent the conditions that exist when the hazardous waste management unit is or would be operating at the highest load or capacity level reasonably expected to occur.

(v) A statement signed and dated by the owner or operator certifying that the control device is designed to operate at an efficiency of 95 percent or greater unless the total organic concentration limit of Subsection R315-264-1032(a) is achieved at an efficiency less than 95 weight percent or the total organic emission limits of Subsection R315-264-1032(a) for affected process vents at the facility can be attained by a control device involving vapor recovery at an efficiency less than 95 weight percent. A statement provided by the control device manufacturer or vendor certifying that the control equipment meets the design specifications may be used to comply with this requirement.

(vi) If performance tests are used to demonstrate compliance, all test results.

(c) Design documentation and monitoring, operating, and inspection information for each closed-vent system and control device required to comply with the provisions of Rule R315-264 shall be recorded and kept up-to-date in the facility operating record. The information shall include:

(1) Description and date of each modification that is made to the closed-vent system or control device design.

(2) Identification of operating parameter, description of monitoring device, and diagram of monitoring sensor location or locations used to comply with Subsections R315-264-1033(f)(1) and (f)(2).

(3) Monitoring, operating, and inspection information required by Subsections R315-264-1033(f) through (k).

(4) Date, time, and duration of each period that occurs while the control device is operating when any monitored parameter exceeds the value established in the control device design analysis as specified below:

(i) For a thermal vapor incinerator designed to operate with a minimum residence time of 0.50 second at a minimum temperature of 760 degrees C, period when the combustion temperature is below 760 degrees C.

(ii) For a thermal vapor incinerator designed to operate with an organic emission reduction efficiency of 95 weight percent or greater, period when the combustion zone temperature is more than 28 degrees C below the design average combustion zone temperature established as a requirement of Subsection R315-264-1035(b)(4)(iii)(A).

(iii) For a catalytic vapor incinerator, period when:

(A) Temperature of the vent stream at the catalyst bed inlet is more than 28 degrees C below the average temperature of the inlet vent stream established as a requirement of Subsection R315-264-1035(b)(4)(iii)(B), or

(B) Temperature difference across the catalyst bed is less than 80 percent of the design average temperature difference established as a requirement of Subsection R315-264-1035(b)(4)(iii)(B).

(iv) For a boiler or process heater, period when:

(A) Flame zone temperature is more than 28 degrees C below the design average flame zone temperature established as a requirement of Subsection R315-264-1035(b)(4)(iii)(C), or

(B) Position changes where the vent stream is introduced to the combustion zone from the location established as a requirement of Subsection R315-264-1035(b)(4)(iii)(C).

(v) For a flare, period when the pilot flame is not ignited.

(vi) For a condenser that complies with Subsection R315-264-1033(f)(2)(vi)(A), period when the organic compound concentration level or readings of organic compounds in the exhaust vent stream from the condenser are more than 20 percent greater than the design outlet organic compound concentration level established as a requirement of Subsection R315-264-1035(b)(4)(iii)(E).

(vii) For a condenser that complies with Subsection R315-264-1033(f)(2)(vi)(B), period when:

(A) Temperature of the exhaust vent stream from the condenser is more than 6 degrees C above the design average exhaust vent stream temperature established as a requirement of Subsection R315-264-1035(b)(4)(iii)(E); or

(B) Temperature of the coolant fluid exiting the condenser is more than 6 degrees C above the design average coolant fluid temperature at the condenser outlet established as a requirement of Subsection R315-264-1035(b)(4)(iii)(E).

(viii) For a carbon adsorption system such as a fixed-bed carbon adsorber that regenerates the carbon bed directly onsite in the control device and complies with Subsection R315-264-1033(f)(2)(vii)(A), period when the organic compound concentration level or readings of organic compounds in the exhaust vent stream from the carbon bed are more than 20 percent greater than the design exhaust vent stream organic compound concentration level established as a requirement of Subsection R315-264-1035(b)(4)(iii)(F).

(ix) For a carbon adsorption system such as a fixed-bed carbon adsorber that regenerates the carbon bed directly onsite in the control device and complies with Subsection R315-264-1033(f)(2)(vii)(B), period when the vent stream continues to flow through the control device beyond the predetermined carbon bed regeneration time established as a requirement of Subsection R315-264-1035(b)(4)(iii)(F).

(5) Explanation for each period recorded under Subsection R315-264-1035(4) of the cause for control device operating parameter exceeding the design value and the measures implemented to correct the control device operation.

(6) For a carbon adsorption system operated subject to requirements specified in Subsection R315-264-1033(g) or (h)(2), date when existing carbon in the control device is replaced with fresh carbon.

(7) For a carbon adsorption system operated subject to requirements specified in Subsection R315-264-1033(h)(1), a log that records:

(i) Date and time when control device is monitored for carbon breakthrough and the monitoring device reading.

(ii) Date when existing carbon in the control device is replaced with fresh carbon.

(8) Date of each control device startup and shutdown.

(9) An owner or operator designating any components of a closed-vent system as unsafe to monitor pursuant to Subsection R315-264-1033(o) shall record in a log that is kept in the facility operating record the identification of closed-vent system components that are designated as unsafe to monitor in accordance with the requirements of Subsection R315-264-1033(o), an explanation for each closed-vent system component stating why the closed-vent system component is unsafe to monitor, and the plan for monitoring each closed-vent system component.

(10) When each leak is detected as specified in Subsection R315-264-1033(l), the following information shall be recorded:

(i) The instrument identification number, the closed-vent system component identification number, and the operator name, initials, or identification number.

(ii) The date the leak was detected and the date of first attempt to repair the leak.

(iii) The date of successful repair of the leak.

(iv) Maximum instrument reading measured by Method 21 of 40 CFR part 60, appendix A after it is successfully repaired or determined to be nonrepairable.

(v) "Repair delayed" and the reason for the delay if a leak is not repaired within 15 calendar days after discovery of the leak.

(A) The owner or operator may develop a written procedure that identifies the conditions that justify a delay of repair. In such cases, reasons for delay of repair may be documented by citing the relevant sections of the written procedure.

(B) If delay of repair was caused by depletion of stocked parts, there shall be documentation that the spare parts were sufficiently stocked on-site before depletion and the reason for depletion.

(d) Records of the monitoring, operating, and inspection information required by Subsections R315-264-1035(c)(3) through (c)(10) shall be maintained by the owner or operator for at least 3 years following the date of each occurrence, measurement, maintenance, corrective action, or record.

(e) For a control device other than a thermal vapor incinerator, catalytic vapor incinerator, flare, boiler, process heater, condenser, or carbon adsorption system, the Director shall specify the appropriate recordkeeping requirements.

(f) Up-to-date information and data used to determine

whether or not a process vent is subject to the requirements in Section R315-264-1032 including supporting documentation as required by Subsection R315-264-1034(d)(2) when application of the knowledge of the nature of the hazardous waste stream or the process by which it was produced is used, shall be recorded in a log that is kept in the facility operating record.

R315-264-1036. Reporting Requirements.

(a) A semiannual report shall be submitted by owners and operators subject to the requirements of Sections R315-264-1030 through 1036 to the Director by dates specified by the Director. The report shall include the following information:

(1) The Environmental Protection Agency identification number, name, and address of the facility.

(2) For each month during the semiannual reporting period, dates when the control device exceeded or operated outside of the design specifications as defined in Subsection R315-264-1035(c)(4) and as indicated by the control device monitoring required by Subsection R315-264-1033(f) and such exceedances were not corrected within 24 hours, or that a flare operated with visible emissions as defined in Subsection R315-264-1033(d) and as determined by Method 22 monitoring, the duration and cause of each exceedance or visible emissions, and any corrective measures taken.

(b) If, during the semiannual reporting period, the control device does not exceed or operate outside of the design specifications as defined in Subsection R315-264-264-1035(c)(4) for more than 24 hours or a flare does not operate with visible emissions as defined in Subsection R315-264-264-1033(d), a report to the Director is not required.

R315-264-1050. Air Emission Standards for Equipment Leaks -- Applicability.

(a) The regulations in Sections R315-264-1050 through 1065 apply to owners and operators of facilities that treat, store, or dispose of hazardous wastes, except as provided in Section R315-264-1.

(b) Except as provided in Subsection R315-264-1064(k), Sections R315-264-1050 through 1065 apply to equipment that contains or contacts hazardous wastes with organic concentrations of at least 10 percent by weight that are managed in one of the following:

(1) A unit that is subject to the permitting requirements of Rule R315-270, or

(2) A unit, including a hazardous waste recycling unit, that is not exempt from permitting under the provisions of Subsection R315-262-34(a), i.e., a hazardous waste recycling unit that is not a "90-day" tank or container, and that is located at a hazardous waste management facility otherwise subject to the permitting requirements of Rule R315-270, or

(3) A unit that is exempt from permitting under the provisions of Section R315-262-17, i.e., a "90-day" tank or container, and is not a recycling unit under the provisions of Section R315-261-6.

(c) For the owner or operator of a facility subject to Sections R315-264-1050 through 1065 and who received a final permit under RCRA section 3005 prior to December 6, 1996, the requirements of Sections R315-264-1050 through 1065 shall be incorporated into the permit when the permit is reissued in accordance with the requirements of Section R315-124-15 or reviewed in accordance with the requirements of Subsection R315-270-50(d). Until such date when the owner or operator receives a final permit incorporating the requirements of Sections R315-264-1050 through 1065, the owner or operator is subject to the requirements of 40 CFR 265.1050 through 265.1064, which are adopted by reference in Section R315-265-1.

(d) Each piece of equipment to which Sections R315-264-1050 through 1065 applies shall be marked in such a manner that it can be distinguished readily from other pieces of equipment.

(e) Equipment that is in vacuum service is excluded from the requirements of Sections R315-264-1052 through R315-264-1060 if it is identified as required in Subsection R315-264-1064(g)(5).

(f) Equipment that contains or contacts hazardous waste with an organic concentration of at least 10 percent by weight for less than 300 hours per calendar year is excluded from the requirements of Sections R315-264-1052 through 1060 if it is identified, as required in Subsection R315-264-1064(g)(6).

(g) The requirements of Subpart BB 40 CFR do not apply to the pharmaceutical manufacturing facility, commonly referred to as the Stonewall Plant, located at Route 340 South, Elkton, Virginia, provided that facility is operated in compliance with the requirements contained in a permit issued pursuant to 40 CFR 52.2454. The requirements of Subpart BB 40 CFR shall apply to the facility upon termination of the permit issued pursuant to the 40 CFR 52.2454.

(h) Purged coatings and solvents from surface coating operations subject to the national emission standards for hazardous air pollutants (NESHAP) for the surface coating of automobiles and light-duty trucks at R307-214-2(61), which incorporates 40 CFR part 63 subpart IIII, are not subject to the requirements of Sections R315-264-1050 through 1065.

Note: The requirements of Sections R315-264-1052 through 1065 apply to equipment associated with hazardous waste recycling units previously exempt under Subsection R315-261-6(c)(1). Other exemptions under Section R315-261-4, and Subsection R315-264-1(g) are not affected by these requirements.

R315-264-1051. Definitions.

As used in Sections R315-264-1050 through 1065, all terms shall have the meaning given them in Section R315-264-1031, RCRA, and Rules R315-260 through 266.

R315-264-1052. Standards: Pumps in Light Liquid Service.

(a)(1) Each pump in light liquid service shall be monitored monthly to detect leaks by the methods specified in Subsection R315-264-1063(b), except as provided in Subsections R315-264-1052(d), (e), and (f).

(2) Each pump in light liquid service shall be checked by visual inspection each calendar week for indications of liquids dripping from the pump seal.

(b)(1) If an instrument reading of 10,000 ppm or greater is measured, a leak is detected.

(2) If there are indications of liquids dripping from the pump seal, a leak is detected.

(c)(1) When a leak is detected, it shall be repaired as soon as practicable, but not later than 15 calendar days after it is detected, except as provided in Section R315-264-1059.

(2) A first attempt at repair, e.g., tightening the packing gland, shall be made no later than 5 calendar days after each leak is detected.

(d) Each pump equipped with a dual mechanical seal system that includes a barrier fluid system is exempt from the requirements of Subsection R315-264-1052(a), provided the following requirements are met:

(1) Each dual mechanical seal system shall be:

(i) Operated with the barrier fluid at a pressure that is at all times greater than the pump stuffing box pressure, or

(ii) Equipped with a barrier fluid degassing reservoir that is connected by a closed-vent system to a control device that complies with the requirements of Section R315-264-1060, or

(iii) Equipped with a system that purges the barrier fluid into a hazardous waste stream with no detectable emissions to the atmosphere.

(2) The barrier fluid system shall not be a hazardous waste

with organic concentrations 10 percent or greater by weight.

(3) Each barrier fluid system shall be equipped with a sensor that will detect failure of the seal system, the barrier fluid system, or both.

(4) Each pump shall be checked by visual inspection, each calendar week, for indications of liquids dripping from the pump seals.

(5)(i) Each sensor as described in Subsection R315-264-1052(d)(3) shall be checked daily or be equipped with an audible alarm that shall be checked monthly to ensure that it is functioning properly.

(ii) The owner or operator shall determine, based on design considerations and operating experience, a criterion that indicates failure of the seal system, the barrier fluid system, or both.

(6)(i) If there are indications of liquids dripping from the pump seal or the sensor indicates failure of the seal system, the barrier fluid system, or both based on the criterion determined in Subsection R315-264-1052(d)(5)(ii), a leak is detected.

(ii) When a leak is detected, it shall be repaired as soon as practicable, but not later than 15 calendar days after it is detected, except as provided in Section R315-264-1059.

(iii) A first attempt at repair, e.g., relapping the seal, shall be made no later than 5 calendar days after each leak is detected.

(e) Any pump that is designated, as described in Subsection R315-264-1064(g)(2), for no detectable emissions, as indicated by an instrument reading of less than 500 ppm above background, is exempt from the requirements of Subsections R315-264-1052(a), (c), and (d) if the pump meets the following requirements:

(1) Shall have no externally actuated shaft penetrating the pump housing.

(2) Shall operate with no detectable emissions as indicated by an instrument reading of less than 500 ppm above background as measured by the methods specified in Subsection R315-264-1063(c).

(3) Shall be tested for compliance with Subsection R315-264-1052(e)(2) initially upon designation, annually, and at other times as requested by the Director.

(f) If any pump is equipped with a closed-vent system capable of capturing and transporting any leakage from the seal or seals to a control device that complies with the requirements of Section R315-264-1060, it is exempt from the requirements of Subsections R315-264-1052(a) through (e).

R315-264-1053. Standards: Compressors.

(a) Each compressor shall be equipped with a seal system that includes a barrier fluid system and that prevents leakage of total organic emissions to the atmosphere, except as provided in Subsections R315-264-1053(h) and (i).

(b) Each compressor seal system as required in Subsection R315-264-1053(a) shall be:

(1) Operated with the barrier fluid at a pressure that is at all times greater than the compressor stuffing box pressure, or

(2) Equipped with a barrier fluid system that is connected by a closed-vent system to a control device that complies with the requirements of Section R315-264-1060, or

(3) Equipped with a system that purges the barrier fluid into a hazardous waste stream with no detectable emissions to atmosphere.

(c) The barrier fluid shall not be a hazardous waste with organic concentrations 10 percent or greater by weight.

(d) Each barrier fluid system as described in Subsections R315-264-1053(a) through (c) shall be equipped with a sensor that will detect failure of the seal system, barrier fluid system, or both.

(e)(1) Each sensor as required in Subsection R315-264-1053(d) shall be checked daily or shall be equipped with an audible alarm that shall be checked monthly to ensure that it is functioning properly unless the compressor is located within the boundary of an unmanned plant site, in which case the sensor shall be checked daily.

(2) The owner or operator shall determine, based on design considerations and operating experience, a criterion that indicates failure of the seal system, the barrier fluid system, or both.

(f) If the sensor indicates failure of the seal system, the barrier fluid system, or both based on the criterion determined under Subsection R315-264-1053(e)(2), a leak is detected.

(g)(1) When a leak is detected, it shall be repaired as soon as practicable, but not later than 15 calendar days after it is detected, except as provided in Section R315-264-1059.

(2) A first attempt at repair, e.g., tightening the packing gland, shall be made no later than 5 calendar days after each leak is detected.

(h) A compressor is exempt from the requirements of Subsections R315-264-1053(a) and (b) if it is equipped with a closed-vent system capable of capturing and transporting any leakage from the seal to a control device that complies with the requirements of Section R315-264-1060, except as provided in Subsection R315-264-1053(i).

(i) Any compressor that is designated, as described in Subsection R315-264-1064(g)(2), for no detectable emissions as indicated by an instrument reading of less than 500 ppm above background is exempt from the requirements of Subsections R315-264-1053(a) through (h) if the compressor:

(1) Is determined to be operating with no detectable emissions, as indicated by an instrument reading of less than 500 ppm above background, as measured by the method specified in Subsection R315-264-1063(c).

(2) Is tested for compliance with Subsection R315-264-1053(i)(1) initially upon designation, annually, and at other times as requested by the Director.

R315-264-1054. Standards: Pressure Relief Devices in Gas/Vapor Service.

(a) Except during pressure releases, each pressure relief device in gas/vapor service shall be operated with no detectable emissions, as indicated by an instrument reading of less than 500 ppm above background, as measured by the method specified in Subsection R315-264-1063(c).

(b)(1) After each pressure release, the pressure relief device shall be returned to a condition of no detectable emissions, as indicated by an instrument reading of less than 500 ppm above background, as soon as practicable, but no later than 5 calendar days after each pressure release, except as provided in Section R315-264-1059.

(2) No later than 5 calendar days after the pressure release, the pressure relief device shall be monitored to confirm the condition of no detectable emissions, as indicated by an instrument reading of less than 500 ppm above background, as measured by the method specified in Subsection R315-264-1063(c).

(c) Any pressure relief device that is equipped with a closed-vent system capable of capturing and transporting leakage from the pressure relief device to a control device as described in Section R315-264-264-1060 is exempt from the requirements of Subsection R315-264-1054(a) and (b).

R315-264-1055. Standards: Sampling Connection Systems.

(a) Each sampling connection system shall be equipped with a closed-purge, closed-loop, or closed-vent system. This system shall collect the sample purge for return to the process or for routing to the appropriate treatment system. Gases displaced during filling of the sample container are not required to be collected or captured.

(b) Each closed-purge, closed-loop, or closed-vent system as required in Subsection R315-264-1055(a) shall meet one of

the following requirements:

(1) Return the purged process fluid directly to the process line;

(2) Collect and recycle the purged process fluid; or

(3) Be designed and operated to capture and transport all the purged process fluid to a waste management unit that complies with the applicable requirements of Sections R315-264-1084 through 1086 or a control device that complies with the requirements of Section R315-264-1060.

(c) In-situ sampling systems and sampling systems without purges are exempt from the requirements of Subsections R315-264-1055(a) and (b).

R315-264-1056. Standards: Open-Ended Valves or Lines.

(a)(1) Each open-ended valve or line shall be equipped with a cap, blind flange, plug, or a second valve.

(2) The cap, blind flange, plug, or second valve shall seal the open end at all times except during operations requiring hazardous waste stream flow through the open-ended valve or line.

(b) Each open-ended valve or line equipped with a second valve shall be operated in a manner such that the valve on the hazardous waste stream end is closed before the second valve is closed.

(c) When a double block and bleed system is being used, the bleed valve or line may remain open during operations that require venting the line between the block valves but shall comply with Subsection R315-264-1056(a) at all other times.

R315-264-1057. Standards: Valves in Gas/Vapor Service or in Light Liquid Service.

(a) Each valve in gas/vapor or light liquid service shall be monitored monthly to detect leaks by the methods specified in Subsection R315-264-1063(b) and shall comply with Subsections R315-264-1057(b) through (e), except as provided in Subsections R315-264-1057(f), (g), and (h), and Sections R315-264-1061 and 1062.

(b) If an instrument reading of 10,000 ppm or greater is measured, a leak is detected.

(c)(1) Any valve for which a leak is not detected for two successive months may be monitored the first month of every succeeding quarter, beginning with the next quarter, until a leak is detected.

(2) If a leak is detected, the valve shall be monitored monthly until a leak is not detected for two successive months,

(d)(1) When a leak is detected, it shall be repaired as soon as practicable, but no later than 15 calendar days after the leak is detected, except as provided in Section R315-264-1059.

(2) A first attempt at repair shall be made no later than 5 calendar days after each leak is detected.

(e) First attempts at repair include, but are not limited to, the following best practices where practicable:

(1) Tightening of bonnet bolts.

(2) Replacement of bonnet bolts.

(3) Tightening of packing gland nuts.

(4) Injection of lubricant into lubricated packing.

(f) Any valve that is designated, as described in Subsection R315-264-1064(g)(2), for no detectable emissions, as indicated by an instrument reading of less than 500 ppm above background, is exempt from the requirements of Subsection R315-264-1057(a) if the valve:

(1) Has no external actuating mechanism in contact with the hazardous waste stream.

(2) Is operated with emissions less than 500 ppm above background as determined by the method specified in Subsection R315-264-1063(c).

(3) Is tested for compliance with Subsection R315-264-1057(f)(2) initially upon designation, annually, and at other times as requested by the Director.

(g) Any valve that is designated, as described in Subsection R315-264-1064(h)(1), as an unsafe-to-monitor valve is exempt from the requirements of Subsection R315-264-1057(a) if:

(1) The owner or operator of the valve determines that the valve is unsafe to monitor because monitoring personnel would be exposed to an immediate danger as a consequence of complying with Subsection R315-264-1057(a).

(2) The owner or operator of the valve adheres to a written plan that requires monitoring of the valve as frequently as practicable during safe-to-monitor times.

(h) Any valve that is designated, as described in Subsection R315-264-1064(h)(2), as a difficult-to-monitor valve is exempt from the requirements of Subsection R315-264-1057(a) if:

(1) The owner or operator of the valve determines that the valve cannot be monitored without elevating the monitoring personnel more than 2 meters above a support surface.

(2) The hazardous waste management unit within which the valve is located was in operation before June 21, 1990.

(3) The owner or operator of the valve follows a written plan that requires monitoring of the valve at least once per calendar year.

R315-264-1058. Standards: Pumps and Valves in Heavy Liquid Service, Pressure Relief Devices in Light Liquid or Heavy Liquid Service, and Flanges and Other Connectors.

(a) Pumps and valves in heavy liquid service, pressure relief devices in light liquid or heavy liquid service, and flanges and other connectors shall be monitored within 5 days by the method specified in Subsection R315-264-1063(b) if evidence of a potential leak is found by visual, audible, olfactory, or any other detection method.

(b) If an instrument reading of 10,000 ppm or greater is measured, a leak is detected.

(c)(1) When a leak is detected, it shall be repaired as soon as practicable, but not later than 15 calendar days after it is detected, except as provided in Section R315-264-1059.

(2) The first attempt at repair shall be made no later than 5 calendar days after each leak is detected.

(d) First attempts at repair include, but are not limited to, the best practices described under Subsection R315-264-1057(e).

(e) Any connector that is inaccessible or is ceramic or ceramic-lined, e.g., porcelain, glass, or glass-lined, is exempt from the monitoring requirements of Subsection R315-264-1058(a) and from the recordkeeping requirements of Section R315-264-1064.

R315-264-1059. Standards: Delay of Repair.

(a) Delay of repair of equipment for which leaks have been detected will be allowed if the repair is technically infeasible without a hazardous waste management unit shutdown. In such a case, repair of this equipment shall occur before the end of the next hazardous waste management unit shutdown.

(b) Delay of repair of equipment for which leaks have been detected will be allowed for equipment that is isolated from the hazardous waste management unit and that does not continue to contain or contact hazardous waste with organic concentrations at least 10 percent by weight.

(c) Delay of repair for valves will be allowed if:

(1) The owner or operator determines that emissions of purged material resulting from immediate repair are greater than the emissions likely to result from delay of repair.

(2) When repair procedures are effected, the purged material is collected and destroyed or recovered in a control device complying with Section R315-264-1060.

(d) Delay of repair for pumps will be allowed if:

(1) Repair requires the use of a dual mechanical seal

system that includes a barrier fluid system.

(2) Repair is completed as soon as practicable, but not later than 6 months after the leak was detected.

(e) Delay of repair beyond a hazardous waste management unit shutdown will be allowed for a valve if valve assembly replacement is necessary during the hazardous waste management unit shutdown, valve assembly supplies have been depleted, and valve assembly supplies had been sufficiently stocked before the supplies were depleted. Delay of repair beyond the next hazardous waste management unit shutdown will not be allowed unless the next hazardous waste management unit shutdown occurs sooner than 6 months after the first hazardous waste management unit shutdown.

R315-264-1060. Standards: Closed-Vent Systems and Control Devices.

(a) Owners and operators of closed-vent systems and control devices subject to Sections R315-264-1050 through 1065 shall comply with the provisions of Section R315-264-1033.

(b)(1) The owner or operator of an existing facility who cannot install a closed-vent system and control device to comply with the provisions of Sections R315-264-1050 through 1065 on the effective date that the facility becomes subject to the provisions of Sections R315-264-1050 through 1065 shall prepare an implementation schedule that includes dates by which the closed-vent system and control device will be installed and in operation. The controls shall be installed as soon as possible, but the implementation schedule may allow up to 30 months after the effective date that the facility becomes subject to Sections R315-264-1050 through 1065 for installation and startup.

(2) Any unit that begins operation after December 21, 1990, and is subject to the provisions of Sections R315-264-1050 through 1065 when operation begins, shall comply with the rules immediately, i.e., shall have control devices installed and operating on startup of the affected unit; the 30-month implementation schedule does not apply.

(3) The owner or operator of any facility in existence on the effective date of a statutory or regulatory amendment that renders the facility subject to Sections R315-264-1050 through 1065 shall comply with all requirements of Sections R315-264-1050 through 1065 as soon as practicable but no later than 30 months after the amendment's effective date. When control equipment required by Sections R315-264-1050 through 1065 cannot be installed and begin operation by the effective date of the amendment, the facility owner or operator shall prepare an implementation schedule that includes the following information: Specific calendar dates for award or contracts or issuance of purchase orders for the control equipment, initiation of on-site installation of the control equipment, completion of the control equipment installation, and performance of any testing to demonstrate that the installed equipment meets the applicable standards of Sections R315-264-1050 through 1065. The owner or operator shall enter the implementation schedule in the operating record or in a permanent, readily available file located at the facility.

(4) Owners and operators of facilities and units that become newly subject to the requirements of Sections R315-264-1050 through 1065 after December 8, 1997, due to an action other than those described in Subsection R315-264-1060(b)(3) shall comply with all applicable requirements immediately, i.e., shall have control devices installed and operating on the date the facility or unit becomes subject to Sections R315-264-1050 through 1065; the 30-month implementation schedule does not apply.

R315-264-1061. Alternative Standards for Valves in Gas/Vapor Service or in Light Liquid Service: Percentage of Valves Allowed to Leak.

(a) An owner or operator subject to the requirements of Section R315-264-1057 may elect to have all valves within a hazardous waste management unit comply with an alternative standard that allows no greater than 2 percent of the valves to leak.

(b) The following requirements shall be met if an owner or operator decides to comply with the alternative standard of allowing 2 percent of valves to leak:

(1) A performance test as specified in Section R315-264-1061(c) shall be conducted initially upon designation, annually, and at other times requested by the Director.

(2) If a valve leak is detected, it shall be repaired in accordance with Subsections R315-264-1057(d) and (e).

(c) Performance tests shall be conducted in the following manner:

(1) All valves subject to the requirements in Section R315-264-1057 within the hazardous waste management unit shall be monitored within 1 week by the methods specified in Subsection R315-264-1063(b).

(2) If an instrument reading of 10,000 ppm or greater is measured, a leak is detected.

(3) The leak percentage shall be determined by dividing the number of valves subject to the requirements in Section R315-264-1057 for which leaks are detected by the total number of valves subject to the requirements in Section R315-264-1057 within the hazardous waste management unit.

R315-264-1062. Alternative Standards for Valves in Gas/Vapor Service or in Light Liquid Service: Skip Period Leak Detection and Repair.

(a) An owner or operator subject to the requirements of Section R315-264-1057 may elect for all valves within a hazardous waste management unit to comply with one of the alternative work practices specified in Subsections R315-264-1062(b)(2) and (3).

(b)(1) An owner or operator shall comply with the requirements for valves, as described in Section R315-264-1057, except as described in Subsections R315-264-1062(b)(2) and (b)(3).

(2) After two consecutive quarterly leak detection periods with the percentage of valves leaking equal to or less than 2 percent, an owner or operator may begin to skip one of the quarterly leak detection periods, i.e., monitor for leaks once every six months, for the valves subject to the requirements in Section R315-264-1057.

(3) After five consecutive quarterly leak detection periods with the percentage of valves leaking equal to or less than 2 percent, an owner or operator may begin to skip three of the quarterly leak detection periods, i.e., monitor for leaks once every year, for the valves subject to the requirements in Section R315-264-1057.

(4) If the percentage of valves leaking is greater than 2 percent, the owner or operator shall monitor monthly in compliance with the requirements in Section R315-264-1057, but may again elect to use Section R315-264-1062 after meeting the requirements of Section R315-264-1057(c)(1).

R315-264-1063. Test Methods and Procedures.

(a) Each owner or operator subject to the provisions of Rule R315-264 shall comply with the test methods and procedures requirements provided in Section R315-264-1063.

(b) Leak detection monitoring, as required in Sections R315-264-1052 through 1062, shall comply with the following requirements:

(1) Monitoring shall comply with Reference Method 21 in 40 CFR part 60.

(2) The detection instrument shall meet the performance criteria of Reference Method 21.

(3) The instrument shall be calibrated before use on each day of its use by the procedures specified in Reference Method 21.

(4) Calibration gases shall be:

(i) Zero air, less than 10 ppm of hydrocarbon in air.

(ii) A mixture of methane or n-hexane and air at a concentration of approximately, but less than, 10,000 ppm methane or n-hexane.

(5) The instrument probe shall be traversed around all potential leak interfaces as close to the interface as possible as described in Reference Method 21.

(c) When equipment is tested for compliance with no detectable emissions, as required in Subsections R315-264-1052(e), 1053(i), 1054, and 1057(f), the test shall comply with the following requirements:

(1) The requirements of Subsections R315-264-1063(b)(1) through (4) shall apply.

(2) The background level shall be determined as set forth in Reference Method 21.

(3) The instrument probe shall be traversed around all potential leak interfaces as close to the interface as possible as described in Reference Method 21.

(4) The arithmetic difference between the maximum concentration indicated by the instrument and the background level is compared with 500 ppm for determining compliance.

(d) In accordance with the waste analysis plan required by Subsection R315-264-13(b), an owner or operator of a facility shall determine, for each piece of equipment, whether the equipment contains or contacts a hazardous waste with organic concentration that equals or exceeds 10 percent by weight using the following:

(1) Methods described in ASTM Methods D 2267-88, E 169-87, E 168-88, E 260-85, incorporated by reference under Section R315-260-11);

(2) Method 9060A, incorporated by reference under Section R315-260-11, of "Test Methods for Evaluating Solid Waste," EPA Publication SW-846, for computing total organic concentration of the sample, or analyzed for its individual organic constituents; or

(3) Application of the knowledge of the nature of the hazardous waste stream or the process by which it was produced. Documentation of a waste determination by knowledge is required. Examples of documentation that shall be used to support a determination under this provision include production process information documenting that no organic compounds are used, information that the waste is generated by a process that is identical to a process at the same or another facility that has previously been demonstrated by direct measurement to have a total organic content less than 10 percent, or prior speciation analysis results on the same waste stream where it can also be documented that no process changes have occurred since that analysis that could affect the waste total organic concentration.

(e) If an owner or operator determines that a piece of equipment contains or contacts a hazardous waste with organic concentrations at least 10 percent by weight, the determination can be revised only after following the procedures in Subsections R315-264-1063(d)(1) or (d)(2).

(f) When an owner or operator and the Director do not agree on whether a piece of equipment contains or contacts a hazardous waste with organic concentrations at least 10 percent by weight, the procedures in Subsections R315-264-1063(d)(1) or (d)(2) can be used to resolve the dispute.

(g) Samples used in determining the percent organic content shall be representative of the highest total organic content hazardous waste that is expected to be contained in or contact the equipment.

(h) To determine if pumps or valves are in light liquid service, the vapor pressures of constituents may be obtained from standard reference texts or may be determined by ASTM D-2879-86, incorporated by reference under Section R315-260-11.

(i) Performance tests to determine if a control device achieves 95 weight percent organic emission reduction shall comply with the procedures of Sections R315-264-1034(c)(1) through (c)(4).

R315-264-1064. Recordkeeping Requirements.

(a)(1) Each owner or operator subject to the provisions of Sections R315-264-1050 through 1065 shall comply with the recordkeeping requirements of Section R315-264-1064.

(2) An owner or operator of more than one hazardous waste management unit subject to the provisions of Sections R315-264-1050 through 1065 may comply with the recordkeeping requirements for these hazardous waste management units in one recordkeeping system if the system identifies each record by each hazardous waste management unit.

(b) Owners and operators shall record the following information in the facility operating record:

(1) For each piece of equipment to which Sections R315-264-1050 through 1065 apply:

(i) Equipment identification number and hazardous waste management unit identification.

(ii) Approximate locations within the facility, e.g., identify the hazardous waste management unit on a facility plot plan.

(iii) Type of equipment, e.g., a pump or pipeline valve.

(iv) Percent-by-weight total organics in the hazardous waste stream at the equipment.

(v) Hazardous waste state at the equipment, e.g., gas/vapor or liquid.

(vi) Method of compliance with the standard, e.g., "monthly leak detection and repair" or "equipped with dual mechanical seals."

(2) For facilities that comply with the provisions of Subsection R315-264-1033(a)(2), an implementation schedule as specified in Subsection R315-264-1033(a)(2).

(3) Where an owner or operator chooses to use test data to demonstrate the organic removal efficiency or total organic compound concentration achieved by the control device, a performance test plan as specified in Subsection R315-264-1035(b)(3).

(4) Documentation of compliance with Section R315-264-1060, including the detailed design documentation or performance test results specified in Subsection R315-264-1035(b)(4).

(c) When each leak is detected as specified in Sections R315-264-1052, 1053, 1057, and 1058, the following requirements apply:

(1) A weatherproof and readily visible identification, marked with the equipment identification number, the date evidence of a potential leak was found in accordance with Subsection R315-264-1058(a), and the date the leak was detected, shall be attached to the leaking equipment.

(2) The identification on equipment, except on a valve, may be removed after it has been repaired.

(3) The identification on a valve may be removed after it has been monitored for 2 successive months as specified in Subsection R315-264-1057(c) and no leak has been detected during those 2 months.

(d) When each leak is detected as specified in Subsections R315-264-1052, 1053, 1057, and 1058, the following information shall be recorded in an inspection log and shall be kept in the facility operating record:

(1) The instrument and operator identification numbers and the equipment identification number.

(2) The date evidence of a potential leak was found in accordance with Subsection R315-264-1058(a).

(3) The date the leak was detected and the dates of each attempt to repair the leak.

(4) Repair methods applied in each attempt to repair the leak.

(5) "Above 10,000" if the maximum instrument reading measured by the methods specified in Subsection R315-264-1063(b) after each repair attempt is equal to or greater than 10,000 ppm.

(6) "Repair delayed" and the reason for the delay if a leak is not repaired within 15 calendar days after discovery of the leak.

(7) Documentation supporting the delay of repair of a valve in compliance with Subsection R315-264-1059(c).

(8) The signature of the owner or operator, or designate, whose decision it was that repair could not be effected without a hazardous waste management unit shutdown.

(9) The expected date of successful repair of the leak if a leak is not repaired within 15 calendar days.

(10) The date of successful repair of the leak.

(e) Design documentation and monitoring, operating, and inspection information for each closed-vent system and control device required to comply with the provisions of Section R315-264-1060 shall be recorded and kept up-to-date in the facility operating record as specified in Subsection R315-264-1035(c). Design documentation is specified in Subsection R315-264-1035(c)(1) and (c)(2) and monitoring, operating, and inspection information in Subsection R315-264-1035(c)(3)through (c)(8).

(f) For a control device other than a thermal vapor incinerator, catalytic vapor incinerator, flare, boiler, process heater, condenser, or carbon adsorption system, the Director shall specify the appropriate recordkeeping requirements.

(g) The following information pertaining to all equipment subject to the requirements in Sections R315-264-1052 through 1060 shall be recorded in a log that is kept in the facility operating record:

(1) A list of identification numbers for equipment, except welded fittings, subject to the requirements of Sections R315-264-1050 through 1065.

(2)(i) A list of identification numbers for equipment that the owner or operator elects to designate for no detectable emissions, as indicated by an instrument reading of less than 500 ppm above background, under the provisions of Subsections R315-264-1052(e), 1053(i), and 1057(f).

(ii) The designation of this equipment as subject to the requirements of Subsections R315-264-1052(e), 1053(i), or 1057(f) shall be signed by the owner or operator.

(3) A list of equipment identification numbers for pressure relief devices required to comply with Subsection R315-264-1054(a).

(4)(i) The dates of each compliance test required in Subsections R315-264-1052(e), 1053(i), 1054, and 1057(f).

(ii) The background level measured during each compliance test.

(iii) The maximum instrument reading measured at the equipment during each compliance test.

(5) A list of identification numbers for equipment in vacuum service.

(6) Identification, either by list or location, area or group, of equipment that contains or contacts hazardous waste with an organic concentration of at least 10 percent by weight for less than 300 hours per calendar year.

(h) The following information pertaining to all valves subject to the requirements of Subsections R315-264-1057 (g) and (h) shall be recorded in a log that is kept in the facility operating record:

(1) A list of identification numbers for valves that are designated as unsafe to monitor, an explanation for each valve stating why the valve is unsafe to monitor, and the plan for monitoring each valve.

(2) A list of identification numbers for valves that are designated as difficult to monitor, an explanation for each valve stating why the valve is difficult to monitor, and the planned schedule for monitoring each valve.

(i) The following information shall be recorded in the facility operating record for valves complying with Section R315-264-1062:

(1) A schedule of monitoring.

(2) The percent of valves found leaking during each monitoring period.

(j) The following information shall be recorded in a log that is kept in the facility operating record:

(1) Criteria required in Subsections R315-264-1052(d)(5)(ii) and 1053(e)(2) and an explanation of the design criteria.

(2) Any changes to these criteria and the reasons for the changes.

(k) The following information shall be recorded in a log that is kept in the facility operating record for use in determining exemptions as provided in the applicability section of Sections R315-264-1050 through 1065 and other specific sections of Rule R315-264:

(1) An analysis determining the design capacity of the hazardous waste management unit.

(2) A statement listing the hazardous waste influent to and effluent from each hazardous waste management unit subject to the requirements in Subsections R315-264-1052 through 1060 and an analysis determining whether these hazardous wastes are heavy liquids.

(3) An up-to-date analysis and the supporting information and data used to determine whether or not equipment is subject to the requirements in Subsections R315-264-1052 through 1060. The record shall include supporting documentation as required by Subsection R315-264-1063(d)(3) when application of the knowledge of the nature of the hazardous waste stream or the process by which it was produced is used. If the owner or operator takes any action, e.g., changing the process that produced the waste, that could result in an increase in the total organic content of the waste contained in or contacted by equipment determined not to be subject to the requirements in Sections R315-264-1052 through 1060, then a new determination is required.

(l) Records of the equipment leak information required by Subsection R315-264-1064(d) and the operating information required by Subsection R315-264-1064(e) need be kept only 3 years.

(m) The owner or operator of a facility with equipment that is subject to Sections R315-264-1050 through 1065 and to regulations at 40 CFR part 60, part 61, or part 63 may elect to determine compliance with Sections R315-264-1050 through 1065 either by documentation pursuant to Section R315-264-1064, or by documentation of compliance with the regulations at 40 CFR part 60, part 61, or part 63 pursuant to the relevant provisions of the regulations at 40 part 60, part 61, or part 63. The documentation of compliance under regulations at 40 CFR part 60, part 61, or part 63 shall be kept with or made readily available with the facility operating record.

R315-264-1065. Reporting Requirements.

(a) A semiannual report shall be submitted by owners and operators subject to the requirements of Sections R315-264-1050 through 1065 to the Director by dates specified by the Director. The report shall include the following information:

(1) The Environmental Protection Agency identification number, name, and address of the facility.

(2) For each month during the semiannual reporting period:

(i) The equipment identification number of each valve for which a leak was not repaired as required in Subsection R315-

264-1057(d).

(ii) The equipment identification number of each pump for which a leak was not repaired as required in Subsections R315-264-1052(c) and (d)(6).

(iii) The equipment identification number of each compressor for which a leak was not repaired as required in Subsection R315-264-1053(g).

(3) Dates of hazardous waste management unit shutdowns that occurred within the semiannual reporting period.

(4) For each month during the semiannual reporting period, dates when the control device installed as required by Sections R315-264-1052, 1053, 1054, or 1055 exceeded or operated outside of the design specifications as defined in Subsection R315-264-1064(e) and as indicated by the control device monitoring required by Section R315-264-1060 and was not corrected within 24 hours, the duration and cause of each exceedance, and any corrective measures taken.

(b) If, during the semiannual reporting period, leaks from valves, pumps, and compressors are repaired as required in Subsections R315-264-1057(d), 1052(c) and (d)(6), and 1053(g), respectively, and the control device does not exceed or operate outside of the design specifications as defined in Subsection R315-264-1064(e) for more than 24 hours, a report to the Director is not required.

R315-264-1080. Air Emission Standards for Tanks, Surface Impoundments, and Containers -- Applicability.

(a) The requirements of Sections R315-264-1080 through 1090 apply to owners and operators of all facilities that treat, store, or dispose of hazardous waste in tanks, surface impoundments, or containers subject to either Sections R315-264-170 through 179, 190 through 200, or 220 through 232 except as Section R315-264-1 and Subsection R315-264-1080(b) provide otherwise.

(b) The requirements of Sections R315-264-1080 through 1090 do not apply to the following waste management units at the facility:

(1) A waste management unit that holds hazardous waste placed in the unit before December 6, 1996, and in which no hazardous waste is added to the unit on or after December 6, 1996.

(2) A container that has a design capacity less than or equal to 0.1 cubic meter.

(3) A tank in which an owner or operator has stopped adding hazardous waste and the owner or operator has begun implementing or completed closure pursuant to an approved closure plan.

(4) A surface impoundment in which an owner or operator has stopped adding hazardous waste, except to implement an approved closure plan, and the owner or operator has begun implementing or completed closure pursuant to an approved closure plan.

(5) A waste management unit that is used solely for on-site treatment or storage of hazardous waste that is placed in the unit as a result of implementing remedial activities required under the corrective action authorities of RCRA sections 3004(u), 3004(v), or 3008(h); CERCLA authorities; or similar Federal or Utah authorities.

(6) A waste management unit that is used solely for the management of radioactive mixed waste in accordance with all applicable regulations under the authority of the Atomic Energy Act and the Nuclear Waste Policy Act.

(7) A hazardous waste management unit that the owner or operator certifies is equipped with and operating air emission controls in accordance with the requirements of an applicable regulation codified under the Utah Air Conservation Act. For the purpose of complying with Subsection R315-264-1080(b), a tank for which the air emission control includes an enclosure, as opposed to a cover, shall be in compliance with the enclosure and control device requirements of Subsection R315-264-1084(i), except as provided in Subsection R315-264-1082(c)(5).

(8) A tank that has a process vent as defined in Section R315-264-1031.

(c) For the owner and operator of a facility subject to Sections R315-264-1080 through 1090 who received a final permit under RCRA section 3005 prior to December 6, 1996, the requirements of Sections R315-264-1080 through 1090 shall be incorporated into the permit when the permit is reissued in accordance with the requirements of Section R315-124-15 or reviewed in accordance with the requirements of Subsection R315-270-50(d). Until such date when the permit is reissued in accordance with the requirements of Section R315-124-15 or reviewed in accordance with the requirements of Subsection R315-270-50(d), the owner and operator are subject to the requirements of 40 CFR 265.1080 through 1090, which are adopted by reference.

(d) The requirements of Sections R315-264-1080 through 1090, except for the recordkeeping requirements specified in Subsection R315-264-1089(i), are administratively stayed for a tank or a container used for the management of hazardous waste generated by organic peroxide manufacturing and its associated laboratory operations when the owner or operator of the unit meets all of the following conditions:

(1) The owner or operator identifies that the tank or container receives hazardous waste generated by an organic peroxide manufacturing process producing more than one functional family of organic peroxides or multiple organic peroxides within one functional family, that one or more of these organic peroxides could potentially undergo self-accelerating thermal decomposition at or below ambient temperatures, and that organic peroxides are the predominant products manufactured by the process. For the purpose of meeting the conditions of Section R315-264-1080, "organic peroxide" means an organic compound that contains the bivalent structure and which may be considered to be a structural derivative of hydrogen peroxide where one or both of the hydrogen atoms has been replaced by an organic radical.

(2) The owner or operator prepares documentation, in accordance with the requirements of Subsection R315-264-1089(i), explaining why an undue safety hazard would be created if air emission controls specified in Sections R315-264-1084 through 1087 are installed and operated on the tanks and containers used at the facility to manage the hazardous waste generated by the organic peroxide manufacturing process or processes meeting the conditions of Subsection R315-264-1080(d)(1).

(3) The owner or operator notifies the Director in writing that hazardous waste generated by an organic peroxide manufacturing process or processes meeting the conditions of Subsection R315-264-1080(d)(1) are managed at the facility in tanks or containers meeting the conditions of Subsection R315-264-1080(d)(2). The notification shall state the name and address of the facility, and be signed and dated by an authorized representative of the facility owner or operator.

R315-264-1081. Definitions.

As used in Sections R315-264-1080 through 1090, all terms shall have the meaning given to them in 40 CFR 265.1081, which is adopted by reference; RCRA; and Rules R315-260 through 266.

R315-264-1082. Standards: General.

(a) Section R315-264-1082 applies to the management of hazardous waste in tanks, surface impoundments, and containers subject to Sections R315-264-1080 through 1090.

(b) The owner or operator shall control air pollutant emissions from each hazardous waste management unit in accordance with standards specified in Sections R315-264-1084

through 1087, as applicable to the hazardous waste management unit, except as provided for in Subsection R315-264-1082(c).

(c) A tank, surface impoundment, or container is exempt from standards specified in Sections R315-264-1084 through 1087, as applicable, provided that the waste management unit is one of the following:

(1) A tank, surface impoundment, or container for which all hazardous waste entering the unit has an average VO concentration at the point of waste origination of less than 500 parts per million by weight (ppmw). The average VO concentration shall be determined using the procedures specified in Subsection R315-264-1083(a). The owner or operator shall review and update, as necessary, this determination at least once every 12 months following the date of the initial determination for the hazardous waste streams entering the unit.

(2) A tank, surface impoundment, or container for which the organic content of all the hazardous waste entering the waste management unit has been reduced by an organic destruction or removal process that achieves any one of the following conditions:

(i) A process that removes or destroys the organics contained in the hazardous waste to a level such that the average VO concentration of the hazardous waste at the point of waste treatment is less than the exit concentration limit (Ct) established for the process. The average VO concentration of the hazardous waste at the point of waste treatment and the exit concentration limit for the process shall be determined using the procedures specified in Subsection R315-264-1083(b).

(ii) A process that removes or destroys the organics contained in the hazardous waste to a level such that the organic reduction efficiency (R) for the process is equal to or greater than 95 percent, and the average VO concentration of the hazardous waste at the point of waste treatment is less than 100 ppmw. The organic reduction efficiency for the process and the average VO concentration of the hazardous waste at the point of waste treatment shall be determined using the procedures specified in Subsection R315-264-1083(b).

(iii) A process that removes or destroys the organics contained in the hazardous waste to a level such that the actual organic mass removal rate (MR) for the process is equal to or greater than the required organic mass removal rate (RMR) established for the process. The required organic mass removal rate and the actual organic mass removal rate for the process shall be determined using the procedures specified in Subsection R315-264-1083(b).

(iv) A biological process that destroys or degrades the organics contained in the hazardous waste, such that either of the following conditions is met:

(A) The organic reduction efficiency (R) for the process is equal to or greater than 95 percent, and the organic biodegradation efficiency (Rbio) for the process is equal to or greater than 95 percent. The organic reduction efficiency and the organic biodegradation efficiency for the process shall be determined using the procedures specified in Subsection R315-264-1083(b).

(B) The total actual organic mass biodegradation rate (MRbio) for all hazardous waste treated by the process is equal to or greater than the required organic mass removal rate (RMR). The required organic mass removal rate and the actual organic mass biodegradation rate for the process shall be determined using the procedures specified in Subsection R315-264-1083(b).

(v) A process that removes or destroys the organics contained in the hazardous waste and meets all of the following conditions:

(A) From the point of waste origination through the point where the hazardous waste enters the treatment process, the hazardous waste is managed continuously in waste management units which use air emission controls in accordance with the standards specified in Sections R315-264-1084 through 1087, as applicable to the waste management unit.

(B) From the point of waste origination through the point where the hazardous waste enters the treatment process, any transfer of the hazardous waste is accomplished through continuous hard-piping or other closed system transfer that does not allow exposure of the waste to the atmosphere. The Director considers a drain system that meets the requirements of Subsection R307-214-2(29), which incorporates 40 CFR part 63, subpart RR-National Emission Standards for Individual Drain Systems to be a closed system.

(C) The average VO concentration of the hazardous waste at the point of waste treatment is less than the lowest average VO concentration at the point of waste origination determined for each of the individual waste streams entering the process or 500 ppmw, whichever value is lower. The average VO concentration of each individual waste stream at the point of waste origination shall be determined using the procedures specified in Subsection R315-264-1083(a). The average VO concentration of the hazardous waste at the point of waste treatment shall be determined using the procedures specified in Subsection R315-264-1083(b).

(vi) A process that removes or destroys the organics contained in the hazardous waste to a level such that the organic reduction efficiency (R) for the process is equal to or greater than 95 percent and the owner or operator certifies that the average VO concentration at the point of waste origination for each of the individual waste streams entering the process is less than 10,000 ppmw. The organic reduction efficiency for the process and the average VO concentration of the hazardous waste at the point of waste origination shall be determined using the procedures specified in Subsections R315-264-1083(b) and 1083(a), respectively.

(vii) A hazardous waste incinerator for which the owner or operator has either:

(A) Been issued a final permit under Rule R315-270 which implements the requirements of Sections R315-264-340 through 351; or

(B) Has designed and operates the incinerator in accordance with the interim status requirements of 40 CFR 265.340 through 352, which are adopted by reference.

(viii) A boiler or industrial furnace for which the owner or operator has either:

(A) Been issued a final permit under Rule R315-270 which implements the requirements of Sections R315-266-100 through 112, or

(B) Has designed and operates the boiler or industrial furnace in accordance with the interim status requirements of Sections R315-266-100 through 112.

(ix) For the purpose of determining the performance of an organic destruction or removal process in accordance with the conditions in each of Subsections R315-264-1082(c)(2)(i) through (c)(2)(vi), the owner or operator shall account for VO concentrations determined to be below the limit of detection of the analytical method by using the following VO concentration:

(A) If Method 25D in 40 CFR part 60, appendix A is used for the analysis, one-half the blank value determined in the method at section 4.4 of Method 25D in 40 CFR part 60, appendix A, or a value of 25 ppmw, whichever is less.

(B) If any other analytical method is used, one-half the sum of the limits of detection established for each organic constituent in the waste that has a Henry's law constant value at least 0.1 mole-fraction-in-the-gas-phase/mole-fraction-in-the-liquid-phase (0.1 Y/X), which can also be expressed as 1.8×10^{-6} atmospheres/gram-mole/m3, at 25 degrees Celsius.

(3) A tank or surface impoundment used for biological treatment of hazardous waste in accordance with the requirements of Subsection R315-264-1082(c)(2)(iv).

(4) A tank, surface impoundment, or container for which

all hazardous waste placed in the unit either:

(i) Meets the numerical concentration limits for organic hazardous constituents, applicable to the hazardous waste, as specified in Section R315-268-40-Land Disposal Restrictions under Table "Treatment Standards for Hazardous Waste;" or

(ii) The organic hazardous constituents in the waste have been treated by the treatment technology established by the Board for the waste in Subsection R315-268-42(a), or have been removed or destroyed by an equivalent method of treatment approved by EPA pursuant to 40 CFR 268.42(b).

(5) A tank used for bulk feed of hazardous waste to a waste incinerator and all of the following conditions are met:

(i) The tank is located inside an enclosure vented to a control device that is designed and operated in accordance with all applicable requirements specified under Section R315-214-1, which incorporates 40 CFR part 61, subpart FF-National Emission Standards for Benzene Waste Operations for a facility at which the total annual benzene quantity from the facility waste is equal to or greater than 10 megagrams per year;

(ii) The enclosure and control device serving the tank were installed and began operation prior to November 25, 1996 and

(iii) The enclosure is designed and operated in accordance with the criteria for a permanent total enclosure as specified in "Procedure T-Criteria for and Verification of a Permanent or Temporary Total Enclosure" under 40 CFR 52.741, appendix B. The enclosure may have permanent or temporary openings to allow worker access; passage of material into or out of the enclosure by conveyor, vehicles, or other mechanical or electrical equipment; or to direct air flow into the enclosure. The owner or operator shall perform the verification procedure for the enclosure as specified in Section 5.0 to "Procedure T-Criteria for and Verification of a Permanent or Temporary Total Enclosure" annually.

(d) The Director may at any time perform or request that the owner or operator perform a waste determination for a hazardous waste managed in a tank, surface impoundment, or container exempted from using air emission controls under the provisions of Section R315-264-1082 as follows:

(1) The waste determination for average VO concentration of a hazardous waste at the point of waste origination shall be performed using direct measurement in accordance with the applicable requirements of Subsection R315-264-1083(a). The waste determination for a hazardous waste at the point of waste treatment shall be performed in accordance with the applicable requirements of Subsection R315-264-1083(b).

(2) In performing a waste determination pursuant to Subsection R315-264-1082(d)(1), the sample preparation and analysis shall be conducted as follows:

(i) In accordance with the method used by the owner or operator to perform the waste analysis, except in the case specified in Subsection R315-264-1082(d)(2)(ii).

(ii) If the Director determines that the method used by the owner or operator was not appropriate for the hazardous waste managed in the tank, surface impoundment, or container, then the Director may choose an appropriate method.

(3) In a case when the owner or operator is requested to perform the waste determination, the Director may elect to have an authorized representative observe the collection of the hazardous waste samples used for the analysis.

(4) In a case when the results of the waste determination performed or requested by the Director do not agree with the results of a waste determination performed by the owner or operator using knowledge of the waste, then the results of the waste determination performed in accordance with the requirements of Subsection R315-264-1082(d)(1) shall be used to establish compliance with the requirements of Sections R315-264-1080 through 1090.

(5) In a case when the owner or operator has used an averaging period greater than 1 hour for determining the average VO concentration of a hazardous waste at the point of waste origination, the Director may elect to establish compliance with Sections R315-264-1080 through 1090 by performing or requesting that the owner or operator perform a waste determination using direct measurement based on waste samples collected within a 1-hour period as follows:

(i) The average VO concentration of the hazardous waste at the point of waste origination shall be determined by direct measurement in accordance with the requirements of Subsection R315-264-1083(a).

(ii) Results of the waste determination performed or requested by the Director showing that the average VO concentration of the hazardous waste at the point of waste origination is equal to or greater than 500 ppmw shall constitute noncompliance with Sections R315-264-1080 through 1090 except in a case as provided for in Subsection R315-264-1082(d)(5)(iii).

(iii) For the case when the average VO concentration of the hazardous waste at the point of waste origination previously has been determined by the owner or operator using an averaging period greater than 1 hour to be less than 500 ppmw but because of normal operating process variations the VO concentration of the hazardous waste determined by direct measurement for any given 1-hour period may be equal to or greater than 500 ppmw, information that was used by the owner or operator to determine the average VO concentration of the hazardous waste, e.g., test results, measurements, calculations, and other documentation, and recorded in the facility records in accordance with the requirements of Subsections R315-264-1083(a) and Section R315-264-1089 shall be considered by the Director together with the results of the waste determination performed or requested by the Director in establishing compliance with Sections R315-264-1080 through 1090.

R315-264-1083. Waste Determination Procedures.

(a) Waste determination procedure to determine average volatile organic (VO) concentration of a hazardous waste at the point of waste origination.

(1) An owner or operator shall determine the average VO concentration at the point of waste origination for each hazardous waste placed in a waste management unit exempted under the provisions of Subsection R315-264-1082(c)(1) from using air emission controls in accordance with standards specified in Sections R315-264-1084 through 1087, as applicable to the waste management unit.

(i) An initial determination of the average VO concentration of the waste stream shall be made before the first time any portion of the material in the hazardous waste stream is placed in a waste management unit exempted under the provisions of Subsection R315-264-1082(c)(1) from using air emission controls, and thereafter an initial determination of the average VO concentration of the waste stream shall be made for each averaging period that a hazardous waste is managed in the unit; and

(ii) Perform a new waste determination whenever changes to the source generating the waste stream are reasonably likely to cause the average VO concentration of the hazardous waste to increase to a level that is equal to or greater than the applicable VO concentration limits specified in Section R315-264-1082.

(2) For a waste determination that is required by Subsection R315-264-1083(a)(1), the average VO concentration of a hazardous waste at the point of waste origination shall be determined in accordance with the procedures specified in 40 CFR 265.1084(a)(2) through (a)(4), which are adopted by reference.

(b) Waste determination procedures for treated hazardous waste.

(1) An owner or operator shall perform the applicable

waste determinations for each treated hazardous waste placed in waste management units exempted under the provisions of Subsections R315-264-1082(c)(2)(i) through (c)(2)(vi) from using air emission controls in accordance with standards specified in Sections R315-264-1084 through 1087, as applicable to the waste management unit.

(i) An initial determination of the average VO concentration of the waste stream shall be made before the first time any portion of the material in the treated waste stream is placed in the exempt waste management unit, and thereafter update the information used for the waste determination at least once every 12 months following the date of the initial waste determination; and

(ii) Perform a new waste determination whenever changes to the process generating or treating the waste stream are reasonably likely to cause the average VO concentration of the hazardous waste to increase to a level such that the applicable treatment conditions specified in Subsection R315-264-1082(c)(2) are not achieved.

(2) The waste determination for a treated hazardous waste shall be performed in accordance with the procedures specified in 40 CFR 265.1084(b)(2) through (b)(9), which are adopted by reference, as applicable to the treated hazardous waste.

(c) Procedure to determine the maximum organic vapor pressure of a hazardous waste in a tank.

(1) An owner or operator shall determine the maximum organic vapor pressure for each hazardous waste placed in a tank using Tank Level 1 controls in accordance with standards specified in Subsection R315-264-1084(c).

(2) The maximum organic vapor pressure of the hazardous waste may be determined in accordance with the procedures specified in 40 CFR 265.1084(c)(2) through (c)(4), which are adopted by reference.

(d) The procedure for determining no detectable organic emissions for the purpose of complying with Sections R315-264-1080 through 1090 shall be conducted in accordance with the procedures specified in 40 CFR 265.1084(d), which is adopted by reference.

R315-264-1084. Standards: Tanks.

(a) The provisions of Section R315-264-1084 apply to the control of air pollutant emissions from tanks for which Subsection R315-264-1082(b) references the use of Section R315-264-1084 for such air emission control.

(b) The owner or operator shall control air pollutant emissions from each tank subject to Section R315-264-1084 in accordance with the following requirements as applicable:

(1) For a tank that manages hazardous waste that meets all of the conditions specified in Subsections R315-264-1084(b)(1)(i) through (b)(1)(iii), the owner or operator shall control air pollutant emissions from the tank in accordance with the Tank Level 1 controls specified in Subsection R315-264-1084(c) or the Tank Level 2 controls specified in Subsection R315-264-1084(d).

(i) The hazardous waste in the tank has a maximum organic vapor pressure which is less than the maximum organic vapor pressure limit for the tank's design capacity category as follows:

(A) For a tank design capacity equal to or greater than 151 cubic meters, the maximum organic vapor pressure limit for the tank is 5.2 kPa.

(B) For a tank design capacity equal to or greater than 75 cubic meters but less than 151 cubic meters, the maximum organic vapor pressure limit for the tank is 27.6 kPa.

(C) For a tank design capacity less than 75 cubic meters, the maximum organic vapor pressure limit for the tank is 76.6 kPa.

(ii) The hazardous waste in the tank is not heated by the owner or operator to a temperature that is greater than the temperature at which the maximum organic vapor pressure of the hazardous waste is determined for the purpose of complying with Subsection R315-264-1084(b)(1)(i).

(iii) The hazardous waste in the tank is not treated by the owner or operator using a waste stabilization process, as defined in 40 CFR 265.1081, which is adopted by reference.

(2) For a tank that manages hazardous waste that does not meet all of the conditions specified in Subsections R315-264-1084(b)(1)(i) through (b)(1)(iii), the owner or operator shall control air pollutant emissions from the tank by using Tank Level 2 controls in accordance with the requirements of Subsection R315-264-1084(d). Examples of tanks required to use Tank Level 2 controls include: A tank used for a waste stabilization process; and a tank for which the hazardous waste in the tank has a maximum organic vapor pressure that is equal to or greater than the maximum organic vapor pressure limit for the tank's design capacity category as specified in Subsection R315-264-1084(b)(1)(i).

(c) Owners and operators controlling air pollutant emissions from a tank using Tank Level 1 controls shall meet the requirements specified in Subsections R315-264-1084(c)(1) through (c)(4):

(1) The owner or operator shall determine the maximum organic vapor pressure for a hazardous waste to be managed in the tank using Tank Level 1 controls before the first time the hazardous waste is placed in the tank. The maximum organic vapor pressure shall be determined using the procedures specified in Subsection R315-264-1083(c). Thereafter, the owner or operator shall perform a new determination whenever changes to the hazardous waste managed in the tank could potentially cause the maximum organic vapor pressure to increase to a level that is equal to or greater than the maximum organic vapor pressure limit for the tank design capacity category specified in Subsection R315-264-1084(b)(1)(i), as applicable to the tank.

(2) The tank shall be equipped with a fixed roof designed to meet the following specifications:

(i) The fixed roof and its closure devices shall be designed to form a continuous barrier over the entire surface area of the hazardous waste in the tank. The fixed roof may be a separate cover installed on the tank, e.g., a removable cover mounted on an open-top tank, or may be an integral part of the tank structural design, e.g., a horizontal cylindrical tank equipped with a hatch.

(ii) The fixed roof shall be installed in a manner such that there are no visible cracks, holes, gaps, or other open spaces between roof section joints or between the interface of the roof edge and the tank wall.

(iii) Each opening in the fixed roof, and any manifold system associated with the fixed roof, shall be either:

(A) Equipped with a closure device designed to operate such that when the closure device is secured in the closed position there are no visible cracks, holes, gaps, or other open spaces in the closure device or between the perimeter of the opening and the closure device; or

(B) Connected by a closed-vent system that is vented to a control device. The control device shall remove or destroy organics in the vent stream, and shall be operating whenever hazardous waste is managed in the tank, except as provided for in Subsection R315-264-1084(c)(2)(iii)(B)(I) and (II).

(I) During periods when it is necessary to provide access to the tank for performing the activities of Subsection R315-264-1084(c)(2)(iii)(B)(II), venting of the vapor headspace underneath the fixed roof to the control device is not required, opening of closure devices is allowed, and removal of the fixed roof is allowed. Following completion of the activity, the owner or operator shall promptly secure the closure device in the closed position or reinstall the cover, as applicable, and resume operation of the control device.

(II) During periods of routine inspection, maintenance, or other activities needed for normal operations, and for removal of accumulated sludge or other residues from the bottom of the tank.

(iv) The fixed roof and its closure devices shall be made of suitable materials that will minimize exposure of the hazardous waste to the atmosphere, to the extent practical, and will maintain the integrity of the fixed roof and closure devices throughout their intended service life. Factors to be considered when selecting the materials for and designing the fixed roof and closure devices shall include: Organic vapor permeability, the effects of any contact with the hazardous waste or its vapors managed in the tank; the effects of outdoor exposure to wind, moisture, and sunlight; and the operating practices used for the tank on which the fixed roof is installed.

(3) Whenever a hazardous waste is in the tank, the fixed roof shall be installed with each closure device secured in the closed position except as follows:

(i) Opening of closure devices or removal of the fixed roof is allowed at the following times:

(A) To provide access to the tank for performing routine inspection, maintenance, or other activities needed for normal operations. Examples of such activities include those times when a worker needs to open a port to sample the liquid in the tank, or when a worker needs to open a hatch to maintain or repair equipment. Following completion of the activity, the owner or operator shall promptly secure the closure device in the closed position or reinstall the cover, as applicable, to the tank.

(B) To remove accumulated sludge or other residues from the bottom of tank.

(ii) Opening of a spring-loaded pressure-vacuum relief valve, conservation vent, or similar type of pressure relief device which vents to the atmosphere is allowed during normal operations for the purpose of maintaining the tank internal pressure in accordance with the tank design specifications. The device shall be designed to operate with no detectable organic emissions when the device is secured in the closed position. The settings at which the device opens shall be established such that the device remains in the closed position whenever the tank internal pressure is within the internal pressure operating range determined by the owner or operator based on the tank manufacturer recommendations, applicable regulations, fire protection and prevention codes, standard engineering codes and practices, or other requirements for the safe handling of flammable, ignitable, explosive, reactive, or hazardous materials. Examples of normal operating conditions that may require these devices to open are during those times when the tank internal pressure exceeds the internal pressure operating range for the tank as a result of loading operations or diurnal ambient temperature fluctuations.

(iii) Opening of a safety device, as defined in 40 CFR 265.1081, which is adopted by reference, is allowed at any time conditions require doing so to avoid an unsafe condition.

(4) The owner or operator shall inspect the air emission control equipment in accordance with the following requirements.

(i) The fixed roof and its closure devices shall be visually inspected by the owner or operator to check for defects that could result in air pollutant emissions. Defects include, but are not limited to, visible cracks, holes, or gaps in the roof sections or between the roof and the tank wall; broken, cracked, or otherwise damaged seals or gaskets on closure devices; and broken or missing hatches, access covers, caps, or other closure devices.

(ii) The owner or operator shall perform an initial inspection of the fixed roof and its closure devices on or before the date that the tank becomes subject to Section R315-264-1084. Thereafter, the owner or operator shall perform the inspections at least once every year except under the special conditions provided for in Subsection R315-264-1084(l).

(iii) In the event that a defect is detected, the owner or operator shall repair the defect in accordance with the requirements of Subsection R315-264-1084(k).

(iv) The owner or operator shall maintain a record of the inspection in accordance with the requirements specified in Subsection R315-264-1089(b).

(d) Owners and operators controlling air pollutant emissions from a tank using Tank Level 2 controls shall use one of the following tanks:

(1) A fixed-roof tank equipped with an internal floating roof in accordance with the requirements specified in Subsection R315-264-1084(e);

(2) A tank equipped with an external floating roof in accordance with the requirements specified in Subsection R315-264-1084(f)

(3) A tank vented through a closed-vent system to a control device in accordance with the requirements specified in Subsection R315-264-1084(g);

(4) A pressure tank designed and operated in accordance with the requirements specified in Subsection R315-264-1084(h); or

(5) A tank located inside an enclosure that is vented through a closed-vent system to an enclosed combustion control device in accordance with the requirements specified in Subsection R315-264-1084(i).

(e) The owner or operator who controls air pollutant emissions from a tank using a fixed roof with an internal floating roof shall meet the requirements specified in Subsections R315-264-1084(e)(1) through (e)(3).

(1) The tank shall be equipped with a fixed roof and an internal floating roof in accordance with the following requirements:

(i) The internal floating roof shall be designed to float on the liquid surface except when the floating roof shall be supported by the leg supports.

(ii) The internal floating roof shall be equipped with a continuous seal between the wall of the tank and the floating roof edge that meets either of the following requirements:

(A) A single continuous seal that is either a liquid-mounted seal or a metallic shoe seal, as defined in 40 CFR 265.1081, which is adopted by reference; or

(B) Two continuous seals mounted one above the other. The lower seal may be a vapor-mounted seal.

(iii) The internal floating roof shall meet the following specifications:

(A) Each opening in a noncontact internal floating roof except for automatic bleeder vents, vacuum breaker vents, and the rim space vents is to provide a projection below the liquid surface.

(B) Each opening in the internal floating roof shall be equipped with a gasketed cover or a gasketed lid except for leg sleeves, automatic bleeder vents, rim space vents, column wells, ladder wells, sample wells, and stub drains.

(C) Each penetration of the internal floating roof for the purpose of sampling shall have a slit fabric cover that covers at least 90 percent of the opening.

(D) Each automatic bleeder vent and rim space vent shall be gasketed.

(E) Each penetration of the internal floating roof that allows for passage of a ladder shall have a gasketed sliding cover.

(F) Each penetration of the internal floating roof that allows for passage of a column supporting the fixed roof shall have a flexible fabric sleeve seal or a gasketed sliding cover.

(2) The owner or operator shall operate the tank in accordance with the following requirements:

(i) When the floating roof is resting on the leg supports,

the process of filling, emptying, or refilling shall be continuous and shall be completed as soon as practical.

(ii) Automatic bleeder vents are to be set closed at all times when the roof is floating, except when the roof is being floated off or is being landed on the leg supports.

(iii) Prior to filling the tank, each cover, access hatch, gauge float well or lid on any opening in the internal floating roof shall be bolted or fastened closed, i.e., no visible gaps. Rim space vents are to be set to open only when the internal floating roof is not floating or when the pressure beneath the rim exceeds the manufacturer's recommended setting.

(3) The owner or operator shall inspect the internal floating roof in accordance with the procedures specified as follows:

(i) The floating roof and its closure devices shall be visually inspected by the owner or operator to check for defects that could result in air pollutant emissions. Defects include, but are not limited to: The internal floating roof is not floating on the surface of the liquid inside the tank; liquid has accumulated on top of the internal floating roof; any portion of the roof seals have detached from the roof rim; holes, tears, or other openings are visible in the seal fabric; the gaskets no longer close off the hazardous waste surface from the atmosphere; or the slotted membrane has more than 10 percent open area.

(ii) The owner or operator shall inspect the internal floating roof components as follows except as provided in Subsection R315-264-1084(e)(3)(iii):

(A) Visually inspect the internal floating roof components through openings on the fixed-roof, e.g., manholes and roof hatches, at least once every 12 months after initial fill, and

(B) Visually inspect the internal floating roof, primary seal, secondary seal, if one is in service, gaskets, slotted membranes, and sleeve seals, if any, each time the tank is emptied and degassed and at least every 10 years.

(iii) As an alternative to performing the inspections specified in Subsection R315-264-1084(e)(3)(ii) for an internal floating roof equipped with two continuous seals mounted one above the other, the owner or operator may visually inspect the internal floating roof, primary and secondary seals, gaskets, slotted membranes, and sleeve seals, if any, each time the tank is emptied and degassed and at least every 5 years.

(iv) Prior to each inspection required by Subsections R315-264-1084(e)(3)(ii) or (e)(3)(iii), the owner or operator shall notify the Director in advance of each inspection to provide the Director with the opportunity to have an observer present during the inspection. The owner or operator shall notify the Director of the date and location of the inspection as follows:

(A) Prior to each visual inspection of an internal floating roof in a tank that has been emptied and degassed, written notification shall be prepared and sent by the owner or operator so that it is received by the Director at least 30 calendar days before refilling the tank except when an inspection is not planned as provided for in Subsection R315-264-1084(e)(3)(iv)(B).

(B) When a visual inspection is not planned and the owner or operator could not have known about the inspection 30 calendar days before refilling the tank, the owner or operator shall notify the Director as soon as possible, but no later than 7 calendar days before refilling of the tank. This notification may be made by telephone and immediately followed by a written explanation for why the inspection is unplanned. Alternatively, written notification, including the explanation for the unplanned inspection, may be sent so that it is received by the Director at least 7 calendar days before refilling the tank.

(v) In the event that a defect is detected, the owner or operator shall repair the defect in accordance with the requirements of Subsection R315-264-1084(k).

(vi) The owner or operator shall maintain a record of the inspection in accordance with the requirements specified in Subsection R315-264-1089(b).

(4) Safety devices, as defined in 40 CFR 265.1081, which is adopted by reference, may be installed and operated as necessary on any tank complying with the requirements of Subsection R315-264-1084(e).

(f) The owner or operator who controls air pollutant emissions from a tank using an external floating roof shall meet the requirements specified in Subsections R315-264-1084(f)(1) through (f)(3).

(1) The owner or operator shall design the external floating roof in accordance with the following requirements:

(i) The external floating roof shall be designed to float on the liquid surface except when the floating roof shall be supported by the leg supports.

(ii) The floating roof shall be equipped with two continuous seals, one above the other, between the wall of the tank and the roof edge. The lower seal is referred to as the primary seal, and the upper seal is referred to as the secondary seal.

(A) The primary seal shall be a liquid-mounted seal or a metallic shoe seal, as defined in 40 CFR 265.1081, which is adopted by reference. The total area of the gaps between the tank wall and the primary seal shall not exceed 212 square centimeters per meter of tank diameter, and the width of any portion of these gaps shall not exceed 3.8 centimeters. If a metallic shoe seal is used for the primary seal, the metallic shoe seal shall be designed so that one end extends into the liquid in the tank and the other end extends a vertical distance of at least 61 centimeters above the liquid surface.

(B) The secondary seal shall be mounted above the primary seal and cover the annular space between the floating roof and the wall of the tank. The total area of the gaps between the tank wall and the secondary seal shall not exceed 21.2 square centimeters per meter of tank diameter, and the width of any portion of these gaps shall not exceed 1.3 centimeters.

(iii) The external floating roof shall meet the following specifications:

(A) Except for automatic bleeder vents, vacuum breaker vents, and rim space vents, each opening in a noncontact external floating roof shall provide a projection below the liquid surface.

(B) Except for automatic bleeder vents, rim space vents, roof drains, and leg sleeves, each opening in the roof shall be equipped with a gasketed cover, seal, or lid.

(C) Each access hatch and each gauge float well shall be equipped with a cover designed to be bolted or fastened when the cover is secured in the closed position.

(D) Each automatic bleeder vent and each rim space vent shall be equipped with a gasket.

(E) Each roof drain that empties into the liquid managed in the tank shall be equipped with a slotted membrane fabric cover that covers at least 90 percent of the area of the opening.

(F) Each unslotted and slotted guide pole well shall be equipped with a gasketed sliding cover or a flexible fabric sleeve seal.

(G) Each unslotted guide pole shall be equipped with a gasketed cap on the end of the pole.

(H) Each slotted guide pole shall be equipped with a gasketed float or other device which closes off the liquid surface from the atmosphere.

(I) Each gauge hatch and each sample well shall be equipped with a gasketed cover.

(2) The owner or operator shall operate the tank in accordance with the following requirements:

(i) When the floating roof is resting on the leg supports, the process of filling, emptying, or refilling shall be continuous and shall be completed as soon as practical.

(ii) Except for automatic bleeder vents, rim space vents,

roof drains, and leg sleeves, each opening in the roof shall be secured and maintained in a closed position at all times except when the closure device shall be open for access.

(iii) Covers on each access hatch and each gauge float well shall be bolted or fastened when secured in the closed position.

(iv) Automatic bleeder vents shall be set closed at all times when the roof is floating, except when the roof is being floated off or is being landed on the leg supports.

(v) Rim space vents shall be set to open only at those times that the roof is being floated off the roof leg supports or when the pressure beneath the rim seal exceeds the manufacturer's recommended setting.

(vi) The cap on the end of each unslotted guide pole shall be secured in the closed position at all times except when measuring the level or collecting samples of the liquid in the tank.

(vii) The cover on each gauge hatch or sample well shall be secured in the closed position at all times except when the hatch or well shall be opened for access.

(viii) Both the primary seal and the secondary seal shall completely cover the annular space between the external floating roof and the wall of the tank in a continuous fashion except during inspections.

(3) The owner or operator shall inspect the external floating roof in accordance with the procedures specified as follows:

(i) The owner or operator shall measure the external floating roof seal gaps in accordance with the following requirements:

(A) The owner or operator shall perform measurements of gaps between the tank wall and the primary seal within 60 calendar days after initial operation of the tank following installation of the floating roof and, thereafter, at least once every 5 years.

(B) The owner or operator shall perform measurements of gaps between the tank wall and the secondary seal within 60 calendar days after initial operation of the tank following installation of the floating roof and, thereafter, at least once every year.

(C) If a tank ceases to hold hazardous waste for a period of 1 year or more, subsequent introduction of hazardous waste into the tank shall be considered an initial operation for the purposes of Subsections R315-264-1084(f)(3)(i)(A) and (f)(3)(i)(B).

(D) The owner or operator shall determine the total surface area of gaps in the primary seal and in the secondary seal individually using the following procedure:

(1) The seal gap measurements shall be performed at one or more floating roof levels when the roof is floating off the roof supports.

(2) Seal gaps, if any, shall be measured around the entire perimeter of the floating roof in each place where a 0.32-centimeter diameter uniform probe passes freely, without forcing or binding against the seal, between the seal and the wall of the tank and measure the circumferential distance of each such location.

(3) For a seal gap measured under Subsection R315-264-1084(f)(3), the gap surface area shall be determined by using probes of various widths to measure accurately the actual distance from the tank wall to the seal and multiplying each such width by its respective circumferential distance.

(4) The total gap area shall be calculated by adding the gap surface areas determined for each identified gap location for the primary seal and the secondary seal individually, and then dividing the sum for each seal type by the nominal diameter of the tank. These total gap areas for the primary seal and secondary seal are then compared to the respective standards for the seal type as specified in Subsection R315-264-1084(f)(1)(ii).

(E) In the event that the seal gap measurements do not conform to the specifications in Subsection R315-264-1084(f)(1)(ii), the owner or operator shall repair the defect in accordance with the requirements of Subsection R315-264-1084(k).

(F) The owner or operator shall maintain a record of the inspection in accordance with the requirements specified in Subsection R315-264-1089(b).

(ii) The owner or operator shall visually inspect the external floating roof in accordance with the following requirements:

(A) The floating roof and its closure devices shall be visually inspected by the owner or operator to check for defects that could result in air pollutant emissions. Defects include, but are not limited to: Holes, tears, or other openings in the rim seal or seal fabric of the floating roof; a rim seal detached from the floating roof; all or a portion of the floating roof deck being submerged below the surface of the liquid in the tank; broken, cracked, or otherwise damaged seals or gaskets on closure devices; and broken or missing hatches, access covers, caps, or other closure devices.

(B) The owner or operator shall perform an initial inspection of the external floating roof and its closure devices on or before the date that the tank becomes subject to Section R315-264-1084. Thereafter, the owner or operator shall perform the inspections at least once every year except for the special conditions provided for in Subsection R315-264-1084(l).

(C) In the event that a defect is detected, the owner or operator shall repair the defect in accordance with the requirements of Subsection R315-264-1084(k).

(D) The owner or operator shall maintain a record of the inspection in accordance with the requirements specified in Subsection R315-264-1089(b).

(iii) Prior to each inspection required by Subsections R315-264-1084(f)(3)(i) or (f)(3)(ii), the owner or operator shall notify the Director in advance of each inspection to provide the Director with the opportunity to have an observer present during the inspection. The owner or operator shall notify the Director of the date and location of the inspection as follows:

(A) Prior to each inspection to measure external floating roof seal gaps as required under Subsection R315-264-1084(f)(3)(i), written notification shall be prepared and sent by the owner or operator so that it is received by the Director at least 30 calendar days before the date the measurements are scheduled to be performed.

(B) Prior to each visual inspection of an external floating roof in a tank that has been emptied and degassed, written notification shall be prepared and sent by the owner or operator so that it is received by the Director at least 30 calendar days before refilling the tank except when an inspection is not planned as provided for in Subsection R315-264-1084(f)(3)(iii)(C).

(C) When a visual inspection is not planned and the owner or operator could not have known about the inspection 30 calendar days before refilling the tank, the owner or operator shall notify the Director as soon as possible, but no later than 7 calendar days before refilling of the tank. This notification may be made by telephone and immediately followed by a written explanation for why the inspection is unplanned. Alternatively, written notification, including the explanation for the unplanned inspection, may be sent so that it is received by the Director at least 7 calendar days before refilling the tank.

(4) Safety devices, as defined in 40 CFR 265.1081, which is adopted by reference, may be installed and operated as necessary on any tank complying with the requirements of Subsection R315-264-1084(f).

(g) The owner or operator who controls air pollutant emissions from a tank by venting the tank to a control device shall meet the requirements specified in Subsections R315-264-

1084(g)(1) through (g)(3).

(1) The tank shall be covered by a fixed roof and vented directly through a closed-vent system to a control device in accordance with the following requirements:

(i) The fixed roof and its closure devices shall be designed to form a continuous barrier over the entire surface area of the liquid in the tank.

(ii) Each opening in the fixed roof not vented to the control device shall be equipped with a closure device. If the pressure in the vapor headspace underneath the fixed roof is less than atmospheric pressure when the control device is operating, the closure devices shall be designed to operate such that when the closure device is secured in the closed position there are no visible cracks, holes, gaps, or other open spaces in the closure device or between the perimeter of the cover opening and the closure device. If the pressure in the vapor headspace underneath the fixed roof is equal to or greater than atmospheric pressure when the control device is operating, the closure device shall be designed to operate with no detectable organic emissions.

(iii) The fixed roof and its closure devices shall be made of suitable materials that will minimize exposure of the hazardous waste to the atmosphere, to the extent practical, and will maintain the integrity of the fixed roof and closure devices throughout their intended service life. Factors to be considered when selecting the materials for and designing the fixed roof and closure devices shall include: Organic vapor permeability, the effects of any contact with the liquid and its vapor managed in the tank; the effects of outdoor exposure to wind, moisture, and sunlight; and the operating practices used for the tank on which the fixed roof is installed.

(iv) The closed-vent system and control device shall be designed and operated in accordance with the requirements of Section R315-264-1087.

(2) Whenever a hazardous waste is in the tank, the fixed roof shall be installed with each closure device secured in the closed position and the vapor headspace underneath the fixed roof vented to the control device except as follows:

(i) Venting to the control device is not required, and opening of closure devices or removal of the fixed roof is allowed at the following times:

(A) To provide access to the tank for performing routine inspection, maintenance, or other activities needed for normal operations. Examples of such activities include those times when a worker needs to open a port to sample liquid in the tank, or when a worker needs to open a hatch to maintain or repair equipment. Following completion of the activity, the owner or operator shall promptly secure the closure device in the closed position or reinstall the cover, as applicable, to the tank.

(B) To remove accumulated sludge or other residues from the bottom of a tank.

(ii) Opening of a safety device, as defined in 40 CFR 265.1081, which is adopted by reference, is allowed at any time conditions require doing so to avoid an unsafe condition.

(3) The owner or operator shall inspect and monitor the air emission control equipment in accordance with the following procedures:

(i) The fixed roof and its closure devices shall be visually inspected by the owner or operator to check for defects that could result in air pollutant emissions. Defects include, but are not limited to, visible cracks, holes, or gaps in the roof sections or between the roof and the tank wall; broken, cracked, or otherwise damaged seals or gaskets on closure devices; and broken or missing hatches, access covers, caps, or other closure devices.

(ii) The closed-vent system and control device shall be inspected and monitored by the owner or operator in accordance with the procedures specified in Section R315-264-1087.

(iii) The owner or operator shall perform an initial inspection of the air emission control equipment on or before the date that the tank becomes subject to Section R315-264-1084. Thereafter, the owner or operator shall perform the inspections at least once every year except for the special conditions provided for in Subsection R315-264-1084(l).

(iv) In the event that a defect is detected, the owner or operator shall repair the defect in accordance with the requirements of Subsection R315-264-1084(k).

(v) The owner or operator shall maintain a record of the inspection in accordance with the requirements specified in Subsection R315-264-1089(b).

(h) The owner or operator who controls air pollutant emissions by using a pressure tank shall meet the following requirements.

(1) The tank shall be designed not to vent to the atmosphere as a result of compression of the vapor headspace in the tank during filling of the tank to its design capacity.

(2) All tank openings shall be equipped with closure devices designed to operate with no detectable organic emissions as determined using the procedure specified in Subsection R315-264-1083(d).

(3) Whenever a hazardous waste is in the tank, the tank shall be operated as a closed system that does not vent to the atmosphere except under either or the following conditions as specified in Subsections R315-264-1084(h)(3)(i) or (h)(3)(ii).

(i) At those times when opening of a safety device, as defined in 40 CFR 265.1081, which is adopted by reference, is required to avoid an unsafe condition.

(ii) At those times when purging of inerts from the tank is required and the purge stream is routed to a closed-vent system and control device designed and operated in accordance with the requirements of Section R315-264-1087.

(i) The owner or operator who controls air pollutant emissions by using an enclosure vented through a closed-vent system to an enclosed combustion control device shall meet the requirements specified in Subsections R315-264-1084(i)(1) through (i)(4).

(1) The tank shall be located inside an enclosure. The enclosure shall be designed and operated in accordance with the criteria for a permanent total enclosure as specified in "Procedure T-Criteria for and Verification of a Permanent or Temporary Total Enclosure" under 40 CFR 52.741, appendix B. The enclosure may have permanent or temporary openings to allow worker access; passage of material into or out of the enclosure by conveyor, vehicles, or other mechanical means; entry of permanent mechanical or electrical equipment; or direct airflow into the enclosure. The owner or operator shall perform the verification procedure for the enclosure as specified in Section 5.0 to "Procedure T-Criteria for and Verification of a Permanent or Temporary Total Enclosure" initially when the enclosure is first installed and, thereafter, annually.

(2) The enclosure shall be vented through a closed-vent system to an enclosed combustion control device that is designed and operated in accordance with the standards for either a vapor incinerator, boiler, or process heater specified in Section R315-264-1087.

(3) Safety devices, as defined in 40 CFR 265.1081, which is adopted by reference, may be installed and operated as necessary on any enclosure, closed-vent system, or control device used to comply with the requirements of Subsections R315-264-1084(i)(1) and (i)(2).

(4) The owner or operator shall inspect and monitor the closed-vent system and control device as specified in Section R315-264-1087.

(j) The owner or operator shall transfer hazardous waste to a tank subject to Section R315-264-1084 in accordance with the following requirements:

(1) Transfer of hazardous waste, except as provided in Subsection R315-264-1084(j)(2), to the tank from another tank

subject to Section R315-264-1084 or from a surface impoundment subject to Section R315-264-1085 shall be conducted using continuous hard-piping or another closed system that does not allow exposure of the hazardous waste to the atmosphere. For the purpose of complying with this provision, an individual drain system is considered to be a closed system when it meets the requirements of Subsection R307-214-2(29), which incorporates 40 CFR part 63, subpart RR-National Emission Standards for Individual Drain Systems.

(2) The requirements of Subsection R315-264-1084(j)(1) do not apply when transferring a hazardous waste to the tank under any of the following conditions:

(i) The hazardous waste meets the average VO concentration conditions specified in Subsection R315-264-1082(c)(1) at the point of waste origination.

(ii) The hazardous waste has been treated by an organic destruction or removal process to meet the requirements in Subsection R315-264-1082(c)(2).

(iii) The hazardous waste meets the requirements of Subsection R315-264-1082(c)(4).

(k) The owner or operator shall repair each defect detected during an inspection performed in accordance with the requirements of Subsections R315-264-1084(c)(4), (e)(3), (f)(3), or (g)(3) as follows:

(1) The owner or operator shall make first efforts at repair of the defect no later than 5 calendar days after detection, and repair shall be completed as soon as possible but no later than 45 calendar days after detection except as provided in Subsection R315-264-1084(k)(2).

(2) Repair of a defect may be delayed beyond 45 calendar days if the owner or operator determines that repair of the defect requires emptying or temporary removal from service of the tank and no alternative tank capacity is available at the site to accept the hazardous waste normally managed in the tank. In this case, the owner or operator shall repair the defect the next time the process or unit that is generating the hazardous waste managed in the tank stops operation. Repair of the defect shall be completed before the process or unit resumes operation.

(l) Following the initial inspection and monitoring of the cover as required by the applicable provisions of Sections R315-264-1080 through 1090, subsequent inspection and monitoring may be performed at intervals longer than 1 year under the following special conditions:

(1) In the case when inspecting or monitoring the cover would expose a worker to dangerous, hazardous, or other unsafe conditions, then the owner or operator may designate a cover as an "unsafe to inspect and monitor cover" and comply with all of the following requirements:

(i) Prepare a written explanation for the cover stating the reasons why the cover is unsafe to visually inspect or to monitor, if required.

(ii) Develop and implement a written plan and schedule to inspect and monitor the cover, using the procedures specified in the applicable section of Sections R315-264-1080 through 1090, as frequently as practicable during those times when a worker can safely access the cover.

(2) In the case when a tank is buried partially or entirely underground, an owner or operator is required to inspect and monitor, as required by the applicable provisions of Section R315-264-1084, only those portions of the tank cover and those connections to the tank, e.g., fill ports, access hatches, gauge wells, etc., that are located on or above the ground surface.

R315-264-1085. Standards: Surface Impoundments.

(a) The provisions of Section R315-264-1085 apply to the control of air pollutant emissions from surface impoundments for which Subsection R315-264-1082(b) references the use of Section R315-264-1085 for such air emission control.

(b) The owner or operator shall control air pollutant emissions from the surface impoundment by installing and operating either of the following:

(1) A floating membrane cover in accordance with the provisions specified in Subsection R315-264-1085(c); or

(2) A cover that is vented through a closed-vent system to a control device in accordance with the provisions specified in Subsection R315-264-1085(d).

(c) The owner or operator who controls air pollutant emissions from a surface impoundment using a floating membrane cover shall meet the requirements specified in Subsections R315-264-1085(c)(1) through (c)(3).

(1) The surface impoundment shall be equipped with a floating membrane cover designed to meet the following specifications:

(i) The floating membrane cover shall be designed to float on the liquid surface during normal operations and form a continuous barrier over the entire surface area of the liquid.

(ii) The cover shall be fabricated from a synthetic membrane material that is either:

(A) High density polyethylene (HDPE) with a thickness no less than 2.5 millimeters; or

(B) A material or a composite of different materials determined to have both organic permeability properties that are equivalent to those of the material listed in Subsection R315-264-1085(c)(1)(ii)(A) and chemical and physical properties that maintain the material integrity for the intended service life of the material.

(iii) The cover shall be installed in a manner such that there are no visible cracks, holes, gaps, or other open spaces between cover section seams or between the interface of the cover edge and its foundation mountings.

(iv) Except as provided for in Subsection R315-264-1085(c)(1)(v), each opening in the floating membrane cover shall be equipped with a closure device designed to operate such that when the closure device is secured in the closed position there are no visible cracks, holes, gaps, or other open spaces in the closure device or between the perimeter of the cover opening and the closure device.

(v) The floating membrane cover may be equipped with one or more emergency cover drains for removal of stormwater. Each emergency cover drain shall be equipped with a slotted membrane fabric cover that covers at least 90 percent of the area of the opening or a flexible fabric sleeve seal.

(vi) The closure devices shall be made of suitable materials that will minimize exposure of the hazardous waste to the atmosphere, to the extent practical, and will maintain the integrity of the closure devices throughout their intended service life. Factors to be considered when selecting the materials of construction and designing the cover and closure devices shall include: Organic vapor permeability; the effects of any contact with the liquid and its vapor managed in the surface impoundment; the effects of outdoor exposure to wind, moisture, and sunlight; and the operating practices used for the surface impoundment on which the floating membrane cover is installed.

(2) Whenever a hazardous waste is in the surface impoundment, the floating membrane cover shall float on the liquid and each closure device shall be secured in the closed position except as follows:

(i) Opening of closure devices or removal of the cover is allowed at the following times:

(A) To provide access to the surface impoundment for performing routine inspection, maintenance, or other activities needed for normal operations. Examples of such activities include those times when a worker needs to open a port to sample the liquid in the surface impoundment, or when a worker needs to open a hatch to maintain or repair equipment. Following completion of the activity, the owner or operator shall promptly replace the cover and secure the closure device

in the closed position, as applicable.

(B) To remove accumulated sludge or other residues from the bottom of surface impoundment.

(ii) Opening of a safety device, as defined in 40 CFR 265.1081, which is adopted by reference, is allowed at any time conditions require doing so to avoid an unsafe condition.

(3) The owner or operator shall inspect the floating membrane cover in accordance with the following procedures:

(i) The floating membrane cover and its closure devices shall be visually inspected by the owner or operator to check for defects that could result in air pollutant emissions. Defects include, but are not limited to, visible cracks, holes, or gaps in the cover section seams or between the interface of the cover edge and its foundation mountings; broken, cracked, or otherwise damaged seals or gaskets on closure devices; and broken or missing hatches, access covers, caps, or other closure devices.

(ii) The owner or operator shall perform an initial inspection of the floating membrane cover and its closure devices on or before the date that the surface impoundment becomes subject to Section R315-264-1085. Thereafter, the owner or operator shall perform the inspections at least once every year except for the special conditions provided for in Subsection R315-264-1085(g).

(iii) In the event that a defect is detected, the owner or operator shall repair the defect in accordance with the requirements of Subsection R315-264-1085(f).

(iv) The owner or operator shall maintain a record of the inspection in accordance with the requirements specified in Subsection R315-264-1089(c).

(d) The owner or operator who controls air pollutant emissions from a surface impoundment using a cover vented to a control device shall meet the requirements specified in Subsections R315-264-1085(d)(1) through (d)(3).

(1) The surface impoundment shall be covered by a cover and vented directly through a closed-vent system to a control device in accordance with the following requirements:

(i) The cover and its closure devices shall be designed to form a continuous barrier over the entire surface area of the liquid in the surface impoundment.

(ii) Each opening in the cover not vented to the control device shall be equipped with a closure device. If the pressure in the vapor headspace underneath the cover is less than atmospheric pressure when the control device is operating, the closure devices shall be designed to operate such that when the closure device is secured in the closed position there are no visible cracks, holes, gaps, or other open spaces in the closure device or between the perimeter of the cover opening and the closure device. If the pressure in the vapor headspace underneath the cover is equal to or greater than atmospheric pressure when the control device is operating, the closure device shall be designed to operate with no detectable organic emissions using the procedure specified in Subsection R315-264-1083(d).

(iii) The cover and its closure devices shall be made of suitable materials that will minimize exposure of the hazardous waste to the atmosphere, to the extent practical, and will maintain the integrity of the cover and closure devices throughout their intended service life. Factors to be considered when selecting the materials of construction and designing the cover and closure devices shall include: Organic vapor permeability; the effects of any contact with the liquid or its vapors managed in the surface impoundment; the effects of outdoor exposure to wind, moisture, and sunlight; and the operating practices used for the surface impoundment on which the cover is installed.

(iv) The closed-vent system and control device shall be designed and operated in accordance with the requirements of Section R315-264-1087.

(2) Whenever a hazardous waste is in the surface impoundment, the cover shall be installed with each closure device secured in the closed position and the vapor headspace underneath the cover vented to the control device except as follows:

(i) Venting to the control device is not required, and opening of closure devices or removal of the cover is allowed at the following times:

(A) To provide access to the surface impoundment for performing routine inspection, maintenance, or other activities needed for normal operations. Examples of such activities include those times when a worker needs to open a port to sample liquid in the surface impoundment, or when a worker needs to open a hatch to maintain or repair equipment. Following completion of the activity, the owner or operator shall promptly secure the closure device in the closed position or reinstall the cover, as applicable, to the surface impoundment.

(B) To remove accumulated sludge or other residues from the bottom of the surface impoundment.

(ii) Opening of a safety device, as defined in 40 CFR 265.1081, which is adopted by reference, is allowed at any time conditions require doing so to avoid an unsafe condition.

(3) The owner or operator shall inspect and monitor the air emission control equipment in accordance with the following procedures:

(i) The surface impoundment cover and its closure devices shall be visually inspected by the owner or operator to check for defects that could result in air pollutant emissions. Defects include, but are not limited to, visible cracks, holes, or gaps in the cover section seams or between the interface of the cover edge and its foundation mountings; broken, cracked, or otherwise damaged seals or gaskets on closure devices; and broken or missing hatches, access covers, caps, or other closure devices.

(ii) The closed-vent system and control device shall be inspected and monitored by the owner or operator in accordance with the procedures specified in Section R315-264-1087.

(iii) The owner or operator shall perform an initial inspection of the air emission control equipment on or before the date that the surface impoundment becomes subject to Section R315-264-1085. Thereafter, the owner or operator shall perform the inspections at least once every year except for the special conditions provided for in Subsection R315-264-1085(g).

(iv) In the event that a defect is detected, the owner or operator shall repair the defect in accordance with the requirements of Subsection R315-264-1085(f).

(v) The owner or operator shall maintain a record of the inspection in accordance with the requirements specified in Subsection R315-264-1089(c).

(e) The owner or operator shall transfer hazardous waste to a surface impoundment subject to Section R315-264-1085 in accordance with the following requirements:

(1) Transfer of hazardous waste, except as provided in Subsection R315-264-1085(e)(2), to the surface impoundment from another surface impoundment subject to Section R315-264-1085 or from a tank subject to Section R315-264-1084 shall be conducted using continuous hard-piping or another closed system that does not allow exposure of the waste to the atmosphere. For the purpose of complying with this provision, an individual drain system is considered to be a closed system when it meets the requirements of Subsection R307-214-2(29), which incorporates 40 CFR part 63, subpart RR-National Emission Standards for Individual Drain Systems.

(2) The requirements of Subsection R315-264-1085(e)(1) do not apply when transferring a hazardous waste to the surface impoundment under either of the following conditions:

(i) The hazardous waste meets the average VO concentration conditions specified in Subsection R315-264-

1082(c)(1) at the point of waste origination.

(ii) The hazardous waste has been treated by an organic destruction or removal process to meet the requirements in Subsection R315-264-1082(c)(2).

(iii) The hazardous waste meets the requirements of Subsection R315-264-1082(c)(4).

(f) The owner or operator shall repair each defect detected during an inspection performed in accordance with the requirements of Subsections R315-264-1085(c)(3) or (d)(3) as follows:

(1) The owner or operator shall make first efforts at repair of the defect no later than 5 calendar days after detection and repair shall be completed as soon as possible but no later than 45 calendar days after detection except as provided in Subsection R315-264-1085(f)(2).

(2) Repair of a defect may be delayed beyond 45 calendar days if the owner or operator determines that repair of the defect requires emptying or temporary removal from service of the surface impoundment and no alternative capacity is available at the site to accept the hazardous waste normally managed in the surface impoundment. In this case, the owner or operator shall repair the defect the next time the process or unit that is generating the hazardous waste managed in the surface impoundment stops operation. Repair of the defect shall be completed before the process or unit resumes operation.

(g) Following the initial inspection and monitoring of the cover as required by the applicable provisions of Sections R315-264-1080 through 1090, subsequent inspection and monitoring may be performed at intervals longer than 1 year in the case when inspecting or monitoring the cover would expose a worker to dangerous, hazardous, or other unsafe conditions. In this case, the owner or operator may designate the cover as an "unsafe to inspect and monitor cover" and comply with all of the following requirements:

(1) Prepare a written explanation for the cover stating the reasons why the cover is unsafe to visually inspect or to monitor, if required.

(2) Develop and implement a written plan and schedule to inspect and monitor the cover using the procedures specified in the applicable section of Sections R315-264-1080 through 1090 as frequently as practicable during those times when a worker can safely access the cover.

R315-264-1086. Standards: Containers.

(a) The provisions of Section R315-264-1086 apply to the control of air pollutant emissions from containers for which Subsection R315-264-1082(b) references the use of Section R315-264-1086 for such air emission control.

(b) General requirements.

(1) The owner or operator shall control air pollutant emissions from each container subject to Section R315-264-1086 in accordance with the following requirements, as applicable to the container, except when the special provisions for waste stabilization processes specified in Subsection R315-264-1086(b)(2) apply to the container.

(i) For a container having a design capacity greater than 0.1 cubic meters and less than or equal to 0.46 cubic meters, the owner or operator shall control air pollutant emissions from the container in accordance with the Container Level 1 standards specified in Subsection R315-264-1086(c).

(ii) For a container having a design capacity greater than 0.46 cubic meters that is not in light material service, the owner or operator shall control air pollutant emissions from the container in accordance with the Container Level 1 standards specified in Subsection R315-264-1086(c).

(iii) For a container having a design capacity greater than 0.46 cubic meters that is in light material service, the owner or operator shall control air pollutant emissions from the container in accordance with the Container Level 2 standards specified in Subsection R315-264-1086(d).

(2) When a container having a design capacity greater than 0.1 cubic meters is used for treatment of a hazardous waste by a waste stabilization process, the owner or operator shall control air pollutant emissions from the container in accordance with the Container Level 3 standards specified in Subsection R315-264-1086(e) at those times during the waste stabilization process when the hazardous waste in the container is exposed to the atmosphere.

(c) Container Level 1 standards.

(1) A container using Container Level 1 controls is one of the following:

(i) A container that meets the applicable U.S. Department of Transportation (DOT) regulations on packaging hazardous materials for transportation as specified in Subsection R315-264-1086(f).

(ii) A container equipped with a cover and closure devices that form a continuous barrier over the container openings such that when the cover and closure devices are secured in the closed position there are no visible holes, gaps, or other open spaces into the interior of the container. The cover may be a separate cover installed on the container, e.g., a lid on a drum or a suitably secured tarp on a roll-off box, or may be an integral part of the container structural design, e.g., a "portable tank" or bulk cargo container equipped with a screw-type cap.

(iii) An open-top container in which an organic-vapor suppressing barrier is placed on or over the hazardous waste in the container such that no hazardous waste is exposed to the atmosphere. One example of such a barrier is application of a suitable organic-vapor suppressing foam.

(2) A container used to meet the requirements of Subsections R315-264-1086(c)(1)(ii) or (c)(1)(iii) shall be equipped with covers and closure devices, as applicable to the container, that are composed of suitable materials to minimize exposure of the hazardous waste to the atmosphere and to maintain the equipment integrity, for as long as the container is in service. Factors to be considered in selecting the materials of construction and designing the cover and closure devices shall include: Organic vapor permeability; the effects of contact with the hazardous waste or its vapor managed in the container; the effects of outdoor exposure of the closure device or cover material to wind, moisture, and sunlight; and the operating practices for which the container is intended to be used.

(3) Whenever a hazardous waste is in a container using Container Level 1 controls, the owner or operator shall install all covers and closure devices for the container, as applicable to the container, and secure and maintain each closure device in the closed position except as follows:

(i) Opening of a closure device or cover is allowed for the purpose of adding hazardous waste or other material to the container as follows:

(A) In the case when the container is filled to the intended final level in one continuous operation, the owner or operator shall promptly secure the closure devices in the closed position and install the covers, as applicable to the container, upon conclusion of the filling operation.

(B) In the case when discrete quantities or batches of material intermittently are added to the container over a period of time, the owner or operator shall promptly secure the closure devices in the closed position and install covers, as applicable to the container, upon either the container being filled to the intended final level; the completion of a batch loading after which no additional material will be added to the container within 15 minutes; the person performing the loading operation leaving the immediate vicinity of the container; or the shutdown of the process generating the material being added to the container, whichever condition occurs first.

(ii) Opening of a closure device or cover is allowed for the purpose of removing hazardous waste from the container as

follows:

(A) For the purpose of meeting the requirements of Section R315-264-1086, an empty container as defined in Subsection R315-261-7(b) may be open to the atmosphere at any time, i.e., covers and closure devices are not required to be secured in the closed position on an empty container.

(B) In the case when discrete quantities or batches of material are removed from the container but the container does not meet the conditions to be an empty container as defined in Subsection R315-261-7(b), the owner or operator shall promptly secure the closure devices in the closed position and install covers, as applicable to the container, upon the completion of a batch removal after which no additional material will be removed from the container within 15 minutes or the person performing the unloading operation leaves the immediate vicinity of the container, whichever condition occurs first.

(iii) Opening of a closure device or cover is allowed when access inside the container is needed to perform routine activities other than transfer of hazardous waste. Examples of such activities include those times when a worker needs to open a port to measure the depth of or sample the material in the container, or when a worker needs to open a manhole hatch to access equipment inside the container. Following completion of the activity, the owner or operator shall promptly secure the closure device in the closed position or reinstall the cover, as applicable to the container.

(iv) Opening of a spring-loaded pressure-vacuum relief valve, conservation vent, or similar type of pressure relief device which vents to the atmosphere is allowed during normal operations for the purpose of maintaining the internal pressure of the container in accordance with the container design specifications. The device shall be designed to operate with no detectable organic emissions when the device is secured in the closed position. The settings at which the device opens shall be established such that the device remains in the closed position whenever the internal pressure of the container is within the internal pressure operating range determined by the owner or operator based on container manufacturer recommendations, applicable regulations, fire protection and prevention codes, standard engineering codes and practices, or other requirements for the safe handling of flammable, ignitable, explosive, reactive, or hazardous materials. Examples of normal operating conditions that may require these devices to open are during those times when the internal pressure of the container exceeds the internal pressure operating range for the container as a result of loading operations or diurnal ambient temperature fluctuations.

(v) Opening of a safety device, as defined in 40 CFR 265.1081, which is adopted by reference, is allowed at any time conditions require doing so to avoid an unsafe condition.

(4) The owner or operator of containers using Container Level 1 controls shall inspect the containers and their covers and closure devices as follows:

(i) In the case when a hazardous waste already is in the container at the time the owner or operator first accepts possession of the container at the facility and the container is not emptied within 24 hours after the container is accepted at the facility, i.e., does not meet the conditions for an empty container as specified in Subsection R315-261-7(b), the owner or operator shall visually inspect the container and its cover and closure devices to check for visible cracks, holes, gaps, or other open spaces into the interior of the container when the cover and closure devices are secured in the closed position. The container visual inspection shall be conducted on or before the date that the container is accepted at the facility, i.e., the date the container becomes subject to container standards of Sections R315-264-1080 through 1090. For purposes of this requirement, the date of acceptance is the date of signature that the facility owner or operator enters on Item 20 of the Uniform Hazardous Waste Manifest in the appendix to Rule R315-262 (EPA Forms 8700-22 and 8700-22A), as required under Section R315-264-71. If a defect is detected, the owner or operator shall repair the defect in accordance with the requirements of Subsection R315-264-1086(c)(4)(iii).

(ii) In the case when a container used for managing hazardous waste remains at the facility for a period of 1 year or more, the owner or operator shall visually inspect the container and its cover and closure devices initially and thereafter, at least once every 12 months, to check for visible cracks, holes, gaps, or other open spaces into the interior of the container when the cover and closure devices are secured in the closed position. If a defect is detected, the owner or operator shall repair the defect in accordance with the requirements of Subsection R315-264-1086(c)(4)(iii).

(iii) When a defect is detected for the container, cover, or closure devices, the owner or operator shall make first efforts at repair of the defect no later than 24 hours after detection and repair shall be completed as soon as possible but no later than 5 calendar days after detection. If repair of a defect cannot be completed within 5 calendar days, then the hazardous waste shall be removed from the container and the container shall not be used to manage hazardous waste until the defect is repaired.

(5) The owner or operator shall maintain at the facility a copy of the procedure used to determine that containers with capacity of 0.46 cubic meters or greater, which do not meet applicable DOT regulations as specified in Subsection R315-264-1086(f), are not managing hazardous waste in light material service.

(d) Container Level 2 standards.

(1) A container using Container Level 2 controls is one of the following:

(i) A container that meets the applicable U.S. Department of Transportation (DOT) regulations on packaging hazardous materials for transportation as specified in Subsection R315-264-1086(f).

(ii) A container that operates with no detectable organic emissions as defined in 40 CFR 265.1081, which is adopted by reference, and determined in accordance with the procedure specified in Subsection R315-264-1086(g).

(iii) A container that has been demonstrated within the preceding 12 months to be vapor-tight by using 40 CFR part 60, appendix A, Method 27 in accordance with the procedure specified in Subsection R315-264-1086(h).

(2) Transfer of hazardous waste in or out of a container using Container Level 2 controls shall be conducted in such a manner as to minimize exposure of the hazardous waste to the atmosphere, to the extent practical, considering the physical properties of the hazardous waste and good engineering and safety practices for handling flammable, ignitable, explosive, reactive, or other hazardous materials. Examples of container loading procedures that the Director considers to meet the requirements of Subsection R315-264-1086(d) include using any one of the following: A submerged-fill pipe or other submerged-fill method to load liquids into the container; a vapor-balancing system or a vapor-recovery system to collect and control the vapors displaced from the container during filling operations; or a fitted opening in the top of a container through which the hazardous waste is filled and subsequently purging the transfer line before removing it from the container opening.

(3) Whenever a hazardous waste is in a container using Container Level 2 controls, the owner or operator shall install all covers and closure devices for the container, and secure and maintain each closure device in the closed position except as follows:

(i) Opening of a closure device or cover is allowed for the purpose of adding hazardous waste or other material to the container as follows:

(A) In the case when the container is filled to the intended final level in one continuous operation, the owner or operator shall promptly secure the closure devices in the closed position and install the covers, as applicable to the container, upon conclusion of the filling operation.

(B) In the case when discrete quantities or batches of material intermittently are added to the container over a period of time, the owner or operator shall promptly secure the closure devices in the closed position and install covers, as applicable to the container, upon either the container being filled to the intended final level; the completion of a batch loading after which no additional material will be added to the container within 15 minutes; the person performing the loading operation leaving the immediate vicinity of the container; or the shutdown of the process generating the material being added to the container, whichever condition occurs first.

(ii) Opening of a closure device or cover is allowed for the purpose of removing hazardous waste from the container as follows:

(A) For the purpose of meeting the requirements of Section R315-264-1086, an empty container as defined in Subsection R315-261-7(b) may be open to the atmosphere at any time, i.e., covers and closure devices are not required to be secured in the closed position on an empty container.

(B) In the case when discrete quantities or batches of material are removed from the container but the container does not meet the conditions to be an empty container as defined in Subsection R315-261-7(b), the owner or operator shall promptly secure the closure devices in the closed position and install covers, as applicable to the container, upon the completion of a batch removal after which no additional material will be removed from the container within 15 minutes or the person performing the unloading operation leaves the immediate vicinity of the container, whichever condition occurs first.

(iii) Opening of a closure device or cover is allowed when access inside the container is needed to perform routine activities other than transfer of hazardous waste. Examples of such activities include those times when a worker needs to open a port to measure the depth of or sample the material in the container, or when a worker needs to open a manhole hatch to access equipment inside the container. Following completion of the activity, the owner or operator shall promptly secure the closure device in the closed position or reinstall the cover, as applicable to the container.

(iv) Opening of a spring-loaded, pressure-vacuum relief valve, conservation vent, or similar type of pressure relief device which vents to the atmosphere is allowed during normal operations for the purpose of maintaining the internal pressure of the container in accordance with the container design specifications. The device shall be designed to operate with no detectable organic emission when the device is secured in the closed position. The settings at which the device opens shall be established such that the device remains in the closed position whenever the internal pressure of the container is within the internal pressure operating range determined by the owner or operator based on container manufacturer recommendations, applicable regulations, fire protection and prevention codes, standard engineering codes and practices, or other requirements for the safe handling of flammable, ignitable, explosive, reactive, or hazardous materials. Examples of normal operating conditions that may require these devices to open are during those times when the internal pressure of the container exceeds the internal pressure operating range for the container as a result of loading operations or diurnal ambient temperature fluctuations.

(v) Opening of a safety device, as defined in 40 CFR 265.1081, which is adopted by reference, is allowed at any time conditions require doing so to avoid an unsafe condition.

(4) The owner or operator of containers using Container Level 2 controls shall inspect the containers and their covers and closure devices as follows:

(i) In the case when a hazardous waste already is in the container at the time the owner or operator first accepts possession of the container at the facility and the container is not emptied within 24 hours after the container is accepted at the facility, i.e., does not meet the conditions for an empty container as specified in Subsection R35- 261-7(b), the owner or operator shall visually inspect the container and its cover and closure devices to check for visible cracks, holes, gaps, or other open spaces into the interior of the container when the cover and closure devices are secured in the closed position. The container visual inspection shall be conducted on or before the date that the container is accepted at the facility, i.e., the date the container becomes subject to the container standards of Sections R315-264-1080 through. For purposes of this requirement, the date of acceptance is the date of signature that the facility owner or operator enters on Item 20 of the Uniform Hazardous Waste Manifest in the appendix to Rule R315-262 (EPA Forms 8700-22 and 8700-22A), as required under Section R315-264-71. If a defect is detected, the owner or operator shall repair the defect in accordance with the requirements of Subsection R315-264-1086(d)(4)(iii).

(ii) In the case when a container used for managing hazardous waste remains at the facility for a period of 1 year or more, the owner or operator shall visually inspect the container and its cover and closure devices initially and thereafter, at least once every 12 months, to check for visible cracks, holes, gaps, or other open spaces into the interior of the container when the cover and closure devices are secured in the closed position. If a defect is detected, the owner or operator shall repair the defect in accordance with the requirements of Subsection R315-264-1086(d)(4)(iii).

(iii) When a defect is detected for the container, cover, or closure devices, the owner or operator shall make first efforts at repair of the defect no later than 24 hours after detection, and repair shall be completed as soon as possible but no later than 5 calendar days after detection. If repair of a defect cannot be completed within 5 calendar days, then the hazardous waste shall be removed from the container and the container shall not be used to manage hazardous waste until the defect is repaired.

(e) Container Level 3 standards.

(1) A container using Container Level 3 controls is one of the following:

(i) A container that is vented directly through a closed-vent system to a control device in accordance with the requirements of Subsection R315-264-1086(e)(2)(ii).

(ii) A container that is vented inside an enclosure which is exhausted through a closed-vent system to a control device in accordance with the requirements of Subsections R315-264-1086(e)(2)(i) and (e)(2)(ii).

(2) The owner or operator shall meet the following requirements, as applicable to the type of air emission control equipment selected by the owner or operator:

(i) The container enclosure shall be designed and operated in accordance with the criteria for a permanent total enclosure as specified in "Procedure T-Criteria for and Verification of a Permanent or Temporary Total Enclosure" under 40 CFR 52.741, appendix B. The enclosure may have permanent or temporary openings to allow worker access; passage of containers through the enclosure by conveyor or other mechanical means; entry of permanent mechanical or electrical equipment; or direct airflow into the enclosure. The owner or operator shall perform the verification procedure for the enclosure as specified in Section 5.0 to "Procedure T-Criteria for and Verification of a Permanent or Temporary Total Enclosure" initially when the enclosure is first installed and, thereafter, annually.

(ii) The closed-vent system and control device shall be

designed and operated in accordance with the requirements of Section R315-264-1087.

(3) Safety devices, as defined in 40 CFR 265.1081, which is adopted by reference, may be installed and operated as necessary on any container, enclosure, closed-vent system, or control device used to comply with the requirements of Subsection R315-264-1086(e)(1).

(4) Owners and operators using Container Level 3 controls in accordance with the provisions of Sections R315-264-1086 through 1090 shall inspect and monitor the closed-vent systems and control devices as specified in Subsection R315-264-1087.

(5) Owners and operators that use Container Level 3 controls in accordance with the provisions of Sections R315-264-1086 through 1090 shall prepare and maintain the records specified in Subsection R315-264-1089(d).

(6) Transfer of hazardous waste in or out of a container using Container Level 3 controls shall be conducted in such a manner as to minimize exposure of the hazardous waste to the atmosphere, to the extent practical, considering the physical properties of the hazardous waste and good engineering and safety practices for handling flammable, ignitable, explosive, reactive, or other hazardous materials. Examples of container loading procedures that the Director considers to meet the requirements of Subsection R315-264-1086(e) include using any one of the following: A submerged-fill pipe or other submerged-fill method to load liquids into the container; a vapor-balancing system or a vapor-recovery system to collect and control the vapors displaced from the container during filling operations; or a fitted opening in the top of a container through which the hazardous waste is filled and subsequently purging the transfer line before removing it from the container opening.

(f) For the purpose of compliance with Subsection R315-264-1086(c)(1)(i) or (d)(1)(i), containers shall be used that meet the applicable U.S. Department of Transportation (DOT) regulations on packaging hazardous materials for transportation as follows:

(1) The container meets the applicable requirements specified in 49 CFR part 178-Specifications for Packaging or 49 CFR part 179-Specifications for Tank Cars.

(2) Hazardous waste is managed in the container in accordance with the applicable requirements specified in 49 CFR part 107, subpart B-Exemptions; 49 CFR part 172-Hazardous Materials Table, Special Provisions, Hazardous Materials Communications, Emergency Response Information, and Training Requirements; 49 CFR part 173-Shippers-General Requirements for Shipments and Packages; and 49 CFR part 180-Continuing Qualification and Maintenance of Packagings.

(3) For the purpose of complying with Sections R315-264-1086 through 1090, no exceptions to the 49 CFR part 178 or part 179 regulations are allowed except as provided for in Subsection R315-264-1086(f)(4).

(4) For a lab pack that is managed in accordance with the requirements of 49 CFR part 178 for the purpose of complying with Sections R315-264-1086 through 1090, an owner or operator may comply with the exceptions for combination packagings specified in 49 CFR 173.12(b).

(g) To determine compliance with the no detectable organic emissions requirement of Subsection R315-264-1086(d)(1)(ii), the procedure specified in Subsection R315-264-1083(d) shall be used.

(1) Each potential leak interface, i.e., a location where organic vapor leakage could occur, on the container, its cover, and associated closure devices, as applicable to the container, shall be checked. Potential leak interfaces that are associated with containers include, but are not limited to: The interface of the cover rim and the container wall; the periphery of any opening on the container or container cover and its associated closure device; and the sealing seat interface on a spring-loaded pressure-relief valve.

(2) The test shall be performed when the container is filled with a material having a volatile organic concentration representative of the range of volatile organic concentrations for the hazardous wastes expected to be managed in this type of container. During the test, the container cover and closure devices shall be secured in the closed position.

(h) Procedure for determining a container to be vapor-tight using Method 27 of 40 CFR part 60, appendix A for the purpose of complying with Subsection R315-264-1086(d)(1)(iii).

(1) The test shall be performed in accordance with Method 27 of 40 CFR part 60, appendix A of this chapter.

(2) A pressure measurement device shall be used that has a precision of +/- 2.5 mm water and that is capable of measuring above the pressure at which the container is to be tested for vapor tightness.

(3) If the test results determined by Method 27 indicate that the container sustains a pressure change less than or equal to 750 Pascals within 5 minutes after it is pressurized to a minimum of 4,500 Pascals, then the container is determined to be vapor-tight.

R315-264-1087. Standards: Closed-Vent Systems and Control Devices.

(a) Section R315-264-1087 applies to each closed-vent system and control device installed and operated by the owner or operator to control air emissions in accordance with standards of Sections R315-264-1080 through 1090.

(b) The closed-vent system shall meet the following requirements:

(1) The closed-vent system shall route the gases, vapors, and fumes emitted from the hazardous waste in the waste management unit to a control device that meets the requirements specified in Subsection R315-264-1087(c).

(2) The closed-vent system shall be designed and operated in accordance with the requirements specified in Subsection R315-264-1033(k).

(3) In the case when the closed-vent system includes bypass devices that could be used to divert the gas or vapor stream to the atmosphere before entering the control device, each bypass device shall be equipped with either a flow indicator as specified in Subsection R315-264-1087(b)(3)(i) or a seal or locking device as specified in Subsection R315-264-1087(b)(3)(ii). For the purpose of complying with Subsection R315-264-1087(b), low leg drains, high point bleeds, analyzer vents, open-ended valves or lines, spring loaded pressure relief valves, and other fittings used for safety purposes are not considered to be bypass devices.

(i) If a flow indicator is used to comply with Subsection R315-264-1087(b)(3), the indicator shall be installed at the inlet to the bypass line used to divert gases and vapors from the closed-vent system to the atmosphere at a point upstream of the control device inlet. For Subsection R315-264-1087(b), a flow indicator means a device which indicates the presence of either gas or vapor flow in the bypass line.

(ii) If a seal or locking device is used to comply with Subsection R315-264-1087(b)(3), the device shall be placed on the mechanism by which the bypass device position is controlled, e.g., valve handle, damper lever, when the bypass device is in the closed position such that the bypass device cannot be opened without breaking the seal or removing the lock. Examples of such devices include, but are not limited to, a car-seal or a lock-and-key configuration valve. The owner or operator shall visually inspect the seal or closure mechanism at least once every month to verify that the bypass mechanism is maintained in the closed position.

(4) The closed-vent system shall be inspected and monitored by the owner or operator in accordance with the procedure specified in Subsection R315-264-1033(l).

(c) The control device shall meet the following requirements:

(1) The control device shall be one of the following devices:

(i) A control device designed and operated to reduce the total organic content of the inlet vapor stream vented to the control device by at least 95 percent by weight;

(ii) An enclosed combustion device designed and operated in accordance with the requirements of Subsection R315-264-1033(c); or

(iii) A flare designed and operated in accordance with the requirements of Subsection R315-264-1033(d).

(2) The owner or operator who elects to use a closed-vent system and control device to comply with the requirements of Section R315-264-1087 shall comply with the requirements specified in Subsections R315-264-1087(c)(2)(i) through (c)(2)(vi).

(i) Periods of planned routine maintenance of the control device, during which the control device does not meet the specifications of Subsections R315-264-1087(c)(1)(i), (c)(1)(ii), or (c)(1)(iii), as applicable, shall not exceed 240 hours per year.

(ii) The specifications and requirements in Subsections R315-264-1087(c)(1)(i), (c)(1)(ii), and (c)(1)(iii) for control devices do not apply during periods of planned routine maintenance.

(iii) The specifications and requirements in Subsections R315-264-1087(c)(1)(i), (c)(1)(ii), and (c)(1)(iii) for control devices do not apply during a control device system malfunction.

(iv) The owner or operator shall demonstrate compliance with the requirements of Subsection R315-264-1087(c)(2)(i), i.e., planned routine maintenance of a control device, during which the control device does not meet the specifications of Subsections R315-264-1087(c)(1)(i), (c)(1)(ii), or (c)(1)(iii), as applicable, shall not exceed 240 hours per year, by recording the information specified in Subsection R315-264-1089(e)(1)(v).

(v) The owner or operator shall correct control device system malfunctions as soon as practicable after their occurrence in order to minimize excess emissions of air pollutants.

(vi) The owner or operator shall operate the closed-vent system such that gases, vapors, or fumes are not actively vented to the control device during periods of planned maintenance or control device system malfunction, i.e., periods when the control device is not operating or not operating normally, except in cases when it is necessary to vent the gases, vapors, and/or fumes to avoid an unsafe condition or to implement malfunction corrective actions or planned maintenance actions.

(3) The owner or operator using a carbon adsorption system to comply with Subsection R315-264-1087(c)(1) shall operate and maintain the control device in accordance with the following requirements:

(i) Following the initial startup of the control device, all activated carbon in the control device shall be replaced with fresh carbon on a regular basis in accordance with the requirements of Subsections R315-264-1033(g) or 1033(h).

(ii) All carbon that is a hazardous waste and that is removed from the control device shall be managed in accordance with the requirements of Subsection R315-264-1033(n), regardless of the average volatile organic concentration of the carbon.

(4) An owner or operator using a control device other than a thermal vapor incinerator, flare, boiler, process heater, condenser, or carbon adsorption system to comply with Subsection R315-264-1087(c)(1) shall operate and maintain the control device in accordance with the requirements of Subsection R315-264-1033(j).

(5) The owner or operator shall demonstrate that a control device achieves the performance requirements of Subsection R315-264-1087(c)(1) as follows:

(i) An owner or operator shall demonstrate using either a performance test as specified in Subsection R315-264-1087(c)(5)(iii) or a design analysis as specified in Subsection R315-264-1087(c)(5)(iv) the performance of each control device except for the following:

(A) A flare;

(B) A boiler or process heater with a design heat input capacity of 44 megawatts or greater;

(C) A boiler or process heater into which the vent stream is introduced with the primary fuel;

(D) A boiler or industrial furnace burning hazardous waste for which the owner or operator has been issued a final permit under Rule R315-270 and has designed and operates the unit in accordance with the requirements of Sections R315-266-100 through 112; or

(E) A boiler or industrial furnace burning hazardous waste for which the owner or operator has designed and operates in accordance with the interim status requirements of Sections R315-266-100 through 112.

(ii) An owner or operator shall demonstrate the performance of each flare in accordance with the requirements specified in Subsection R315-264-1033(e).

(iii) For a performance test conducted to meet the requirements of Subsection R315-264-1087(c)(5)(i), the owner or operator shall use the test methods and procedures specified in Subsections R315-264-1034(c)(1) through (c)(4).

(iv) For a design analysis conducted to meet the requirements of Subsection R315-264-1087(c)(5)(i), the design analysis shall meet the requirements specified in Subsection R315-264-1035(b)(4)(iii).

(v) The owner or operator shall demonstrate that a carbon adsorption system achieves the performance requirements of Subsection R315-264-1087(c)(1) based on the total quantity of organics vented to the atmosphere from all carbon adsorption system equipment that is used for organic adsorption, organic desorption or carbon regeneration, organic recovery, and carbon disposal.

(6) If the owner or operator and the Director do not agree on a demonstration of control device performance using a design analysis then the disagreement shall be resolved using the results of a performance test performed by the owner or operator in accordance with the requirements of Subsection R315-264-1087(c)(5)(iii). The Director may choose to have an authorized representative observe the performance test.

(7) The closed-vent system and control device shall be inspected and monitored by the owner or operator in accordance with the procedures specified in Subsections R315-264-1033(f)(2) and 1033(l). The readings from each monitoring device required by Subsection R315-264-1033(f)(2) shall be inspected at least once each operating day to check control device operation. Any necessary corrective measures shall be immediately implemented to ensure the control device is operated in compliance with the requirements of Section R315-264-1087.

R315-264-1088. Inspection and Monitoring Requirements.

(a) The owner or operator shall inspect and monitor air emission control equipment used to comply with Sections R315-264-1080 through 1090 in accordance with the applicable requirements specified in Sections R315-264-1084 through 1087.

(b) The owner or operator shall develop and implement a written plan and schedule to perform the inspections and monitoring required by Subsection R315-264-1088(a). The owner or operator shall incorporate this plan and schedule into the facility inspection plan required under Section R315-264-15.

R315-264-1089. Recordkeeping Requirements.

(a) Each owner or operator of a facility subject to requirements of Sections R315-264-1080 through 1090 shall record and maintain the information specified in Subsections R315-264-1089(b) through (j), as applicable to the facility. Except for air emission control equipment design documentation and information required by Subsections R315-264-1089(i) and (j), records required by Section R315-264-1089 shall be maintained in the operating record for a minimum of 3 years. Air emission control equipment design documentation shall be maintained in the operating record until the air emission control equipment is replaced or otherwise no longer in service. Information required by Subsections R315-264-1089(i) and (j) shall be maintained in the operating record for as long as the waste management unit is not using air emission controls specified in Sections R315-264-1084 through 1087 in accordance with the conditions specified in Subsection R315-264-1080(d) or 1080(b)(7), respectively.

(b) The owner or operator of a tank using air emission controls in accordance with the requirements of Section R315-264-1084 shall prepare and maintain records for the tank that include the following information:

(1) For each tank using air emission controls in accordance with the requirements of Subsection R315-264-1084, the owner or operator shall record:

(i) A tank identification number, or other unique identification description as selected by the owner or operator.

(ii) A record for each inspection required by Section R315-264-1084 that includes the following information:

(A) Date inspection was conducted.

(B) For each defect detected during the inspection: The location of the defect, a description of the defect, the date of detection, and corrective action taken to repair the defect. In the event that repair of the defect is delayed in accordance with the requirements of Section R315-264-1084, the owner or operator shall also record the reason for the delay and the date that completion of repair of the defect is expected.

(2) In addition to the information required by Subsection R315-264-1089(b)(1), the owner or operator shall record the following information, as applicable to the tank:

(i) The owner or operator using a fixed roof to comply with the Tank Level 1 control requirements specified in Subsection R315-264-1084(c) shall prepare and maintain records for each determination for the maximum organic vapor pressure of the hazardous waste in the tank performed in accordance with the requirements of Subsection R315-264-1084(c). The records shall include the date and time the samples were collected, the analysis method used, and the analysis results.

(ii) The owner or operator using an internal floating roof to comply with the Tank Level 2 control requirements specified in Subsection R315-264-1084(e) shall prepare and maintain documentation describing the floating roof design.

(iii) Owners and operators using an external floating roof to comply with the Tank Level 2 control requirements specified in Subsection R315-264-1084(f) shall prepare and maintain the following records:

(A) Documentation describing the floating roof design and the dimensions of the tank.

(B) Records for each seal gap inspection required by Subsection R315-264-1084(f)(3) describing the results of the seal gap measurements. The records shall include the date that the measurements were performed, the raw data obtained for the measurements, and the calculations of the total gap surface area. In the event that the seal gap measurements do not conform to the specifications in Subsection R315-264-1084(f)(1), the records shall include a description of the repairs that were made, the date the repairs were made, and the date the tank was emptied, if necessary.

(iv) Each owner or operator using an enclosure to comply with the Tank Level 2 control requirements specified in Subsection R315-264-1084(i) shall prepare and maintain the following records:

(A) Records for the most recent set of calculations and measurements performed by the owner or operator to verify that the enclosure meets the criteria of a permanent total enclosure as specified in "Procedure T---Criteria for and Verification of a Permanent or Temporary Total Enclosure" under 40 CFR 52.741, appendix B.

(B) Records required for the closed-vent system and control device in accordance with the requirements of Subsection R315-264-1089(e).

(c) The owner or operator of a surface impoundment using air emission controls in accordance with the requirements of Section R315-264-1085 shall prepare and maintain records for the surface impoundment that include the following information:

(1) A surface impoundment identification number, or other unique identification description as selected by the owner or operator.

(2) Documentation describing the floating membrane cover or cover design, as applicable to the surface impoundment, that includes information prepared by the owner or operator or provided by the cover manufacturer or vendor describing the cover design, and certification by the owner or operator that the cover meets the specifications listed in Subsection R315-264-1085(c).

(3) A record for each inspection required by Section R315-264-1085 that includes the following information:

(i) Date inspection was conducted.

(ii) For each defect detected during the inspection the following information: The location of the defect, a description of the defect, the date of detection, and corrective action taken to repair the defect. In the event that repair of the defect is delayed in accordance with the provisions of Subsection R315-264-1085(f), the owner or operator shall also record the reason for the delay and the date that completion of repair of the defect is expected.

(4) For a surface impoundment equipped with a cover and vented through a closed-vent system to a control device, the owner or operator shall prepare and maintain the records specified in Subsection R315-264-1089(e).

(d) The owner or operator of containers using Container Level 3 air emission controls in accordance with the requirements of Section R315-264-1086 shall prepare and maintain records that include the following information:

(1) Records for the most recent set of calculations and measurements performed by the owner or operator to verify that the enclosure meets the criteria of a permanent total enclosure as specified in "Procedure T-Criteria for and Verification of a Permanent or Temporary Total Enclosure" under 40 CFR 52.741, appendix B.

(2) Records required for the closed-vent system and control device in accordance with the requirements of Subsection R315-264-1089(e).

(e) The owner or operator using a closed-vent system and control device in accordance with the requirements of Section R315-264-1087 shall prepare and maintain records that include the following information:

(1) Documentation for the closed-vent system and control device that includes:

(i) Certification that is signed and dated by the owner or operator stating that the control device is designed to operate at the performance level documented by a design analysis as specified in Subsection R315-264-1089(e)(1)(ii) or by performance tests as specified in Subsection R315-264-1089(e)(1)(iii) when the tank, surface impoundment, or container is or would be operating at capacity or the highest level reasonably expected to occur.

(ii) If a design analysis is used, then design documentation as specified in Subsection R315-264-1035(b)(4). The documentation shall include information prepared by the owner or operator or provided by the control device manufacturer or vendor that describes the control device design in accordance with Subsection R315-264-1035(b)(4)(iii) and certification by the owner or operator that the control equipment meets the applicable specifications.

(iii) If performance tests are used, then a performance test plan as specified in Subsection R315-264-1035(b)(3) and all test results.

(iv) Information as required by Subsection R315-264-1035(c)(1) and Subsection R315-264-1035(c)(2), as applicable.

(v) An owner or operator shall record, on a semiannual basis, the information specified in Subsections R315-264-1089(e)(1)(v)(A) and (e)(1)(v)(B) for those planned routine maintenance operations that would require the control device not to meet the requirements of Subsections R315-264-1087(c)(1)(i), (c)(1)(ii), or (c)(1)(iii), as applicable.

(A) A description of the planned routine maintenance that is anticipated to be performed for the control device during the next 6-month period. This description shall include the type of maintenance necessary, planned frequency of maintenance, and lengths of maintenance periods.

(B) A description of the planned routine maintenance that was performed for the control device during the previous 6-month period. This description shall include the type of maintenance performed and the total number of hours during those 6 months that the control device did not meet the requirements of Subsections R315-264-1087 (c)(1)(i), (c)(1)(ii), or (c)(1)(iii), as applicable, due to planned routine maintenance.

(vi) An owner or operator shall record the information specified in Subsections R315-264-1089(e)(1)(vi)(A) through (e)(1)(vi)(C) for those unexpected control device system malfunctions that would require the control device not to meet the requirements of Subsections R315-264-1087 (c)(1)(i), (c)(1)(ii), or (c)(1)(iii), as applicable.

(A) The occurrence and duration of each malfunction of the control device system.

(B) The duration of each period during a malfunction when gases, vapors, or fumes are vented from the waste management unit through the closed-vent system to the control device while the control device is not properly functioning.

(C) Actions taken during periods of malfunction to restore a malfunctioning control device to its normal or usual manner of operation.

(vii) Records of the management of carbon removed from a carbon adsorption system conducted in accordance with Subsection R315-264-1087(c)(3)(ii).

(f) The owner or operator of a tank, surface impoundment, or container exempted from standards in accordance with the provisions of Subsection R315-264-1082(c) shall prepare and maintain the following records, as applicable:

(1) For tanks, surface impoundments, and containers exempted under the hazardous waste organic concentration conditions specified in Subsections R315-264-1082(c)(1) or 1082(c)(2)(i) through (c)(2)(vi), the owner or operator shall record the information used for each waste determination, e.g., test results, measurements, calculations, and other documentation, in the facility operating log. If analysis results for waste samples are used for the waste determination, then the owner or operator shall record the date, time, and location that each waste sample is collected in accordance with applicable requirements of Section R315-264-1083.

(2) For tanks, surface impoundments, or containers exempted under the provisions of Subsections R315-264-1082(c)(2)(vii) or (c)(2)(viii), the owner or operator shall record the identification number for the incinerator, boiler, or industrial furnace in which the hazardous waste is treated.

(g) An owner or operator designating a cover as "unsafe to inspect and monitor" pursuant to Subsections R315-264-1084(l) or 1085(g) shall record in a log that is kept in the facility operating record the following information: The identification numbers for waste management units with covers that are designated as "unsafe to inspect and monitor," the explanation for each cover stating why the cover is unsafe to inspect and monitor, and the plan and schedule for inspecting and monitoring each cover.

(h) The owner or operator of a facility that is subject to Section R315-264-1080 through 1090 and to the control device standards in 40 CFR part 60, subpart VV, or 40 CFR part 61, subpart V, may elect to demonstrate compliance with the applicable sections of Section R315-264-1080 through 1090 by documentation either pursuant to Section R315-264-1080 through 1090, or pursuant to the provisions of 40 CFR part 60, subpart VV or 40 CFR part 61, subpart V, to the extent that the documentation required by 40 CFR parts 60 or 61 duplicates the documentation required by Section R315-264-1089.

(i) For each tank or container not using air emission controls specified in Sections R315-264-1084 through 1087 in accordance with the conditions specified in Subsection R315-264-1080(d), the owner or operator shall record and maintain the following information:

(1) A list of the individual organic peroxide compounds manufactured at the facility that meet the conditions specified in Subsection R315-264-1080(d)(1).

(2) A description of how the hazardous waste containing the organic peroxide compounds identified in Subsection R315-264-1089(i)(1) are managed at the facility in tanks and containers. This description shall include:

(i) For the tanks used at the facility to manage this hazardous waste, sufficient information shall be provided to describe for each tank: A facility identification number for the tank; the purpose and placement of this tank in the management train of this hazardous waste; and the procedures used to ultimately dispose of the hazardous waste managed in the tanks.

(ii) For containers used at the facility to manage these hazardous wastes, sufficient information shall be provided to describe: A facility identification number for the container or group of containers; the purpose and placement of this container, or group of containers, in the management train of this hazardous waste; and the procedures used to ultimately dispose of the hazardous waste handled in the containers.

(3) An explanation of why managing the hazardous waste containing the organic peroxide compounds identified in Subsection R315-264-1089(i)(1) in the tanks and containers as described in Subsection R315-264-1089(i)(2) would create an undue safety hazard if the air emission controls, as required under Sections R315-264-1084 through 1087, are installed and operated on these waste management units. This explanation shall include the following information:

(i) For tanks used at the facility to manage these hazardous wastes, sufficient information shall be provided to explain: How use of the required air emission controls on the tanks would affect the tank design features and facility operating procedures currently used to prevent an undue safety hazard during the management of this hazardous waste in the tanks; and why installation of safety devices on the required air emission controls, as allowed under Section R315-264-1080 through 1090, will not address those situations in which evacuation of tanks equipped with these air emission controls is necessary and consistent with good engineering and safety practices for handling organic peroxides.

(ii) For containers used at the facility to manage these hazardous wastes, sufficient information shall be provided to explain: How use of the required air emission controls on the containers would affect the container design features and handling procedures currently used to prevent an undue safety

hazard during the management of this hazardous waste in the containers; and why installation of safety devices on the required air emission controls, as allowed under Section R315-264-1080 through 1090, will not address those situations in which evacuation of containers equipped with these air emission controls is necessary and consistent with good engineering and safety practices for handling organic peroxides.

(j) For each hazardous waste management unit not using air emission controls specified in Sections R315-264-1084 through 1087 in accordance with the requirements of Subsection R315-264-1080(b)(7), the owner and operator shall record and maintain the following information:

(1) Certification that the waste management unit is equipped with and operating air emission controls in accordance with the requirements of an applicable regulation codified under the Utah Air Conservation Act.

(2) Identification of the specific requirements codified under the Utah Air Conservation Act with which the waste management unit is in compliance.

R315-264-1090. Reporting Requirements.

(a) Each owner or operator managing hazardous waste in a tank, surface impoundment, or container exempted from using air emission controls under the provisions of Subsection R315-264-1082(c) shall report to the Director each occurrence when hazardous waste is placed in the waste management unit in noncompliance with the conditions specified in Subsection R315-264-1082(c)(1) or (c)(2), as applicable. Examples of such occurrences include placing in the waste management unit a hazardous waste having an average VO concentration equal to or greater than 500 ppmw at the point of waste origination; or placing in the waste management unit a treated hazardous waste of which the organic content has been reduced by an organic destruction or removal process that fails to achieve the applicable conditions specified in Subsections R315-264-1082(c)(2)(i) through (c)(2)(vi). The owner or operator shall submit a written report within 15 calendar days of the time that the owner or operator becomes aware of the occurrence. The written report shall contain the EPA identification number, facility name and address, a description of the noncompliance event and the cause, the dates of the noncompliance, and the actions taken to correct the noncompliance and prevent recurrence of the noncompliance. The report shall be signed and dated by an authorized representative of the owner or operator.

(b) Each owner or operator using air emission controls on a tank in accordance with the requirements Subsection R315-264-1084(c) shall report to the Director each occurrence when hazardous waste is managed in the tank in noncompliance with the conditions specified in Subsection R315-264-1084(b). The owner or operator shall submit a written report within 15 calendar days of the time that the owner or operator becomes aware of the occurrence. The written report shall contain the EPA identification number, facility name and address, a description of the noncompliance event and the cause, the dates of the noncompliance, and the actions taken to correct the noncompliance and prevent recurrence of the noncompliance. The report shall be signed and dated by an authorized representative of the owner or operator.

(c) Each owner or operator using a control device in accordance with the requirements of Section R315-264-1087 shall submit a semiannual written report to the Director excepted as provided for in Subsection R315-264-1090(d). The report shall describe each occurrence during the previous 6-month period when either:

(1) A control device is operated continuously for 24 hours or longer in noncompliance with the applicable operating values defined in Subsection R315-264-1035(c)(4); or

(2) A flare is operated with visible emissions for 5 minutes or longer in a two-hour period, as defined in Subsection R315-264-1033(d). The written report shall include the EPA identification number, facility name and address, and an explanation why the control device could not be returned to compliance within 24 hours, and actions taken to correct the noncompliance. The report shall be signed and dated by an authorized representative of the owner or operator.

(d) A report to the Director in accordance with the requirements of Subsection R315-264-1090(c) is not required for a 6-month period during which all control devices subject to Section R316-264-1080 through 1090 are operated by the owner or operator such that:

(1) During no period of 24 hours or longer did a control device operate continuously in noncompliance with the applicable operating values defined in Subsection R315-264-1035(c)(4); and

(2) No flare was operated with visible emissions for 5 minutes or longer in a two-hour period, as defined in Subsection R315-264-1033(d).

R315-264-1100. Containment Buildings -- Applicability.

The requirements of Sections R315-264-1100 through 1102 apply to owners or operators who store or treat hazardous waste in units designed and operated under Section R315-264-1101. The owner or operator is not subject to the definition of land disposal in RCRA section 3004(k) provided that the unit:

(a) Is a completely enclosed, self-supporting structure that is designed and constructed of manmade materials of sufficient strength and thickness to support themselves, the waste contents, and any personnel and heavy equipment that operate within the unit, and to prevent failure due to pressure gradients, settlement, compression, or uplift, physical contact with the hazardous wastes to which they are exposed; climatic conditions; and the stresses of daily operation, including the movement of heavy equipment within the unit and contact of such equipment with containment walls;

(b) Has a primary barrier that is designed to be sufficiently durable to withstand the movement of personnel, wastes, and handling equipment within the unit;

(c) If the unit is used to manage liquids, has:

(1) A primary barrier designed and constructed of materials to prevent migration of hazardous constituents into the barrier;

(2) A liquid collection system designed and constructed of materials to minimize the accumulation of liquid on the primary barrier; and

(3) A secondary containment system designed and constructed of materials to prevent migration of hazardous constituents into the barrier, with a leak detection and liquid collection system capable of detecting, collecting, and removing leaks of hazardous constituents at the earliest practicable time, unless the unit has been granted a variance from the secondary containment system requirements under Subsection R315-264-1101(b)(4);

(d) Has controls sufficient to prevent fugitive dust emissions to meet the no visible emission standard in Subsection R315-264-1101(c)(1)(iv); and

(e) Is designed and operated to ensure containment and prevent the tracking of materials from the unit by personnel or equipment.

R315-264-1101. Containment Buildings -- Design and Operating Standards.

(a) All containment buildings shall comply with the following design standards:

(1) The containment building shall be completely enclosed with a floor, walls, and a roof to prevent exposure to the elements, e.g., precipitation, wind, run-on, and to assure containment of managed wastes.

(2) The floor and containment walls of the unit, including the secondary containment system if required under Subsection R315-264-1101(b), shall be designed and constructed of materials of sufficient strength and thickness to support themselves, the waste contents, and any personnel and heavy equipment that operate within the unit, and to prevent failure due to pressure gradients, settlement, compression, or uplift, physical contact with the hazardous wastes to which they are exposed; climatic conditions; and the stresses of daily operation, including the movement of heavy equipment within the unit and contact of such equipment with containment walls. The unit shall be designed so that it has sufficient structural strength to prevent collapse or other failure. All surfaces to be in contact with hazardous wastes shall be chemically compatible with those wastes. the Director shall consider standards established by professional organizations generally recognized by the industry such as the American Concrete Institute (ACI) and the American Society of Testing Materials (ASTM) in judging the structural integrity requirements of Subsection R315-264-1101(a). If appropriate to the nature of the waste management operation to take place in the unit, an exception to the structural strength requirement may be made for light-weight doors and windows that meet these criteria:

(i) They provide an effective barrier against fugitive dust emissions under Subsection R315-264-1101(c)(1)(iv); and

(ii) The unit is designed and operated in a fashion that assures that wastes will not actually come in contact with these openings.

(3) Incompatible hazardous wastes or treatment reagents shall not be placed in the unit or its secondary containment system if they could cause the unit or secondary containment system to leak, corrode, or otherwise fail.

(4) A containment building shall have a primary barrier designed to withstand the movement of personnel, waste, and handling equipment in the unit during the operating life of the unit and appropriate for the physical and chemical characteristics of the waste to be managed.

(b) For a containment building used to manage hazardous wastes containing free liquids or treated with free liquids, the presence of which is determined by the paint filter test, a visual examination, or other appropriate means, the owner or operator shall include:

(1) A primary barrier designed and constructed of materials to prevent the migration of hazardous constituents into the barrier, e.g., a geomembrane covered by a concrete wear surface.

(2) A liquid collection and removal system to minimize the accumulation of liquid on the primary barrier of the containment building:

(i) The primary barrier shall be sloped to drain liquids to the associated collection system; and

(ii) Liquids and waste shall be collected and removed to minimize hydraulic head on the containment system at the earliest practicable time.

(3) A secondary containment system including a secondary barrier designed and constructed to prevent migration of hazardous constituents into the barrier, and a leak detection system that is capable of detecting failure of the primary barrier and collecting accumulated hazardous wastes and liquids at the earliest practicable time.

(i) The requirements of the leak detection component of the secondary containment system are satisfied by installation of a system that is, at a minimum:

(A) Constructed with a bottom slope of 1 percent or more; and

(B) Constructed of a granular drainage material with a hydraulic conductivity of 1 x 10-2 cm/sec or more and a thickness of 30.5 cm (12 inches) or more, or constructed of synthetic or geonet drainage materials with a transmissivity of 3 x 10-5 m2/sec or more.

(ii) If treatment is to be conducted in the building, an area in which such treatment will be conducted shall be designed to prevent the release of liquids, wet materials, or liquid aerosols to other portions of the building.

(iii) The secondary containment system shall be constructed of materials that are chemically resistant to the waste and liquids managed in the containment building and of sufficient strength and thickness to prevent collapse under the pressure exerted by overlaying materials and by any equipment used in the containment building. Containment buildings can serve as secondary containment systems for tanks placed within the building under certain conditions. A containment building can serve as an external liner system for a tank, provided it meets the requirements of Subsection R315-264-193(e)(1). In addition, the containment building shall meet the requirements of Subsections R315-264-193(b) and 193(c)(1) and (2) to be considered an acceptable secondary containment system for a tank.

(4) For existing units other than 90-day generator units, the Director may delay the secondary containment requirement for up to two years, based on a demonstration by the owner or operator that the unit substantially meets the standards of Sections R315-264-1100 and 1102. In making this demonstration, the owner or operator shall:

(i) Provide written notice to the Director of their request by November 16, 1992. This notification shall describe the unit and its operating practices with specific reference to the performance of existing containment systems, and specific plans for retrofitting the unit with secondary containment;

(ii) Respond to any comments from the Director on these plans within 30 days; and

(iii) Fulfill the terms of the revised plans, if such plans are approved by the Director.

(c) Owners or operators of all containment buildings shall:

(1) Use controls and practices to ensure containment of the hazardous waste within the unit; and, at a minimum:

(i) Maintain the primary barrier to be free of significant cracks, gaps, corrosion, or other deterioration that could cause hazardous waste to be released from the primary barrier;

(ii) Maintain the level of the stored/treated hazardous waste within the containment walls of the unit so that the height of any containment wall is not exceeded;

(iii) Take measures to prevent the tracking of hazardous waste out of the unit by personnel or by equipment used in handling the waste. An area shall be designated to decontaminate equipment and any rinsate shall be collected and properly managed; and

(iv) Take measures to control fugitive dust emissions such that any openings, doors, windows, vents, cracks, etc., exhibit no visible emissions, see 40 CFR part 60, appendix A, Method 22-Visual Determination of Fugitive Emissions from Material Sources and Smoke Emissions from Flares. In addition, all associated particulate collection devices, e.g., fabric filter, electrostatic precipitator, shall be operated and maintained with sound air pollution control practices, see 40 CFR part 60 subpart 292 for guidance. This state of no visible emissions shall be maintained effectively at all times during routine operating and maintenance conditions, including when vehicles and personnel are entering and exiting the unit.

(2) Obtain and keep on-site a certification by a qualified Professional Engineer that the containment building design meets the requirements of Subsections R315-264-1101(a), (b), and (c).

(3) Throughout the active life of the containment building, if the owner or operator detects a condition that could lead to or has caused a release of hazardous waste, the owner or operator shall repair the condition promptly, in accordance with the following procedures.

(i) Upon detection of a condition that has led to a release of hazardous waste, e.g., upon detection of leakage from the primary barrier, the owner or operator shall:

(A) Enter a record of the discovery in the facility operating record;

(B) Immediately remove the portion of the containment building affected by the condition from service;

(C) Determine what steps shall be taken to repair the containment building, remove any leakage from the secondary collection system, and establish a schedule for accomplishing the cleanup and repairs; and

(D) Within 7 days after the discovery of the condition, notify the Director of the condition, and within 14 working days, provide a written notice to the Director with a description of the steps taken to repair the containment building, and the schedule for accomplishing the work.

(ii) The Director shall review the information submitted, make a determination regarding whether the containment building shall be removed from service completely or partially until repairs and cleanup are complete, and notify the owner or operator of the determination and the underlying rationale in writing.

(iii) Upon completing all repairs and cleanup the owner or operator shall notify the Director in writing and provide a verification, signed by a qualified, registered professional engineer, that the repairs and cleanup have been completed according to the written plan submitted in accordance with Subsection R315-264-1101(c)(3)(i)(D).

(4) Inspect and record in the facility operating record, at least once every seven days, data gathered from monitoring and leak detection equipment as well as the containment building and the area immediately surrounding the containment building to detect signs of releases of hazardous waste.

(d) For a containment building that contains both areas with and without secondary containment, the owner or operator shall:

(1) Design and operate each area in accordance with the requirements enumerated in Subsections R315-264-1101(a) through (c);

(2) Take measures to prevent the release of liquids or wet materials into areas without secondary containment; and

(3) Maintain in the facility's operating log a written description of the operating procedures used to maintain the integrity of areas without secondary containment.

(e) Notwithstanding any other provision of Subsection R315-264-1100 through 1102 the Director may waive requirements for secondary containment for a permitted containment building where the owner operator demonstrates that the only free liquids in the unit are limited amounts of dust suppression liquids required to meet occupational health and safety requirements, and where containment of managed wastes and liquids can be assured without a secondary containment system.

R315-264-1102. Closure and Post-Closure Care.

(a) At closure of a containment building, the owner or operator shall remove or decontaminate all waste residues, contaminated containment system components, liners, etc.; contaminated subsoils; and structures and equipment contaminated with waste and leachate; and manage them as hazardous waste unless Subsection R315-261-3(d) applies. The closure plan, closure activities, cost estimates for closure, and financial responsibility for containment buildings shall meet all of the requirements specified in Sections R315-264-110 through 120 and 140 through 151.

(b) If, after removing or decontaminating all residues and making all reasonable efforts to effect removal or decontamination of contaminated components, subsoils, structures, and equipment as required in Subsection R315-264-1102(a), the owner or operator finds that not all contaminated subsoils can be practicably removed or decontaminated, he shall close the facility and perform post-closure care in accordance with the closure and post-closure requirements that apply to landfills, Section R315-264-310. In addition, for the purposes of closure, post-closure, and financial responsibility, such a containment building is then considered to be a landfill, and the owner or operator shall meet all of the requirements for landfills specified in Sections R315-264-110 through 120 and 140 through 151.

R315-264-1103. Appendix I to Rule R315-264 -- Recordkeeping Instructions.

The recordkeeping provisions of Section R315-264-73 specify that an owner or operator shall keep a written operating record at his facility. This appendix provides additional instructions for keeping portions of the operating record. See Subsection R315-264-73(b) for additional recordkeeping requirements.

The following information shall be recorded, as it becomes available, and maintained in the operating record until closure of the facility in the following manner:

Records of each hazardous waste received, treated, stored, or disposed of at the facility which include the following:

(1) A description by its common name and the EPA Hazardous Waste Number(s) from Rule R315-261 which apply to the waste. The waste description also shall include the waste's physical form, i.e., liquid, sludge, solid, or contained gas. If the waste is not listed in Sections R315-261-30 through 35, the description also shall include the process that produced it, for example, solid filter cake from production of ----, EPA Hazardous Waste Number W051.

Each hazardous waste listed in Sections R315-261-30 through 35, and each hazardous waste characteristic defined in Sections R315-261-20 through 24, has a four-digit EPA Hazardous Waste Number assigned to it. This number shall be used for recordkeeping and reporting purposes. Where a hazardous waste contains more than one listed hazardous waste, or where more than one hazardous waste characteristic applies to the waste, the waste description shall include all applicable EPA Hazardous Waste Numbers.

(2) The estimated or manifest-reported weight, or volume and density, where applicable, in one of the units of measure specified in Table 1;

Table 1

Unit of measure	Code(1)
Gallons	G
Gallons per Hour	E
Gallons per Day	U
Liters	L
Liters per Hour	H
Liters per Day	V
Short Tons per Hour	D
Metric Tons per Hour	W
Short Tons per Day	N
Metric Tons per Day	S
Pounds per Hour	J
Kilograms per Hour	R
Cubic Yards	Y
Cubic Meters	C
Acres	B
Acre-feet	A
Hectares	Q
Hectare-meter	F
Btu's per Hour	I
Pounds	P
Short tons	T
Kilograms	K
Tons	M

(1) Single digit symbols are used here for data processing purposes.

(3) The method(s), by handling code(s) as specified in Table 2, and date(s) of treatment, storage, or disposal.

Table 2
Handling Codes for Treatment, Storage and Disposal Methods

Enter the handling code(s) listed below that most closely represents the technique(s) used at the facility to treat, store or dispose of each quantity of hazardous waste received.

For Storage

Code	Storage type
S01	Container (barrel, drum, etc.)
S02	Tank
S03	Waste Pile
S04	Surface Impoundment
S05	Drip Pad
S06	Containment Building (Storage)
S99	Other Storage (specify)

For Treatment

(a) Thermal Treatment-

Code	Type of Thermal Treatment
T06	Liquid injection incinerator
T07	Rotary kiln incinerator
T08	Fluidized bed incinerator
T09	Multiple hearth incinerator
T10	Infrared furnace incinerator
T11	Molten salt destructor
T12	Pyrolysis
T13	Wet air oxidation
T14	CalcinationT15 Microwave discharge
T18	Other (specify)

(b) Chemical Treatment-

Code	Type of Chemical Treatment
T19	Absorption mound
T20	Absorption field
T21	Chemical fixation
T22	Chemical oxidation
T23	Chemical precipitation
T24	Chemical reduction
T25	Chlorination
T26	Chlorinolysis
T27	Cyanide destruction
T28	Degradation
T29	Detoxification
T30	Ion exchange
T31	Neutralization
T32	Ozonation
T33	Photolysis
T34	Other (specify)

(c) Physical Treatment-
(1) Separation of components:

Code	Type of Separation treatmen
T35	Centrifugation
T36	Clarification
T37	Coagulation
T38	Decanting
T39	Encapsulation
T40	Filtration
T41	Flocculation
T42	Flotation
T43	Foaming
T44	Sedimentation
T45	Thickening
T46	Ultrafiltration
T47	Other (specify)

(2) Removal of Specific Components:

Code	Type of Removal Treatment
T48	Absorption-molecular sieve
T49	Activated carbon
T50	Blending
T51	Catalysis
T52	Crystallization
T53	Dialysis
T54	Distillation
T55	Electrodialysis
T56	Electrolysis
T57	Evaporation
T58	High gradient magnetic separation
T59	Leaching
T60	Liquid ion exchange
T61	Liquid-liquid extraction
T62	Reverse osmosis
T63	Solvent recovery
T64	Stripping
T65	Sand filter
T66	Other (specify)

(d) Biological Treatment

Code	Type of Biological Treatment
T67	Activated sludge
T68	Aerobic lagoon
T69	Aerobic tank
T70	Anaerobic tank
T71	Composting
T72	Septic tank
T73	Spray irrigation
T74	Thickening filter
T75	Trickling filter
T76	Waste stabilization pond
T77	Other (specify)

(e) Boilers and Industrial Furnaces

Code	Type of Boiler or Industrial Furnace
T80	BoilerT81 Cement Kiln
T82	Lime Kiln
T83	Aggregate Kiln
T84	Phosphate Kiln
T85	Coke Oven
T86	Blast Furnace
T87	Smelting, Melting, or Refining Furnace
T88	Titanium Dioxide Chloride Process Oxidation Reactor
T89	Methane Reforming Furnace
T90	Pulping Liquor Recovery Furnace
T91	Combustion Device Used in the Recovery of Sulfur Values from Spent Sulfuric Acid
T92	Halogen Acid Furnaces
T93	Other Industrial Furnaces Listed in Section R315-260.10 (specify)

(f) Other Treatment

Code	Other type of Treatment
T94	Containment Building (Treatment)

For Disposal

Code	Type of Disposal
D79	Underground Injection
D80	Landfill
D81	Land Treatment
D82	Ocean Disposal
D83	Surface Impoundment (to be closed as a landfill)
D99	Other Disposal (specify)

For Miscellaneous Sections R315-264-600 through 603 Units

Code	Unit type
X01	Open Burning/Open Detonation
X02	Mechanical Processing
X03	Thermal Unit
X04	Geologic Repository
X99	Other Sections R315-264-600 through 603 Units (specify)

R315-264-1104. Appendix IV to Rule R315-264-Cochran's Approximation to the Behrens-Fisher Students' t-test.

40 CFR 264 Appendix IV, 2015 edition, is adopted and incorporated by reference.

R315-264-1105. Appendix V to Rule R315-264 -- Examples of Potentially Incompatible Waste.

Many hazardous wastes, when mixed with other waste or materials at a hazardous waste facility, can produce effects which are harmful to human health and the environment, such as (1) heat or pressure, (2) fire or explosion, (3) violent reaction, (4) toxic dusts, mists, fumes, or gases, or (5) flammable fumes or gases.

Below are examples of potentially incompatible wastes, waste components, and materials, along with the harmful consequences which result from mixing materials in one group with materials in another group. The list is intended as a guide to owners or operators of treatment, storage, and disposal facilities, and to enforcement and permit granting officials, to indicate the need for special precautions when managing these potentially incompatible waste materials or components.

This list is not intended to be exhaustive. An owner or operator shall, as the regulations require, adequately analyze his wastes so that he can avoid creating uncontrolled substances or

reactions of the type listed below, whether they are listed below or not.

It is possible for potentially incompatible wastes to be mixed in a way that precludes a reaction, e.g., adding acid to water rather than water to acid, or that neutralizes them, e.g., a strong acid mixed with a strong base, or that controls substances produced, e.g., by generating flammable gases in a closed tank equipped so that ignition cannot occur, and burning the gases in an incinerator.

In the lists below, the mixing of a Group A material with a Group B material may have the potential consequence as noted.

Table

Group 1-A

Acetylene sludge
Alkaline caustic liquids
Alkaline cleaner
Alkaline corrosive liquids
Alkaline corrosive battery fluid
Caustic wastewater
Lime sludge and other corrosive alkalies
Lime wastewaterLime and water
Spent caustic

Group 1-B

Acid sludge
Acid and water
Battery acid
Chemical cleaners
Electrolyte, acid
Etching acid liquid or solvent
Pickling liquor and other corrosive acids
Spent acid
Spent mixed acid
Spent sulfuric acid
Potential consequences: Heat generation; violent reaction.

Group 2-A

Aluminum
Beryllium
Calcium
Lithium
Magnesium
Potassium
Sodium
Zinc powder
Other reactive metals and metal hydrides

Group 2-B

Any waste in Group 1-A or
1-B
Potential consequences: Fire or explosion; generation of flammable hydrogen gas.

Group 3-A

Alcohols
Water

Group 3-B

Any concentrated waste in Groups 1-A or 1-B
Calcium
Lithium
Metal hydrides
Potassium
SO2 Cl2, SOCl2, PCl3, CH3 SiCl3
Other water-reactive waste
Potential consequences: Fire, explosion, or heat generation; generation of flammable or toxic gases.

Group 4-A

Alcohols
Aldehydes
Halogenated hydrocarbons
Nitrated hydrocarbons
Unsaturated hydrocarbons
Other reactive organic compounds and solvents

Group 4-B

Concentrated Group 1-A or 1-B wastes
Group 2-A wastes
Potential consequences: Fire, explosion, or violent reaction.

Group 5-A

Spent cyanide and sulfide solutions

Group 5-B

Group 1-B wastes
Potential consequences: Generation of toxic hydrogen cyanide or hydrogen sulfide gas.

Group 6-A

Chlorates
Chlorine
Chlorites
Chromic acid
Hypochlorites
Nitrates
Nitric acid, fuming
Perchlorates
Permanganates
Peroxides
Other strong oxidizers

Group 6-B

Acetic acid and other organic acids
Concentrated mineral acids
Group 2-A wastes
Group 4-A wastes
Other flammable and combustible wastes
Potential consequences: Fire, explosion, or violent reaction.
Source: "Law, Regulations, and Guidelines for Handling of Hazardous Waste." California Department of Health, February 1975.

(1) These include counties, city-county consolidations, and independent cities. In the case of Alaska, the political jurisdictions are election districts, and, in the case of Hawaii, the political jurisdiction listed is the island of Hawaii.

R315-264-1106. Appendix VI to Rule R315-264 -- Political Jurisdictions within Utah in Which Compliance With Subsection R315-264-18(a) Shall Be Demonstrated.

Beaver
Box Elder
Cache
Carbon
Daggett
Davis
Duchesne
Emery
Garfield
Grand
Iron
Juab
Kane
Millard
Morgan
Piute
Rich
Salt Lake
San Juan
Sanpete
Sevier
Summit
Tooele
Uintah
Utah
Wasatch
Washington
Wayne
Weber

R315-264-1107. Appendix IX to Rule R315-264 -- Ground-

Water Monitoring List.

40 CFR 264 Appendix IX, 2015 edition, is adopted and incorporated by reference.

KEY: hazardous waste, TSD facilities
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R315. Environmental Quality, Waste Management and Radiation Control, Waste Management.

R315-265. Interim Status Standards for Owners and Operators of Hazardous Waste Treatment, Storage, and Disposal Facilities.

R315-265-1. Incorporation, General -- Purpose, Scope, and Applicability.

40 CFR 265.270 through 265.282, 265.300 through 265.316, 265.340 through 265.352, 265.370 through 265.383, 265.400 through 265.406, 265.430, 265.440 through 265.445, 265.1030 through 265.1035, 265.1050 through 265.1064, 265.1080 through 265.1091, 265.1100 through 265.1102, 265.1200 through 265.1202, 265.1300 through 265.1316 and Appendices I and III through VI of 40 CFR 265, 2015 edition, as amended by 81 FR 85827, are adopted and incorporated by reference except that "Director" is substituted for all references to "Regional Administrator", and for all references to "EPA" or "Environmental Protection Agency" except for references to "EPA identification number" and where EPA is used in reference to actions under Subsection R315-268-42(b) and in Subsection R315-265-71(a)(3).

(a) The purpose of Rule R315-265 is to establish minimum standards that define the acceptable management of hazardous waste during the period of interim status and until certification of final closure or, if the facility is subject to post-closure requirements, until post-closure responsibilities are fulfilled.

(b) Except as provided in 40 CFR 265.1080(b), which is adopted and incorporated by reference, the standards of Rule R315-265, and of Sections R315-264-552, R315-264-553, and R315-264-554, apply to owners and operators of facilities that treat, store or dispose of hazardous waste who have fully complied with the requirements for interim status under section 3005(e) of RCRA and Section R315-270-10 until either a permit is issued under Rule R315-270 or until applicable Rule R315-265 closure and post-closure responsibilities are fulfilled, and to those owners and operators of facilities in existence on November 19, 1980 who have failed to provide timely notification as required by section 3010(a) of RCRA, failed to file Part A of the permit application as required by Subsections R315-270-10 (e) and (g), or both. These standards apply to all treatment, storage and disposal of hazardous waste at these facilities after the effective date of these regulations, except as specifically provided otherwise in Rule R315-265 or Rule R315-261.

Comment: As stated in section 3005(a) of RCRA, after the effective date of regulations under that section, i.e., Rules R315-270 and R315-124, the treatment, storage and disposal of hazardous waste is prohibited except in accordance with a permit. Section 3005(e) of RCRA provides for the continued operation of an existing facility that meets certain conditions, until final administrative disposition of the owner's and operator's permit application is made.

(c) The requirements of Rule R315-265 do not apply to:

(1) A person disposing of hazardous waste by means of ocean disposal subject to a permit issued under the Marine Protection, Research, and Sanctuaries Act;

Comment: These Rule R315-265 regulations do apply to the treatment or storage of hazardous waste before it is loaded onto an ocean vessel for incineration or disposal at sea, as provided in Subsection R315-265-1(b).

(2) Reserved

(3) The owner or operator of a POTW which treats, stores, or disposes of hazardous waste;

Comment: The owner or operator of a facility under Subsections R315-265-1(c)(1) through (3) is subject to the requirements of Rule R315-264 to the extent they are included in a permit by rule granted to such a person under 40 CFR 122, or are required by 40 CFR 144.14.

(4) Reserved

(5) The owner or operator of a facility permitted under Rules R315-301 through R315-320 to manage municipal or industrial solid waste, if the only hazardous waste the facility treats, stores, or disposes of is excluded from regulation under Rule R315-265 by Section R315-262-14;

(6) The owner or operator of a facility managing recyclable materials described in Subsections R315-261-6(a)(2), (3), and (4), except to the extent they are referred to in Rule R315-279 or Sections R315-266-20 through 266-23, R315-266-70, R315-266-80, or R315-266-100 through 266-112.

(7) A generator accumulating waste on site in compliance with applicable conditions for exemption in Sections R315-262-14 through 262-17 and Sections R315-262-200 through 262-216 and R315-262-230 through 262-233, except to the extent the requirements of Rule R315-265 are included in those sections;

(8) A farmer disposing of waste pesticides from his own use in compliance with Section R315-262-70; or

(9) The owner or operator of a totally enclosed treatment facility, as defined in Section R315-260-10.

(10) The owner or operator of an elementary neutralization unit or a wastewater treatment unit as defined in Section R315-260-10, provided that if the owner or operator is diluting hazardous ignitable (D001) wastes (other than the D001 High TOC Subcategory defined in Section R315-268-40, Table Treatment Standards for Hazardous Wastes), or reactive (D003) waste, to remove the characteristic before land disposal, the owner/operator shall comply with the requirements set out in Subsection R315-265-17(b).

(11)(i) Except as provided in Subsection R315-265-1(c)(11)(ii), a person engaged in treatment or containment activities during immediate response to any of the following situations:

(A) A discharge of a hazardous waste;

(B) An imminent and substantial threat of a discharge of a hazardous waste;

(C) A discharge of a material which, when discharged, becomes a hazardous waste.

(ii) An owner or operator of a facility otherwise regulated by this Rule R315-265 shall comply with all applicable requirements of Sections R315-265-30 through 265-37 and Sections R315-265-50 through 265-56.

(iii) Any person who is covered by Subsection R315-265-1(c)(11)(i) and who continues or initiates hazardous waste treatment or containment activities after the immediate response is over is subject to all applicable requirements of this Rule R315-265 and Rule R315-124 for those activities.

(12) A transporter storing manifested shipments of hazardous waste in containers meeting the requirements of Section R315-262-30 at a transfer facility for a period of ten days or less.

(13) The addition of absorbent material to waste in a container, as defined in Section R315-260-10, or the addition of waste to the absorbent material in a container provided that these actions occur at the time waste is first placed in the containers; and Subsection R315-265-17(b), Sections R315-265-171, and 265-172 are complied with.

(14) Universal waste handlers and universal waste transporters, as defined in Section R315-260-10, handling the wastes listed below. These handlers are subject to regulation under Rule R315-273, when handling the below listed universal wastes.

(i) Batteries as described in Section R315-273-2;

(ii) Pesticides as described in Section R315-273-3;

(iii) Mercury-containing equipment as described in Section R315-273-4; and

(iv) Lamps as described in Section R315-273-5;

(v) Antifreeze as described in Subsection R315-273-6(a); and

(vi) Aerosol cans as described in Subsection R315-273-6(b).

(d) The following hazardous wastes shall not be managed at facilities subject to regulation under Rule R315-265.

(1) EPA Hazardous Waste Nos. FO20, FO21, FO22, FO23, FO26, or FO27 unless:

(i) The wastewater treatment sludge is generated in a surface impoundment as part of the plant's wastewater treatment system;

(ii) The waste is stored in tanks or containers;

(iii) The waste is stored or treated in waste piles that meet the requirements of Subsection R315-264-250(c) as well as all other applicable requirements of Sections R315-265-250 through 265-260;

(iv) The waste is burned in incinerators that are certified pursuant to the standards and procedures in 40 CFR 265.352, which is adopted by reference; or

(v) The waste is burned in facilities that thermally treat the waste in a device other than an incinerator and that are certified pursuant to the standards and procedures in 40 CFR 265.383, which is adopted by reference.

(e) The requirements of Rule R315-265 apply to owners or operators of all facilities which treat, store or dispose of hazardous waste referred to in Rule R315-268, and the Rule R315-268 standards are considered material conditions or requirements of the Rule R315-265 interim status standards.

R315-265-4. General -- Imminent Hazard Action.

Notwithstanding any other provisions of these regulations, enforcement actions may be brought pursuant to Section 19-5-115.

R315-265-10. General Facility Standards -- Applicability.

The regulations in Section R315-262-10 through 262-19 apply to owners and operators of all hazardous waste facilities, except as Section R315-265-1 provides otherwise.

R315-265-11. General Facility Standards -- Identification Number.

Every facility owner or operator shall apply to the Director for an EPA identification number using EPA form 8700-12. Information on obtaining this number can be acquired by contacting the Utah Division of Waste Management and Radiation Control.

R315-265-12. General Facility Standards -- Required Notices.

(a) The owner or operator of a facility that is arranging or has arranged to receive hazardous waste subject to Sections R315-262-80 through 262-84 from a foreign source shall submit the following required notices:

(1) As per Subsection R315-262-84(b), for imports where the competent authority of the country of export does not require the foreign exporter to submit to it a notification proposing export and obtain consent from EPA and the competent authorities for the countries of transit, such owner or operator of the facility, if acting as the importer, shall provide notification of the proposed transboundary movement in English to EPA using the allowable methods listed in Subsection R315-262-84(b)(1) at least 60 days before the first shipment is expected to depart the country of export. The notification may cover up to one year of shipments of wastes having similar physical and chemical characteristics, the same United Nations classification, the same RCRA waste codes and OECD waste codes, and being sent from the same foreign exporter.

(2) As per Subsection R315-262-84(d)(2)(xv), a copy of the movement document bearing all required signatures within three (3) working days of receipt of the shipment to the foreign exporter; to the competent authorities of the countries of export and transit that control the shipment as an export and transit shipment of hazardous waste respectively; and on or after the electronic import-export reporting compliance date, to EPA electronically using EPA's Waste Import Export Tracking System (WIETS), or its successor system. The original of the signed movement document shall be maintained at the facility for at least three (3) years. The owner or operator of a facility may satisfy this recordkeeping requirement by retaining electronically submitted documents in the facility's account on EPA's Waste Import Export Tracking System (WIETS), or its successor system, provided that copies are readily available for viewing and production if requested by any EPA or Utah inspector. No owner or operator of a facility may be held liable for the inability to produce the documents for inspection under this section if the owner or operator of a facility can demonstrate that the inability to produce the document is due exclusively to technical difficulty with EPA's Waste Import Export Tracking System (WIETS), or its successor system, for which the owner or operator of a facility bears no responsibility.

(3) As per Subsection R315-262-84(f)(4), if the facility has physical control of the waste and it must be sent to an alternate facility or returned to the country of export, such owner or operator of the facility shall inform EPA, using the allowable methods listed in Subsection R315-262-84(b)(1) of the need to return or arrange alternate management of the shipment.

(4) As per Subsection R315-262-84(g), such owner or operator shall:

(i) Send copies of the signed and dated confirmation of recovery or disposal, as soon as possible, but no later than thirty days after completing recovery or disposal on the waste in the shipment and no later than one calendar year following receipt of the waste, to the foreign exporter, to the competent authority of the country of export that controls the shipment as an export of hazardous waste, and on or after the electronic import-export reporting compliance date, to EPA electronically using EPA's Waste Import Export Tracking System (WIETS), or its successor system.

(ii) If the facility performed any of recovery operations R12, R13, or RC16, or disposal operations D13 through D15, or DC17, promptly send copies of the confirmation of recovery or disposal that it receives from the final recovery or disposal facility within one year of shipment delivery to the final recovery or disposal facility that performed one of recovery operations R1 through R11, or RC16, or one of disposal operations D1 through D12, or DC15 to DC16, to the competent authority of the country of export that controls the shipment as an export of hazardous waste, and on or after the electronic import-export reporting compliance date, to EPA electronically using EPA's Waste Import Export Tracking System (WIETS), or its successor system. The recovery and disposal operations in Subsection R315-265-12(a)(4)(ii) are defined in Section R315-262-81.

(b) Before transferring ownership or operation of a facility during its operating life, or of a disposal facility during the post-closure care period, the owner or operator shall notify the new owner or operator in writing of the requirements of Rule R315-265 and Rule R315-270. Also see Section R315-270-72.

Comment: An owner's or operator's failure to notify the new owner or operator of the requirements of Rule R315-265 in no way relieves the new owner or operator of his obligation to comply with all applicable requirements.

R315-265-13. General Facility Standards -- General Waste Analysis.

(a)(1) Before an owner or operator treats, stores, or disposes of any hazardous wastes, or nonhazardous wastes if applicable under Subsection R315-265-113(d), he shall obtain a detailed chemical and physical analysis of a representative

sample of the wastes. At a minimum, the analysis shall contain all the information which must be known to treat, store, or dispose of the waste in accordance with Rule R315-265 and Rule R315-268.

(2) The analysis may include data developed under Rule R315-261, and existing published or documented data on the hazardous waste or on waste generated from similar processes.

Comment: For example, the facility's records of analyses performed on the waste before the effective date of these regulations, or studies conducted on hazardous waste generated from processes similar to that which generated the waste to be managed at the facility, may be included in the data base required to comply with Subsection R315-265-13(a)(1). The owner or operator of an off-site facility may arrange for the generator of the hazardous waste to supply part of the information required by Subsection R315-265-13(a)(1), except as otherwise specified in Subsections R315-268-7(b) and (c). If the generator does not supply the information, and the owner or operator chooses to accept a hazardous waste, the owner or operator is responsible for obtaining the information required to comply with Section R315-265-13.

(3) The analysis shall be repeated as necessary to ensure that it is accurate and up to date. At a minimum, the analysis shall be repeated:

(i) When the owner or operator is notified, or has reason to believe, that the process or operation generating the hazardous wastes or non-hazardous wastes, if applicable, under Subsection R315-265-113(d) has changed; and

(ii) For off-site facilities, when the results of the inspection required in Subsection R315-265-13(a)(4) indicate that the hazardous waste received at the facility does not match the waste designated on the accompanying manifest or shipping paper.

(4) The owner or operator of an off-site facility shall inspect and, if necessary, analyze each hazardous waste movement received at the facility to determine whether it matches the identity of the waste specified on the accompanying manifest or shipping paper.

(b) The owner or operator shall develop and follow a written waste analysis plan which describes the procedures which he will carry out to comply with Subsection R315-265-13(a). He shall keep this plan at the facility. At a minimum, the plan shall specify:

(1) The parameters for which each hazardous waste, or non-hazardous waste if applicable under Subsection R315-265-113(d), will be analyzed and the rationale for the selection of these parameters, i.e., how analysis for these parameters will provide sufficient information on the waste's properties to comply with Subsection R315-265-13(a);

(2) The test methods which will be used to test for these parameters;

(3) The sampling method which will be used to obtain a representative sample of the waste to be analyzed. A representative sample may be obtained using either:

(i) One of the sampling methods described in Section R315-261-1090; or

(ii) An equivalent sampling method.

Comment: See Subsection R315-260-20(c) for related discussion.

(4) The frequency with which the initial analysis of the waste will be reviewed or repeated to ensure that the analysis is accurate and up to date;

(5) For off-site facilities, the waste analyses that hazardous waste generators have agreed to supply; and

(6) Where applicable, the methods that will be used to meet the additional waste analysis requirements for specific waste management methods as specified in Sections R315-265-200, R315-265-225, and R315-265-252, and 40 CFR 265.273, 265.314, 265.341, 265.375, 265.402, 265.1034(d), 265.1063(d), 265.1084, which are adopted and incorporated by reference and Section R315-268-7.

(7) For surface impoundments exempted from land disposal restrictions under Subsection R315-268-4(a), the procedures and schedule for:

(i) The sampling of impoundment contents;

(ii) The analysis of test data; and,

(iii) The annual removal of residues which are not delisted under Section R315-260-22 or which exhibit a characteristic of hazardous waste and either:

(A) Do not meet applicable treatment standards of Sections R315-268-40 through R315-268-49; or

(B) Where no treatment standards have been established;

(I) Such residues are prohibited from land disposal under Section R315-268-32 or RCRA section 3004(d); or

(II) Such residues are prohibited from land disposal under Subsection R315-268-33(f).

(8) For owners and operators seeking an exemption to the air emission standards of 40 CFR 265 Subpart CC, in accordance with 40 CFR 265.1083, which are adopted and incorporated by reference.

(i) If direct measurement is used for the waste determination, the procedures and schedules for waste sampling and analysis, and the results of the analysis of test data to verify the exemption.

(ii) If knowledge of the waste is used for the waste determination, any information prepared by the facility owner or operator or by the generator of the hazardous waste, if the waste is received from off-site, that is used as the basis for knowledge of the waste.

(c) For off-site facilities, the waste analysis plan required in Subsection R315-265-13(b) shall also specify the procedures which will be used to inspect and, if necessary, analyze each movement of hazardous waste received at the facility to ensure that it matches the identity of the waste designated on the accompanying manifest or shipping paper. At a minimum, the plan shall describe:

(1) The procedures which will be used to determine the identity of each movement of waste managed at the facility; and

(2) The sampling method which will be used to obtain a representative sample of the waste to be identified, if the identification method includes sampling.

(3) The procedures that the owner or operator of an off-site landfill receiving containerized hazardous waste will use to determine whether a hazardous waste generator or treater has added a biodegradable sorbent to the waste in the container.

R315-265-14. General Facility Standards -- Security.

(a) The owner or operator shall prevent the unknowing entry, and minimize the possibility for the unauthorized entry, of persons or livestock onto the active portion of his facility, unless:

(1) Physical contact with the waste, structures, or equipment with the active portion of the facility will not injure unknowing or unauthorized persons or livestock which may enter the active portion of a facility, and

(2) Disturbance of the waste or equipment, by the unknowing or unauthorized entry of persons or livestock onto the active portion of a facility, will not cause a violation of the requirements of Rule R315-265.

(b) Unless exempt under Subsections R315-265-14(a)(1) and (2), a facility shall ha ve:

(1) A 24-hour surveillance system, for example, television monitoring or surveillance by guards or facility personnel, which continuously monitors and controls entry onto the active portion of the facility; or

(2)(i) An artificial or natural barrier, for example, a fence in good repair or a fence combined with a cliff, which completely surrounds the active portion of the facility; and

(ii) A means to control entry, at all times, through the gates or other entrances to the active portion of the facility, for example, an attendant, television monitors, locked entrance, or controlled roadway access to the facility.

Comment: The requirements of Subsection R315-265-14(b) are satisfied if the facility or plant within which the active portion is located itself has a surveillance system, or a barrier and a means to control entry, which complies with the requirements of Subsections R315-265-14(b)(1) or (2).

(c) Unless exempt under Subsections R315-265-14(a)(1) and (a)(2), a sign with the legend, "Danger---Unauthorized Personnel Keep Out," shall be posted at each entrance to the active portion of a facility, and at other locations, in sufficient numbers to be seen from any approach to this active portion. The legend shall be written in English and in any other language predominant in the area surrounding the facility, for example, facilities in counties bordering the Canadian province of Quebec shall post signs in French; facilities in counties bordering Mexico shall post signs in Spanish, and shall be legible from a distance of at least 25 feet. Existing signs with a legend other than "Danger---Unauthorized Personnel Keep Out" may be used if the legend on the sign indicates that only authorized personnel are allowed to enter the active portion, and that entry onto the active portion can be dangerous.

Comment: See Subsection R315-265-117(b) for discussion of security requirements at disposal facilities during the post-closure care period.

R315-265-15. General Facility Standards -- General Inspection Requirements.

(a) The owner or operator shall inspect his facility for malfunctions and deterioration, operator errors, and discharges which may be causing, or may lead to: (1) Release of hazardous waste constituents to the environment or (2) a threat to human health. The owner or operator shall conduct these inspections often enough to identify problems in time to correct them before they harm human health or the environment.

(b)(1) The owner or operator shall develop and follow a written schedule for inspecting all monitoring equipment, safety and emergency equipment, security devices, and operating and structural equipment, such as dikes and sump pumps, that are important to preventing, detecting, or responding to environmental or human health hazards.

(2) He shall keep this schedule at the facility.

(3) The schedule shall identify the types of problems, for example, malfunctions or deterioration, which are to be looked for during the inspection, for example, inoperative sump pump, leaking fitting, eroding dike, etc.

(4) The frequency of inspection may vary for the items on the schedule. However, the frequency should be based on the rate of deterioration of the equipment and the probability of an environmental or human health incident if the deterioration, malfunction, or operator error goes undetected between inspections. Areas subject to spills, such as loading and unloading areas, shall be inspected daily when in use. At a minimum, the inspection schedule shall include the items and frequencies called for in Sections R315-265-174, R315-265-193, R315-265-195, R315-265-226, and R315-265-260, 40 CFR 265.278, 265.304, 265.347, 265.377, 265.403, 265.1033, 265.1052, 265.1053, 265.1058, and 265.1084 through 265.1090, which are adopted and incorporated by reference, where applicable.

(c) The owner or operator shall remedy any deterioration or malfunction of equipment or structures which the inspection reveals on a schedule which ensures that the problem does not lead to an environmental or human health hazard. Where a hazard is imminent or has already occurred, remedial action shall be taken immediately.

(d) The owner or operator shall record inspections in an inspection log or summary. He shall keep these records for at least three years from the date of inspection. At a minimum, these records shall include the date and time of the inspection, the name of the inspector, a notation of the observations made, and the date and nature of any repairs or other remedial actions.

R315-265-16. General Facility Standards -- Personnel Training.

(a)(1) Facility personnel shall successfully complete a program of classroom instruction or on-the-job training that teaches them to perform their duties in a way that ensures the facility's compliance with the requirements of Rule R315-265. The owner or operator shall ensure that this program includes all the elements described in the document required under Subsection R315-265-16(d)(3).

(2) This program shall be directed by a person trained in hazardous waste management procedures, and shall include instruction which teaches facility personnel hazardous waste management procedures, including contingency plan implementation, relevant to the positions in which they are employed.

(3) At a minimum, the training program shall be designed to ensure that facility personnel are able to respond effectively to emergencies by familiarizing them with emergency procedures, emergency equipment, and emergency systems, including where applicable:

(i) Procedures for using, inspecting, repairing, and replacing facility emergency and monitoring equipment;

(ii) Key parameters for automatic waste feed cut-off systems;

(iii) Communications or alarm systems;

(iv) Response to fires or explosions;

(v) Response to ground-water contamination incidents; and

(vi) Shutdown of operations.

(4) For facility employees that receive emergency response training pursuant to Occupational Safety and Health Administration (OSHA) regulations 29 CFR 1910.120(p)(8) and 1910.120(q), the facility is not required to provide separate emergency response training pursuant to Section R315-265-16, provided that the overall facility training meets all the requirements of Section R315-265-16.

(b) Facility personnel shall successfully complete the program required in Subsection R315-265-16(a) within six months after the effective date of these regulations or six months after the date of their employment or assignment to a facility, or to a new position at a facility, whichever is later. Employees hired after the effective date of these regulations shall not work in unsupervised positions until they have completed the training requirements of Subsection R315-265-16(a).

(c) Facility personnel shall take part in an annual review of the initial training required in Subsection R315-265-16(a).

(d) The owner or operator shall maintain the following documents and records at the facility:

(1) The job title for each position at the facility related to hazardous waste management, and the name of the employee filling each job;

(2) A written job description for each position listed under Subsection R315-265-16(d)(1). This description may be consistent in its degree of specificity with descriptions for other similar positions in the same company location or bargaining unit, but shall include the requisite skill, education, or other qualifications, and duties of facility personnel assigned to each position;

(3) A written description of the type and amount of both introductory and continuing training that will be given to each person filling a position listed under Subsection R315-265-16(d)(1);

(4) Records that document that the training or job

experience required under Subsections R315-265-16(a), (b), and (c) has been given to, and completed by, facility personnel.

(e) Training records on current personnel shall be kept until closure of the facility. Training records on former employees shall be kept for at least three years from the date the employee last worked at the facility. Personnel training records may accompany personnel transferred within the same company.

R315-265-17. General Facility Standards -- General Requirements for Ignitable, Reactive, or Incompatible Wastes.

(a) The owner or operator shall take precautions to prevent accidental ignition or reaction of ignitable or reactive waste. This waste shall be separated and protected from sources of ignition or reaction including but not limited to: Open flames, smoking, cutting and welding, hot surfaces, frictional heat, sparks; static, electrical, or mechanical, spontaneous ignition, for example, from heat-producing chemical reactions, and radiant heat. While ignitable or reactive waste is being handled, the owner or operator shall confine smoking and open flame to specially designated locations. "No Smoking" signs shall be conspicuously placed wherever there is a hazard from ignitable or reactive waste.

(b) Where specifically required by other sections of Rule R315-265, the treatment, storage, or disposal of ignitable or reactive waste, and the mixture or commingling of incompatible wastes, or incompatible wastes and materials, shall be conducted so that it does not:

(1) Generate extreme heat or pressure, fire or explosion, or violent reaction;

(2) Produce uncontrolled toxic mists, fumes, dusts, or gases in sufficient quantities to threaten human health;

(3) Produce uncontrolled flammable fumes or gases in sufficient quantities to pose a risk of fire or explosions;

(4) Damage the structural integrity of the device or facility containing the waste; or

(5) Through other like means threaten human health or the environment.

R315-265-18. General Facility Standards -- Location Standards.

The placement of any hazardous waste in a salt dome, salt bed formation, underground mine or cave is prohibited, except for the Department of Energy Waste Isolation Pilot Project in New Mexico.

R315-265-19. General Facility Standards -- Construction Quality Assurance Program.

(a) CQA program.

(1) A construction quality assurance (CQA) program is required for all surface impoundment, waste pile, and landfill units that are required to comply with Subsection R315-265-221(a), Section R315-265-254, and 40 CFR 265.301(a), which is adopted and incorporated by reference. The program shall ensure that the constructed unit meets or exceeds all design criteria and specifications in the permit. The program shall be developed and implemented under the direction of a CQA officer who is a registered professional engineer.

(2) The CQA program shall address the following physical components, where applicable:

(i) Foundations;

(ii) Dikes;

(iii) Low-permeability soil liners;

(iv) Geomembranes (flexible membrane liners);

(v) Leachate collection and removal systems and leak detection systems; and

(vi) Final cover systems.

(b) Written CQA plan. Before construction begins on a unit subject to the CQA program under Subsection R315-265-19(a), the owner or operator shall develop a written CQA plan. The plan shall identify steps that will be used to monitor and document the quality of materials and the condition and manner of their installation. The CQA plan shall include:

(1) Identification of applicable units, and a description of how they will be constructed.

(2) Identification of key personnel in the development and implementation of the CQA plan, and CQA officer qualifications.

(3) A description of inspection and sampling activities for all unit components identified in Subsection R315-265-19(a)(2), including observations and tests that will be used before, during, and after construction to ensure that the construction materials and the installed unit components meet the design specifications. The description shall cover: Sampling size and locations; frequency of testing; data evaluation procedures; acceptance and rejection criteria for construction materials; plans for implementing corrective measures; and data or other information to be recorded and retained in the operating record under Section R315-265-73.

(c) Contents of program.

(1) The CQA program shall include observations, inspections, tests, and measurements sufficient to ensure:

(i) Structural stability and integrity of all components of the unit identified in Subsection R315-265-19(a)(2);

(ii) Proper construction of all components of the liners, leachate collection and removal system, leak detection system, and final cover system, according to permit specifications and good engineering practices, and proper installation of all components, for example, pipes, according to design specifications;

(iii) Conformity of all materials used with design and other material specifications under Sections R315-264-221, R315-264-251, and R315-264-301.

(2) The CQA program shall include test fills for compacted soil liners, using the same compaction methods as in the full-scale unit, to ensure that the liners are constructed to meet the hydraulic conductivity requirements of Subsections R315-264-221(c)(1), R315-264-251(c)(1), and R315-264-301(c)(1) in the field. Compliance with the hydraulic conductivity requirements shall be verified by using in-situ testing on the constructed test fill. The test fill requirement is waived where data are sufficient to show that a constructed soil liner meets the hydraulic conductivity requirements of Subsections R315-264-221(c)(1), R315-264-251(c)(1), and R315-264-301(c)(1) in the field.

(d) Certification. The owner or operator of units subject to Section R315-265-19 shall submit to the Director by certified mail or hand delivery, at least 30 days prior to receiving waste, a certification signed by the CQA officer that the CQA plan has been successfully carried out and that the unit meets the requirements of Subsections R315-265-221(a), Section R315-265-254, or 40 CFR 265.301(a), which is adopted and incorporated by reference. The owner or operator may receive waste in the unit after 30 days from the Director's receipt of the CQA certification unless the Director determines in writing that the construction is not acceptable, or extends the review period for a maximum of 30 more days, or seeks additional information from the owner or operator during this period. Documentation supporting the CQA officer's certification shall be furnished to the Director upon request.

R315-265-30. Preparedness and Prevention -- Applicability.

The regulations in Section R315-265-30 through 37 apply to owners and operators of all hazardous waste facilities, except as Section R315-265-1 provides otherwise.

R315-265-31. Preparedness and Prevention -- Maintenance and Operation of Facility.

Facilities shall be maintained and operated to minimize the possibility of a fire, explosion, or any unplanned sudden or non-sudden release of hazardous waste or hazardous waste constituents to air, soil, or surface water which could threaten human health or the environment.

R315-265-32. Preparedness and Prevention -- Required Equipment.

All facilities shall be equipped with the following, unless none of the hazards posed by waste handled at the facility could require a particular kind of equipment specified below:

(a) An internal communications or alarm system capable of providing immediate emergency instruction, voice or signal, to facility personnel;

(b) A device, such as a telephone, immediately available at the scene of operations, or a hand-held two-way radio, capable of summoning emergency assistance from local police departments, fire departments, or State or local emergency response teams;

(c) Portable fire extinguishers, fire control equipment, including special extinguishing equipment, such as that using foam, inert gas, or dry chemicals, spill control equipment, and decontamination equipment; and

(d) Water at adequate volume and pressure to supply water hose streams, or foam producing equipment, or automatic sprinklers, or water spray systems.

R315-265-33. Preparedness and Prevention -- Testing and Maintenance of Equipment.

All facility communications or alarm systems, fire protection equipment, spill control equipment, and decontamination equipment, where required, shall be tested and maintained as necessary to assure its proper operation in time of emergency.

R315-265-34. Preparedness and Prevention -- Access to Communications or Alarm System.

(a) Whenever hazardous waste is being poured, mixed, spread, or otherwise handled, all personnel involved in the operation shall have immediate access to an internal alarm or emergency communication device, either directly or through visual or voice contact with another employee, unless such a device is not required under Section R315-265-32.

(b) If there is ever just one employee on the premises while the facility is operating, he shall have immediate access to a device, such as a telephone, immediately available at the scene of operation, or a hand-held two-way radio, capable of summoning external emergency assistance, unless such a device is not required under Section R315-265-32.

R315-265-35. Preparedness and Prevention -- Required Aisle Space.

The owner or operator shall maintain aisle space to allow the unobstructed movement of personnel, fire protection equipment, spill control equipment, and decontamination equipment to any area of facility operation in an emergency, unless aisle space is not needed for any of these purposes.

R315-265-37. Preparedness and Prevention -- Arrangements with Local Authorities.

(a) The owner or operator shall attempt to make the following arrangements, as appropriate for the type of waste handled at his facility and the potential need for the services of these organizations:

(1) Arrangements to familiarize police, fire departments, and emergency response teams with the layout of the facility, properties of hazardous waste handled at the facility and associated hazards, places where facility personnel would normally be working, entrances to roads inside the facility, and possible evacuation routes;

(2) Where more than one police and fire department might respond to an emergency, agreements designating primary emergency authority to a specific police and a specific fire department, and agreements with any others to provide support to the primary emergency authority;

(3) Agreements with State emergency response teams, emergency response contractors, and equipment suppliers; and

(4) Arrangements to familiarize local hospitals with the properties of hazardous waste handled at the facility and the types of injuries or illnesses which could result from fires, explosions, or releases at the facility.

(b) Where State or local authorities decline to enter into such arrangements, the owner or operator shall document the refusal in the operating record.

R315-265-50. Contingency Plan and Emergency Procedures -- Applicability.

The regulations in Sections R315-265-50 through 56 apply to owners and operators of all hazardous waste facilities, except as Section R315-265-1 provides otherwise.

R315-265-51. Contingency Plan and Emergency Procedures -- Purpose and Implementation of Contingency Plan.

(a) Each owner or operator shall have a contingency plan for his facility. The contingency plan shall be designed to minimize hazards to human health or the environment from fires, explosions, or any unplanned sudden or non-sudden release of hazardous waste or hazardous waste constituents to air, soil, or surface water.

(b) The provisions of the plan shall be carried out immediately whenever there is a fire, explosion, or release of hazardous waste or hazardous waste constituents which could threaten human health or the environment.

R315-265-52. Contingency Plan and Emergency Procedures -- Content of Contingency Plan.

(a) The contingency plan shall describe the actions facility personnel shall take to comply with Sections R315-265-51 and R315-265-56 in response to fires, explosions, or any unplanned sudden or non-sudden release of hazardous waste or hazardous waste constituents to air, soil, or surface water at the facility.

(b) If the owner or operator has already prepared a Spill Prevention, Control, and Countermeasures (SPCC) Plan in accordance with 40 CFR 112, or some other emergency or contingency plan, he need only amend that plan to incorporate hazardous waste management provisions that are sufficient to comply with the requirements of Rule R315-265. The owner or operator may develop one contingency plan which meets all regulatory requirements. EPA recommends that the plan be based on the National Response Team's Integrated Contingency Plan Guidance ("One Plan"). When modifications are made to non-RCRA provisions in an integrated contingency plan, the changes do not trigger the need for a RCRA permit modification.

(c) The plan shall describe arrangements agreed to by local police departments, fire departments, hospitals, contractors, and State and local emergency response teams to coordinate emergency services, pursuant to Section R315-265-37.

(d) The plan shall list names, addresses, and phone numbers, office and home, of all persons qualified to act as emergency coordinator, see Section R315-265-55, and this list shall be kept up to date. Where more than one person is listed, one shall be named as primary emergency coordinator and others shall be listed in the order in which they will assume responsibility as alternates.

(e) The plan shall include a list of all emergency equipment at the facility, such as fire extinguishing systems, spill control equipment, communications and alarm systems,

internal and external, and decontamination equipment, where this equipment is required. This list shall be kept up to date. In addition, the plan shall include the location and a physical description of each item on the list, and a brief outline of its capabilities.

(f) The plan shall include an evacuation plan for facility personnel where there is a possibility that evacuation could be necessary. This plan shall describe signal(s) to be used to begin evacuation, evacuation routes, and alternate evacuation routes, in cases where the primary routes could be blocked by releases of hazardous waste or fires.

R315-265-53. Contingency Plan and Emergency Procedures -- Copies of Contingency Plan.

A copy of the contingency plan and all revisions to the plan shall be:

(a) Maintained at the facility; and

(b) Submitted to all local police departments, fire departments, hospitals, and State and local emergency response teams that may be called upon to provide emergency services.

R315-265-54. Contingency Plan and Emergency Procedures --Amendment of Contingency Plan.

The contingency plan shall be reviewed, and immediately amended, if necessary, whenever:

(a) Applicable regulations are revised;

(b) The plan fails in an emergency;

(c) The facility changes-in its design, construction, operation, maintenance, or other circumstances-in a way that materially increases the potential for fires, explosions, or releases of hazardous waste or hazardous waste constituents, or changes the response necessary in an emergency;

(d) The list of emergency coordinators changes; or

(e) The list of emergency equipment changes.

R315-265-55. Contingency Plan and Emergency Procedures --Emergency Coordinator.

At all times, there shall be at least one employee either on the facility premises or on call, i.e., available to respond to an emergency by reaching the facility within a short period of time, with the responsibility for coordinating all emergency response measures. This emergency coordinator shall be thoroughly familiar with all aspects of the facility's contingency plan, all operations and activities at the facility, the location and characteristics of waste handled, the location of all records within the facility, and the facility layout. In addition, this person shall have the authority to commit the resources needed to carry out the contingency plan. Comment: The emergency coordinator's responsibilities are more fully spelled out in Section R315-265-56. Applicable responsibilities for the emergency coordinator vary, depending on factors such as type and variety of waste(s) handled by the facility, and type and complexity of the facility.

R315-265-56. Contingency Plan and Emergency Procedures --Emergency Procedures.

(a) Whenever there is an imminent or actual emergency situation, the emergency coordinator, or his designee when the emergency coordinator is on call, shall immediately:

(1) Activate internal facility alarms or communication systems, where applicable, to notify all facility personnel; and

(2) Notify appropriate State or local agencies with designated response roles if their help is needed.

(b) Whenever there is a release, fire, or explosion, the emergency coordinator shall immediately identify the character, exact source, amount, and areal extent of any released materials. He may do this by observation or review of facility records or manifests and, if necessary, by chemical analysis.

(c) Concurrently, the emergency coordinator shall assess possible hazards to human health or the environment that may result from the release, fire, or explosion. This assessment shall consider both direct and indirect effects of the release, fire, or explosion, for example, the effects of any toxic, irritating, or asphyxiating gases that are generated, or the effects of any hazardous surface water run-offs from water or chemical agents used to control fire and heat-induced explosions.

(d) If the emergency coordinator determines that the facility has had a release, fire, or explosion which could threaten human health, or the environment, outside the facility, he shall report his findings as follows:

(1) If his assessment indicates that evacuation of local areas may be advisable, he shall immediately notify appropriate local authorities. He shall be available to help appropriate officials decide whether local areas should be evacuated; and

(2) He shall immediately notify the Utah Department of Environmental Quality as specified in Section R315-263-30 and either the government official designated as the on-scene coordinator for that geographical area, or the National Response Center, using their 24-hour toll free number 800/424-8802. The report shall include:

(i) Name and telephone number of reporter;

(ii) Name and address of facility;

(iii) Time and type of incident, for example, release, fire;

(iv) Name and quantity of material(s) involved, to the extent known;

(v) The extent of injuries, if any; and

(vi) The possible hazards to human health, or the environment, outside the facility.

(e) During an emergency, the emergency coordinator shall take all reasonable measures necessary to ensure that fires, explosions, and releases do not occur, recur, or spread to other hazardous waste at the facility. These measures shall include, where applicable, stopping processes and operations, collecting and containing released waste, and removing or isolating containers.

(f) If the facility stops operations in response to a fire, explosion or release, the emergency coordinator shall monitor for leaks, pressure buildup, gas generation, or ruptures in valves, pipes, or other equipment, wherever this is appropriate.

(g) Immediately after an emergency, the emergency coordinator shall provide for treating, storing, or disposing of recovered waste, contaminated soil or surface water, or any other material that results from a release, fire, or explosion at the facility.

Comment: Unless the owner or operator can demonstrate, in accordance with Subsections R315-261-3(c) or (d), that the recovered material is not a hazardous waste, the owner or operator becomes a generator of hazardous waste and shall manage it in accordance with all applicable requirements of Rules R315-262, R315-263, and R315-265.

(h) The emergency coordinator shall ensure that, in the affected area(s) of the facility:

(1) No waste that may be incompatible with the released material is treated, stored, or disposed of until cleanup procedures are completed; and

(2) All emergency equipment listed in the contingency plan is cleaned and fit for its intended use before operations are resumed.

(i) The owner or operator shall note in the operating record the time, date, and details of any incident that requires implementing the contingency plan. Within 15 days after the incident, he shall submit a written report on the incident to the Director. The report shall include:

(1) Name, address, and telephone number of the owner or operator;

(2) Name, address, and telephone number of the facility;

(3) Date, time, and type of incident, for example, fire, explosion;

(4) Name and quantity of material(s) involved;
(5) The extent of injuries, if any;
(6) An assessment of actual or potential hazards to human health or the environment, where this is applicable; and
(7) Estimated quantity and disposition of recovered material that resulted from the incident.

R315-265-70. Manifest System, Recordkeeping, and Reporting --Applicability.

(a) The regulations in R315-265-70 through R315-265-77 apply to owners and operators of both on-site and off-site facilities, except as Section R315-265-1 provides otherwise. Sections R315-265-71, R315-265-72, and R315-265-76 do not apply to owners and operators of on-site facilities that do not receive any hazardous waste from off-site sources.

R315-265-71. Manifest System, Recordkeeping, and Reporting --Use of Manifest System.

(a)(1) If a facility receives hazardous waste accompanied by a manifest, the owner, operator or his/her agent shall sign and date the manifest as indicated in Subsection R315-265-71(a)(2) to certify that the hazardous waste covered by the manifest was received, that the hazardous waste was received except as noted in the discrepancy space of the manifest, or that the hazardous waste was rejected as noted in the manifest discrepancy space.

(2) If the facility receives a hazardous waste shipment accompanied by a manifest, the owner, operator, or his agent shall:

(i) Sign and date, by hand, each copy of the manifest;

(ii) Note any discrepancies, as defined in Subsection R315-265-72(a), on each copy of the manifest;

(iii) Immediately give the transporter at least one copy of the manifest;

(iv) Within 30 days of delivery, send a copy, Page 2, of the manifest to the generator;

(v) Paper manifest submission requirements are:

(A) Options for compliance on June 30, 2018. Beginning on June 30, 2018, send the top copy, Page 1, of any paper manifest and any paper continuation sheet to the e-Manifest system for purposes of data entry and processing, or in lieu of submitting the paper copy to EPA, the owner or operator may transmit to the EPA system an image file of Page 1 of the manifest and any continuation sheet, or both a data file and image file corresponding to Page 1 of the manifest and any continuation sheet, within 30 days of the date of delivery. Submissions of copies to the e-Manifest system shall be made at the mailing address or electronic mail/submission address specified at the e-Manifest program website's directory of services. Beginning on June 30, 2021, EPA will not accept mailed paper manifests from facilities for processing in e-Manifest.

(B) Options for compliance on June 30, 2021. Beginning on June 30, 2021, the requirement to submit the top copy, Page1, of the paper manifest and any paper continuation sheet to the e-Manifest system for purposes of data entry and processing may be met by the owner or operator only by transmitting to the EPA system an image file of Page 1 of the manifest and any continuation sheet, or by transmitting to the EPA system both a data file and the image file corresponding to Page 1 of the manifest and any continuation sheet, within 30 days of the date of delivery. Submissions of copies to the e-Manifest system shall be made to the electronic mail/submission address specified at the e-Manifest program website's directory of services; and

(vi) Retain at the facility a copy of each manifest for at least three years from the date of delivery.

(3) The owner or operator of a facility that receives hazardous waste subject to Sections R315-262-80 through 265-84 from a foreign source shall:

(i) Additionally list the relevant consent number from consent documentation supplied by EPA to the facility for each waste listed on the manifest, matched to the relevant list number for the waste from block 9b. If additional space is needed, the owner or operator should use a Continuation Sheet(s), EPA Form 8700-22A; and

(ii) Send a copy of the manifest to EPA using the addresses listed in Subsection R315-262-82(e) within 30 days of delivery until the facility can submit such a copy to the e-Manifest system per Subsection R315-265-71(a)(2)(v).

(b) If a facility receives, from a rail or water (bulk shipment) transporter, hazardous waste which is accompanied by a shipping paper containing all the information required on the manifest, excluding the EPA identification numbers, generator's certification, and signatures, the owner or operator, or his agent, shall:

(1) Sign and date each copy of the manifest or shipping paper, if the manifest has not been received, to certify that the hazardous waste covered by the manifest or shipping paper was received;

(2) Note any significant discrepancies, as defined in Subsection R315-265-72(a), in the manifest or shipping paper, if the manifest has not been received, on each copy of the manifest or shipping paper;

Comment: The Director does not intend that the owner or operator of a facility whose procedures under Subsection R315-265-13(c) include waste analysis shall perform that analysis before signing the shipping paper and giving it to the transporter. Subsection R315-265-72(b), however, requires reporting an unreconciled discrepancy discovered during later analysis.

(3) Immediately give the rail or water (bulk shipment) transporter at least one copy of the manifest or shipping paper, if the manifest has not been received;

(4) Within 30 days after the delivery, send a copy of the signed and dated manifest or a signed and dated copy of the shipping paper, if the manifest has not been received within 30 days after delivery, to the generator; and

Comment: Subsection R315-262-23(c) requires the generator to send three copies of the manifest to the facility when hazardous waste is sent by rail or water (bulk shipment).

(5) Retain at the facility a copy of the manifest and shipping paper, if signed in lieu of the manifest at the time of delivery, for at least three years from the date of delivery.

(c) Whenever a shipment of hazardous waste is initiated from a facility, the owner or operator of that facility shall comply with the requirements of Rule R315-262. The provisions of Sections R315-262-15, R315-262-16, and R315-262-17 are applicable to the on-site accumulation of hazardous wastes by generators. Therefore, the provisions of Sections R315-262-15, R315-262-16, and R315-262-17 only apply to owners or operators who are shipping hazardous waste which they generated at that facility or operating as a large quantity generator consolidating hazardous waste from very small quantity generators under Subsection R315-262-17(f).

Comment: The provisions of Section R315-262-34 are applicable to the on-site accumulation of hazardous wastes by generators. Therefore, the provisions of Section R315-262-34 only apply to owners or operators who are shipping hazardous waste which they generated at that facility.

(d) As per Subsection R315-262-84(d)(2)(xv), within three working days of the receipt of a shipment subject to Sections R315-262-80 through 262-84, the owner or operator of a facility shall provide a copy of the movement document bearing all required signatures to the foreign exporter; to the competent authorities of the countries of export and transit that control the shipment as an export and transit shipment of hazardous waste respectively; and on or after the electronic import-export reporting compliance date, to EPA electronically using EPA's

Waste Import Export Tracking System (WIETS), or its successor system. The original copy of the movement document shall be maintained at the facility for at least three years from the date of signature. The owner or operator of a facility may satisfy this recordkeeping requirement by retaining electronically submitted documents in the facility's account on EPA's Waste Import Export Tracking System (WIETS), or its successor system, provided that copies are readily available for viewing and production if requested by any EPA or Utah inspector. No owner or operator of a facility may be held liable for the inability to produce the documents for inspection under this section if the owner or operator of a facility can demonstrate that the inability to produce the document is due exclusively to technical difficulty with EPA's Waste Import Export Tracking System (WIETS), or its successor system, for which the owner or operator of a facility bears no responsibility.

(e) A facility shall determine whether the consignment state for a shipment regulates any additional wastes, beyond those regulated Federally, as hazardous wastes under its state hazardous waste program. Facilities shall also determine whether the consignment state or generator state requires the facility to submit any copies of the manifest to these states.

(f) Legal equivalence to paper manifests. Electronic manifests that are obtained, completed, and transmitted in accordance with Subsection R315-262-20(a)(3), and used in accordance with this Section R315-265-71 in lieu of the paper manifest form are the legal equivalent of paper manifest forms bearing handwritten signatures, and satisfy for all purposes any requirement in these regulations to obtain, complete, sign, provide, use, or retain a manifest.

(1) Any requirement in these regulations for the owner or operator of a facility to sign a manifest or manifest certification by hand, or to obtain a handwritten signature, is satisfied by signing with or obtaining a valid and enforceable electronic signature within the meaning of Section R315-262-25.

(2) Any requirement in these regulations to give, provide, send, forward, or to return to another person a copy of the manifest is satisfied when a copy of an electronic manifest is transmitted to the other person.

(3) Any requirement in these regulations for a manifest to accompany a hazardous waste shipment is satisfied when a copy of an electronic manifest is accessible during transportation and forwarded to the person or persons who are scheduled to receive delivery of the hazardous waste shipment.

(4) Any requirement in these regulations for an owner or operator to keep or retain a copy of each manifest is satisfied by the retention of the facility's electronic manifest copies in its account on the e-Manifest system, provided that such copies are readily available for viewing and production if requested by any EPA or Utah inspector.

(5) No owner or operator may be held liable for the inability to produce an electronic manifest for inspection under this Section R315-265-71 if the owner or operator can demonstrate that the inability to produce the electronic manifest is due exclusively to a technical difficulty with the EPA system for which the owner or operator bears no responsibility.

(g) An owner or operator may participate in the electronic manifest system either by accessing the electronic manifest system from the owner's or operator's electronic equipment, or by accessing the electronic manifest system from portable equipment brought to the owner's or operator's site by the transporter who delivers the waste shipment to the facility

(h) Special procedures applicable to replacement manifests. If a facility receives hazardous waste that is accompanied by a paper replacement manifest for a manifest that was originated electronically, the following procedures apply to the delivery of the hazardous waste by the final transporter:

(1) Upon delivery of the hazardous waste to the designated facility, the owner or operator shall sign and date each copy of the paper replacement manifest by hand in Item 20, Designated Facility Certification of Receipt, and note any discrepancies in Item 18, Discrepancy Indication Space, of the replacement manifest,

(2) The owner or operator of the facility shall give back to the final transporter one copy of the paper replacement manifest,

(3) Within 30 days of delivery of the hazardous waste to the designated facility, the owner or operator of the facility shall send one signed and dated copy of the paper replacement manifest to the generator, and send an additional signed and dated copy of the paper replacement manifest to the EPA e-Manifest system, and

(4) The owner or operator of the facility shall retain at the facility one copy of the paper replacement manifest for at least three years from the date of delivery.

(i) Special procedures applicable to electronic signature methods undergoing tests. If an owner or operator using an electronic manifest signs this manifest electronically using an electronic signature method which is undergoing pilot or demonstration tests aimed at demonstrating the practicality or legal dependability of the signature method, then the owner or operator shall also sign with an ink signature the facility's certification of receipt or discrepancies on the printed copy of the manifest provided by the transporter. Upon executing its ink signature on this printed copy, the owner or operator shall retain this original copy among its records for at least three years from the date of delivery of the waste.

(j) Imposition of user fee for electronic manifest use.

(1) As prescribed in 40 CFR 265.1311, and determined in 40 CFR 265.1312, which are adopted and incorporated by reference, an owner or operator who is a user of the electronic manifest system shall be assessed a user fee by EPA for the submission and processing of each electronic and paper manifest. EPA shall update the schedule of user fees and publish them to the user community, as provided in 40 CFR 265.1313, which is adopted and incorporated by reference.

(2) An owner or operator subject to user fees under Section R315-265-71 shall make user fee payments in accordance with the requirements of 40 CFR 265.1314, subject to the informal fee dispute resolution process of 40 CFR 265.1316, and subject to the sanctions for delinquent payments under 40 CFR 265.1315, which are adopted and incorporated by reference.

(k) Electronic manifest signatures.

(1) Electronic manifest signatures shall meet the criteria described in Section R315-262-25.

(l) Post-receipt manifest data corrections. After facilities have certified to the receipt of hazardous wastes by signing Item 20 of the manifest, any post-receipt data corrections may be submitted at any time by any interested person, for example, waste handler, shown on the manifest.

(1) Interested persons shall make all corrections to manifest data by electronic submission, either by directly entering corrected data to the web based service provided in e-Manifest for such corrections, or by an upload of a data file containing data corrections relating to one or more previously submitted manifests.

(2) Each correction submission shall include the following information:

(i) The Manifest Tracking Number and date of receipt by the facility of the original manifest(s) for which data are being corrected;

(ii) The Item Number(s) of the original manifest that is the subject of the submitted correction(s); and

(iii) For each Item Number with corrected data, the data previously entered and the corresponding data as corrected by the correction submission.

(3) Each correction submission shall include a statement that the person submitting the corrections certifies that to the

best of his or her knowledge or belief, the corrections that are included in the submission will cause the information reported about the previously received hazardous wastes to be true, accurate, and complete.

(i) The certification statement shall be executed with a valid electronic signature; and

(ii) A batch upload of data corrections may be submitted under one certification statement.

(4) Upon receipt by the system of any correction submission, other interested persons shown on the manifest will be provided electronic notice of the submitter's corrections.

(5) Other interested persons shown on the manifest may respond to the submitter's corrections with comments to the submitter, or by submitting another correction to the system, certified by the respondent as specified in Subsection R315-265-71(l)(3), and with notice of the corrections to other interested persons shown on the manifest.

R315-265-72. Manifest System, Recordkeeping, and Reporting -- Manifest Discrepancies.

(a) Manifest discrepancies are:

(1) Significant differences, as defined by Subsection R315-265-72(b), between the quantity or type of hazardous waste designated on the manifest or shipping paper, and the quantity and type of hazardous waste a facility actually receives;

(2) Rejected wastes, which may be a full or partial shipment of hazardous waste that the TSDF cannot accept; or

(3) Container residues, which are residues that exceed the quantity limits for "empty" containers set forth in Subsection R315-261-7(b).

(b) Significant differences in quantity are: For bulk waste, variations greater than 10 percent in weight; for batch waste, any variation in piece count, such as a discrepancy of one drum in a truckload. Significant differences in type are obvious differences which can be discovered by inspection or waste analysis, such as waste solvent substituted for waste acid, or toxic constituents not reported on the manifest or shipping paper.

(c) Upon discovering a significant difference in quantity or type, the owner or operator shall attempt to reconcile the discrepancy with the waste generator or transporter, for example, with telephone conversations. If the discrepancy is not resolved within 15 days after receiving the waste, the owner or operator shall immediately submit to the Director a letter describing the discrepancy and attempts to reconcile it, and a copy of the manifest or shipping paper at issue.

(d)(1) Upon rejecting waste or identifying a container residue that exceeds the quantity limits for "empty" containers set forth in Subsection R315-261-7(b), the facility shall consult with the generator prior to forwarding the waste to another facility that can manage the waste. If it is impossible to locate an alternative facility that can receive the waste, the facility may return the rejected waste or residue to the generator. The facility shall send the waste to the alternative facility or to the generator within 60 days of the rejection or the container residue identification.

(2) While the facility is making arrangements for forwarding rejected wastes or residues to another facility under this Section R315-265-72, it shall ensure that either the delivering transporter retains custody of the waste, or the facility shall provide for secure, temporary custody of the waste, pending delivery of the waste to the first transporter designated on the manifest prepared under Subsections R315-265-72(e) or (f).

(e) Except as provided in Subsection R315-265-72(e)(7), for full or partial load rejections and residues that are to be sent off-site to an alternate facility, the facility is required to prepare a new manifest in accordance with Subsection R315-262-20(a) and the following instructions:

(1) Write the generator's U.S. EPA ID number in Item 1 of the new manifest. Write the generator's name and mailing address in Item 5 of the new manifest. If the mailing address is different from the generator's site address, then write the generator's site address in the designated space in Item 5.

(2) Write the name of the alternate designated facility and the facility's U.S. EPA ID number in the designated facility block, Item 8, of the new manifest.

(3) Copy the manifest tracking number found in Item 4 of the old manifest to the Special Handling and Additional Information Block of the new manifest, and indicate that the shipment is a residue or rejected waste from the previous shipment.

(4) Copy the manifest tracking number found in Item 4 of the new manifest to the manifest reference number line in the Discrepancy Block of the old manifest, Item 18a.

(5) Write the DOT description for the rejected load or the residue in Item 9, U.S. DOT Description, of the new manifest and write the container types, quantity, and volume(s) of waste.

(6) Sign the Generator's/Offeror's Certification to certify, as offeror of the shipment, that the waste has been properly packaged, marked and labeled and is in proper condition for transportation.

(7) For full load rejections that are made while the transporter remains at the facility, the facility may return the shipment to the generator with the original manifest by completing Item 18a and 18b of the manifest and supplying the generator's information in the Alternate Facility space. The facility shall retain a copy for its records and then give the remaining copies of the manifest to the transporter to accompany the shipment. If the original manifest is not used, then the facility shall use a new manifest and comply with Subsections R315-265-72(f)(1), (2), (3), (4), (5), (6), and (8).

(8) For full or partial load rejections and container residues contained in non-empty containers that are returned to the generator, the facility shall also comply with the exception reporting requirements in Subsection R315-262-42(a).

(g) If a facility rejects a waste or identifies a container residue that exceeds the quantity limits for "empty" containers set forth in Subsection R315-261-7(b) after it has signed, dated, and returned a copy of the manifest to the delivering transporter or to the generator, the facility shall amend its copy of the manifest to indicate the rejected wastes or residues in the discrepancy space of the amended manifest. The facility shall also copy the manifest tracking number from Item 4 of the new manifest to the discrepancy space of the amended manifest, and shall re-sign and date the manifest to certify to the information as amended. The facility shall retain the amended manifest for at least three years from the date of amendment, and shall within 30 days, send a copy of the amended manifest to the transporter and generator that received copies prior to their being amended.

R315-265-73. Manifest System, Recordkeeping, and Reporting -- Operating Record.

(a) The owner or operator shall keep a written operating record at his facility.

(b) The following information shall be recorded, as it becomes available, and maintained in the operating record for three years unless noted below:

(1) A description and the quantity of each hazardous waste received, and the method(s) and date(s) of its treatment, storage, or disposal at the facility as required by Appendix I to 40 CFR part 265, which is adopted and incorporated by reference. This information shall be maintained in the operating record until closure of the facility;

(2) The location of each hazardous waste within the facility and the quantity at each location. For disposal facilities, the location and quantity of each hazardous waste shall be recorded on a map or diagram of each cell or disposal area. For

all facilities, this information shall include cross-references to manifest document numbers if the waste was accompanied by a manifest. This information shall be maintained in the operating record until closure of the facility;

Comment: See Section R315-265-119, 40 CFR 265.279, and 40 CFR 265.309, which are adopted and incorporated by reference, for related requirements.

(3) Records and results of waste analysis, waste determinations, and trial tests performed as specified in Sections R315-265-13, R315-265-200, R315-265-225, R315-265-252, 40 CFR 265.273, 265.314, 265.341, 265.375, 265.402, 265.1034, 265.1063, 265.1084, which are adopted and incorporated by reference, Subsection R315-268-4(a), and Section R315-268-7.

(4) Summary reports and details of all incidents that require implementing the contingency plan as specified in Subsection R315-265-56(j);

(5) Records and results of inspections as required by Subsection R315-265-15(d), except these data need be kept only three years;

(6) Monitoring, testing or analytical data, and corrective action where required by Sections R315-265-90 through 265-94 and by Sections R315-265-19, R315-265-94, R315-265-191, R315-265-193, R315-265-195, R315-265-224, R315-265-226, R315-265-255, R315-265-260, 40 CFR 265.276, 265.278, 265.280(d)(1), 265.302, 265.304, 265.347, 265.377, 265.1034(c) through 265.1034(f), 265.1035, 265.1063(d) through 265. 265.1063(i), 265.1064, and 265.1083 through 265.1090, which are adopted and incorporated by reference. Maintain in the operating record for three years, except for records and results pertaining to ground-water monitoring and cleanup, and response action plans for surface impoundments, waste piles, and landfills, which shall be maintained in the operating record until closure of the facility.

Comment: As required by Section R315-265-94, monitoring data at disposal facilities shall be kept throughout the post-closure period.

(7) All closure cost estimates under Section R315-265-142 and, for disposal facilities, all post-closure cost estimates under Section R315-265-144 shall be maintained in the operating record until closure of the facility.

(8) Records of the quantities, and date of placement, for each shipment of hazardous waste placed in land disposal units under an extension to the effective date of any land disposal restriction granted pursuant to Section R315-268-5, monitoring data required pursuant to a petition under Section R315-268-6, or a certification under Section R315-268-8, and the applicable notice required by a generator under Subsection R315-268-7(a). All of this information shall be maintained in the operating record until closure of the facility.

(9) For an off-site treatment facility, a copy of the notice, and the certification and demonstration if applicable, required by the generator or the owner or operator under Sections R315-268-7 or R315-268-8;

(10) For an on-site treatment facility, the information contained in the notice, except the manifest number, and the certification and demonstration if applicable, required by the generator or the owner or operator under Sections R315-268-7 or R315-268-8;

(11) For an off-site land disposal facility, a copy of the notice, and the certification and demonstration if applicable, required by the generator or the owner or operator of a treatment facility under Sections R315-268-7 or R315-268-8;

(12) For an on-site land disposal facility, the information contained in the notice, except the manifest number, and the certification and demonstration if applicable, required by the generator or the owner or operator of a treatment facility under Sections R315-268-7 or R315-268-8.

(13) For an off-site storage facility, a copy of the notice, and the certification and demonstration if applicable, required by the generator or the owner or operator under Sections R315-268-7 or R315-268-8; and

(14) For an on-site storage facility, the information contained in the notice, except the manifest number, and the certification and demonstration if applicable, required by the generator or the owner or operator of a treatment facility under Sections R315-268-7 or R315-268-8.

(15) Monitoring, testing or analytical data, and corrective action where required by Section R315-265-90, Subsections R315-265-93(d)(2), and R315-265-93(d)(5), and the certification as required by Subsection R315-265-196(f) shall be maintained in the operating record until closure of the facility.

R315-265-74. Manifest System, Recordkeeping, and Reporting -- Availability, Retention, and Dispostion of Records.

(a) All records, including plans, required under Rule R315-265 shall be furnished upon request, and made available at all reasonable times for inspection, by any officer, employee, or representative of the Director.

(b) The retention period for all records required under Rule R315-265 is extended automatically during the course of any unresolved enforcement action regarding the facility or as requested by the Director.

(c) A copy of records of waste disposal locations and quantities under Subsection R315-265-73(b)(2) shall be submitted to the Director and local land authority upon closure of the facility, see Section R315-265-119.

R315-265-75. Manifest System, Recordkeeping, and Reporting -- Biennial Report.

The owner or operator shall complete and submit EPA Form 8700-13 A/B to the Director by March 1 of the following even numbered year and shall cover activities during the previous year.

R315-265-76. Manifest System, Recordkeeping, and Reporting -- Unmanifested Waste Report.

(a) If a facility accepts for treatment, storage, or disposal any hazardous waste from an off-site source without an accompanying manifest, or without an accompanying shipping paper as described by Subsection R315-263-20(e), and if the waste is not excluded from the manifest requirement by Rules R315-260 through R315-266, R315-268, R315-270 or R315-273, then the owner or operator shall prepare and submit a letter to the Director within fifteen days after receiving the waste. The unmanifested waste report shall contain the following information:

(1) The EPA identification number, name and address of the facility;

(2) The date the facility received the waste;

(3) The EPA identification number, name and address of the generator and the transporter, if available;

(4) A description and the quantity of each unmanifested hazardous waste the facility received;

(5) The method of treatment, storage, or disposal for each hazardous waste;

(6) The certification signed by the owner or operator of the facility or his authorized representative; and

(7) A brief explanation of why the waste was unmanifested, if known.

R315-265-77. Manifest System, Recordkeeping, and Reporting -- Additional Reports.

In addition to submitting the biennial report and unmanifested waste reports described in Sections R315-265-75 and 265-76, the owner or operator shall also report to the Director:

(a) Releases, fires, and explosions as specified in Subsection R315-265-56(j);

(b) Ground-water contamination and monitoring data as specified in Sections R315-265-93 and R315-265-94; and

(c) Facility closure as specified in Section R315-265-115.

(d) As otherwise required by 40 CFR 265 Subparts AA, BB, and CC, which are adopted and incorporated by reference.

R315-265-90. Ground-Water Monitoring - Applicability.

(a) Within one year after the effective date of these regulations, the owner or operator of a surface impoundment, landfill, or land treatment facility which is used to manage hazardous waste shall implement a ground-water monitoring program capable of determining the facility's impact on the quality of ground water in the uppermost aquifer underlying the facility, except as Section R315-265-1 and Subsection R315-265-90(c) provide otherwise.

(b) Except as Subsections R315-265-90(c) and (d) provide otherwise, the owner or operator shall install, operate, and maintain a ground-water monitoring system which meets the requirements of Section R315-265-91, and shall comply with Sections R315-265-92 through 265-94. This ground-water monitoring program shall be carried out during the active life of the facility, and for disposal facilities, during the post-closure care period as well.

(c) All or part of the ground-water monitoring requirements of Sections R315-265-90 through 265-94 may be waived if the owner or operator can demonstrate that there is a low potential for migration of hazardous waste or hazardous waste constituents from the facility via the uppermost aquifer to water supply wells, domestic, industrial, or agricultural, or to surface water. This demonstration shall be in writing, and shall be kept at the facility. This demonstration shall be certified by a qualified geologist or geotechnical engineer and shall establish the following:

(1) The potential for migration of hazardous waste or hazardous waste constituents from the facility to the uppermost aquifer, by an evaluation of:

(i) A water balance of precipitation, evapotranspiration, runoff, and infiltration; and

(ii) Unsaturated zone characteristics, i.e., geologic materials, physical properties, and depth to ground water; and

(2) The potential for hazardous waste or hazardous waste constituents which enter the uppermost aquifer to migrate to a water supply well or surface water, by an evaluation of:

(i) Saturated zone characteristics, i.e., geologic materials, physical properties, and rate of ground-water flow; and

(ii) The proximity of the facility to water supply wells or surface water.

(d) If an owner or operator assumes, or knows, that ground-water monitoring of indicator parameters in accordance with Sections R315-265-91 and 265-92 would show statistically significant increases, or decreases in the case of pH, when evaluated under Subsection R315-265-93(b), he may install, operate, and maintain an alternate ground-water monitoring system, other than the one described in Sections R315-265-91 and 265-92. If the owner or operator decides to use an alternate ground-water monitoring system he shall:

(1) Within one year after the effective date of these regulations, develop a specific plan, certified by a qualified geologist or geotechnical engineer, which satisfies the requirements of Subsection R315-265-93(d)(3), for an alternate ground-water monitoring system. This plan is to be placed in the facility's operating record and maintained until closure of the facility.

(2) Not later than one year after the effective date of these regulations, initiate the determinations specified in Subsection R315-265-93(d)(4);

(3) Prepare a report in accordance with Subsection R315-265-93(d)(5) and place it in the facility's operating record and maintain until closure of the facility.

(4) Continue to make the determinations specified in Subsection R315-265-93(d)(4) on a quarterly basis until final closure of the facility; and

(5) Comply with the recordkeeping and reporting requirements in Subsection R315-265-94(b).

(e) The ground-water monitoring requirements of this Sections R315-265-90 through 265-94 may be waived with respect to any surface impoundment that (1) Is used to neutralize wastes which are hazardous solely because they exhibit the corrosivity characteristic under Section R315-261-22 or are listed as hazardous wastes in Sections R315-261-30 through 261-35 only for this reason, and (2) contains no other hazardous wastes, if the owner or operator can demonstrate that there is no potential for migration of hazardous wastes from the impoundment. The demonstration shall establish, based upon consideration of the characteristics of the wastes and the impoundment, that the corrosive wastes will be neutralized to the extent that they no longer meet the corrosivity characteristic before they can migrate out of the impoundment. The demonstration shall be in writing and shall be certified by a qualified professional.

(f) The Director may replace all or part of the requirements of Sections R315-265-90 through 265-94 applying to a regulated unit, as defined in Section R315-264-90, with alternative requirements developed for groundwater monitoring set out in an approved closure or post-closure plan or in an enforceable document, as defined in Subsection R315-270-1(c)(7), where the Director determines that:

(1) A regulated unit is situated among solid waste management units, or areas of concern, a release has occurred, and both the regulated unit and one or more solid waste management unit(s), or areas of concern, are likely to have contributed to the release; and

(2) It is not necessary to apply the requirements of Sections R315-265-90 through 265-94 because the alternative requirements will protect human health and the environment. The alternative standards for the regulated unit shall meet the requirements of Subsection R315-264-101(a).

R315-265-91. Ground-Water Monitoring -- Ground-Water Monitoring System.

(a) A ground-water monitoring system shall be capable of yielding ground-water samples for analysis and shall consist of:

(1) Monitoring wells, at least one, installed hydraulically upgradient, i.e., in the direction of increasing static head, from the limit of the waste management area. Their number, locations, and depths shall be sufficient to yield ground-water samples that are:

(i) Representative of background ground-water quality in the uppermost aquifer near the facility; and

(ii) Not affected by the facility; and

(2) Monitoring wells, at least three, installed hydraulically downgradient, i.e., in the direction of decreasing static head, at the limit of the waste management area. Their number, locations, and depths shall ensure that they immediately detect any statistically significant amounts of hazardous waste or hazardous waste constituents that migrate from the waste management area to the uppermost aquifer.

(3) The facility owner or operator may demonstrate that an alternate hydraulically downgradient monitoring well location will meet the criteria outlined below. The demonstration shall be in writing and kept at the facility. The demonstration shall be certified by a qualified ground-water scientist and establish that:

(i) An existing physical obstacle prevents monitoring well installation at the hydraulically downgradient limit of the waste management area; and

(ii) The selected alternate downgradient location is as close to the limit of the waste management area as practical; and

(iii) The location ensures detection that, given the alternate location, is as early as possible of any statistically significant amounts of hazardous waste or hazardous waste constituents that migrate from the waste management area to the uppermost aquifer.

(iv) Lateral expansion, new, or replacement units are not eligible for an alternate downgradient location under Section R315-265-91.

(b) Separate monitoring systems for each waste management component of a facility are not required provided that provisions for sampling upgradient and downgradient water quality will detect any discharge from the waste management area.

(1) In the case of a facility consisting of only one surface impoundment, landfill, or land treatment area, the waste management area is described by the waste boundary, perimeter.

(2) In the case of a facility consisting of more than one surface impoundment, landfill, or land treatment area, the waste management area is described by an imaginary boundary line which circumscribes the several waste management components.

(c) All monitoring wells shall be cased in a manner that maintains the integrity of the monitoring well bore hole. This casing shall be screened or perforated, and packed with gravel or sand where necessary, to enable sample collection at depths where appropriate aquifer flow zones exist. The annular space, i.e., the space between the bore hole and well casing, above the sampling depth shall be sealed with a suitable material, for example, cement grout or bentonite slurry, to prevent contamination of samples and the ground water.

R315-265-92. Ground-Water Monitoring -- Sampling and Analysis.

(a) The owner or operator shall obtain and analyze samples from the installed ground-water monitoring system. The owner or operator shall develop and follow a ground-water sampling and analysis plan. He shall keep this plan at the facility. The plan shall include procedures and techniques for:

(1) Sample collection;

(2) Sample preservation and shipment;

(3) Analytical procedures; and

(4) Chain of custody control.

Comment: See "Procedures Manual For Ground-water Monitoring At Solid Waste Disposal Facilities," EPA-530/SW-611, August 1977 and "Methods for Chemical Analysis of Water and Wastes," EPA-600/4-79-020, March 1979 for discussions of sampling and analysis procedures.

(b) The owner or operator shall determine the concentration or value of the following parameters in ground-water samples in accordance with Subsections R315-265-92(c) and (d):

(1) Parameters characterizing the suitability of the ground water as a drinking water supply, as specified in Appendix III to 40 CFR 265, which is adopted and incorporated by reference.

(2) Parameters establishing ground-water quality:

(i) Chloride

(ii) Iron

(iii) Manganese

(iv) Phenols

(v) Sodium

(vi) Sulfate

Comment: These parameters are to be used as a basis for comparison in the event a ground-water quality assessment is required under Subsection R315-265-93(d).

(3) Parameters used as indicators of ground-water contamination:

(i) pH

(ii) Specific Conductance

(iii) Total Organic Carbon

(iv) Total Organic Halogen

(c)(1) For all monitoring wells, the owner or operator shall establish initial background concentrations or values of all parameters specified in Subsection R315-265-92(b). He shall do this quarterly for one year.

(2) For each of the indicator parameters specified in Subsection R315-265-92(b)(3), at least four replicate measurements shall be obtained for each sample and the initial background arithmetic mean and variance shall be determined by pooling the replicate measurements for the respective parameter concentrations or values in samples obtained from upgradient wells during the first year.

(d) After the first year, all monitoring wells shall be sampled and the samples analyzed with the following frequencies:

(1) Samples collected to establish ground-water quality shall be obtained and analyzed for the parameters specified in Subsection R315-265-92(b)(2) at least annually.

(2) Samples collected to indicate ground-water contamination shall be obtained and analyzed for the parameters specified in Subsection R315-265-92(b)(3) at least semi-annually.

(e) Elevation of the ground-water surface at each monitoring well shall be determined each time a sample is obtained.

R315-265-93. Ground-Water Monitoring -- Preparation, Evaluation, and Response.

(a) Within one year after the effective date of these regulations, the owner or operator shall prepare an outline of a ground-water quality assessment program. The outline shall describe a more comprehensive ground-water monitoring program, than that described in Sections R315-265-91 and 265-92, capable of determining:

(1) Whether hazardous waste or hazardous waste constituents have entered the ground water;

(2) The rate and extent of migration of hazardous waste or hazardous waste constituents in the ground water; and

(3) The concentrations of hazardous waste or hazardous waste constituents in the ground water.

(b) For each indicator parameter specified in Subsection R315-265-92(b)(3), the owner or operator shall calculate the arithmetic mean and variance, based on at least four replicate measurements on each sample, for each well monitored in accordance with Subsection R315-265-92(d)(2), and compare these results with its initial background arithmetic mean. The comparison shall consider individually each of the wells in the monitoring system, and shall use the Student's t-test at the 0.01 level of significance, see Appendix IV to 40 CFR 265, which is adopted and incorporated by reference, to determine statistically significant increases, and decreases, in the case of pH, over initial background.

(c)(1) If the comparisons for the upgradient wells made under Subsection R315-265-93(b) show a significant increase, or pH decrease, the owner or operator shall submit this information in accordance with Subsection R315-265-94(a)(2)(ii).

(2) If the comparisons for downgradient wells made under Subsection R315-265-93(b) show a significant increase, or pH decrease, the owner or operator shall then immediately obtain additional ground-water samples from those downgradient wells where a significant difference was detected, split the samples in two, and obtain analyses of all additional samples to determine whether the significant difference was a result of laboratory error.

(d)(1) If the analyses performed under Subsection R315-265-93(c)(2) confirm the significant increase, or pH decrease, the owner or operator shall provide written notice to the

Director---within seven days of the date of such confirmation---that the facility may be affecting ground-water quality.

(2) Within 15 days after the notification under Subsection R315-265-93(d)(1), the owner or operator shall develop a specific plan, based on the outline required under Subsection R315-265-93(a) and certified by a qualified geologist or geotechnical engineer, for a ground-water quality assessment at the facility. This plan shall be placed in the facility operating record and be maintained until closure of the facility.

(3) The plan to be submitted under Subsection R315-265-90(d)(1) or Subsection R315-265-93(d)(2)shall specify:

(i) The number, location, and depth of wells;

(ii) Sampling and analytical methods for those hazardous wastes or hazardous waste constituents in the facility;

(iii) Evaluation procedures, including any use of previously-gathered ground-water quality information; and

(iv) A schedule of implementation.

(4) The owner or operator shall implement the ground-water quality assessment plan which satisfies the requirements of Subsection R315-265-93(d)(3), and, at a minimum, determine:

(i) The rate and extent of migration of the hazardous waste or hazardous waste constituents in the ground water; and

(ii) The concentrations of the hazardous waste or hazardous waste constituents in the ground water.

(5) The owner or operator shall make his first determination under Subsection R315-265-93(d)(4), as soon as technically feasible, and prepare a report containing an assessment of ground-water quality. This report shall be placed in the facility operating record and be maintained until closure of the facility.

(6) If the owner or operator determines, based on the results of the first determination under Subsection R315-265-93(d)(4), that no hazardous waste or hazardous waste constituents from the facility have entered the ground water, then he may reinstate the indicator evaluation program described in Section R315-265-92 and Subsection R315-265-93(b). If the owner or operator reinstates the indicator evaluation program, he shall so notify the Director in the report submitted under Subsection R315-265-93(d)(5).

(7) If the owner or operator determines, based on the first determination under Subsection R315-265-93(d)(4), that hazardous waste or hazardous waste constituents from the facility have entered the ground water, then he:

(i) Shall continue to make the determinations required under Subsection R315-265-93(d)(4) on a quarterly basis until final closure of the facility, if the ground-water quality assessment plan was implemented prior to final closure of the facility; or

(ii) May cease to make the determinations required under Subsection R315-265-93(d)(4), if the ground-water quality assessment plan was implemented during the post-closure care period.

(e) Notwithstanding any other provision of Sections R315-265-90 through R315-265-94, any ground-water quality assessment to satisfy the requirements of Subsection R315-265-93(d)(4) which is initiated prior to final closure of the facility shall be completed and reported in accordance with Subsection R315-265-93(d)(5).

(f) Unless the ground water is monitored to satisfy the requirements of Subsection R315-265-93(d)(4), at least annually the owner or operator shall evaluate the data on ground-water surface elevations obtained under Subsection R315-265-92(e) to determine whether the requirements under Subsection R315-265-91(a) for locating the monitoring wells continues to be satisfied. If the evaluation shows that Subsection R315-265-91(a) is no longer satisfied, the owner or operator shall immediately modify the number, location, or depth of the monitoring wells to bring the ground-water monitoring system into compliance with this requirement.

R315-265-94. Ground-Water Monitoring -- Recordkeeping and Reporting.

(a) Unless the ground water is monitored to satisfy the requirements of Subsection R315-265-93(d)(4), the owner or operator shall:

(1) Keep records of the analyses required in Subsections R315-265-92(c) and (d), the associated ground-water surface elevations required in Subsection R315-265-92(e), and the evaluations required in Subsection R315-265-93(b) throughout the active life of the facility, and, for disposal facilities, throughout the post-closure care period as well; and

(2) Report the following ground-water monitoring information to the Director:

(i) During the first year when initial background concentrations are being established for the facility: concentrations or values of the parameters listed in Subsection R315-265-92(b)(1) for each ground-water monitoring well within 15 days after completing each quarterly analysis. The owner or operator shall separately identify for each monitoring well any parameters whose concentration or value has been found to exceed the maximum contaminant levels listed in Appendix III to 40 CFR 265, which is adopted and incorporated by reference.

(ii) Annually: Concentrations or values of the parameters listed in Subsection R315-265-92(b)(3) for each ground-water monitoring well, along with the required evaluations for these parameters under Subsection R315-265-93(b). The owner or operator shall separately identify any significant differences from initial background found in the upgradient wells, in accordance with Subsection R315-265-93(c)(1). During the active life of the facility, this information shall be submitted no later than March 1 following each calendar year.

(iii) No later than March 1 following each calendar year: Results of the evaluations of ground-water surface elevations under Subsection R315-265-93(f), and a description of the response to that evaluation, where applicable.

(b) If the ground water is monitored to satisfy the requirements of Subsection R315-265-93(d)(4), the owner or operator shall:

(1) Keep records of the analyses and evaluations specified in the plan, which satisfies the requirements of Subsection R315-265-93(d)(3), throughout the active life of the facility, and, for disposal facilities, throughout the post-closure care period as well; and

(2) Annually, until final closure of the facility, submit to the Director a report containing the results of his or her ground-water quality assessment program which includes, but is not limited to, the calculated, or measured, rate of migration of hazardous waste or hazardous waste constituents in the ground water during the reporting period. This information shall be submitted no later than March 1 following each calendar year.

R315-265-110. Closure and Post-Closure -- Applicability.

Except as Section R315-265-1 provides otherwise:

(a) Sections R315-265-111 through 265-115, which concern closure, apply to the owners and operators of all hazardous waste management facilities; and

(b) Sections R315-265-116 through R315-265-120, which concern post-closure care, apply to the owners and operators of:

(1) All hazardous waste disposal facilities;

(2) Waste piles and surface impoundments for which the owner or operator intends to remove the wastes at closure to the extent that these sections are made applicable to such facilities in Sections R315-265-228 or R315-265-258;

(3) Tank systems that are required under Section R315-265-197 to meet requirements for landfills; and

(4) Containment buildings that are required under 40 CFR

265.1102, which is adopted and incorporated by reference, to meet the requirement for landfills.

(c) Section R315-265-121 applies to owners and operators of units that are subject to the requirements of Subsection R315-270-1(c)(7) and are regulated under an enforceable document, as defined in Subsection R315-270-1(c)(7).

(d) The Director may replace all or part of the requirements of Sections R315-265-110 through 265-121, and the unit-specific standards in Subsection R315-265-111(c), applying to a regulated unit, as defined in Section R315-264-90, with alternative requirements for closure set out in an approved closure or post-closure plan, or in an enforceable document, as defined in Subsection R315-270-1(c)(7), where the Director determines that:

(1) A regulated unit is situated among solid waste management units, or areas of concern, a release has occurred, and both the regulated unit and one or more solid waste management unit(s), or areas of concern, are likely to have contributed to the release, and

(2) It is not necessary to apply the closure requirements of Sections R315-265-110 through 265-121, those referenced herein, or both, because the alternative requirements will protect human health and the environment, and will satisfy the closure performance standard of Subsections R315-265-111(a) and (b).

R315-265-111. Closure and Post-Closure -- Closure Performance Standard.

The owner or operator shall close the facility in a manner that:

(a) Minimizes the need for further maintenance, and

(b) Controls, minimizes or eliminates, to the extent necessary to protect human health and the environment, post-closure escape of hazardous waste, hazardous constituents, leachate, contaminated run-off, or hazardous waste decomposition products to the ground or surface waters or to the atmosphere, and

(c) Complies with the closure requirements of Sections R315-110 through 121, including, but not limited to, the requirements of Sections R315-265-197, R315-265-228, R315-265-258, and 40 CFR 265.280, 265.310, 265.351, 265.381, 265.404, and 265.1102, which are adopted and incorporated by reference.

R315-265-112. Closure and Post-Closure -- Closure Plan; Amendment of Plan.

(a) Written plan. By May 19, 1981, or by six months after the effective date of the rule that first subjects a facility to provisions of Section R315-265-112, the owner or operator of a hazardous waste management facility shall have a written closure plan. Until final closure is completed and certified in accordance with Section R315-265-115, a copy of the most current plan shall be furnished to the Director upon request, including request by mail. In addition, for facilities without approved plans, it shall also be provided during site inspections, on the day of inspection, to any officer, employee, or representative of the Director who is duly designated by the Director.

(b) Content of plan. The plan shall identify steps necessary to perform partial, final, or both, closure of the facility at any point during its active life. The closure plan shall include, at least:

(1) A description of how each hazardous waste management unit at the facility will be closed in accordance with Section R315-265-111; and

(2) A description of how final closure of the facility will be conducted in accordance with Section R315-265-111. The description shall identify the maximum extent of the operation which will be unclosed during the active life of the facility; and

(3) An estimate of the maximum inventory of hazardous wastes ever on-site over the active life of the facility and a detailed description of the methods to be used during partial and final closure, including, but not limited to methods for removing, transporting, treating, storing or disposing of all hazardous waste, identification of and the type(s) of off-site hazardous waste management unit(s) to be used, if applicable; and

(4) A detailed description of the steps needed to remove or decontaminate all hazardous waste residues and contaminated containment system components, equipment, structures, and soils during partial and final closure including, but not limited to, procedures for cleaning equipment and removing contaminated soils, methods for sampling and testing surrounding soils, and criteria for determining the extent of decontamination necessary to satisfy the closure performance standard; and

(5) A detailed description of other activities necessary during the partial and final closure periods to ensure that all partial closures and final closure satisfy the closure performance standards, including, but not limited to, ground-water monitoring, leachate collection, and run-on and run-off control; and

(6) A schedule for closure of each hazardous waste management unit and for final closure of the facility. The schedule shall include, at a minimum, the total time required to close each hazardous waste management unit and the time required for intervening closure activities which will allow tracking of the progress of partial and final closure. For example, in the case of a landfill unit, estimates of the time required to treat or dispose of all hazardous waste inventory and of the time required to place a final cover shall be included.; and

(7) An estimate of the expected year of final closure for facilities that use trust funds to demonstrate financial assurance under Sections R315-265-143 or 265-145 and whose remaining operating life is less than twenty years, and for facilities without approved closure plans.

(8) For facilities where the Director has applied alternative requirements at a regulated unit under Subsections R315-265-90(f), R315-265-110(d), R315-265-140(d), or all three, either the alternative requirements applying to the regulated unit, or a reference to the enforceable document containing those alternative requirements.

(c) Amendment of plan. The owner or operator may amend the closure plan at any time prior to the notification of partial or final closure of the facility. An owner or operator with an approved closure plan shall submit a written request to the Director to authorize a change to the approved closure plan. The written request shall include a copy of the amended closure plan for approval by the Director.

(1) The owner or operator shall amend the closure plan whenever:

(i) Changes in operating plans or facility design affect the closure plan, or

(ii) There is a change in the expected year of closure, if applicable, or

(iii) In conducting partial or final closure activities, unexpected events require a modification of the closure plan.

(iv) The owner or operator requests the Director to apply alternative requirements to a regulated unit under Subsections R315-265-90(f), R315-265-110(d), R315-265-140(d), or all three.

(2) The owner or operator shall amend the closure plan at least 60 days prior to the proposed change in facility design or operation, or no later than 60 days after an unexpected event has occurred which has affected the closure plan. If an unexpected event occurs during the partial or final closure period, the owner or operator shall amend the closure plan no later than 30 days after the unexpected event. These provisions also apply to owners or operators of surface impoundments and waste piles

who intended to remove all hazardous wastes at closure, but are required to close as landfills in accordance with 40 CFR 265.310, which is adopted and incorporated by reference.

(3) An owner or operator with an approved closure plan shall submit the modified plan to the Director at least 60 days prior to the proposed change in facility design or operation, or no more than 60 days after an unexpected event has occurred which has affected the closure plan. If an unexpected event has occurred during the partial or final closure period, the owner or operator shall submit the modified plan no more than 30 days after the unexpected event. These provisions also apply to owners or operators of surface impoundments and waste piles who intended to remove all hazardous wastes at closure but are required to close as landfills in accordance with 40 CFR 265.310, which is adopted and incorporated by reference. If the amendment to the plan is a Class 2 or 3 modification according to the criteria in Section R315-270-42, the modification to the plan will be approved according to the procedures in Subsection R315-265-112(d)(4).

(4) The Director may request modifications to the plan under the conditions described in Subsection R315-265-112(c)(1). An owner or operator with an approved closure plan shall submit the modified plan within 60 days of the request from the Director, or within 30 days if the unexpected event occurs during partial or final closure. If the amendment is considered a Class 2 or 3 modification according to the criteria in Section R315-270-42, the modification to the plan will be approved in accordance with the procedures in Subsection R315-265-112(d)(4).

(d) Notification of partial closure and final closure.

(1) The owner or operator shall submit the closure plan to the Director at least 180 days prior to the date on which he expects to begin closure of the first surface impoundment, waste pile, land treatment, or landfill unit, or final closure if it involves such a unit, whichever is earlier. The owner or operator shall submit the closure plan to the Director at least 45 days prior to the date on which he expects to begin partial or final closure of a boiler or industrial furnace. The owner or operator shall submit the closure plan to the Director at least 45 days prior to the date on which he expects to begin final closure of a facility with only tanks, container storage, or incinerator units. Owners or operators with approved closure plans shall notify the Director in writing at least 60 days prior to the date on which he expects to begin closure of a surface impoundment, waste pile, landfill, or land treatment unit, or final closure of a facility involving such a unit. Owners or operators with approved closure plans shall notify the Director in writing at least 45 days prior to the date on which he expects to begin partial or final closure of a boiler or industrial furnace. Owners or operators with approved closure plans shall notify the Director in writing at least 45 days prior to the date on which he expects to begin final closure of a facility with only tanks, container storage, or incinerator units.

(2) The date when he "expects to begin closure" shall be either:

(i) Within 30 days after the date on which any hazardous waste management unit receives the known final volume of hazardous wastes, or, if there is a reasonable possibility that the hazardous waste management unit will receive additional hazardous wastes, no later than one year after the date on which the unit received the most recent volume of hazardous waste. If the owner or operator of a hazardous waste management unit can demonstrate to the Director that the hazardous waste management unit or facility has the capacity to receive additional hazardous wastes and he has taken, and will continue to take, all steps to prevent threats to human health and the environment, including compliance with all interim status requirements, the Director may approve an extension to this one-year limit; or

(ii) For units meeting the requirements of Subsection R315-265-113(d), no later than 30 days after the date on which the hazardous waste management unit receives the known final volume of nonhazardous wastes, or if there is a reasonable possibility that the hazardous waste management unit will receive additional nonhazardous wastes, no later than one year after the date on which the unit received the most recent volume of nonhazardous wastes. If the owner or operator can demonstrate to the Director that the hazardous waste management unit has the capacity to receive additional nonhazardous wastes and he has taken, and will continue to take, all steps to prevent threats to human health and the environment, including compliance with all applicable interim status requirements, the Director may approve an extension to this one-year limit.

(3) The owner or operator shall submit his closure plan to the Director no later than 15 days after:

(i) Termination of interim status except when a permit is issued simultaneously with termination of interim status; or

(ii) Issuance of a judicial decree or final order under section 3008 of RCRA to cease receiving hazardous wastes or close.

(4) The Director will provide the owner or operator and the public, through a newspaper notice, the opportunity to submit written comments on the plan and request modifications to the plan no later than 30 days from the date of the notice. He will also, in response to a request or at his own discretion, hold a public hearing whenever such a hearing might clarify one or more issues concerning a closure plan. The Director will give public notice of the hearing at least 30 days before it occurs. Public notice of the hearing may be given at the same time as notice of the opportunity for the public to submit written comments, and the two notices may be combined. The Director will approve, modify, or disapprove the plan within 90 days of its receipt. If the Director does not approve the plan he shall provide the owner or operator with a detailed written statement of reasons for the refusal and the owner or operator shall modify the plan or submit a new plan for approval within 30 days after receiving such written statement. The Director will approve or modify this plan in writing within 60 days. If the Director modifies the plan, this modified plan becomes the approved closure plan. The Director shallt assure that the approved plan is consistent with Sections R315-265-111 through 265-115 and the applicable requirements of Sections R315-265-90 through 265-94, and Sections R315-265-197, R315-265-228, R315-265-258, and 40 CFR 265.280, 265.310, 265.351, 265.381, 265.404, and 265.1102, which are adopted and incorporated by reference. A copy of the modified plan with a detailed statement of reasons for the modifications shall be mailed to the owner or operator.

(e) Removal of wastes and decontamination or dismantling of equipment. Nothing in Section R315-265-112 shall preclude the owner or operator from removing hazardous wastes and decontaminating or dismantling equipment in accordance with the approved partial or final closure plan at any time before or after notification of partial or final closure.

R315-265-113. Closure and Post-Closure -- Closure; Time Allowed for Closure.

(a) Within 90 days after receiving the final volume of hazardous wastes, or the final volume of nonhazardous wastes if the owner or operator complies with all applicable requirements in Subsections R315-265-113(d) and (e), at a hazardous waste management unit or facility, or within 90 days after approval of the closure plan, whichever is later, the owner or operator shall treat, remove from the unit or facility, or dispose of on-site, all hazardous wastes in accordance with the approved closure plan. The Director may approve a longer period if the owner or operator demonstrates that:

(1)(i) The activities required to comply with this

Subsection R315-265-113(a) will, of necessity, take longer than 90 days to complete; or

(ii)(A) The hazardous waste management unit or facility has the capacity to receive additional hazardous wastes, or has the capacity to receive non-hazardous wastes if the facility owner or operator complies with Subsections R315-265-113(d) and (e); and

(B) There is a reasonable likelihood that he or another person will recommence operation of the hazardous waste management unit or the facility within one year; and

(C) Closure of the hazardous waste management unit or facility would be incompatible with continued operation of the site; and

(2) He has taken and will continue to take all steps to prevent threats to human health and the environment, including compliance with all applicable interim status requirements.

(b) The owner or operator shall complete partial and final closure activities in accordance with the approved closure plan and within 180 days after receiving the final volume of hazardous wastes, or the final volume of nonhazardous wastes if the owner or operator complies with all applicable requirements in Subsections R315-265-113(d) and (e), at the hazardous waste management unit or facility, or 180 days after approval of the closure plan, if that is later. The Director may approve an extension to the closure period if the owner or operator demonstrates that:

(1)(i) The partial or final closure activities will, of necessity, take longer than 180 days to complete; or

(ii)(A) The hazardous waste management unit or facility has the capacity to receive additional hazardous wastes, or has the capacity to receive non-hazardous wastes if the facility owner or operator complies with Subsections R315-265-113(d) and (e); and

(B) There is reasonable likelihood that he or another person will recommence operation of the hazardous waste management unit or the facility within one year; and

(C) Closure of the hazardous waste management unit or facility would be incompatible with continued operation of the site; and

(2) He has taken and will continue to take all steps to prevent threats to human health and the environment from the unclosed but not operating hazardous waste management unit or facility, including compliance with all applicable interim status requirements.

(c) The demonstrations referred to in Subsections R315-265-113(a)(1) and (b)(1) shall be made as follows:

(1) The demonstrations in Subsection R315-265-113(a)(1) shall be made at least 30 days prior to the expiration of the 90-day period in Subsection R315-265-113(a); and

(2) The demonstration in Subsection R315-265-113(b)(1) shall be made at least 30 days prior to the expiration of the 180-day period in Subsection R315-265-113(b), unless the owner or operator is otherwise subject to the deadlines in Subsection R315-265-113(d).

(d) The Director may allow an owner or operator to receive non-hazardous wastes in a landfill, land treatment, or surface impoundment unit after the final receipt of hazardous wastes at that unit if:

(1) The owner or operator submits an amended part B application, or a part B application, if not previously required, and demonstrates that:

(i) The unit has the existing design capacity as indicated on the part A application to receive non-hazardous wastes; and

(ii) There is a reasonable likelihood that the owner or operator or another person will receive non-hazardous wastes in the unit within one year after the final receipt of hazardous wastes; and

(iii) The non-hazardous wastes will not be incompatible with any remaining wastes in the unit or with the facility design and operating requirements of the unit or facility under Rule R315-265; and

(iv) Closure of the hazardous waste management unit would be incompatible with continued operation of the unit or facility; and

(v) The owner or operator is operating and will continue to operate in compliance with all applicable interim status requirements; and

(2) The part B application includes an amended waste analysis plan, ground-water monitoring and response program, human exposure assessment required under RCRA section 3019, and closure and post-closure plans, and updated cost estimates and demonstrations of financial assurance for closure and post-closure care as necessary and appropriate to reflect any changes due to the presence of hazardous constituents in the non-hazardous wastes, and changes in closure activities, including the expected year of closure if applicable under Subsection R315-265-112(b)(7), as a result of the receipt of non-hazardous wastes following the final receipt of hazardous wastes; and

(3) The part B application is amended, as necessary and appropriate, to account for the receipt of non-hazardous wastes following receipt of the final volume of hazardous wastes; and

(4) The part B application and the demonstrations referred to in Subsections R315-265-113(d)(1) and (d)(2) are submitted to the Director no later than 180 days prior to the date on which the owner or operator of the facility receives the known final volume of hazardous wastes, or no later than 90 days after the effective date of Rule R315-265, whichever is later.

(e) In addition to the requirements in Subsection R315-265-113(d), an owner or operator of a hazardous waste surface impoundment that is not in compliance with the liner and leachate collection system requirements in 42 U.S.C. 3004(o)(1) and 3005(j)(1) or 42 U.S.C. 3004(o)(2) or (3) or 3005(j) (2), (3), (4) or (13) shall:

(1) Submit with the part B application:

(i) A contingent corrective measures plan; and

(ii) A plan for removing hazardous wastes in compliance with Subsection R315-265-113(e)(2); and

(2) Remove all hazardous wastes from the unit by removing all hazardous liquids and removing all hazardous sludges to the extent practicable without impairing the integrity of the liner(s), if any.

(3) Removal of hazardous wastes shall be completed no later than 90 days after the final receipt of hazardous wastes. The Director may approve an extension to this deadline if the owner or operator demonstrates that the removal of hazardous wastes will, of necessity, take longer than the allotted period to complete and that an extension will not pose a threat to human health and the environment.

(4) If a release that is a statistically significant increase, or decrease in the case of pH, in hazardous constituents over background levels is detected in accordance with the requirements in Sections R315-265-90 through 265-94, the owner or operator of the unit:

(i) Shall implement corrective measures in accordance with the approved contingent corrective measures plan required by Subsection R315-265-113(e)(1) no later than one year after detection of the release, or approval of the contingent corrective measures plan, whichever is later;

(ii) May receive wastes at the unit following detection of the release only if the approved corrective measures plan includes a demonstration that continued receipt of wastes will not impede corrective action; and

(iii) May be required by the Director to implement corrective measures in less than one year or to cease receipt of wastes until corrective measures have been implemented if necessary to protect human health and the environment.

(5) During the period of corrective action, the owner or

operator shall provide annual reports to the Director describing the progress of the corrective action program, compile all ground-water monitoring data, and evaluate the effect of the continued receipt of non-hazardous wastes on the effectiveness of the corrective action.

(6) The Director may require the owner or operator to commence closure of the unit if the owner or operator fails to implement corrective action measures in accordance with the approved contingent corrective measures plan within one year as required in Subsection R315-265-113(e)(4), or fails to make substantial progress in implementing corrective action and achieving the facility's background levels.

(7) If the owner or operator fails to implement corrective measures as required in Subsection R315-265-113(e)(4), or if the Director determines that substantial progress has not been made pursuant to Subsection R315-265-113(e)(6) he shall:

(i) Notify the owner or operator in writing that the owner or operator shall begin closure in accordance with the deadline in Subsections R315-265-113(a) and (b) and provide a detailed statement of reasons for this determination, and

(ii) Provide the owner or operator and the public, through a newspaper notice, the opportunity to submit written comments on the decision no later than 20 days after the date of the notice.

(iii) If the Director receives no written comments, the decision will become final five days after the close of the comment period. The Director will notify the owner or operator that the decision is final, and that a revised closure plan, if necessary, shall be submitted within 15 days of the final notice and that closure shall begin in accordance with the deadlines in Subsections R315-265-113(a) and (b).

(iv) If the Director receives written comments on the decision, he shall make a final decision within 30 days after the end of the comment period, and provide the owner or operator in writing and the public through a newspaper notice, a detailed statement of reasons for the final decision. If the Director determines that substantial progress has not been made, closure shall be initiated in accordance with the deadlines in Subsections R315-265-113(a) and (b).

(v) The final determinations made by the Director under Subsections R315-265-113(e)(7)(iii) and (iv) are not subject to administrative appeal.

R315-265-114. Closure and Post-Closure -- Disposal or Decontamination of Equipment, Structures and Soils.

During the partial and final closure periods, all contaminated equipment, structures and soil shall be properly disposed of, or decontaminated unless specified otherwise in Sections R315-265-197, 265-228, 265-258, or 40 CFR 265.280, or 265.310, which are adopted and incorporated by reference. By removing all hazardous wastes or hazardous constituents during partial and final closure, the owner or operator may become a generator of hazardous waste and shall handle that hazardous waste in accordance with all applicable requirements of Rule R315-262.

R315-265-115. Closure and Post-Closure -- Certification of Closure.

Within 60 days of completion of closure of each hazardous waste surface impoundment, waste pile, land treatment, and landfill unit, and within 60 days of completion of final closure, the owner or operator shall submit to the Director, by registered mail, a certification that the hazardous waste management unit or facility, as applicable, has been closed in accordance with the specifications in the approved closure plan. The certification shall be signed by the owner or operator and by a qualified Professional Engineer. Documentation supporting the Professional Engineer's certification shall be furnished to the Director upon request until he releases the owner or operator from the financial assurance requirements for closure under Subsection R315-265-143(h).

R315-265-116. Closure and Post-Closure -- Survey Plat.

No later than the submission of the certification of closure of each hazardous waste disposal unit, an owner or operator shall submit to the local zoning authority, or the authority with jurisdiction over local land use, and to the Director, a survey plat indicating the location and dimensions of landfill cells or other hazardous waste disposal units with respect to permanently surveyed benchmarks. This plat shall be prepared and certified by a professional land surveyor. The plat filed with the local zoning authority, or the authority with jurisdiction over local land use shall contain a note, prominently displayed, which states the owner's or operator's obligation to restrict disturbance of the hazardous waste disposal unit in accordance with the applicable regulations in Sections R315-265-110 through 265-121.

R315-265-117. Closure and Post-Closure -- Post-Closure Care and Use of Property.

(a)(1) Post-closure care for each hazardous waste management unit subject to the requirements of Sections R315-265-117 through 265-120 shall begin after completion of closure of the unit and continue for 30 years after that date. It shall consist of at least the following:

(i) Monitoring and reporting in accordance with the requirements of Sections R315-265-90 through 265-94, R315-265-220 through 265-231, R315-265-250 through 265-260, and subparts M, and N of 40 CFR 265, which are adopted and incorporated by reference; and

(ii) Maintenance and monitoring of waste containment systems in accordance with the requirements of Sections R315-265-90 through 265-94, R315-265-220 through 265-231, R315-265-250 through 265-260, and subparts M, and N of 40 CFR 265, which are adopted and incorporated by reference.

(2) Any time preceding closure of a hazardous waste management unit subject to post-closure care requirements or final closure, or any time during the post-closure period for a particular hazardous waste disposal unit, the Director may:

(i) Shorten the post-closure care period applicable to the hazardous waste management unit, or facility, if all disposal units have been closed, if he finds that the reduced period is sufficient to protect human health and the environment, for example, leachate or ground-water monitoring results, characteristics of the hazardous waste, application of advanced technology, or alternative disposal, treatment, or re-use techniques indicate that the hazardous waste management unit or facility is secure; or

(ii) Extend the post-closure care period applicable to the hazardous waste management unit or facility, if he finds that the extended period is necessary to protect human health and the environment, for example, leachate or ground-water monitoring results indicate a potential for migration of hazardous wastes at levels which may be harmful to human health and the environment.

(b) The Director may require, at partial and final closure, continuation of any of the security requirements of Section R315-265-14 during part or all of the post-closure period when:

(1) Hazardous wastes may remain exposed after completion of partial or final closure; or

(2) Access by the public or domestic livestock may pose a hazard to human health.

(c) Post-closure use of property on or in which hazardous wastes remain after partial or final closure shall never be allowed to disturb the integrity of the final cover, liner(s), or any other components of the containment system, or the function of the facility's monitoring systems, unless the Director finds that the disturbance:

(1) Is necessary to the proposed use of the property, and

will not increase the potential hazard to human health or the environment; or

(2) Is necessary to reduce a threat to human health or the environment.

(d) All post-closure care activities shall be in accordance with the provisions of the approved post-closure plan as specified in Section R315-265-118.

R315-265-118. Closure and Post-Closure -- Post-Closure Plan; Amendment of Plan.

(a) Written plan. By May 19, 1981, the owner or operator of a hazardous waste disposal unit shall have a written post-closure plan. An owner or operator of a surface impoundment or waste pile that intends to remove all hazardous wastes at closure shall prepare a post-closure plan and submit it to the Director within 90 days of the date that the owner or operator or Director determines that the hazardous waste management unit or facility shall be closed as a landfill, subject to the requirements of Sections R315-265-117 through 265-120.

(b) Until final closure of the facility, a copy of the most current post-closure plan shall be furnished to the Director upon request, including request by mail. In addition, for facilities without approved post-closure plans, it shall also be provided during site inspections, on the day of inspection, to any officer, employee or representative of the Director. After final closure has been certified, the person or office specified in Subsection R315-265-118(c)(3) shall keep the approved post-closure plan during the post-closure period.

(c) For each hazardous waste management unit subject to the requirements of this Section R315-265-118, the post-closure plan shall identify the activities that will be carried on after closure of each disposal unit and the frequency of these activities, and include at least:

(1) A description of the planned monitoring activities and frequencies at which they will be performed to comply with Sections R315-265-90 through 265-94, R315-265-220 through 265-231, R315-265-250 through 265-260, and subparts M, and N of 40 CFR 265, which are adopted and incorporated by reference, during the post-closure care period; and

(2) A description of the planned maintenance activities, and frequencies at which they will be performed, to ensure:

(i) The integrity of the cap and final cover or other containment systems in accordance with the requirements of Sections R315-265-90 through 265-94, R315-265-220 through 265-231, R315-265-250 through 265-260, and subparts M, and N of 40 CFR 265, which are adopted and incorporated by reference; and

(ii) The function of the monitoring equipment in accordance with the requirements of Sections R315-265-90 through 265-94, R315-265-220 through 265-231, R315-265-250 through 265-260, and subparts M, and N of 40 CFR 265, which are adopted and incorporated by reference; and

(3) The name, address, and phone number of the person or office to contact about the hazardous waste disposal unit or facility during the post-closure care period.

(4) For facilities subject to Section R315-265-121, provisions that satisfy the requirements of Subsections R315-265-121(a)(1) and (3).

(5) For facilities where the Director has applied alternative requirements at a regulated unit under Subsections R315-265-90(f), R315-265-110(d), R315-265-140(d), or all three, either the alternative requirements that apply to the regulated unit, or a reference to the enforceable document containing those requirements.

(d) Amendment of plan. The owner or operator may amend the post-closure plan any time during the active life of the facility or during the post-closure care period. An owner or operator with an approved post-closure plan shall submit a written request to the Director to authorize a change to the approved plan. The written request shall include a copy of the amended post-closure plan for approval by the Director.

(1) The owner or operator shall amend the post-closure plan whenever:

(i) Changes in operating plans or facility design affect the post-closure plan, or

(ii) Events which occur during the active life of the facility, including partial and final closures, affect the post-closure plan.

(iii) The owner or operator requests the Director to apply alternative requirements to a regulated unit under Subsections R315-265.90(f), R315-265.110(d), R315-265.140(d) or all three.

(2) The owner or operator shall amend the post-closure plan at least 60 days prior to the proposed change in facility design or operation, or no later than 60 days after an unexpected event has occurred which has affected the post-closure plan.

(3) An owner or operator with an approved post-closure plan shall submit the modified plan to the Director at least 60 days prior to the proposed change in facility design or operation, or no more than 60 days after an unexpected event has occurred which has affected the post-closure plan. If an owner or operator of a surface impoundment or a waste pile who intended to remove all hazardous wastes at closure in accordance with Subsections R315-265-228(b) or R315-265-258(a) is required to close as a landfill in accordance with 40 CFR 265.310, which is adopted and incorporated by reference, the owner or operator shall submit a post-closure plan within 90 days of the determination by the owner or operator or Director that the unit shall be closed as a landfill. If the amendment to the post-closure plan is a Class 2 or 3 modification according to the criteria in Section R315-270-42, the modification to the plan will be approved according to the procedures in Subsection R315-265-118(f).

(4) The Director may request modifications to the plan under the conditions described in Section R315-265-118(d)(1). An owner or operator with an approved post-closure plan shall submit the modified plan no later than 60 days of the request from the Director. If the amendment to the plan is considered a Class 2 or 3 modification according to the criteria in Section R315-270-42, the modifications to the post-closure plan will be approved in accordance with the procedures in Subsection R315-265-118(f). If the Director determines that an owner or operator of a surface impoundment or waste pile who intended to remove all hazardous wastes at closure shall close the facility as a landfill, the owner or operator shall submit a post-closure plan for approval to the Director within 90 days of the determination.

(e) The owner or operator of a facility with hazardous waste management units subject to these requirements shall submit his post-closure plan to the Director at least 180 days before the date he expects to begin partial or final closure of the first hazardous waste disposal unit. The date he "expects to begin closure" of the first hazardous waste disposal unit shall be either within 30 days after the date on which the hazardous waste management unit receives the known final volume of hazardous waste or, if there is a reasonable possibility that the hazardous waste management unit will receive additional hazardous wastes, no later than one year after the date on which the unit received the most recent volume of hazardous wastes. The owner or operator shall submit the post-closure plan to the Director no later than 15 days after:

(1) Termination of interim status, except when a permit is issued to the facility simultaneously with termination of interim status; or

(2) Issuance of a judicial decree or final orders under section 3008 of RCRA to cease receiving wastes or close.

(f) The Director will provide the owner or operator and the public, through a newspaper notice, the opportunity to submit

written comments on the post-closure plan and request modifications to the plan no later than 30 days from the date of the notice. He will also, in response to a request or at his own discretion, hold a public hearing whenever such a hearing might clarify one or more issues concerning a post-closure plan. The Director will give public notice of the hearing at least 30 days before it occurs. Public notice of the hearing may be given at the same time as notice of the opportunity for the public to submit written comments, and the two notices may be combined. The Director will approve, modify, or disapprove the plan within 90 days of its receipt. If the Director does not approve the plan he shall provide the owner or operator with a detailed written statement of reasons for the refusal and the owner or operator shall modify the plan or submit a new plan for approval within 30 days after receiving such written statement. The Director will approve or modify this plan in writing within 60 days. If the Director modifies the plan, this modified plan becomes the approved post-closure plan. The Director shall ensure that the approved post-closure plan is consistent with Sections R315-265-117 through 265-120. A copy of the modified plan with a detailed statement of reasons for the modifications shall be mailed to the owner or operator.

(g) The post-closure plan and length of the post-closure care period may be modified any time prior to the end of the post-closure care period in either of the following two ways:

(1) The owner or operator or any member of the public may petition the Director to extend or reduce the post-closure care period applicable to a hazardous waste management unit or facility based on cause, or alter the requirements of the post-closure care period based on cause.

(i) The petition shall include evidence demonstrating that:

(A) The secure nature of the hazardous waste management unit or facility makes the post-closure care requirement(s) unnecessary or supports reduction of the post-closure care period specified in the current post-closure plan, for example, leachate or ground-water monitoring results, characteristics of the wastes, application of advanced technology, or alternative disposal, treatment, or re-use techniques indicate that the facility is secure, or

(B) The requested extension in the post-closure care period or alteration of post-closure care requirements is necessary to prevent threats to human health and the environment, e.g., leachate or ground-water monitoring results indicate a potential for migration of hazardous wastes at levels which may be harmful to human health and the environment.

(ii) These petitions will be considered by the Director only when they present new and relevant information not previously considered by the Director. Whenever the Director is considering a petition, he will provide the owner or operator and the public, through a newspaper notice, the opportunity to submit written comments within 30 days of the date of the notice. He will also, in response to a request or at his own discretion, hold a public hearing whenever a hearing might clarify one or more issues concerning the post-closure plan. The Director will give the public notice of the hearing at least 30 days before it occurs. Public notice of the hearing may be given at the same time as notice of the opportunity for written public comments, and the two notices may be combined. After considering the comments, he will issue a final determination, based upon the criteria set forth in Subsection R315-265-118(g)(1).

(iii) If the Director denies the petition, he will send the petitioner a brief written response giving a reason for the denial.

(2) The Director may tentatively decide to modify the post-closure plan if he deems it necessary to prevent threats to human health and the environment. He may propose to extend or reduce the post-closure care period applicable to a hazardous waste management unit or facility based on cause or alter the requirements of the post-closure care period based on cause.

(i) The Director will provide the owner or operator and the affected public, through a newspaper notice, the opportunity to submit written comments within 30 days of the date of the notice and the opportunity for a public hearing as in Subsection R315-265-118(g)(1)(ii). After considering the comments, he will issue a final determination.

(ii) The Director will base his final determination upon the same criteria as required for petitions under Subsection R315-265-118(g)(1)(i). A modification of the post-closure plan may include, where appropriate, the temporary suspension rather than permanent deletion of one or more post-closure care requirements. At the end of the specified period of suspension, the Director would then determine whether the requirement(s) should be permanently discontinued or reinstated to prevent threats to human health and the environment.

R315-265-119. Closure and Post-Closure -- Post-Closure Notices.

(a) No later than 60 days after certification of closure of each hazardous waste disposal unit, the owner or operator shall submit to the local zoning authority, or the authority with jurisdiction over local land use, and to the Director, a record of the type, location, and quantity of hazardous wastes disposed of within each cell or other disposal unit of the facility. For hazardous wastes disposed of before January 12, 1981, the owner or operator shall identify the type, location and quantity of the hazardous wastes to the best of his knowledge and in accordance with any records he has kept.

(b) Within 60 days of certification of closure of the first hazardous waste disposal unit and within 60 days of certification of closure of the last hazardous waste disposal unit, the owner or operator shall:

(1) Record, in accordance with Utah law, a notation on the deed to the facility property---or on some other instrument which is normally examined during title search---that will in perpetuity notify any potential purchaser of the property that:

(i) The land has been used to manage hazardous wastes; and

(ii) Its use is restricted under regulations in Sections R315-265-110 through 265-121; and

(iii) The survey plat and record of the type, location, and quantity of hazardous wastes disposed of within each cell or other hazardous waste disposal unit of the facility required by Section R315-265-116 and Subsection R315-265-119(a) have been filed with the local zoning authority or the authority with jurisdiction over local land use and with the Director; and

(2) Submit a certification signed by the owner or operator that he has recorded the notation specified in Subsection R315-265-119(b)(1) and a copy of the document in which the notation has been placed, to the Director.

(c) If the owner or operator or any subsequent owner of the land upon which a hazardous waste disposal unit was located wishes to remove hazardous wastes and hazardous waste residues, the liner, if any, and all contaminated structures, equipment, and soils, he shall request a modification to the approved post-closure plan in accordance with the requirements of Subsection R315-265-118(g). The owner or operator shall demonstrate that the removal of hazardous wastes will satisfy the criteria of Subsection R315-265-117(c). By removing hazardous waste, the owner or operator may become a generator of hazardous waste and shall manage it in accordance with all applicable requirements of Rules R315-260 through 266, R315-268, R315-270 and R315-273. If the owner or operator is granted approval to conduct the removal activities, the owner or operator may request that the Director approve either:

(1) The removal of the notation on the deed to the facility property or other instrument normally examined during title search, or

(2) The addition of a notation to the deed or instrument

indicating the removal of the hazardous waste.

R315-265-120. Closure and Post-Closure -- Certification of Completion of Post-Closure Care.

No later than 60 days after the completion of the established post-closure care period for each hazardous waste disposal unit, the owner or operator shall submit to the Director, by registered mail, a certification that the post-closure care period for the hazardous waste disposal unit was performed in accordance with the specifications in the approved post-closure plan. The certification shall be signed by the owner or operator and a qualified Professional Engineer. Documentation supporting the Professional Engineer's certification shall be furnished to the Director upon request until he releases the owner or operator from the financial assurance requirements for post-closure care under Subsection R315-265-145(h).

R315-265-121. Closure and Post-Closure -- Post-Closure Requirements for Facilities that Obtain Enforceable Documents in Lieu of Post-Closure Permits.

(a) Owners and operators who are subject to the requirement to obtain a post-closure permit under Subsection R315-270-1(c), but who obtain enforceable documents in lieu of post-closure permits, as provided under Subsection R315-270-1(c)(7), shall comply with the following requirements:

(1) The requirements to submit information about the facility in Section R315-270-28;

(2) The requirements for facility-wide corrective action in Section R315-264-101;

(3) The requirements of Sections R315-264-91 through 264-100.

(b)(1) The Director, in issuing enforceable documents under Section R315-265-121 in lieu of permits, will assure a meaningful opportunity for public involvement which, at a minimum, includes public notice and opportunity for public comment:

(i) When the Director becomes involved in a remediation at the facility as a regulatory or enforcement matter;

(ii) On the proposed preferred remedy and the assumptions upon which the remedy is based, in particular those related to land use and site characterization; and

(iii) At the time of a proposed decision that remedial action is complete at the facility. These requirements shall be met before the Director may consider that the facility has met the requirements of Subsection R315-270-1(c)(7), unless the facility qualifies for a modification to these public involvement procedures under Subsections R315-265-121(b)(2) or (3).

(2) If the Director determines that even a short delay in the implementation of a remedy would adversely affect human health or the environment, the Director may delay compliance with the requirements of Subsection R315-265-121(b)(1) and implement the remedy immediately. However, the Director shall assure involvement of the public at the earliest opportunity, and, in all cases, upon making the decision that additional remedial action is not needed at the facility.

(3) The Director may allow a remediation initiated prior to October 22, 1998 to substitute for corrective action required under a post-closure permit even if the public involvement requirements of Subsection R315-265-121(b)(1) have not been met so long as the Director assures that notice and comment on the decision that no further remediation is necessary to protect human health and the environment takes place at the earliest reasonable opportunity after October 22, 1998.

R315-265-140. Financial Requirements -- Applicability.

(a) The requirements of Sections R315-265-142, R315-265-143, R315-265-147 and R315-265-148 apply to owners or operators of all hazardous waste facilities, except as provided otherwise in this Section R315-265-140 or in Section R315-265-1.

(b) The requirements of Sections R315-265-144 and R315-265-145 apply only to owners and operators of:

(1) Disposal facilities;

(2) Tank systems that are required under Section R315-265-197 to meet the requirements for landfills; and

(3) Containment buildings that are required under 40 CFR 265.1102, which is adopted and incorporated by reference, to meet the requirements for landfills.

(c) States and the Federal government are exempt from the requirements of Sections R315-265-140 through 265-148.

(d) The Director may replace all or part of the requirements of Sections R315-265-140 through 265-148 applying to a regulated unit with alternative requirements for financial assurance set out in the permit or in an enforceable document, as defined in Subsection R315-270-1(c)(7), where the Director:

(1) Prescribes alternative requirements for the regulated unit under Subsection R315-265-90(f), Subsection R315-265-110(d), or both, and

(2) Determines that it is not necessary to apply the requirements of Sections R315-265-140 through 265-148 because the alternative financial assurance requirements will protect human health and the environment.

R315-265-141. Financial Requirements -- Definitions of Terms as Used in Sections R315-265-140 through R315-265-148.

(a) Closure plan means the plan for closure prepared in accordance with the requirements of Section R315-265-112.

(b) Current closure cost estimate means the most recent of the estimates prepared in accordance with Subsections R315-265-142(a), (b), and (c).

(c) Current post-closure cost estimate means the most recent of the estimates prepared in accordance with Subsections R315-265-144(a), (b), and (c).

(d) Parent corporation means a corporation which directly owns at least 50 percent of the voting stock of the corporation which is the facility owner or operator; the latter corporation is deemed a "subsidiary" of the parent corporation.

(e) Post-closure plan means the plan for post-closure care prepared in accordance with the requirements of Sections R315-265-117 through 265-120.

(f) The following terms are used in the specifications for the financial tests for closure, post-closure care, and liability coverage. The definitions are intended to assist in the understanding of these regulations and are not intended to limit the meanings of terms in a way that conflicts with generally accepted accounting practices.

Assets means all existing and all probable future economic benefits obtained or controlled by a particular entity.

Current assets means cash or other assets or resources commonly identified as those which are reasonably expected to be realized in cash or sold or consumed during the normal operating cycle of the business.

Current liabilities means obligations whose liquidation is reasonably expected to require the use of existing resources properly classifiable as current assets or the creation of other current liabilities.

Current plugging and abandonment cost estimate means the most recent of the estimates prepared in accordance with 40 CFR 144.62(a), (b), and (c).

Independently audited refers to an audit performed by an independent certified public accountant in accordance with generally accepted auditing standards.

Liabilities means probable future sacrifices of economic benefits arising from present obligations to transfer assets or provide services to other entities in the future as a result of past transactions or events.

Net working capital means current assets minus current liabilities.

Net worth means total assets minus total liabilities and is equivalent to owner's equity.

Tangible net worth means the tangible assets that remain after deducting liabilities; such assets would not include intangibles such as goodwill and rights to patents or royalties.

(g) In the liability insurance requirements the terms bodily injury and property damage shall have the meanings given these terms by applicable Utah law. However, these terms do not include those liabilities which, consistent with standard industry practice, are excluded from coverage in liability policies for bodily injury and property damage. The Director intends the meanings of other terms used in the liability insurance requirements to be consistent with their common meanings within the insurance industry. The definitions given below of several of the terms are intended to assist in the understanding of these regulations and are not intended to limit their meanings in a way that conflicts with general insurance industry usage.

Accidental occurrence means an accident, including continuous or repeated exposure to conditions, which results in bodily injury or property damage neither expected nor intended from the standpoint of the insured.

Legal defense costs means any expenses that an insurer incurs in defending against claims of third parties brought under the terms and conditions of an insurance policy.

Nonsudden accidental occurrence means an occurrence which takes place over time and involves continuous or repeated exposure.

Sudden accidental occurrence means an occurrence which is not continuous or repeated in nature.

(h) Substantial business relationship means the extent of a business relationship necessary under applicable Utah law to make a guarantee contract issued incident to that relationship valid and enforceable. A "substantial business relationship" must arise from a pattern of recent or ongoing business transactions, in addition to the guarantee itself, such that a currently existing business relationship between the guarantor and the owner or operator is demonstrated to the satisfaction of the Director.

R315-265-142. Financial Requirements -- Cost Estimate for Closure.

(a) The owner or operator shall have a detailed written estimate, in current dollars, of the cost of closing the facility in accordance with the requirements in Sections R315-265-111 through R315-265-115 and applicable closure requirements in Sections R315-265-197, R315-265-228, R315-265-258, and 40 CFR 265.280, 265.310, 265.351, 265.381, 265.404, and 265.1102, which are adopted and incorporated by reference.

(1) The estimate shall equal the cost of final closure at the point in the facility's active life when the extent and manner of its operation would make closure the most expensive, as indicated by its closure plan, see Subsection R315-265-112(b); and

(2) The closure cost estimate shall be based on the costs to the owner or operator of hiring a third party to close the facility. A third party is a party who is neither a parent nor a subsidiary of the owner or operator. See definition of parent corporation in Subsection R315-265-141(d). The owner or operator may use costs for on-site disposal if he can demonstrate that on-site disposal capacity will exist at all times over the life of the facility.

(3) The closure cost estimate may not incorporate any salvage value that may be realized with the sale of hazardous wastes, or non-hazardous wastes if applicable under Subsection R315-265-113(d), facility structures or equipment, land, or other assets associated with the facility at the time of partial or final closure.

(4) The owner or operator may not incorporate a zero cost for hazardous wastes, or non-hazardous wastes if applicable under Subsection R315-265-113(d), that might have economic value.

(b) During the active life of the facility, the owner or operator shall adjust the closure cost estimate for inflation within 60 days prior to the anniversary date of the establishment of the financial instrument(s) used to comply with Section R315-265-143. For owners and operators using the financial test or corporate guarantee, the closure cost estimate shall be updated for inflation within 30 days after the close of the firm's fiscal year and before submission of updated information to the Director as specified in Subsection R315-265-143(e)(3). The adjustment may be made by recalculating the closure cost estimate in current dollars, or by using an inflation factor derived from the most recent Implicit Price Deflator for Gross National Product published by the U.S. Department of Commerce in its Survey of Current Business, as specified in Subsections R315-265-142(b)(1) and (2). The inflation factor is the result of dividing the latest published annual Deflator by the Deflator for the previous year.

(1) The first adjustment is made by multiplying the closure cost estimate by the inflation factor. The result is the adjusted closure cost estimate.

(2) Subsequent adjustments are made by multiplying the latest adjusted closure cost estimate by the latest inflation factor.

(c) During the active life of the facility, the owner or operator shall revise the closure cost estimate no later than 30 days after a revision has been made to the closure plan which increases the cost of closure. If the owner or operator has an approved closure plan, the closure cost estimate shall be revised no later than 30 days after the Director has approved the request to modify the closure plan, if the change in the closure plan increases the cost of closure. The revised closure cost estimate shall be adjusted for inflation as specified in Subsection R315-265-142(b).

(d) The owner or operator shall keep the following at the facility during the operating life of the facility: The latest closure cost estimate prepared in accordance with Subssections R315-265-142(a) and (c) and, when this estimate has been adjusted in accordance with Subsection R315-265-142(b), the latest adjusted closure cost estimate.

R315-265-143. Financial Requirements -- Financial Assurance for Closure.

By the effective date of these regulations, an owner or operator of each facility shall establish financial assurance for closure of the facility. He shall choose from the options as specified in Subsections R315-265-143(a) through (e).

(a) Closure trust fund.

(1) An owner or operator may satisfy the requirements of Section R315-265-143 by establishing a closure trust fund which conforms to the requirements of Subsection R315-265-143(a) and submitting an originally signed duplicate of the trust agreement to the Director. The trustee shall be an entity which has the authority to act as a trustee and whose trust operations are regulated and examined by a Federal or Utah agency.

(2) The wording of the trust agreement shall be identical to the wording specified in Subsection R315-264-151(a)(1), and the trust agreement shall be accompanied by a formal certification of acknowledgment, for example, see Subsection R315-264-151(a)(2). Schedule A of the trust agreement shall be updated within 60 days after a change in the amount of the current closure cost estimate covered by the agreement.

(3) Payments into the trust fund shall be made annually by the owner or operator over the 20 years beginning with the effective date of these regulations or over the remaining operating life of the facility as estimated in the closure plan, whichever period is shorter; this period is hereafter referred to

as the "pay-in period." The payments into the closure trust fund shall be made as follows:

(i) The first payment shall be made by the effective date of these regulations, except as provided in Subsection R315-265-143(a)(5). The first payment shall be at least equal to the current closure cost estimate, except as provided in Subsection R315-265-143(f), divided by the number of years in the pay-in period.

(ii) Subsequent payments shall be made no later than 30 days after each anniversary date of the first payment. The amount of each subsequent payment shall be determined by this formula: Next payment=(CE-CV)/Y, where CE is the current closure cost estimate, CV is the current value of the trust fund, and Y is the number of years remaining in the pay-in period.

(4) The owner or operator may accelerate payments into the trust fund or he may deposit the full amount of the current closure cost estimate at the time the fund is established. However, he shall maintain the value of the fund at no less than the value that the fund would have if annual payments were made as specified in Subsection R315-265-143(a)(3).

(5) If the owner or operator establishes a closure trust fund after having used one or more alternate mechanisms specified in Section R315-265-143, his first payment shall be in at least the amount that the fund would contain if the trust fund were established initially and annual payments made as specified in Subsection R315-265-143(a)(3).

(6) After the pay-in period is completed, whenever the current closure cost estimate changes, the owner or operator shall compare the new estimate with the trustee's most recent annual valuation of the trust fund. If the value of the fund is less than the amount of the new estimate, the owner or operator, within 60 days after the change in the cost estimate, shall either deposit an amount into the fund so that its value after this deposit at least equals the amount of the current closure cost estimate, or obtain other financial assurance as specified in Section R315-265-143 to cover the difference.

(7) If the value of the trust fund is greater than the total amount of the current closure cost estimate, the owner or operator may submit a written request to the Director for release of the amount in excess of the current closure cost estimate.

(8) If an owner or operator substitutes other financial assurance as specified in Section R315-265-143 for all or part of the trust fund, he may submit a written request to the Director for release of the amount in excess of the current closure cost estimate covered by the trust fund.

(9) Within 60 days after receiving a request from the owner or operator for release of funds as specified in Subsections R315-265-143(a) (7) or (8), the Director will instruct the trustee to release to the owner or operator such funds as the Director specifies in writing.

(10) After beginning partial or final closure, an owner or operator or another person authorized to conduct partial or final closure may request reimbursements for partial or final closure expenditures by submitting itemized bills to the Director. The owner or operator may request reimbursements for partial closure only if sufficient funds are remaining in the trust fund to cover the maximum costs of closing the facility over its remaining operating life. No later than 60 days after receiving bills for partial or final closure activities, the Director will instruct the trustee to make reimbursements in those amounts as the Director specifies in writing, if the Director determines that the partial or final closure expenditures are in accordance with the approved closure plan, or otherwise justified. If the Director has reason to believe that the maximum cost of closure over the remaining life of the facility will be significantly greater than the value of the trust fund, he may withhold reimbursements of such amounts as he deems prudent until he determines, in accordance with Subsection R315-265-143(h) that the owner or operator is no longer required to maintain financial assurance for final closure of the facility. If the Director does not instruct the trustee to make such reimbursements, he will provide to the owner or operator a detailed written statement of reasons.

(11) The Director will agree to termination of the trust when:

(i) An owner or operator substitutes alternate financial assurance as specified in Section R315-265-143; or

(ii) The Director releases the owner or operator from the requirements of Section R315-265-143 in accordance with Subsection R315-265-143(h).

(b) Surety bond guaranteeing payment into a closure trust fund.

(1) An owner or operator may satisfy the requirements of Section R315-265-143 by obtaining a surety bond which conforms to the requirements of this paragraph and submitting the bond to the Director. The surety company issuing the bond shall, at a minimum, be among those listed as acceptable sureties on Federal bonds in Circular 570 of the U.S. Department of the Treasury.

(2) The wording of the surety bond shall be identical to the wording specified in Subsection R315-264-151(b).

(3) The owner or operator who uses a surety bond to satisfy the requirements of Section R315-265-143 shall also establish a standby trust fund. Under the terms of the bond, all payments made thereunder will be deposited by the surety directly into the standby trust fund in accordance with instructions from the Director. This standby trust fund shall meet the requirements specified in Subsection R315-265-143(a), except that:

(i) An originally signed duplicate of the trust agreement shall be submitted to the Director with the surety bond; and

(ii) Until the standby trust fund is funded pursuant to the requirements of Section R315-265-143, the following are not required by these regulations:

(A) Payments into the trust fund as specified in Subsection R315-265-143(a);

(B) Updating of Schedule A of the trust agreement, see Subsection R315-264-151(a), to show current closure cost estimates;

(C) Annual valuations as required by the trust agreement; and

(D) Notices of nonpayment as required by the trust agreement.

(4) The bond shall guarantee that the owner or operator will:

(i) Fund the standby trust fund in an amount equal to the penal sum of the bond before the beginning of final closure of the facility; or

(ii) Fund the standby trust fund in an amount equal to the penal sum within 15 days after an administrative order to begin final closure issued by the Director becomes final, or within 15 days after an order to begin final closure is issued by a U.S. district court or other court of competent jurisdiction; or

(iii) Provide alternate financial assurance as specified in Section R315-265-143, and obtain the Director's written approval of the assurance provided, within 90 days after receipt by both the owner or operator and the Director of a notice of cancellation of the bond from the surety.

(5) Under the terms of the bond, the surety will become liable on the bond obligation when the owner or operator fails to perform as guaranteed by the bond.

(6) The penal sum of the bond shall be in an amount at least equal to the current closure cost estimate, except as provided in Subsection R315-265-143(f).

(7) Whenever the current closure cost estimate increases to an amount greater than the penal sum, the owner or operator, within 60 days after the increase, shall either cause the penal sum to be increased to an amount at least equal to the current closure cost estimate and submit evidence of such increase to

the Director, or obtain other financial assurance as specified in Section R315-265-143 to cover the increase. Whenever the current closure cost estimate decreases, the penal sum may be reduced to the amount of the current closure cost estimate following written approval by the Director.

(8) Under the terms of the bond, the surety may cancel the bond by sending notice of cancellation by certified mail to the owner or operator and to the Director. Cancellation may not occur, however, during the 120 days beginning on the date of receipt of the notice of cancellation by both the owner or operator and the Director, as evidenced by the return receipts.

(9) The owner or operator may cancel the bond if the Director has given prior written consent based on his receipt of evidence of alternate financial assurance as specified in Section R315-265-143.

(c) Closure letter of credit.

(1) An owner or operator may satisfy the requirements of Section R315-265-143 by obtaining an irrevocable standby letter of credit which conforms to the requirements of Subsection R315-265-143(c) and submitting the letter to the Director. The issuing institution shall be an entity which has the authority to issue letters of credit and whose letter-of-credit operations are regulated and examined by a Federal or Utah agency.

(2) The wording of the letter of credit shall be identical to the wording specified in Subsection R315-264-151(d).

(3) An owner or operator who uses a letter of credit to satisfy the requirements of Section R315-265-143 shall also establish a standby trust fund. Under the terms of the letter of credit, all amounts paid pursuant to a draft by the Director will be deposited by the issuing institution directly into the standby trust fund in accordance with instructions from the Director. This standby trust fund shall meet the requirements of the trust fund specified in Subsection R315-265-143(a), except that:

(i) An originally signed duplicate of the trust agreement shall be submitted to the Director with the letter of credit; and

(ii) Unless the standby trust fund is funded pursuant to the requirements of Section R315-265-143, the following are not required by these regulations:

(A) Payments into the trust fund as specified in Subsection R315-265-143(a);

(B) Updating of Schedule A of the trust agreement, see Subsection R315-264-151(a), to show current closure cost estimates;

(C) Annual valuations as required by the trust agreement; and

(D) Notices of nonpayment as required by the trust agreement.

(4) The letter of credit shall be accompanied by a letter from the owner or operator referring to the letter of credit by number, issuing institution, and date, and providing the following information: The EPA Identification Number, name, and address of the facility, and the amount of funds assured for closure of the facility by the letter of credit.

(5) The letter of credit shall be irrevocable and issued for a period of at least 1 year. The letter of credit shall provide that the expiration date will be automatically extended for a period of at least 1 year unless, at least 120 days before the current expiration date, the issuing institution notifies both the owner or operator and the Director by certified mail of a decision not to extend the expiration date. Under the terms of the letter of credit, the 120 days will begin on the date when both the owner or operator and the Director have received the notice, as evidenced by the return receipts.

(6) The letter of credit shall be issued in an amount at least equal to the current closure cost estimate, except as provided in Subsection R315-265-143(f).

(7) Whenever the current closure cost estimate increases to an amount greater than the amount of the credit, the owner or operator, within 60 days after the increase, shall either cause the amount of the credit to be increased so that it at least equals the current closure cost estimate and submit evidence of such increase to the Director, or obtain other financial assurance as specified in Section R315-265-143 to cover the increase. Whenever the current closure cost estimate decreases, the amount of the credit may be reduced to the amount of the current closure cost estimate following written approval by the Director.

(8) Following a final administrative determination that the owner or operator has failed to perform final closure in accordance with the approved closure plan when required to do so, the Director may draw on the letter of credit.

(9) If the owner or operator does not establish alternate financial assurance as specified in Section R315-265-143 and obtain written approval of such alternate assurance from the Director within 90 days after receipt by both the owner or operator and the Director of a notice from the issuing institution that it has decided not to extend the letter of credit beyond the current expiration date, the Director will draw on the letter of credit. The Director may delay the drawing if the issuing institution grants an extension of the term of the credit. During the last 30 days of any such extension the Director will draw on the letter of credit if the owner or operator has failed to provide alternate financial assurance as specified in Section R315-265-143 and obtain written approval of such assurance from the Director.

(10) The Director will return the letter of credit to the issuing institution for termination when:

(i) An owner or operator substitutes alternate financial assurance as specified in Section R315-265-143; or

(ii) The Director releases the owner or operator from the requirements of Section R315-265-143 in accordance with Subsection R315-265-143(h).

(d) Closure insurance.

(1) An owner or operator may satisfy the requirements of Section R315-265-143 by obtaining closure insurance which conforms to the requirements of Subsection R315-265-143(d) and submitting a certificate of such insurance to the Director. By the effective date of these regulations the owner or operator shall submit to the Director a letter from an insurer stating that the insurer is considering issuance of closure insurance conforming to the requirements of this paragraph to the owner or operator. Within 90 days after the effective date of these regulations, the owner or operator shall submit the certificate of insurance to the Director or establish other financial assurance as specified in Section R315-265-143. At a minimum, the insurer shall be licensed to transact the business of insurance, or eligible to provide insurance as an excess or surplus lines insurer, in one or more States.

(2) The wording of the certificate of insurance shall be identical to the wording specified in Subsection R315-264-151(e).

(3) The closure insurance policy shall be issued for a face amount at least equal to the current closure cost estimate, except as provided in Subsection R315-265-143(f). The term "face amount" means the total amount the insurer is obligated to pay under the policy. Actual payments by the insurer will not change the face amount, although the insurer's future liability will be lowered by the amount of the payments.

(4) The closure insurance policy shall guarantee that funds will be available to close the facility whenever final closure occurs. The policy shall also guarantee that once final closure begins, the insurer will be responsible for paying out funds, up to an amount equal to the face amount of the policy, upon the direction of the Director, to such party or parties as the Director specifies.

(5) After beginning partial or final closure, an owner or operator or any other person authorized to conduct closure may

request reimbursements for closure expenditures by submitting itemized bills to the Director. The owner or operator may request reimbursements for partial closure only if the remaining value of the policy is sufficient to cover the maximum costs of closing the facility over its remaining operating life. Within 60 days after receiving bills for closure activities, the Director will instruct the insurer to make reimbursements in such amounts as the Director specifies in writing if the Director determines that the partial or final closure expenditures are in accordance with the approved closure plan or otherwise justified. If the Director has reason to believe that the maximum cost of closure over the remaining life of the facility will be significantly greater than the face amount of the policy, he may withhold reimbursement of such amounts as he deems prudent until he determines, in accordance with Subsection R315-265-143(h), that the owner or operator is no longer required to maintain financial assurance for final closure of the particular facility. If the Director does not instruct the insurer to make such reimbursements, he will provide to the owner or operator a detailed written statement of reasons.

(6) The owner or operator shall maintain the policy in full force and effect until the Director consents to termination of the policy by the owner or operator as specified in Subsection R315-265-143(d)(10). Failure to pay the premium, without substitution of alternate financial assurance as specified in this section, will constitute a significant violation of these regulations, warranting such remedy as the Director deems necessary. Such violation will be deemed to begin upon receipt by the Director of a notice of future cancellation, termination, or failure to renew due to nonpayment of the premium, rather than upon the date of expiration.

(7) Each policy shall contain a provision allowing assignment of the policy to a successor owner or operator. Such assignment may be conditional upon consent of the insurer, provided such consent is not unreasonably refused.

(8) The policy shall provide that the insurer may not cancel, terminate, or fail to renew the policy except for failure to pay the premium. The automatic renewal of the policy shall, at a minimum, provide the insured with the option of renewal at the face amount of the expiring policy. If there is a failure to pay the premium, the insurer may elect to cancel, terminate, or fail to renew the policy by sending notice by certified mail to the owner or operator and the Director. Cancellation, termination, or failure to renew may not occur, however, during the 120 days beginning with the date of receipt of the notice by both the Director and the owner or operator, as evidenced by the return receipts. Cancellation, termination, or failure to renew may not occur and the policy will remain in full force and effect in the event that on or before the date of expiration:

(i) The Director deems the facility abandoned; or

(ii) Interim status is terminated or revoked; or

(iii) Closure is ordered by the Director or a U.S. district court or other court of competent jurisdiction; or

(iv) The owner or operator is named as debtor in a voluntary or involuntary proceeding under Title 11 (Bankruptcy), U.S. Code; or

(v) The premium due is paid.

(9) Whenever the current closure cost estimate increases to an amount greater than the face amount of the policy, the owner or operator, within 60 days after the increase, shall either cause the face amount to be increased to an amount at least equal to the current closure cost estimate and submit evidence of such increase to the Director, or obtain other financial assurance as specified in Section R315-265-143 to cover the increase. Whenever the current closure cost estimate decreases, the face amount may be reduced to the amount of the current closure cost estimate following written approval by the Director.

(10) The Director will give written consent to the owner or operator that he may terminate the insurance policy when:

(i) An owner or operator substitutes alternate financial assurance as specified in Section R315-265-143; or

(ii) The Director releases the owner or operator from the requirements of Section R315-265-143 in accordance with Subsection R315-265-143(h).

(e) Financial test and corporate guarantee for closure.

(1) An owner or operator may satisfy the requirements of Section R315-265-143 by demonstrating that he passes a financial test as specified in Subsection R315-265-143(e). To pass this test the owner or operator shall meet the criteria of either Subsection R315-265-143(e)(1)(i) or (ii):

(i) The owner or operator shall have:

(A) Two of the following three ratios: A ratio of total liabilities to net worth less than 2.0; a ratio of the sum of net income plus depreciation, depletion, and amortization to total liabilities greater than 0.1; and a ratio of current assets to current liabilities greater than 1.5; and

(B) Net working capital and tangible net worth each at least six times the sum of the current closure and post-closure cost estimates and the current plugging and abandonment cost estimates; and

(C) Tangible net worth of at least $10 million; and

(D) Assets located in the United States amounting to at least 90 percent of total assets or at least six times the sum of the current closure and post-closure cost estimates and the current plugging and abandonment cost estimates.

(ii) The owner or operator shall have:

(A) A current rating for his most recent bond issuance of AAA, AA, A, or BBB as issued by Standard and Poor's or Aaa, Aa, A, or Baa as issued by Moody's; and

(B) Tangible net worth at least six times the sum of the current closure and post-closure cost estimates and the current plugging and abandonment cost estimates; and

(C) Tangible net worth of at least $10 million; and

(D) Assets located in the United States amounting to at least 90 percent of total assets or at least six times the sum of the current closure and post-closure cost estimates and the current plugging and abandonment cost estimates.

(2) The phrase "current closure and post-closure cost estimates" as used in Subsection R315-265-143(e)(1) refers to the cost estimates required to be shown in paragraphs 1-4 of the letter from the owner's or operator's chief financial officer, for example see Subsection R315-264-151(f). The phrase "current plugging and abandonment cost estimates" as used in Subsection R315-265-143(e)(1) refers to the cost estimates required to be shown in paragraphs 1-4 of the letter from the owner's or operator's chief financial officer, for example see 40 CFR 144.70(f).

(3) To demonstrate that he meets this test, the owner or operator shall submit the following items to the Director:

(i) A letter signed by the owner's or operator's chief financial officer and worded as specified in Subsection R314-264-151(f); and

(ii) A copy of the independent certified public accountant's report on examination of the owner's or operator's financial statements for the latest completed fiscal year; and

(iii) A special report from the owner's or operator's independent certified public accountant to the owner or operator stating that:

(A) He has compared the data which the letter from the chief financial officer specifies as having been derived from the independently audited, year-end financial statements for the latest fiscal year with the amounts in such financial statements; and

(B) In connection with that procedure, no matters came to his attention which caused him to believe that the specified data should be adjusted.

(4) The owner or operator may obtain an extension of the time allowed for submission of the documents specified in

Subsection R315-265-143(e)(3) if the fiscal year of the owner or operator ends during the 90 days prior to the effective date of these regulations and if the year-end financial statements for that fiscal year will be audited by an independent certified public accountant. The extension will end no later than 90 days after the end of the owner's or operator's fiscal year. To obtain the extension, the owner's or operator's chief financial officer shall send, by the effective date of these regulations, a letter to the Director. This letter from the chief financial officer shall:

(i) Request the extension;

(ii) Certify that he has grounds to believe that the owner or operator meets the criteria of the financial test;

(iii) Specify for each facility to be covered by the test the EPA Identification Number, name, address, and current closure and post-closure cost estimates to be covered by the test;

(iv) Specify the date ending the owner's or operator's last complete fiscal year before the effective date of these regulations;

(v) Specify the date, no later than 90 days after the end of such fiscal year, when he will submit the documents specified in Subsection R315-265-143(e)(3); and

(vi) Certify that the year-end financial statements of the owner or operator for such fiscal year will be audited by an independent certified public accountant.

(5) After the initial submission of items specified in Subsection R315-265-143(e)(3), the owner or operator shall send updated information to the Director within 90 days after the close of each succeeding fiscal year. This information shall consist of all three items specified in Subsection R315-265-143(e)(3).

(6) If the owner or operator no longer meets the requirements of Subsection R315-265-143(e)(1), he shall send notice to the Director of intent to establish alternate financial assurance as specified in this section. The notice shall be sent by certified mail within 90 days after the end of the fiscal year for which the year-end financial data show that the owner or operator no longer meets the requirements. The owner or operator shall provide the alternate financial assurance within 120 days after the end of such fiscal year.

(7) The Director may, based on a reasonable belief that the owner or operator may no longer meet the requirements of Subsection R315-265-143(e)(1), require reports of financial condition at any time from the owner or operator in addition to those specified in Subsection R315-265-143(e)(3). If the Director finds, on the basis of such reports or other information, that the owner or operator no longer meets the requirements of Subsection R315-265-143(e)(1), the owner or operator shall provide alternate financial assurance as specified in Section R315-265-143 within 30 days after notification of such a finding.

(8) The Director may disallow use of this test on the basis of qualifications in the opinion expressed by the independent certified public accountant in his report on examination of the owner's or operator's financial statements, see Subsection R315-265-143(e)(3)(ii). An adverse opinion or a disclaimer of opinion will be cause for disallowance. The Director will evaluate other qualifications on an individual basis. The owner or operator shall provide alternate financial assurance as specified in this section within 30 days after notification of the disallowance.

(9) The owner or operator is no longer required to submit the items specified in Subsection R315-265-143(e)(3) when:

(i) An owner or operator substitutes alternate financial assurance as specified in Section R315-265-143; or

(ii) The Director releases the owner or operator from the requirements of Section R315-265-143 in accordance with Subsection R315-265-143(h).

(10) An owner or operator may meet the requirements of Section R315-265-143 by obtaining a written guarantee. The guarantor shall be the direct or higher-tier parent corporation of the owner or operator, a firm whose parent corporation is also the parent corporation of the owner or operator, or a firm with a "substantial business relationship" with the owner or operator. The guarantor shall meet the requirements for owners or operators in Subsections R315-265-143(e)(1) through (8) and shall comply with the terms of the guarantee. The wording of the guarantee shall be identical to the wording specified in Subsection R315-264-151(h). A certified copy of the guarantee shall accompany the items sent to the Director as specified in Subsection R315-265-143(e)(3). One of these items shall be the letter from the guarantor's chief financial officer. If the guarantor's parent corporation is also the parent corporation of the owner or operator, the letter shall describe the value received in consideration of the guarantee. If the guarantor is a firm with a "substantial business relationship" with the owner or operator, this letter shall describe this "substantial business relationship" and the value received in consideration of the guarantee. The terms of the guarantee shall provide that:

(i) If the owner or operator fails to perform final closure of a facility covered by the corporate guarantee in accordance with the closure plan and other interim status requirements whenever required to do so, the guarantor will do so or establish a trust fund as specified in Subsection R315-265-143(a) in the name of the owner or operator.

(ii) The corporate guarantee will remain in force unless the guarantor sends notice of cancellation by certified mail to the owner or operator and to the Director. Cancellation may not occur, however, during the 120 days beginning on the date of receipt of the notice of cancellation by both the owner or operator and the Director, as evidenced by the return receipts.

(iii) If the owner or operator fails to provide alternate financial assurance as specified in Section R315-265-143 and obtain the written approval of such alternate assurance from the Director within 90 days after receipt by both the owner or operator and the Director of a notice of cancellation of the corporate guarantee from the guarantor, the guarantor will provide such alternate financial assurance in the name of the owner or operator.

(f) Use of multiple financial mechanisms. An owner or operator may satisfy the requirements of Section R315-265-143 by establishing more than one financial mechanism per facility. These mechanisms are limited to trust funds, surety bonds, letters of credit, and insurance. The mechanisms shall be as specified in Subsections R315-265-143(a) through (d), respectively, except that it is the combination of mechanisms, rather than the single mechanism, which shall provide financial assurance for an amount at least equal to the current closure cost estimate. If an owner or operator uses a trust fund in combination with a surety bond or a letter of credit, he may use the trust fund as the standby trust fund for the other mechanisms. A single standby trust fund may be established for two or more mechanisms. The Director may use any or all of the mechanisms to provide for closure of the facility.

(g) Use of a financial mechanism for multiple facilities. An owner or operator may use a financial assurance mechanism specified in Section R315-265-143 to meet the requirements of Section R315-265-143 for more than one facility. Evidence of financial assurance submitted to the Director shall include a list showing, for each facility, the EPA Identification Number, name, address, and the amount of funds for closure assured by the mechanism. The amount of funds available through the mechanism shall be no less than the sum of funds that would be available if a separate mechanism had been established and maintained for each facility. In directing funds available through the mechanism for closure of any of the facilities covered by the mechanism, the Director may direct only the amount of funds designated for that facility, unless the owner or operator agrees to the use of additional funds available under

the mechanism.

(h) Release of the owner or operator from the requirements of Section R315-265-143. Within 60 days after receiving certifications from the owner or operator and a qualified Professional Engineer that final closure has been completed in accordance with the approved closure plan, the Director will notify the owner or operator in writing that he is no longer required by Section R315-265-143 to maintain financial assurance for final closure of the facility, unless the Director has reason to believe that final closure has not been in accordance with the approved closure plan. The Director shall provide the owner or operator a detailed written statement of any such reason to believe that closure has not been in accordance with the approved closure plan.

R315-265-144. Financial Requirements -- Cost Estimate for Post-Closure Care.

(a) The owner or operator of a hazardous waste disposal unit shall have a detailed written estimate, in current dollars, of the annual cost of post-closure monitoring and maintenance of the facility in accordance with the applicable post-closure regulations in Sections R315-265-117 through R315-265-120, R315-265-228, R315-265-258, and 40 CFR 265.280 and 265.310, which are adopted and incorporated by reference.

(1) The post-closure cost estimate shall be based on the costs to the owner or operator of hiring a third party to conduct post-closure care activities. A third party is a party who is neither a parent nor subsidiary of the owner or operator. See definition of parent corporation in Subsection R315-265-141(d).

(2) The post-closure cost estimate is calculated by multiplying the annual post-closure cost estimate by the number of years of post-closure care required under Section R315-265-117.

(b) During the active life of the facility, the owner or operator shall adjust the post-closure cost estimate for inflation within 60 days prior to the anniversary date of the establishment of the financial instrument(s) used to comply with Section R315-265-145. For owners or operators using the financial test or corporate guarantee, the post-closure care cost estimate shall be updated for inflation no later than 30 days after the close of the firm's fiscal year and before submission of updated information to the Director as specified in Subsection R315-265-145(d)(5). The adjustment may be made by recalculating the post-closure cost estimate in current dollars or by using an inflation factor derived from the most recent Implicit Price Deflator for Gross National Product published by the U.S. Department of Commerce in its Survey of Current Business as specified in Subsections R315-265-145(b)(1) and (2). The inflation factor is the result of dividing the latest published annual Deflator by the Deflator for the previous year.

(1) The first adjustment is made by multiplying the post-closure cost estimate by the inflation factor. The result is the adjusted post-closure cost estimate.

(2) Subsequent adjustments are made by multiplying the latest adjusted post-closure cost estimate by the latest inflation factor.

(c) During the active life of the facility, the owner or operator shall revise the post-closure cost estimate no later than 30 days after a revision to the post-closure plan which increases the cost of post-closure care. If the owner or operator has an approved post-closure plan, the post-closure cost estimate shall be revised no later than 30 days after the Director has approved the request to modify the plan, if the change in the post-closure plan increases the cost of post-closure care. The revised post-closure cost estimate shall be adjusted for inflation as specified in Subsection R315-265-144(b).

(d) The owner or operator shall keep the following at the facility during the operating life of the facility: the latest post-closure cost estimate prepared in accordance with Subsections R315-265-144(a) and (c) and, when this estimate has been adjusted in accordance with Subsection R315-265-144(b), the latest adjusted post-closure cost estimate.

R315-265-145. Financial Requirements -- Financial Assurance for Post-Closure Care.

By the effective date of these regulations, an owner or operator of a facility with a hazardous waste disposal unit must establish financial assurance for post-closure care of the disposal unit(s).

(a) Post-closure trust fund.

(1) An owner or operator may satisfy the requirements of Section R315-265-145 by establishing a post-closure trust fund which conforms to the requirements of Subsection R315-265-145(a) and submitting an originally signed duplicate of the trust agreement to the Director. The trustee shall be an entity which has the authority to act as a trustee and whose trust operations are regulated and examined by a Federal or Utah agency.

(2) The wording of the trust agreement shall be identical to the wording specified in Subsection R315-264-151(a)(1), and the trust agreement shall be accompanied by a formal certification of acknowledgment, for example see Subsection R315-264-151(a)(2). Schedule A of the trust agreement shall be updated within 60 days after a change in the amount of the current post-closure cost estimate covered by the agreement.

(3) Payments into the trust fund shall be made annually by the owner or operator over the 20 years beginning with the effective date of these regulations or over the remaining operating life of the facility as estimated in the closure plan, whichever period is shorter; this period is hereafter referred to as the "pay-in period." The payments into the post-closure trust fund shall be made as follows:

(i) The first payment shall be made by the effective date of these regulations, except as provided in Subsection R315-265-145(a)(5). The first payment shall be at least equal to the current post-closure cost estimate, except as provided in Subsection R315-265-145(f), divided by the number of years in the pay-in period.

(ii) Subsequent payments shall be made no later than 30 days after each anniversary date of the first payment. The amount of each subsequent payment must be determined by this formula: Next payment = (CE-CV)/Y, where CE is the current post-closure cost estimate, CV is the current value of the trust fund, and Y is the number of years remaining in the pay-in period.

(4) The owner or operator may accelerate payments into the trust fund or he may deposit the full amount of the current post-closure cost estimate at the time the fund is established. However, he shall maintain the value of the fund at no less than the value that the fund would have if annual payments were made as specified in Subsection R315-265-145(a)(3).

(5) If the owner or operator establishes a post-closure trust fund after having used one or more alternate mechanisms specified in this section, his first payment shall be in at least the amount that the fund would contain if the trust fund were established initially and annual payments made as specified in Subsection R315-265-145 (a)(3).

(6) After the pay-in period is completed, whenever the current post-closure cost estimate changes during the operating life of the facility, the owner or operator shall compare the new estimate with the trustee's most recent annual valuation of the trust fund. If the value of the fund is less than the amount of the new estimate, the owner or operator, within 60 days after the change in the cost estimate, shall either deposit an amount into the fund so that its value after this deposit at least equals the amount of the current post-closure cost estimate, or obtain other financial assurance as specified in Section R315-265-145 to cover the difference.

(7) During the operating life of the facility, if the value of

the trust fund is greater than the total amount of the current post-closure cost estimate, the owner or operator may submit a written request to the Director for release of the amount in excess of the current post-closure cost estimate.

(8) If an owner or operator substitutes other financial assurance as specified in this section for all or part of the trust fund, he may submit a written request to the Director for release of the amount in excess of the current post-closure cost estimate covered by the trust fund.

(9) Within 60 days after receiving a request from the owner or operator for release of funds as specified in Subsections R315-265-145(a) (7) or (8), the Director will instruct the trustee to release to the owner or operator such funds as the Director specifies in writing.

(10) During the period of post-closure care, the Director may approve a release of funds if the owner or operator demonstrates to the Director that the value of the trust fund exceeds the remaining cost of post-closure care.

(11) An owner or operator or any other person authorized to conduct post-closure care may request reimbursements for post-closure expenditures by submitting itemized bills to the Director. Within 60 days after receiving bills for post-closure care activities, the Director will instruct the trustee to make reimbursements in those amounts as the Director specifies in writing, if the Director determines that the post-closure expenditures are in accordance with the approved post-closure plan or otherwise justified. If the Director does not instruct the trustee to make such reimbursements, he will provide the owner or operator with a detailed written statement of reasons.

(12) The Director will agree to termination of the trust when:

(i) An owner or operator substitutes alternate financial assurance as specified in this section; or

(ii) The Director releases the owner or operator from the requirements of Section R315-265-145 in accordance with Subsection R315-265-145(h).

(b) Surety bond guaranteeing payment into a post-closure trust fund.

(1) An owner or operator may satisfy the requirements of Section R315-265-145 by obtaining a surety bond which conforms to the requirements of Subsection R315-265-145(b) and submitting the bond to the Director. The surety company issuing the bond must, at a minimum, be among those listed as acceptable sureties on Federal bonds in Circular 570 of the U.S. Department of the Treasury.

(2) The wording of the surety bond must be identical to the wording specified in Subsection R315-264-151(b).

(3) The owner or operator who uses a surety bond to satisfy the requirements of this section shall also establish a standby trust fund. Under the terms of the bond, all payments made thereunder will be deposited by the surety directly into the standby trust fund in accordance with instructions from the Director. This standby trust fund shall meet the requirements specified in Subsection R315-265-145(a), except that:

(i) An originally signed duplicate of the trust agreement shall be submitted to the Director with the surety bond; and

(ii) Until the standby trust fund is funded pursuant to the requirements of Section R315-265-145, the following are not required by these regulations:

(A) Payments into the trust fund as specified in Subsection R315-265-145(a);

(B) Updating of Schedule A of the trust agreement, see Subsection R315-264-151(a), to show current post-closure cost estimates;

(C) Annual valuations as required by the trust agreement; and

(D) Notices of nonpayment as required by the trust agreement.

(4) The bond shall guarantee that the owner or operator will:

(i) Fund the standby trust fund in an amount equal to the penal sum of the bond before the beginning of final closure of the facility; or

(ii) Fund the standby trust fund in an amount equal to the penal sum within 15 days after an administrative order to begin final closure issued by the Director becomes final, or within 15 days after an order to begin final closure is issued by a U.S. district court or other court of competent jurisdiction; or

(iii) Provide alternate financial assurance as specified in Section R315-265-145, and obtain the Director's written approval of the assurance provided, within 90 days after receipt by both the owner or operator and the Director of a notice of cancellation of the bond from the surety.

(5) Under the terms of the bond, the surety will become liable on the bond obligation when the owner or operator fails to perform as guaranteed by the bond.

(6) The penal sum of the bond shall be in an amount at least equal to the current post-closure cost estimate, except as provided in Subsection R315-265-145(f).

(7) Whenever the current post-closure cost estimate increases to an amount greater than the penal sum, the owner or operator, within 60 days after the increase, shall either cause the penal sum to be increased to an amount at least equal to the current post-closure cost estimate and submit evidence of such increase to the Director, or obtain other financial assurance as specified in Section R315-265-145 to cover the increase. Whenever the current post-closure cost estimate decreases, the penal sum may be reduced to the amount of the current post-closure cost estimate following written approval by the Director.

(8) Under the terms of the bond, the surety may cancel the bond by sending notice of cancellation by certified mail to the owner or operator and to the Director. Cancellation may not occur, however, during the 120 days beginning on the date of receipt of the notice of cancellation by both the owner or operator and the Director, as evidenced by the return receipts.

(9) The owner or operator may cancel the bond if the Director has given prior written consent based on his receipt of evidence of alternate financial assurance as specified in Section R315-265-145.

(c) Post-closure letter of credit.

(1) An owner or operator may satisfy the requirements of Section R315-265-145 by obtaining an irrevocable standby letter of credit which conforms to the requirements of Subsection R315-265-145(c) and submitting the letter to the Director. The issuing institution shall be an entity which has the authority to issue letters of credit and whose letter-of-credit operations are regulated and examined by a Federal or Utah agency.

(2) The wording of the letter of credit shall be identical to the wording specified in Subsection R315-264-151(d).

(3) An owner or operator who uses a letter of credit to satisfy the requirements of this section shall also establish a standby trust fund. Under the terms of the letter of credit, all amounts paid pursuant to a draft by the Director will be deposited by the issuing institution directly into the standby trust fund in accordance with instructions from the Director. This standby trust fund must meet the requirements of the trust fund specified in Subsection R315-265-145(a), except that:

(i) An originally signed duplicate of the trust agreement shall be submitted to the Director with the letter of credit; and

(ii) Unless the standby trust fund is funded pursuant to the requirements of Section R315-265-145, the following are not required by these regulations:

(A) Payments into the trust fund as specified in Subsection R315-265-145(a);

(B) Updating of Schedule A of the trust agreement, see Subsection R315-264-151(a), to show current post-closure cost estimates;

(C) Annual valuations as required by the trust agreement; and

(D) Notices of nonpayment as required by the trust agreement.

4) The letter of credit shall be accompanied by a letter from the owner or operator referring to the letter of credit by number, issuing institution, and date, and providing the following information: The EPA Identification Number, name, and address of the facility, and the amount of funds assured for post-closure care of the facility by the letter of credit.

(5) The letter of credit shall be irrevocable and issued for a period of at least one year. The letter of credit shall provide that the expiration date will be automatically extended for a period of at least one year unless, at least 120 days before the current expiration date, the issuing institution notifies both the owner or operator and the Director by certified mail of a decision not to extend the expiration date. Under the terms of the letter of credit, the 120 days will begin on the date when both the owner or operator and the Director have received the notice, as evidenced by the return receipts.

(6) The letter of credit shall be issued in an amount at least equal to the current post-closure cost estimate, except as provided in Subsection R315-265-145(f).

(7) Whenever the current post-closure cost estimate increases to an amount greater than the amount of the credit during the operating life of the facility, the owner or operator, within 60 days after the increase, shall either cause the amount of the credit to be increased so that it at least equals the current post-closure cost estimate and submit evidence of such increase to the Director, or obtain other financial assurance as specified in Section R315-265-145 to cover the increase. Whenever the current post-closure cost estimate decreases during the operating life of the facility, the amount of the credit may be reduced to the amount of the current post-closure cost estimate following written approval by the Director.

(8) During the period of post-closure care, the Director may approve a decrease in the amount of the letter of credit if the owner or operator demonstrates to the Director that the amount exceeds the remaining cost of post-closure care.

(9) Following a final administrative determination that the owner or operator has failed to perform post-closure care in accordance with the approved post-closure plan and other permit requirements, the Director may draw on the letter of credit.

(10) If the owner or operator does not establish alternate financial assurance as specified in Section R315-265-145 and obtain written approval of such alternate assurance from the Director within 90 days after receipt by both the owner or operator and the Director of a notice from the issuing institution that it has decided not to extend the letter of credit beyond the current expiration date, the Director will draw on the letter of credit. The Director may delay the drawing if the issuing institution grants an extension of the term of the credit. During the last 30 days of any such extension the Director will draw on the letter of credit if the owner or operator has failed to provide alternate financial assurance as specified in Section R315-265-145 and obtain written approval of such assurance from the Director.

(11) The Director will return the letter of credit to the issuing institution for termination when:

(i) An owner or operator substitutes alternate financial assurance as specified in Section R315-265-145; or

(ii) The Director releases the owner or operator from the requirements of Section R315-265-145 in accordance with Subsection R315-265-145(h).

(d) Post-closure insurance.

(1) An owner or operator may satisfy the requirements of Section R315-265-145 by obtaining post-closure insurance which conforms to the requirements of Subsection R315-265-145(d) and submitting a certificate of such insurance to the Director. By the effective date of these regulations the owner or operator shall submit to the Director a letter from an insurer stating that the insurer is considering issuance of post- closure insurance conforming to the requirements of Subsection R315-265-145(d) to the owner or operator. Within 90 days after the effective date of these regulations, the owner or operator shall submit the certificate of insurance to the Director or establish other financial assurance as specified in Section R315-265-145. At a minimum, the insurer shall be licensed to transact the business of insurance, or eligible to provide insurance as an excess or surplus lines insurer, in one or more States.

(2) The wording of the certificate of insurance shall be identical to the wording specified in Subsection R315-264-151(e).

(3) The post-closure insurance policy shall be issued for a face amount at least equal to the current post-closure cost estimate, except as provided in Subsection R315-265-145(f). The term "face amount" means the total amount the insurer is obligated to pay under the policy. Actual payments by the insurer will not change the face amount, although the insurer's future liability will be lowered by the amount of the payments.

(4) The post-closure insurance policy shall guarantee that funds will be available to provide post-closure care of the facility whenever the post-closure period begins. The policy shall also guarantee that once post-closure care begins the insurer will be responsible for paying out funds, up to an amount equal to the face amount of the policy, upon the direction of the Director, to such party or parties as the Director specifies.

(5) An owner or operator or any other person authorized to perform post-closure care may request reimbursement for post-closure care expenditures by submitting itemized bills to the Director. Within 60 days after receiving bills for post-closure care activities, the Director will instruct the insurer to make reimbursements in those amounts as the Director specifies in writing, if the Director determines that the post-closure expenditures are in accordance with the approved post-closure plan or otherwise justified. If the Director does not instruct the insurer to make such reimbursements, he will provide a detailed written statement of reasons.

(6) The owner or operator shall maintain the policy in full force and effect until the Director consents to termination of the policy by the owner or operator as specified in Subsection R315-265-145(d)(11). Failure to pay the premium, without substitution of alternate financial assurance as specified in the section, will constitute a significant violation of these regulations, warranting such remedy as the Director deems necessary. Such violation will be deemed to begin upon receipt by the Director of a notice of future cancellation, termination, or failure to renew due to nonpayment of the premium, rather than upon the date of expiration.

(7) Each policy shall contain a provision allowing assignment of the policy to a successor owner or operator. Such assignment may be conditional upon consent of the insurer, provided such consent is not unreasonably refused.

(8) The policy shall provide that the insurer may not cancel, terminate, or fail to renew the policy except for failure to pay the premium. The automatic renewal of the policy must, at a minimum, provide the insured with the option of renewal at the face amount of the expiring policy. If there is a failure to pay the premium, the insurer may elect to cancel, terminate, or fail to renew the policy by sending notice by certified mail to the owner or operator and the Director. Cancellation, termination, or failure to renew may not occur, however, during the 120 days beginning with the date of receipt of the notice by both the Director and the owner or operator, as evidenced by the return receipts. Cancellation, termination, or failure to renew may not occur and the policy will remain in full force and effect in the

event that on or before the date of expiration:

(i) The Director deems the facility abandoned; or

(ii) Interim status is terminated or revoked; or

(iii) Closure is ordered by the Director or a U.S. district court or other court of competent jurisdiction; or

(iv) The owner or operator is named as debtor in a voluntary or involuntary proceeding under Title 11 (Bankruptcy), U.S. Code; or

(v) The premium due is paid.

(9) Whenever the current post-closure cost estimate increases to an amount greater than the face amount of the policy during the operating life of the facility, the owner or operator, within 60 days after the increase, shall either cause the face amount to be increased to an amount at least equal to the current post-closure cost estimate and submit evidence of such increase to the Director, or obtain other financial assurance as specified in Section R315-265-145 to cover the increase. Whenever the current post-closure cost estimate decreases during the operating life of the facility, the face amount may be reduced to the amount of the current post-closure cost estimate following written approval by the Director.

(10) Commencing on the date that liability to make payments pursuant to the policy accrues, the insurer will thereafter annually increase the face amount of the policy. Such increase shall be equivalent to the face amounts of the policy, less any payments made, multiplied by an amount equivalent to 85 percent of the most recent investment rate or of the equivalent coupon-issue yield announced by the U.S. Treasury for 26-week Treasury securities.

(11) The Director will give written consent to the owner or operator that he may terminate the insurance policy when:

(i) An owner or operator substitutes alternate financial assurance as specified in Section R315-265-145; or

(ii) The Director releases the owner or operator from the requirements of Section R315-265-145 in accordance with Subsection R315-265-145(h).

(e) Financial test and corporate guarantee for post-closure care.

(1) An owner or operator may satisfy the requirements of Section R315-265-145 by demonstrating that he passes a financial test as specified in Subsection R315-265-145(e). To pass this test the owner or operator shall meet the criteria either of Subsections R315-265-145(e)(1)(i) or (ii):

(i) The owner or operator shall have:

(A) Two of the following three ratios: a ratio of total liabilities to net worth less than 2.0; a ratio of the sum of net income plus depreciation, depletion, and amortization to total liabilities greater than 0.1; and a ratio of current assets to current liabilities greater than 1.5; and

(B) Net working capital and tangible net worth each at least six times the sum of the current closure and post-closure cost estimates and the current plugging and abandonment cost estimates; and

(C) Tangible net worth of at least $10 million; and

(D) Assets in the United States amounting to at least 90 percent of his total assets or at least six times the sum of the current closure and post-closure cost estimates and the current plugging and abandonment cost estimates.

(ii) The owner or operator shall have:

(A) A current rating for his most recent bond issuance of AAA, AA, A, or BBB as issued by Standard and Poor's or Aaa, Aa, A, or Baa as issued by Moody's; and

(B) Tangible net worth at least six times the sum of the current closure and post-closure cost estimates and the current plugging and abandonment cost estimates; and

(C) Tangible net worth of at least $10 million; and

(D) Assets located in the United States amounting to at least 90 percent of his total assets or at least six times the sum of the current closure and post-closure cost estimates and the current plugging and abandonment cost estimates.

(2) The phrase "current closure and post-closure cost estimates" as used in Subsection R315-265-145(e)(1) refers to the cost estimates required to be shown in paragraphs 1-4 of the letter from the owner's or operator's chief financial officer, for example see Subsection R315-264-151(f). The phrase "current plugging and abandonment cost estimates" as used in Subsection R315-265-145(e)(1) refers to the cost estimates required to be shown in paragraphs 1-4 of the letter from the owner's or operator's chief financial officer, for example see 40 CFR 144.70(f).

(3) To demonstrate that he meets this test, the owner or operator shall submit the following items to the Director:

(i) A letter signed by the owner's or operator's chief financial officer and worded as specified in Subsection R315-264-151(f); and

(ii) A copy of the independent certified public accountant's report on examination of the owner's or operator's financial statements for the latest completed fiscal year; and

(iii) A special report from the owner's or operator's independent certified public accountant to the owner or operator stating that:

(A) He has compared the data which the letter from the chief financial officer specifies as having been derived from the independently audited, year-end financial statements for the latest fiscal year with the amounts in such financial statements; and

(B) In connection with that procedure, no matters came to his attention which caused him to believe that the specified data should be adjusted.

(4) The owner or operator may obtain an extension of the time allowed for submission of the documents specified in Subsection R315-265-145(e)(3) if the fiscal year of the owner or operator ends during the 90 days prior to the effective date of these regulations and if the year-end financial statements for that fiscal year will be audited by an independent certified public accountant. The extension will end no later than 90 days after the end of the owner's or operator's fiscal year. To obtain the extension, the owner's or operator's chief financial officer shall send, by the effective date of these regulations, a letter to the Director. This letter from the chief financial officer shall:

(i) Request the extension;

(ii) Certify that he has grounds to believe that the owner or operator meets the criteria of the financial test;

(iii) Specify for each facility to be covered by the test the EPA Identification Number, name, address, and the current closure and post-closure cost estimates to be covered by the test;

(iv) Specify the date ending the owner's or operator's latest complete fiscal year before the effective date of these regulations;

(v) Specify the date, no later than 90 days after the end of such fiscal year, when he will submit the documents specified in Subsection R315-265-145(e)(3); and

(vi) Certify that the year-end financial statements of the owner or operator for such fiscal year will be audited by an independent certified public accountant.

(5) After the initial submission of items specified in Subsection R315-265-145(e)(3), the owner or operator shall send updated information to the Director within 90 days after the close of each succeeding fiscal year. This information must consist of all three items specified in Subsection R315-265-145(e)(3).

(6) If the owner or operator no longer meets the requirements of Subsection R315-265-145 (e)(1), he shall send notice to the Director of intent to establish alternate financial assurance as specified in Section R315-265-145. The notice shall be sent by certified mail within 90 days after the end of the fiscal year for which the year-end financial data show that the owner or operator no longer meets the requirements. The owner

or operator shall provide the alternate financial assurance within 120 days after the end of such fiscal year.

(7) The Director may, based on a reasonable belief that the owner or operator may no longer meet the requirements of Subsection R315-265-145(e)(1), require reports of financial condition at any time from the owner or operator in addition to those specified in Subsection R315-265-145(e)(3). If the Director finds, on the basis of such reports or other information, that the owner or operator no longer meets the requirements of Subsection R315-265-145(e)(1), the owner or operator shall provide alternate financial assurance as specified in Section R315-265-145 within 30 days after notification of such a finding.

(8) The Director may disallow use of this test on the basis of qualifications in the opinion expressed by the independent certified public accountant in his report on examination of the owner's or operator's financial statements, see Subsection R315-265-145(e)(3)(ii). An adverse opinion or a disclaimer of opinion will be cause for disallowance. The Director will evaluate other qualifications on an individual basis. The owner or operator shall provide alternate financial assurance as specified in Section R315-265-145 within 30 days after notification of the disallowance.

(9) During the period of post-closure care, the Director may approve a decrease in the current post-closure cost estimate for which this test demonstrates financial assurance if the owner or operator demonstrates to the Director that the amount of the cost estimate exceeds the remaining cost of post-closure care.

(10) The owner or operator is no longer required to submit the items specified in Subsection R315-265-145(e)(3) when:

(i) An owner or operator substitutes alternate financial assurance as specified in Section R315-265-145; or

(ii) The Director releases the owner or operator from the requirements of Section R315-265-145 in accordance with Subsection R315-265-145(h).

(11) An owner or operator may meet the requirements of Section R315-265-145 by obtaining a written guarantee. The guarantor shall be the direct or higher-tier parent corporation of the owner or operator, a firm whose parent corporation is also the parent corporation of the owner or operator, or a firm with a "substantial business relationship" with the owner or operator. The guarantor shall meet the requirements for owners or operators in Subsections R315-265-145(e)(1) through (9) and shall comply with the terms of the guarantee. The wording of the guarantee shall be identical to the wording specified in Subsection R315-264-151(h). A certified copy of the guarantee shall accompany the items sent to the Director as specified in Subsection R315-265-145(e)(3). One of these items shall be the letter from the guarantor's chief financial officer. If the guarantor's parent corporation is also the parent corporation of the owner or operator, the letter shall describe the value received in consideration of the guarantee. If the guarantor is a firm with a "substantial business relationship" with the owner or operator, this letter shall describe this "substantial business relationship" and the value received in consideration of the guarantee. The terms of the guarantee must provide that:

(i) If the owner or operator fails to perform post-closure care of a facility covered by the corporate guarantee in accordance with the post-closure plan and other interim status requirements whenever required to do so, the guarantor will do so or establish a trust fund as specified in Subsection R315-265-145(a) in the name of the owner or operator.

(ii) The corporate guarantee will remain in force unless the guarantor sends notice of cancellation by certified mail to the owner or operator and to the Director. Cancellation may not occur, however, during the 120 days beginning on the date of receipt of the notice of cancellation by both the owner or operator and the Director, as evidenced by the return receipts.

(iii) If the owner or operator fails to provide alternate financial assurance as specified in Section R315-265-145 and obtain the written approval of such alternate assurance from the Director within 90 days after receipt by both the owner or operator and the Director of a notice of cancellation of the corporate guarantee from the guarantor, the guarantor will provide such alternate financial assurance in the name of the owner or operator.

(f) Use of multiple financial mechanisms. An owner or operator may satisfy the requirements of Section R315-265-145 by establishing more than one financial mechanism per facility. These mechanisms are limited to trust funds, surety bonds, letters of credit, and insurance. The mechanisms must be as specified in Subsections R315-265-145(a) through (d), respectively, of this section, except that it is the combination of mechanisms, rather than the single mechanism, which shall provide financial assurance for an amount at least equal to the current post-closure cost estimate. If an owner or operator uses a trust fund in combination with a surety bond or a letter of credit, he may use the trust fund as the standby trust fund for the other mechanisms. A single standby trust fund may be established for two or more mechanisms. The Director may use any or all of the mechanisms to provide for post-closure care of the facility.

(g) Use of a financial mechanism for multiple facilities. An owner or operator may use a financial assurance mechanism specified in Section R315-265-145 to meet the requirements of Section R315-265-145 for more than one facility. Evidence of financial assurance submitted to the Director shall include a list showing, for each facility, the EPA Identification Number, name, address, and the amount of funds for post-closure care assured by the mechanism. The amount of funds available through the mechanism shall be no less than the sum of funds that would be available if a separate mechanism had been established and maintained for each facility. In directing funds available through the mechanism for post-closure care of any of the facilities covered by the mechanism, the Director may direct only the amount of funds designated for that facility, unless the owner or operator agrees to the use of additional funds available under the mechanism.

(h) Release of the owner or operator from the requirements of Section R315-265-145. Within 60 days after receiving certifications from the owner or operator and a qualified Professional Engineer that the post-closure care period has been completed for a hazardous waste disposal unit in accordance with the approved plan, the Director will notify the owner or operator in writing that he is no longer required to maintain financial assurance for post-closure care of that unit, unless the Director has reason to believe that post-closure care has not been in accordance with the approved post-closure plan. The Director shall provide the owner or operator a detailed written statement of any such reason to believe that post-closure care has not been in accordance with the approved post-closure plan.

R315-265-146. Financial Requirements -- Use of a Mechansim for Financial Assurance of Both Closure and Post-Closure Care.

An owner or operator may satisfy the requirements for financial assurance for both closure and post-closure care for one or more facilities by using a trust fund, surety bond, letter of credit, insurance, financial test, or corporate guarantee that meets the specifications for the mechanism in both Sections R315-265-143 and R315-265-145. The amount of funds available through the mechanism shall be no less than the sum of funds that would be available if a separate mechanism had been established and maintained for financial assurance of closure and of post-closure care.

R315-265-147. Financial Requirements -- Liability Requirements.

(a) Coverage for sudden accidental occurrences. An owner or operator of a hazardous waste treatment, storage, or disposal facility, or a group of such facilities, shall demonstrate financial responsibility for bodily injury and property damage to third parties caused by sudden accidental occurrences arising from operations of the facility or group of facilities. The owner or operator shall have and maintain liability coverage for sudden accidental occurrences in the amount of at least $1 million per occurrence with an annual aggregate of at least $2 million, exclusive of legal defense costs. This liability coverage may be demonstrated as specified in Subsections R315-265-147(a)(1), (2), (3), (4), (5), or (6):

(1) An owner or operator may demonstrate the required liability coverage by having liability insurance as specified in Subsection R315-265-147(a)(1).

(i) Each insurance policy shall be amended by attachment of the Hazardous Waste Facility Liability Endorsement, or evidenced by a Certificate of Liability Insurance. The wording of the endorsement shall be identical to the wording specified in Subsection R315-264-151(i). The wording of the certificate of insurance shall be identical to the wording specified in Subsection R315-264-151(j). The owner or operator shall submit a signed duplicate original of the endorsement or the certificate of insurance to the Director. If requested by the Director, the owner or operator shall provide a signed duplicate original of the insurance policy.

(ii) Each insurance policy shall be issued by an insurer which, at a minimum, is licensed to transact the business of insurance, or eligible to provide insurance as an excess or surplus lines insurer, in one or more States.

(2) An owner or operator may meet the requirements of Section R315-265-147 by passing a financial test or using the guarantee for liability coverage as specified in Subsections R315-265-147(f) and (g).

(3) An owner or operator may meet the requirements of Section R315-265-147 by obtaining a letter of credit for liability coverage as specified in Subsection R315-265-147(h).

(4) An owner or operator may meet the requirements of Section R315-265-147 by obtaining a surety bond for liability coverage as specified in Subsection R315-265-147(i).

(5) An owner or operator may meet the requirements of Section R315-265-147 by obtaining a trust fund for liability coverage as specified in Subsection R315-265-147(j).

(6) An owner or operator may demonstrate the required liability coverage through the use of combinations of insurance, financial test, guarantee, letter of credit, surety bond, and trust fund, except that the owner or operator may not combine a financial test covering part of the liability coverage requirement with a guarantee unless the financial statement of the owner or operator is not consolidated with the financial statement of the guarantor. The amounts of coverage demonstrated shall total at least the minimum amounts required by Section R315-265-147. If the owner or operator demonstrates the required coverage through the use of a combination of financial assurances under Subsection R315-265-147(a)(6), the owner or operator shall specify at least one such assurance as "primary" coverage and shall specify other assurance as "excess" coverage.

(7) An owner or operator shall notify the Director in writing within 30 days whenever:

(i) A claim results in a reduction in the amount of financial assurance for liability coverage provided by a financial instrument authorized in SubSections R315-265-147(a)(1) through (a)(6); or

(ii) A Certification of Valid Claim for bodily injury or property damages caused by a sudden or non-sudden accidental occurrence arising from the operation of a hazardous waste treatment, storage, or disposal facility is entered between the owner or operator and third-party claimant for liability coverage under Subsections R315-265-147(a)(1) through (a)(6); or

(iii) A final court order establishing a judgment for bodily injury or property damage caused by a sudden or non-sudden accidental occurrence arising from the operation of a hazardous waste treatment, storage, or disposal facility is issued against the owner or operator or an instrument that is providing financial assurance for liability coverage under Subsections R315-265-147(a)(1) through (a)(6).

(b) Coverage for nonsudden accidental occurrences. An owner or operator of a surface impoundment, landfill, or land treatment facility which is used to manage hazardous waste, or a group of such facilities, shall demonstrate financial responsibility for bodily injury and property damage to third parties caused by nonsudden accidental occurrences arising from operations of the facility or group of facilities. The owner or operator shall have and maintain liability coverage for nonsudden accidental occurrences in the amount of at least $3 million per occurrence with an annual aggregate of at least $6 million, exclusive of legal defense costs. An owner or operator who must meet the requirements of Section R315-265-147 may combine the required per-occurrence coverage levels for sudden and nonsudden accidental occurrences into a single per-occurrence level, and combine the required annual aggregate coverage levels for sudden and nonsudden accidental occurrences into a single annual aggregate level. Owners or operators who combine coverage levels for sudden and nonsudden accidental occurrences shall maintain liability coverage in the amount of at least $4 million per occurrence and $8 million annual aggregate. This liability coverage may be demonstrated as specified in Subsections R315-265-147(b)(1), (2), (3), (4), (5), or (6):

(1) An owner or operator may demonstrate the required liability coverage by having liability insurance as specified in Subsection R315-265-147(b)(1).

(i) Each insurance policy shall be amended by attachment of the Hazardous Waste Facility Liability Endorsement or evidenced by a Certificate of Liability Insurance. The wording of the endorsement shall be identical to the wording specified in Subsection R315-264-151(i). The wording of the certificate of insurance shall be identical to the wording specified in Subsection R315-264-151(j). The owner or operator shall submit a signed duplicate original of the endorsement or the certificate of insurance to the Director. If requested by the Director, the owner or operator must provide a signed duplicate original of the insurance policy.

(ii) Each insurance policy shall be issued by an insurer which, at a minimum, is licensed to transact the business of insurance, or eligible to provide insurance as an excess or surplus lines insurer, in one or more States.

(2) An owner or operator may meet the requirements of Section R315-265-147 by passing a financial test or using the guarantee for liability coverage as specified in Subsections R315-265-147(f) and (g).

(3) An owner or operator may meet the requirements of Section R315-265-147 by obtaining a letter of credit for liability coverage as specified in Subsection R315-265-147(h).

(4) An owner or operator may meet the requirements of Section R315-265-147 by obtaining a surety bond for liability coverage as specified in Subsection R315-265-147(i).

(5) An owner or operator may meet the requirements of Section R315-265-147 by obtaining a trust fund for liability coverage as specified in Subsection R315-265-147(j).

(6) An owner or operator may demonstrate the required liability coverage through the use of combinations of insurance, financial test, guarantee, letter of credit, surety bond, and trust fund, except that the owner or operator may not combine a financial test covering part of the liability coverage requirement with a guarantee unless the financial statement of the owner or operator is not consolidated with the financial statement of the guarantor. The amounts of coverage demonstrated shall total at

least the minimum amounts required by Section R315-265-147. If the owner or operator demonstrates the required coverage through the use of a combination of financial assurances under Subsection R315-265-147(b), the owner or operator shall specify at least one such assurance as "primary" coverage and shall specify other assurance as "excess" coverage.

(7) An owner or operator shall notify the Director in writing within 30 days whenever:

(i) A claim results in a reduction in the amount of financial assurance for liability coverage provided by a financial instrument authorized in Subsections R315-265-147(b)(1) through (b)(6); or

(ii) A Certification of Valid Claim for bodily injury or property damages caused by a sudden or non-sudden accidental occurrence arising from the operation of a hazardous waste treatment, storage, or disposal facility is entered between the owner or operator and third-party claimant for liability coverage under Subsections R315-265-147(b)(1) through (b)(6); or

(iii) A final court order establishing a judgment for bodily injury or property damage caused by a sudden or non-sudden accidental occurrence arising from the operation of a hazardous waste treatment, storage, or disposal facility is issued against the owner or operator or an instrument that is providing financial assurance for liability coverage under Subsections R315-265-147(b)(1) through (b)(6).

(c) Request for an exception. If an owner or operator can demonstrate to the satisfaction of the Director that the levels of financial responsibility required by Subsections R315-265-147(a) or (b) are not consistent with the degree and duration of risk associated with treatment, storage, or disposal at the facility or group of facilities, the owner or operator may obtain an exception from the Director. The request for an exception must be submitted in writing to the Director. If granted, the exception will take the form of an adjusted level of required liability coverage, such level to be based on the Director's assessment of the degree and duration of risk associated with the ownership or operation of the facility or group of facilities. The Director may require an owner or operator who requests an exception to provide such technical and engineering information as is deemed necessary by the Director to determine a level of financial responsibility other than that required by Subsections R315-265-147(a) or (b). The Director will process an exception request as if it were a permit modification request under Subsection R315-270-41(a)(5) and subject to the procedures of Section R315-124-5. Notwithstanding any other provision, the Director may hold a public hearing at his discretion or whenever he finds, on the basis of requests for a public hearing, a significant degree of public interest in a tentative decision to grant an exception.

(d) Adjustments by the Director. If the Director determines that the levels of financial responsibility required by Subsections R315-265-147(a) or (b) are not consistent with the degree and duration of risk associated with treatment, storage, or disposal at the facility or group of facilities, the Director may adjust the level of financial responsibility required under Subsection R315-265-147(a) or (b) as may be necessary to protect human health and the environment. This adjusted level will be based on the Director's assessment of the degree and duration of risk associated with the ownership or operation of the facility or group of facilities. In addition, if the Director determines that there is a significant risk to human health and the environment from nonsudden accidental occurrences resulting from the operations of a facility that is not a surface impoundment, landfill, or land treatment facility, he may require that an owner or operator of the facility comply with Subsection R315-265-147(b). An owner or operator shall furnish to the Director, within a reasonable time, any information which the Director requests to determine whether cause exists for such adjustments of level or type of coverage. The Director will process an adjustment of the level of required coverage as if it were a permit modification under Subsection R315-270-41(a)(5) and subject to the procedures of Section R315-124-5. Notwithstanding any other provision, the Director may hold a public hearing at his discretion or whenever he finds, on the basis of requests for a public hearing, a significant degree of public interest in a tentative decision to adjust the level or type of required coverage.

(e) Period of coverage. Within 60 days after receiving certifications from the owner or operator and a qualified Professional Engineer that final closure has been completed in accordance with the approved closure plan, the Director will notify the owner or operator in writing that he is no longer required by Section R315-265-147 to maintain liability coverage for that facility, unless the Director has reason to believe that closure has not been in accordance with the approved closure plan.

(f) Financial test for liability coverage.

(1) An owner or operator may satisfy the requirements of Section R315-265-147 by demonstrating that he passes a financial test as specified in this Subsection R315-265-147(f). To pass this test the owner or operator shall meet the criteria of Subsections R315-265-147(f)(1)(i) or (ii):

(i) The owner or operator shall have:

(A) Net working capital and tangible net worth each at least six times the amount of liability coverage to be demonstrated by this test; and

(B) Tangible net worth of at least $10 million; and

(C) Assets in the United States amounting to either: (1) At least 90 percent of his total assets; or (2) at least six times the amount of liability coverage to be demonstrated by this test.

(ii) The owner or operator shall have:

(A) A current rating for his most recent bond issuance of AAA, AA, A, or BBB as issued by Standard and Poor's, or Aaa, Aa, A, or Baa as issued by Moody's; and

(B) Tangible net worth of at least $10 million; and

(C) Tangible net worth at least six times the amount of liability coverage to be demonstrated by this test; and

(D) Assets in the United States amounting to either: (1) At least 90 percent of his total assets; or (2) at least six times the amount of liability coverage to be demonstrated by this test.

(2) The phrase "amount of liability coverage" as used in Subsection R315-265-147(f)(1) refers to the annual aggregate amounts for which coverage is required under Subsections R315-265-147(a) and (b).

(3) To demonstrate that he meets this test, the owner or operator shall submit the following three items to the Director:

(i) A letter signed by the owner's or operator's chief financial officer and worded as specified in Subsection R315-264-151(g). If an owner or operator is using the financial test to demonstrate both assurance for closure or post-closure care, as specified by Subsections R315-264-143(f), R315-264-145(f), R315-265-143(e), and R315-265-145(e), and liability coverage, he shall submit the letter specified in Subsection R315-264-151(g) to cover both forms of financial responsibility; a separate letter as specified in Subsection R315-264-151(f) is not required.

(ii) A copy of the independent certified public accountant's report on examination of the owner's or operator's financial statements for the latest completed fiscal year.

(iii) A special report from the owner's or operator's independent certified public accountant to the owner or operator stating that:

(A) He has compared the data which the letter from the chief financial officer specifies as having been derived from the independently audited, year-end financial statements for the latest fiscal year with the amounts in such financial statements; and

(B) In connection with that procedure, no matters came to

his attention which caused him to believe that the specified data should be adjusted.

(4) The owner or operator may obtain a one-time extension of the time allowed for submission of the documents specified in Subsection R315-265-147(f)(3) if the fiscal year of the owner or operator ends during the 90 days prior to the effective date of these regulations and if the year-end financial statements for that fiscal year will be audited by an independent certified public accountant. The extension will end no later than 90 days after the end of the owner's or operator's fiscal year. To obtain the extension, the owner's or operator's chief financial officer shall send, by the effective date of these regulations, a letter to the Director. This letter from the chief financial officer shall:

(i) Request the extension;

(ii) Certify that he has grounds to believe that the owner or operator meets the criteria of the financial test;

(iii) Specify for each facility to be covered by the test the EPA Identification Number, name, address, the amount of liability coverage and, when applicable, current closure and post-closure cost estimates to be covered by the test;

(iv) Specify the date ending the owner's or operator's last complete fiscal year before the effective date of these regulations;

(v) Specify the date, no later than 90 days after the end of such fiscal year, when he will submit the documents specified in Subsection R315-265-147(f)(3); and

(vi) Certify that the year-end financial statements of the owner or operator for such fiscal year will be audited by an independent certified public accountant.

(5) After the initial submission of items specified in Subsection R315-265-147(f)(3), the owner or operator shall send updated information to the Director within 90 days after the close of each succeeding fiscal year. This information must consist of all three items specified in Subsection R315-265-147(f)(3).

(6) If the owner or operator no longer meets the requirements of Subsection R315-265-147(f)(1), he shall obtain insurance, a letter of credit, a surety bond, a trust fund, or a guarantee for the entire amount of required liability coverage as specified in Section R315-265-147. Evidence of liability coverage must be submitted to the Director within 90 days after the end of the fiscal year for which the year-end financial data show that the owner or operator no longer meets the test requirements.

(7) The Director may disallow use of this test on the basis of qualifications in the opinion expressed by the independent certified public accountant in his report on examination of the owner's or operator's financial statements, see Subsection R315-265-147(f)(3)(ii). An adverse opinion or a disclaimer of opinion will be cause for disallowance. The Director will evaluate other qualifications on an individual basis. The owner or operator shall provide evidence of insurance for the entire amount of required liability coverage as specified in Section R315-265-147 within 30 days after notification of disallowance.

(g) Guarantee for liability coverage.

(1) Subject to Subsection R315-265-147(g)(2), an owner or operator may meet the requirements of Section R315-265-147 by obtaining a written guarantee, hereinafter referred to as "guarantee." The guarantor shall be the direct or higher-tier parent corporation of the owner or operator, a firm whose parent corporation is also the parent corporation of the owner or operator, or a firm with a "substantial business relationship" with the owner or operator. The guarantor shall meet the requirements for owners or operators in Subsections R315-265-147(f)(1) through (f)(6). The wording of the guarantee must be identical to the wording specified in Subsection R315-264-151(h)(2). A certified copy of the guarantee shall accompany the items sent to the Director as specified in Subsection R315-265-147(f)(3). One of these items shall be the letter from the guarantor's chief financial officer. If the guarantor's parent corporation is also the parent corporation of the owner or operator, this letter shall describe the value received in consideration of the guarantee. If the guarantor is a firm with a "substantial business relationship" with the owner or operator, this letter shall describe this "substantial business relationship" and the value received in consideration of the guarantee.

(i) If the owner or operator fails to satisfy a judgment based on a determination of liability for bodily injury or property damage to third parties caused by sudden or nonsudden accidental occurrences, or both as the case may be, arising from the operation of facilities covered by this corporate guarantee, or fails to pay an amount agreed to in settlement of claims arising from or alleged to arise from such injury or damage, the guarantor will do so up to the limits of coverage.

(2)(i) In the case of corporations incorporated in the United States, a guarantee may be used to satisfy the requirements of Section R315-265-147 only if the Attorneys General or Insurance Commissioners of (A) the State in which the guarantor is incorporated, and (B) Utah have submitted a written statement to the Director that a guarantee executed as described in Section R315-265-147 and Subsection R315-264-151(h)(2) is a legally valid and enforceable obligation in Utah.

(ii) In the case of corporations incorporated outside the United States, a guarantee may be used to satisfy the requirements of Section R315-265-147 only if (A) the non-U.S. corporation has identified a registered agent for service of process in each Utah and in the State in which it has its principal place of business, and if (B) the Attorney General or Insurance Commissioner of each Utah and the State in which the guarantor corporation has its principal place of business, has submitted a written statement to the Director that a guarantee executed as described in Section R315-265-147 and Subsection R315-264-151(h)(2) is a legally valid and enforceable obligation in that Utah.

(h) Letter of credit for liability coverage.

(1) An owner or operator may satisfy the requirements of Section R315-265-147 by obtaining an irrevocable standby letter of credit that conforms to the requirements of Subsection R315-265-147(h) and submitting a copy of the letter of credit to the Director.

(2) The financial institution issuing the letter of credit shall be an entity that has the authority to issue letters of credit and whose letter of credit operations are regulated and examined by a Federal or Utah agency.

(3) The wording of the letter of credit must be identical to the wording specified in Subsection R315-264-151(k).

(4) An owner or operator who uses a letter of credit to satisfy the requirements of Section R315-265-147 may also establish a standby trust fund. Under the terms of such a letter of credit, all amounts paid pursuant to a draft by the trustee of the standby trust will be deposited by the issuing institution into the standby trust in accordance with instructions from the trustee. The trustee of the standby trust fund shall be an entity which has the authority to act as a trustee and whose trust operations are regulated and examined by a Federal or Utah agency.

(5) The wording of the standby trust fund shall be identical to the wording specified in Subsection R315-264-151(n).

(i) Surety bond for liability coverage.

(1) An owner or operator may satisfy the requirements of Section R315-265-147 by obtaining a surety bond that conforms to the requirements of Subsection R315-265-147(i) and submitting a copy of the bond to the Director.

(2) The surety company issuing the bond must be among those listed as acceptable sureties on Federal bonds in the most recent Circular 570 of the U.S. Department of the Treasury.

(3) The wording of the surety bond must be identical to the wording specified in Subsection R315-264-151(l).

(4) A surety bond may be used to satisfy the requirements of Section R315-265-147 only if the Attorneys General or Insurance Commissioners of (i) the State in which the surety is incorporated, and (ii) Utah have submitted a written statement to the Director that a surety bond executed as described in Section R315-265-147 and Subsection R315-264-151(l) is a legally valid and enforceable obligation in Utah.

(j) Trust fund for liability coverage.

(1) An owner or operator may satisfy the requirements of Section R315-265-147 by establishing a trust fund that conforms to the requirements of Subsection R315-265-147(j) and submitting an originally signed duplicate of the trust agreement to the Director.

(2) The trustee shall be an entity which has the authority to act as a trustee and whose trust operations are regulated and examined by a Federal or Utah agency.

(3) The trust fund for liability coverage shall be funded for the full amount of the liability coverage to be provided by the trust fund before it may be relied upon to satisfy the requirements of Section R315-265-147. If at any time after the trust fund is created the amount of funds in the trust fund is reduced below the full amount of the liability coverage to be provided, the owner or operator, by the anniversary date of the establishment of the Fund, shall either add sufficient funds to the trust fund to cause its value to equal the full amount of liability coverage to be provided, or obtain other financial assurance as specified in Section R315-265-147 to cover the difference. For purposes of Subsection R315-265-147(j), "the full amount of the liability coverage to be provided" means the amount of coverage for sudden occurrences, nonsudden occurrences, or both required to be provided by the owner or operator by Section R315-265-147, less the amount of financial assurance for liability coverage that is being provided by other financial assurance mechanisms being used to demonstrate financial assurance by the owner or operator.

(4) The wording of the trust fund must be identical to the wording specified in Subsection R315-264-151(m).

R315-265-148. Financial Requirements -- Incapacity of Owners or Operators, Guarantors, or Financial Institutions.

(a) An owner or operator shall notify the Director by certified mail of the commencement of a voluntary or involuntary proceeding under Title 11, Bankruptcy, U.S. Code, naming the owner or operator as debtor, within 10 days after commencement of the proceeding. A guarantor of a corporate guarantee as specified in Subsections R315-265-143(e) and R315-265-145(e) shall make such a notification if he is named as debtor, as required under the terms of the corporate guarantee, see Subsection R315-264-151(h).

(b) An owner or operator who fulfills the requirements of Sections R315-265-143, R315-265-145, or R315-265-147 by obtaining a trust fund, surety bond, letter of credit, or insurance policy will be deemed to be without the required financial assurance or liability coverage in the event of bankruptcy of the trustee or issuing institution, or a suspension or revocation of the authority of the trustee institution to act as trustee or of the institution issuing the surety bond, letter of credit, or insurance policy to issue such instruments. The owner or operator shall establish other financial assurance or liability coverage within 60 days after such an event.

R315-265-170. Use and Management of Containers -- Applicability.

The regulations in this Sections R315-265-170 through 265-178 apply to owners and operators of all hazardous waste facilities that store containers of hazardous waste, except as Section R315-265-1 provides otherwise.

R315-265-171. Use and Management of Containers -- Condition of Containers.

If a container holding hazardous waste is not in good condition, or if it begins to leak, the owner or operator shall transfer the hazardous waste from this container to a container that is in good condition, or manage the waste in some other way that complies with the requirements of Rule R315-265.

R315-265-172. Use and Management of Containers -- Compatibility of Waste with Container.

The owner or operator shall use a container made of or lined with materials which will not react with, and are otherwise compatible with, the hazardous waste to be stored, so that the ability of the container to contain the waste is not impaired.

R315-265-173. Use and Management of Containers -- Management of Containers.

(a) A container holding hazardous waste shall always be closed during storage, except when it is necessary to add or remove waste.

(b) A container holding hazardous waste shall not be opened, handled, or stored in a manner which may rupture the container or cause it to leak.

Comment: Re-use of containers in transportation is governed by U.S. Department of Transportation regulations, including those set forth in 49 CFR 173.28.

R315-265-174. Use and Management of Containers -- Inspections.

At least weekly, the owner or operator shall inspect areas where containers are stored. The owner or operator shall look for leaking containers and for deterioration of containers caused by corrosion or other factors. See Section R315-265-171 for remedial action required if deterioration or leaks are detected.

R315-265-176. Use and Management of Containers -- Special Requirements for Ignitable or Reactive Waste.

Containers holding ignitable or reactive waste shall be located at least 15 meters, 50 feet, from the facility's property line.

Comment: See Subsection R315-265-17(a) for additional requirements.

R315-265-177. Use and Management of Containers -- Special Requirements for Incompatible Wastes.

(a) Incompatible wastes, or incompatible wastes and materials, see 40 CFR 265 appendix V which is adopted and incorporated by reference for examples, shall not be placed in the same container, unless Subsection R315-265-17(b) is complied with.

(b) Hazardous waste shall not be placed in an unwashed container that previously held an incompatible waste or material, see 40 CFR 265 appendix V which is adopted and incorporated by reference for examples, unless Subsection R315-265-17(b) is complied with.

(c) A storage container holding a hazardous waste that is incompatible with any waste or other materials stored nearby in other containers, piles, open tanks, or surface impoundments shall be separated from the other materials or protected from them by means of a dike, berm, wall, or other device.

Comment: The purpose of this is to prevent fires, explosions, gaseous emissions, leaching, or other discharge of hazardous waste or hazardous waste constituents which could result from the mixing of incompatible wastes or materials if containers break or leak.

R315-265-178. Use and Management of Containers -- Air Emission Standards.

The owner or operator shall manage all hazardous waste placed in a container in accordance with the applicable

requirements of subparts AA, BB, and CC of 40 CFR 265 which is adopted and incorporated by reference.

R315-265-190. Tank Systems -- Applicability.

The requirements of Sections R315-265-190 through 265-202 apply to owners and operators of facilities that use tank systems for storing or treating hazardous waste except as otherwise provided in Subsections R315-265-190(a), (b), and (c) or in Section R315-265-1.

(a) Tank systems that are used to store or treat hazardous waste which contains no free liquids and are situated inside a building with an impermeable floor are exempted from the requirements in Section R315-265-193. To demonstrate the absence or presence of free liquids in the stored/treated waste, the following test must be used: Method 9095B, Paint Filter Liquids Test, as described in "Test Methods for Evaluating Solid Waste, Physical/Chemical Methods," EPA Publication SW-846, as incorporated by reference in Section R315-260-11.

(b) Tank systems, including sumps, as defined in Section R315-260-10, that serve as part of a secondary containment system to collect or contain releases of hazardous wastes are exempted from the requirements in Subsection R315-265-193(a).

(c) Tanks, sumps, and other collection devices used in conjunction with drip pads, as defined in Section R315-260-10 and regulated under 40 CFR part 265 subpart W, which is adopted and incorporated by reference, must meet the requirements of Sections R315-265-190 through 265-202.

R315-265-191. Tank Systems -- Assessment of Existing Tank System's Integrity.

(a) For each existing tank system that does not have secondary containment meeting the requirements of Section R315-265-193, the owner or operator shall determine that the tank system is not leaking or is unfit for use. Except as provided in Subsection R315-265-191(c), the owner or operator shall obtain and keep on file at the facility a written assessment reviewed and certified by a qualified Professional Engineer in accordance with Subsection R315-270-11(d), that attests to the tank system's integrity by January 12, 1988.

(b) This assessment shall determine that the tank system is adequately designed and has sufficient structural strength and compatibility with the waste(s) to be stored or treated to ensure that it will not collapse, rupture, or fail. At a minimum, this assessment must consider the following:

(1) Design standard(s), if available, according to which the tank and ancillary equipment were constructed;

(2) Hazardous characteristics of the waste(s) that have been or will be handled;

(3) Existing corrosion protection measures;

(4) Documented age of the tank system, if available, otherwise, an estimate of the age; and

(5) Results of a leak test, internal inspection, or other tank integrity examination such that:

(i) For non-enterable underground tanks, this assessment shall consist of a leak test that is capable of taking into account the effects of temperature variations, tank end deflection, vapor pockets, and high water table effects,

(ii) For other than non-enterable underground tanks and for ancillary equipment, this assessment shall be either a leak test, as described above, or an internal inspection, or other tank integrity examination, or a combination of assessment mechanisms, certified by a qualified Professional Engineer in accordance with Subsection R315-270-11(d) that addresses cracks, leaks, corrosion, and erosion.

Note: The practices described in the American Petroleum Institute (API) Publication, Guide for Inspection of Refinery Equipment, Chapter XIII, "Atmospheric and Low-Pressure Storage Tanks," 4th edition, 1981, may be used, where applicable, as guidelines in conducting the integrity examination of an other than non-enterable underground tank system.

(c) Tank systems that store or treat materials that become hazardous wastes subsequent to July 14, 1986 shall conduct this assessment within 12 months after the date that the waste becomes a hazardous waste.

(d) If, as a result of the assessment conducted in accordance with Subsection R315-265-191(a), a tank system is found to be leaking or unfit for use, the owner or operator shall comply with the requirements of Section R315-265-196.

R315-265-192. Tank Systems -- Design and Installation of New Tank Systems or Components.

(a) Owners or operators of new tank systems or components shall ensure that the foundation, structural support, seams, connections, and pressure controls, if applicable, are adequately designed and that the tank system has sufficient structural strength, compatibility with the waste(s) to be stored or treated, and corrosion protection so that it will not collapse, rupture, or fail. The owner or operator shall obtain a written assessment reviewed and certified by a qualified Professional Engineer in accordance with Subsection R315-270-11(d) attesting that the system has sufficient structural integrity and is acceptable for the storing and treating of hazardous waste. This assessment shall include the following information:

(1) Design standard(s) according to which the tank(s) and ancillary equipment is or will be constructed.

(2) Hazardous characteristics of the waste(s) to be handled.

(3) For new tank systems or components in which the external shell of a metal tank or any external metal component of the tank system is or will be in contact with the soil or with water, a determination by a corrosion expert of:

(i) Factors affecting the potential for corrosion, including but not limited to:

(A) Soil moisture content;

(B) Soil pH;

(C) Soil sulfides level;

(D) Soil resistivity;

(E) Structure to soil potential;

(F) Influence of nearby underground metal structures, for example, piping;

(G) Stray electric current; and,

(H) Existing corrosion-protection measures, for example, coating, cathodic protection, and

(ii) The type and degree of external corrosion protection that are needed to ensure the integrity of the tank system during the use of the tank system or component, consisting of one or more of the following:

(A) Corrosion-resistant materials of construction such as special alloys or fiberglass-reinforced plastic;

(B) Corrosion-resistant coating, such as epoxy or fiberglass, with cathodic protection, for example, impressed current or sacrificial anodes; and

(C) Electrical isolation devices such as insulating joints and flanges.

Note: The practices described in the National Association of Corrosion Engineers (NACE) standard, "Recommended Practice (RP-02-85)---Control of External Corrosion on Metallic Buried, Partially Buried, or Submerged Liquid Storage Systems," and the American Petroleum Institute (API) Publication 1632, "Cathodic Protection of Underground Petroleum Storage Tanks and Piping Systems," may be used, where applicable, as guidelines in providing corrosion protection for tank systems.

(4) For underground tank system components that are likely to be affected by vehicular traffic, a determination of design or operational measures that will protect the tank system against potential damage; and

(5) Design considerations to ensure that:

(i) Tank foundations will maintain the load of a full tank;

(ii) Tank systems will be anchored to prevent flotation or dislodgement where the tank system is placed in a saturated zone, or is located within a seismic fault zone; and

(iii) Tank systems will withstand the effects of frost heave.

(b) The owner or operator of a new tank system shall ensure that proper handling procedures are adhered to in order to prevent damage to the system during installation. Prior to covering, enclosing, or placing a new tank system or component in use, an independent, qualified installation inspector or a qualified Professional Engineer, either of whom is trained and experienced in the proper installation of tank systems, shall inspect the system or component for the presence of any of the following items:

(1) Weld breaks;

(2) Punctures;

(3) Scrapes of protective coatings;

(4) Cracks;

(5) Corrosion;

(6) Other structural damage or inadequate construction or installation.

All discrepancies shall be remedied before the tank system is covered, enclosed, or placed in use.

(c) New tank systems or components and piping that are placed underground and that are backfilled shall be provided with a backfill material that is a noncorrosive, porous, homogeneous substance and that is carefully installed so that the backfill is placed completely around the tank and compacted to ensure that the tank and piping are fully and uniformly supported.

(d) All new tanks and ancillary equipment shall be tested for tightness prior to being covered, enclosed or placed in use. If a tank system is found not to be tight, all repairs necessary to remedy the leak(s) in the system shall be performed prior to the tank system being covered, enclosed, or placed in use.

(e) Ancillary equipment shall be supported and protected against physical damage and excessive stress due to settlement, vibration, expansion or contraction.

Note: The piping system installation procedures described in American Petroleum Institute (API) Publication 1615 (November 1979), "Installation of Underground Petroleum Storage Systems," or ANSI Standard B31.3, "Petroleum Refinery System," may be used, where applicable, as guidelines for proper installation of piping systems.

(f) The owner or operator shall provide the type and degree of corrosion protection necessary, based on the information provided under Subsection R315-265-192(a)(3), to ensure the integrity of the tank system during use of the tank system. The installation of a corrosion protection system that is field fabricated shall be supervised by an independent corrosion expert to ensure proper installation.

(g) The owner or operator shall obtain and keep on file at the facility written statements by those persons required to certify the design of the tank system and supervise the installation of the tank system in accordance with the requirements of Subsections R315-265-192(b) through (f) to attest that the tank system was properly designed and installed and that repairs, pursuant to Subsections R315-265-192(b) and (d) were performed. These written statements shall also include the certification statement as required in Subsection R315-270-11(d).

R315-265-193. Tank Systems -- Containment and Detection of Releases.

(a) In order to prevent the release of hazardous waste or hazardous constituents to the environment, secondary containment that meets the requirements of Section R315-265-193 shall be provided, except as provided in Subsections R315-265-193(f) and (g):

(1) For all new and existing tank systems or components, prior to their being put into service.

(2) For tank systems that store or treat materials that become hazardous wastes, within 2 years of the hazardous waste listing, or when the tank system has reached 15 years of age, whichever comes later.

(b) Secondary containment systems shall be:

(1) Designed, installed, and operated to prevent any migration of wastes or accumulated liquid out of the system to the soil, ground water, or surface water at any time during the use of the tank system; and

(2) Capable of detecting and collecting releases and accumulated liquids until the collected material is removed.

(c) To meet the requirements of Subsection R315-265-193(b), secondary containment systems shall be at a minimum:

(1) Constructed of or lined with materials that are compatible with the waste(s) to be placed in the tank system and shall have sufficient strength and thickness to prevent failure due to pressure gradients, including static head and external hydrological forces, physical contact with the waste to which they are exposed, climatic conditions, the stress of installation, and the stress of daily operation, including stresses from nearby vehicular traffic;

(2) Placed on a foundation or base capable of providing support to the secondary containment system and resistance to pressure gradients above and below the system and capable of preventing failure due to settlement, compression, or uplift;

(3) Provided with a leak detection system that is designed and operated so that it will detect the failure of either the primary and secondary containment structure or any release of hazardous waste or accumulated liquid in the secondary containment system within 24 hours, or at the earliest practicable time if the existing detection technology or site conditions will not allow detection of a release within 24 hours;

(4) Sloped or otherwise designed or operated to drain and remove liquids resulting from leaks, spills, or precipitation. Spilled or leaked waste and accumulated precipitation shall be removed from the secondary containment system within 24 hours, or in as timely a manner as is possible to prevent harm to human health or the environment, if removal of the released waste or accumulated precipitation cannot be accomplished within 24 hours.

Note: If the collected material is a hazardous waste under Rule R315-261, it is subject to management as a hazardous waste in accordance with all applicable requirements of Rules R315-262 through R315-265. If the collected material is discharged through a point source to waters of the United States, it is subject to the requirements of sections 301, 304, and 402 of the Clean Water Act, as amended. If discharged to Publicly Owned Treatment Works (POTWs), it is subject to the requirements of section 307 of the Clear Water Act, as amended. If the collected material is released to the environment, it may be subject to the reporting requirements of 40 CFR part 302.

(d) Secondary containment for tanks shall include one or more of the following devices:

(1) A liner, external to the tank;

(2) A vault;

(3) A double-walled tank; or

(4) An equivalent device as approved by the Director.

(e) In addition to the requirements of Subsections R315-265-193(b), (c), and (d), secondary containment systems shall satisfy the following requirements:

(1) External liner systems must be:

(i) Designed or operated to contain 100 percent of the capacity of the largest tank within its boundary;

(ii) Designed or operated to prevent run-on or infiltration of precipitation into the secondary containment system unless the collection system has sufficient excess capacity to contain

run-on or infiltration. Such additional capacity shall be sufficient to contain precipitation from a 25-year, 24-hour rainfall event;

(iii) Free of cracks or gaps; and

(iv) Designed and installed to completely surround the tank and to cover all surrounding earth likely to come into contact with the waste if released from the tank(s), for example, capable of preventing lateral as well as vertical migration of the waste.

(2) Vault systems shall be:

(i) Designed or operated to contain 100 percent of the capacity of the largest tank within its boundary;

(ii) Designed or operated to prevent run-on or infiltration of precipitation into the secondary containment system unless the collection system has sufficient excess capacity to contain run-on or infiltration. Such additional capacity must be sufficient to contain precipitation from a 25-year, 24-hour rainfall event;

(iii) Constructed with chemical-resistant water stops in place at all joints, if any;

(iv) Provided with an impermeable interior coating or lining that is compatible with the stored waste and that will prevent migration of waste into the concrete;

(v) Provided with a means to protect against the formation of and ignition of vapors within the vault, if the waste being stored or treated:

(A) Meets the definition of ignitable waste under Section R315-261-21, or

(B) Meets the definition of reactive waste under Section R315-261-23 and may form an ignitable or explosive vapor; and

(vi) Provided with an exterior moisture barrier or be otherwise designed or operated to prevent migration of moisture into the vault if the vault is subject to hydraulic pressure.

(3) Double-walled tanks shall be:

(i) Designed as an integral structure, for example, an inner tank within an outer shell, so that any release from the inner tank is contained by the outer shell;

(ii) Protected, if constructed of metal, from both corrosion of the primary tank interior and the external surface of the outer shell; and

(iii) Provided with a built-in, continuous leak detection system capable of detecting a release within 24 hours or at the earliest practicable time, if the owner or operator can demonstrate to the Director, and the Director concurs, that the existing leak detection technology or site conditions will not allow detection of a release within 24 hours.

Note: The provisions outlined in the Steel Tank Institute's (STI) "Standard for Dual Wall Underground Steel Storage Tank" may be used as guidelines for aspects of the design of underground steel double-walled tanks.

(f) Ancillary equipment shall be provided with full secondary containment, for example, trench, jacketing, double-walled piping, that meets the requirements of Subsections R315-265-193(b) and (c) except for:

(1) Aboveground piping, exclusive of flanges, joints, valves, and connections, that are visually inspected for leaks on a daily basis;

(2) Welded flanges, welded joints, and welded connections that are visually inspected for leaks on a daily basis;

(3) Sealless or magnetic coupling pumps and sealless valves, that are visually inspected for leaks on a daily basis; and

(4) Pressurized aboveground piping systems with automatic shut-off devices, for example, excess flow check valves, flow metering shutdown devices, loss of pressure actuated shut-off devices, that are visually inspected for leaks on a daily basis.

(g) The owner or operator may obtain an exception from the requirements of Section R315-265-193 if the Director finds, as a result of a demonstration by the owner or operator, either: that alternative design and operating practices, together with location characteristics, will prevent the migration of hazardous waste or hazardous constituents into the ground water or surface water at least as effectively as secondary containment during the active life of the tank system or that in the event of a release that does migrate to ground water or surface water, no substantial present or potential hazard will be posed to human health or the environment. New underground tank systems may not, per a demonstration in accordance with Subsection R315-265-193(g)(2), be exempted from the secondary containment requirements of Section R315-265-193. Application for an exception as allowed in Subsection R315-265-193(g) does not waive compliance with the requirements of Sections R315-265-190 through R315-265-202 for new tank systems.

(1) In deciding whether to grant an excpetion based on a demonstration of equivalent protection of ground water and surface water, the Director will consider:

(i) The nature and quantity of the waste;

(ii) The proposed alternate design and operation;

(iii) The hydrogeologic setting of the facility, including the thickness of soils between the tank system and ground water; and

(iv) All other factors that would influence the quality and mobility of the hazardous constituents and the potential for them to migrate to ground water or surface water.

(2) In deciding whether to grant an excpetion, based on a demonstration of no substantial present or potential hazard, the Director will consider:

(i) The potential adverse effects on ground water, surface water, and land quality taking into account:

(A) The physical and chemical characteristics of the waste in the tank system, including its potential for migration,

(B) The hydrogeological characteristics of the facility and surrounding land,

(C) The potential for health risks caused by human exposure to waste constituents,

(D) The potential for damage to wildlife, crops, vegetation, and physical structures caused by exposure to waste constituents, and

(E) The persistence and permanence of the potential adverse effects;

(ii) The potential adverse effects of a release on ground-water quality, taking into account:

(A) The quantity and quality of ground water and the direction of ground-water flow,

(B) The proximity and withdrawal rates of water in the area,

(C) The current and future uses of ground water in the area, and

(D) The existing quality of ground water, including other sources of contamination and their cumulative impact on the ground-water quality;

(iii) The potential adverse effects of a release on surface water quality, taking into account:

(A) The quantity and quality of ground water and the direction of ground-water flow,

(B) The patterns of rainfall in the region,

(C) The proximity of the tank system to surface waters,

(D) The current and future uses of surface waters in the area and any water quality standards established for those surface waters, and

(E) The existing quality of surface water, including other sources of contamination and the cumulative impact on surface-water quality; and

(iv) The potential adverse effects of a release on the land surrounding the tank system, taking into account:

(A) The patterns of rainfall in the region, and

(B) The current and future uses of the surrounding land.

(3) The owner or operator of a tank system, for which an

excpetion from secondary containment had been granted in accordance with the requirements of Subsection R315-265-193(g)(1), at which a release of hazardous waste has occurred from the primary tank system but has not migrated beyond the zone of engineering control, as established in the exception, shall:

(i) Comply with the requirements of Section R315-265-196, except Subsection R315-265-196(d); and

(ii) Decontaminate or remove contaminated soil to the extent necessary to:

(A) Enable the tank system, for which the excpetion was granted, to resume operation with the capability for the detection of and response to releases at least equivalent to the capability it had prior to the release, and

(B) Prevent the migration of hazardous waste or hazardous constituents to ground water or surface water; and

(iii) If contaminated soil cannot be removed or decontaminated in accordance with Subsection R315-265-193(g)(3)(ii), comply with the requirements of Subsection R315-265-197(b);

(4) The owner or operator of a tank system, for which an exception from secondary containment had been granted in accordance with the requirements of Subsection R315-265-193(g)(1), at which a release of hazardous waste has occurred from the primary tank system and has migrated beyond the zone of engineering control, as established in the exception, shall:

(i) Comply with the requirements of Subsections R315-265-196(a), (b), (c), and (d); and

(ii) Prevent the migration of hazardous waste or hazardous constituents to ground water or surface water, if possible, and decontaminate or remove contaminated soil. If contaminated soil cannot be decontaminated or removed, or if ground water has been contaminated, the owner or operator shall comply with the requirements of Subsection R315-265-197(b);

(iii) If repairing, replacing, or reinstalling the tank system, provide secondary containment in accordance with the requirements of Subsections R315-265-193(a) through (f) or reapply for an exception from secondary containment and meet the requirements for new tank systems in Section R315-265-192 if the tank system is replaced. The owner or operator shall comply with these requirements even if contaminated soil can be decontaminated or removed, and ground water or surface water has not been contaminated.

(h) The following procedures shall be followed in order to request an exception from secondary containment:

(1) The Director shall be notified in writing by the owner or operator that he intends to conduct and submit a demonstration for an exception from secondary containment as allowed in paragraph (g) of this section according to the following schedule:

(i) For existing tank systems, at least 24 months prior to the date that secondary containment shall be provided in accordance with Subsection R315-265-193(a); and

(ii) For new tank systems, at least 30 days prior to entering into a contract for installation of the tank system.

(2) As part of the notification, the owner or operator shall also submit to the Director a description of the steps necessary to conduct the demonstration and a timetable for completing each of the steps. The demonstration shall address each of the factors listed in Subsection R315-265-193(g)(1) or Subsection R315-265-193(g)(2).

(3) The demonstration for an exception shall be completed and submitted to the Director within 180 days after notifying the Director of intent to conduct the demonstration.

(4) The Director will inform the public, through a newspaper notice, of the availability of the demonstration for an exception. The notice shall be placed in a daily or weekly major local newspaper of general circulation and shall provide at least 30 days from the date of the notice for the public to review and comment on the demonstration for an exception. The Direction also will hold a public hearing, in response to a request or at his own discretion, whenever such a hearing might clarify one or more issues concerning the demonstration for an exception. Public notice of the hearing will be given at least 30 days prior to the date of the hearing and may be given at the same time as notice of the opportunity for the public to review and comment on the demonstration. These two notices may be combined.

(5) The Director will approve or disapprove the request for an exception within 90 days of receipt of the demonstration from the owner or operator and will notify in writing the owner or operator and each person who submitted written comments or requested notice of the exception decision. If the demonstration for an exception is incomplete or does not include sufficient information, the 90-day time period will begin when the Director receives a complete demonstration, including all information necessary to make a final determination. If the public comment period in Subsection R315-265-193(h)(4) is extended, the 90-day time period will be similarly extended.

(i) All tank systems, until such time as secondary containment meeting the requirements of Section R315-265-193 is provided, shall comply with the following:

(1) For non-enterable underground tanks, a leak test that meets the requirements of Subsection R315-265-191(b)(5) shall be conducted at least annually;

(2) For other than non-enterable underground tanks, and for all ancillary equipment, the owner or operator shall either conduct a leak test as in Subsection R315-265-193(i)(1) or an internal inspection or other tank integrity examination by a qualified Professional Engineer that addresses cracks, leaks, and corrosion or erosion at least annually. The owner or operator shall remove the stored waste from the tank, if necessary, to allow the condition of all internal tank surfaces to be assessed.

Note: The practices described in the American Petroleum Institute (API) Publication Guide for Inspection of Refining Equipment, Chapter XIII, "Atmospheric and Low Pressure Storage Tanks," 4th edition, 1981, may be used, when applicable, as guidelines for assessing the overall condition of the tank system.

(3) The owner or operator shall maintain on file at the facility a record of the results of the assessments conducted in accordance with Subsections R315-265-193(i)(1) through (i)(3).

(4) If a tank system or component is found to be leaking or unfit-for-use as a result of the leak test or assessment in Subsections R315-265-193(i)(1) through (i)(3), the owner or operator shall comply with the requirements of Subsection R315-265-196.

R315-265-194. Tank Systems -- General Operating Requirements.

(a) Hazardous wastes or treatment reagents shall not be placed in a tank system if they could cause the tank, its ancillary equipment, or the secondary containment system to rupture, leak, corrode, or otherwise fail.

(b) The owner or operator shall use appropriate controls and practices to prevent spills and overflows from tank or secondary containment systems. These include at a minimum:

(1) Spill prevention controls, for example, check valves, dry disconnect couplings;

(2) Overfill prevention controls, for example, level sensing devices, high level alarms, automatic feed cutoff, or bypass to a standby tank; and

(3) Maintenance of sufficient freeboard in uncovered tanks to prevent overtopping by wave or wind action or by precipitation.

(c) The owner or operator must comply with the requirements of Section R315-265-196 if a leak or spill occurs in the tank system.

R315-265-195. Tank Systems -- Inspections.

(a) The owner or operator shall inspect, where present, at least once each operating day, data gathered from monitoring and leak detection equipment, for example, pressure or temperature gauges, monitoring wells, to ensure that the tank system is being operated according to its design.

Note: Subsection R315-265-15(c) requires the owner or operator to remedy any deterioration or malfunction he finds. Section R315-265-196 requires the owner or operator to notify the Director within 24 hours of confirming a release. Also, 40 CFR part 302 may require the owner or operator to notify the National Response Center of a release.

(b) Except as noted under Subsection R315-265-195(c), the owner or operator shall inspect at least once each operating day:

(1) Overfill/spill control equipment, for example, waste-feed cutoff systems, bypass systems, and drainage systems, to ensure that it is in good working order;

(2) Above ground portions of the tank system, if any, to detect corrosion or releases of waste; and

(3) The construction materials and the area immediately surrounding the externally accessible portion of the tank system, including the secondary containment system, for example, dikes, to detect erosion or signs of releases of hazardous waste, for example, wet spots, dead vegetation.

(c) Owners or operators of tank systems that either use leak detection equipment to alert facility personnel to leaks, or implement established workplace practices to ensure leaks are promptly identified, shall inspect at least weekly those areas described in Subsections R315-265-195(b)(1) through (3). Use of the alternate inspection schedule shall be documented in the facility's operating record. This documentation shall include a description of the established workplace practices at the facility.

(d) (Reserved)

(e) Ancillary equipment that is not provided with secondary containment, as described in Subsections R315-265-193(f)(1) through (4), shall be inspected at least once each operating day.

(f) The owner or operator shall inspect cathodic protection systems, if present, according to, at a minimum, the following schedule to ensure that they are functioning properly:

(1) The proper operation of the cathodic protection system shall be confirmed within six months after initial installation, and annually thereafter; and

(2) All sources of impressed current shall be inspected and/or tested, as appropriate, at least bimonthly, for example, every other month.

Note: The practices described in the National Association of Corrosion Engineers (NACE) standard, "Recommended Practice (RP-02-85)-Control of External Corrosion on Metallic Buried, Partially Buried, or Submerged Liquid Storage Systems," and the American Petroleum Institute (API) Publication 1632, "Cathodic Protection of Underground Petroleum Storage Tanks and Piping Systems," may be used, where applicable, as guidelines in maintaining and inspecting cathodic protection systems.

(g) The owner or operator shall document in the operating record of the facility an inspection of those items in Subsections R315-265-195(a) and (b).

R315-265-196. Tank Systems -- Response to Leaks or Spills and Dispostion of Leaking or Unfit-For-Use Tank Systems.

A tank system or secondary containment system from which there has been a leak or spill, or which is unfit for use, shall be removed from service immediately, and the owner or operator shall satisfy the following requirements:

(a) Cessation of use; prevent flow or addition of wastes. The owner or operator shall immediately stop the flow of hazardous waste into the tank system or secondary containment system and inspect the system to determine the cause of the release.

(b) Removal of waste from tank system or secondary containment system.

(1) If the release was from the tank system, the owner or operator shall, within 24 hours after detection of the leak or, if the owner or operator demonstrates that that is not possible, at the earliest practicable time remove as much of the waste as is necessary to prevent further release of hazardous waste to the environment and to allow inspection and repair of the tank system to be performed.

(2) If the release was to a secondary containment system, all released materials shall be removed within 24 hours or in as timely a manner as is possible to prevent harm to human health and the environment.

(c) Containment of visible releases to the environment. The owner or operator shall immediately conduct a visual inspection of the release and, based upon that inspection:

(1) Prevent further migration of the leak or spill to soils or surface water; and

(2) Remove, and properly dispose of, any visible contamination of the soil or surface water.

(d) Notifications, reports.

(1) Any release to the environment, except as provided in Subsection R315-265-196(d)(2), shall be reported to the Director within 24 hours of detection. If the release has been reported pursuant to 40 CFR part 302, that report will satisfy this requirement.

(2) A leak or spill of hazardous waste that is:

(i) Less than or equal to a quantity of one pound, and

(ii) Immediately contained and cleaned-up is exempted from the requirements of Subsection R315-265-196(d).

(3) Within 30 days of detection of a release to the environment, a report containing the following information shall be submitted to the Director:

(i) Likely route of migration of the release;

(ii) Characteristics of the surrounding soil, soil composition, geology, hydrogeology, climate;

(iii) Results of any monitoring or sampling conducted in connection with the release, if available. If sampling or monitoring data relating to the release are not available within 30 days, these data shall be submitted to the Director as soon as they become available;

(iv) Proximity to downgradient drinking water, surface water, and population areas; and

(v) Description of response actions taken or planned.

(e) Provision of secondary containment, repair, or closure.

(1) Unless the owner or operator satisfies the requirements of Subsections R315-265-196(e) (2) through (4), the tank system shall be closed in accordance with Section R315-265-197.

(2) If the cause of the release was a spill that has not damaged the integrity of the system, the owner or operator may return the system to service as soon as the released waste is removed and repairs, if necessary, are made.

(3) If the cause of the release was a leak from the primary tank system into the secondary containment system, the system shall be repaired prior to returning the tank system to service.

(4) If the source of the release was a leak to the environment from a component of a tank system without secondary containment, the owner or operator shall provide the component of the system from which the leak occurred with secondary containment that satisfies the requirements of Section R315-265-193 before it can be returned to service, unless the source of the leak is an aboveground portion of a tank system. If the source is an aboveground component that can be inspected visually, the component shall be repaired and may be returned to service without secondary containment as long as the requirements of Subsection R315-265-196(f) are satisfied.

If a component is replaced to comply with the requirements of Subsection R315-265-196(e)(4), that component shall satisfy the requirements for new tank systems or components in Sections R315-265-192 and R315-265-193. Additionally, if a leak has occurred in any portion of a tank system component that is not readily accessible for visual inspection, for example, the bottom of an inground or onground tank, the entire component shall be provided with secondary containment in accordance with Section R315-265-193 prior to being returned to use.

(f) Certification of major repairs. If the owner or operator has repaired a tank system in accordance with Subsection R315-265-196(e), and the repair has been extensive, for example, installation of an internal liner; repair of a ruptured primary containment or secondary containment vessel, the tank system shall not be returned to service unless the owner or operator has obtained a certification by a qualified Professional Engineer in accordance with Subsection R315-270-11(d) that the repaired system is capable of handling hazardous wastes without release for the intended life of the system. This certification is to be placed in the operating record and maintained until closure of the facility.

Note: The Director may, on the basis of any information received that there is or has been a release of hazardous waste or hazardous constituents into the environment, issue an order under Sections 19-6-101 through 125 requiring corrective action or such other response as deemed necessary to protect human health or the environment.

Note: See Subsection R315-265-15(c) for the requirements necessary to remedy a failure. Also, 40 CFR Part 302 requires the owner or operator to notify the National Response Center of a release of any "reportable quantity."

R315-265-197. Tank Systems -- Closure and Post-Closure Care.

(a) At closure of a tank system, the owner or operator shall remove or decontaminate all waste residues, contaminated containment system components, for example, liners, contaminated soils, and structures and equipment contaminated with waste, and manage them as hazardous waste, unless Subsection R315-261-3(d) applies. The closure plan, closure activities, cost estimates for closure, and financial responsibility for tank systems shall meet all of the requirements specified in Sections R315-265-110 through 265-121 and Sections R315-265-140 through 265-147.

(b) If the owner or operator demonstrates that not all contaminated soils can be practicably removed or decontaminated as required in Subsection R315-265-197(a), then the owner or operator shall close the tank system and perform post-closure care in accordance with the closure and post-closure care requirements that apply to landfills, 40 CFR 265.310. In addition, for the purposes of closure, post-closure, and financial responsibility, such a tank system is then considered to be a landfill, and the owner or operator shall meet all of the requirements for landfills specified in Sections R315-265-110 through 265-121 and Sections R315-265-140 through 265-147.

(c) If an owner or operator has a tank system which does not have secondary containment that meets the requirements of Subsections R315-265-193(b) through (f) and which is not exempt from the secondary containment requirements in accordance with Subsection R315-265-193(g), then,

(1) The closure plan for the tank system shall include both a plan for complying with Subsection R315-265-197(a) and a contingent plan for complying with Subsection R315-265-197(b).

(2) A contingent post-closure plan for complying with Subsection R315-265-197(b)shall be prepared and submitted as part of the permit application.

(3) The cost estimates calculated for closure and post-closure care shall reflect the costs of complying with the contingent closure plan and the contingent post-closure plan, if these costs are greater than the costs of complying with the closure plan prepared for the expected closure under Subsection R315-265-197(a).

(4) Financial assurance must be based on the cost estimates in Subsection R315-265-197(c)(3).

(5) For the purposes of the contingent closure and post-closure plans, such a tank system is considered to be a landfill, and the contingent plans shall meet all of the closure, post-closure, and financial responsibility requirements for landfills under Sections R315-265-110 through 265-121 and Sections R315-265-140 through 265-147.

R315-265-198. Tank Systems -- Special Requirements for Ignitable or Reactive Wastes.

(a) Ignitable or reactive waste shall not be placed in a tank system, unless:

(1) The waste is treated, rendered, or mixed before or immediately after placement in the tank system so that:

(i) The resulting waste, mixture, or dissolved material no longer meets the definition of ignitable or reactive waste under Sections R315-261-21 or R315-261-23; and

(ii) Subsection R315-265-17(b) is complied with; or

(2) The waste is stored or treated in such a way that it is protected from any material or conditions that may cause the waste to ignite or react; or

(3) The tank system is used solely for emergencies.

(b) The owner or operator of a facility where ignitable or reactive waste is stored or treated in tanks shall comply with the requirements for the maintenance of protective distances between the waste management area and any public ways, streets, alleys, or an adjoining property line that can be built upon as required in Tables 2-1 through 2-6 of the National Fire Protection Association's "Flammable and Combustible Liquids Code," 1977 or 1981, incorporated by reference, see Section R315-260-11.

R315-265-199. Tank Systems -- Special Requirements for Incompatible Wastes.

(a) Incompatible wastes, or incompatible waste and materials, shall not be placed in the same tank system, unless Subsection R315-265-17(b) is complied with.

(b) Hazardous waste shall not be placed in a tank system that has not been decontaminated and that previously held an incompatible waste or material, unless Subsection R315-265-17(b) is complied with.

R315-265-200. Tank Systems -- Waste Analysis and Trial Tests.

In addition to performing the waste analysis required by Section R315-265-13, the owner or operator shall, whenever a tank system is to be used to treat chemically or to store a hazardous waste that is substantially different from waste previously treated or stored in that tank system; or treat chemically a hazardous waste with a substantially different process than any previously used in that tank system:

(a) Conduct waste analyses and trial treatment or storage tests, for example, bench-scale or pilot-plant scale tests; or

(b) Obtain written, documented information on similar waste under similar operating conditions to show that the proposed treatment or storage will meet the requirements of Subsection R315-265-194(a).

Note: Section R315-265-13 requires the waste analysis plan to include analyses needed to comply with Sections R315-265-198 and 265-199. Section R315-265-73 requires the owner or operator to place the results from each waste analysis and trial test, or the documented information, in the operating record

of the facility.

R315-265-202. Tank Systems -- Air Emission Standards.

The owner or operator shall manage all hazardous waste placed in a tank in accordance with the applicable requirements of 40 CFR 265 subparts AA, BB, and CC.

R315-265-220. Surface Impoundments -- Applicability.

The regulations in Sections R315-265-220 through 265-231 apply to owners and operators of facilities that use surface impoundments to treat, store, or dispose of hazardous waste, except as Section R315-265-1 provides otherwise.

R315-265-221. Surface Impoundments -- Design and Operating Requirements.

(a) The owner or operator of each new surface impoundment unit, each lateral expansion of a surface impoundment unit, and each replacement of an existing surface impoundment unit shall install two or more liners, and a leachate collection and removal system between the liners, and operate the leachate collection and removal system, in accordance with Subsection R315-264-221(c), unless exempted under Subsections R315-264-221(d), (e), or (f).

(b) The owner or operator of each unit referred to in Subsection R315-265-221(a) shall notify the Director at least sixty days prior to receiving waste. The owner or operator of each facility submitting notice shall file a part B application within six months of the receipt of such notice.

(c) The owner or operator of any replacement surface impoundment unit is exempt from Subsection R315-265-221(a) if:

(1) The existing unit was constructed in compliance with the design standards of Subsections 3004(o)(1)(A)(i) and (o)(5) of the Resource Conservation and Recovery Act; and

(2) There is no reason to believe that the liner is not functioning as designed.

(d) The double liner requirement set forth in Subsection R315-265-221(a) may be waived by the Director for any monofill, if:

(1) The monofill contains only hazardous wastes from foundry furnace emission controls or metal casting molding sand, and such wastes do not contain constituents which would render the wastes hazardous for reasons other than the Toxicity Characteristic in Section R315-261-24, with EPA Hazardous Waste Numbers D004 through D017; an

(2)(i)(A) The monofill has at least one liner for which there is no evidence that such liner is leaking. For the purposes of Subsection R315-265-221(d) the term "liner" means a liner designed, constructed, installed, and operated to prevent hazardous waste from passing into the liner at any time during the active life of the facility, or a liner designed, constructed, installed, and operated to prevent hazardous waste from migrating beyond the liner to adjacent subsurface soil, ground water, or surface water at any time during the active life of the facility. In the case of any surface impoundment which has been exempted from the requirements of Subsection R315-265-221(a) on the basis of a liner designed, constructed, installed, and operated to prevent hazardous waste from passing beyond the liner, at the closure of such impoundment the owner or operator shall remove or decontaminate all waste residues, all contaminated liner material, and contaminated soil to the extent practicable. If all contaminated soil is not removed or decontaminated, the owner or operator of such impoundment shall comply with appropriate post-closure requirements, including but not limited to ground-water monitoring and corrective action;

(B) The monofill is located more than one-quarter mile from an "underground source of drinking water", as that term is defined in Section R315-270-2; and

(C) The monofill is in compliance with generally applicable ground-water monitoring requirements for facilities with permits under RCRA section 3005(c); or

(ii) The owner or operator demonstrates that the monofill is located, designed and operated so as to assure that there will be no migration of any hazardous constituent into ground water or surface water at any future time.

(e) In the case of any unit in which the liner and leachate collection system has been installed pursuant to the requirements of Subsection R315-265-221(a) and in good faith compliance with Subsection R315-265-221(a) and with guidance documents governing liners and leachate collection systems under Subsection R315-265-221(a), no liner or leachate collection system which is different from that which was so installed pursuant to Subsection R315-265-221(a) will be required for such unit by the Director when issuing the first permit to such facility, except that the Director will not be precluded from requiring installation of a new liner when the Director has reason to believe that any liner installed pursuant to the requirements of Subsection R315-265-221(a) is leaking.

(f) A surface impoundment shall maintain enough freeboard to prevent any overtopping of the dike by overfilling, wave action, or a storm. Except as provided in Subsection R315-265-221(b), there shall be at least 60 centimeters, two feet, of freeboard.

(g) A freeboard level less than 60 centimeters, two feet, may be maintained if the owner or operator obtains certification by a qualified engineer that alternate design features or operating plans will, to the best of his knowledge and opinion, prevent overtopping of the dike. The certification, along with a written identification of alternate design features or operating plans preventing overtopping, shall be maintained at the facility.

(h) Surface impoundments that are newly subject to RCRA section 3005(j)(1) due to the promulgation of additional listings or characteristics for the identification of hazardous waste shall be in compliance with Subsections R315-265-221(a), (c) and (d) not later than 48 months after the promulgation of the additional listing or characteristic. This compliance period shall not be cut short as the result of the promulgation of land disposal prohibitions under Rule R315-268 or the granting of an extension to the effective date of a prohibition pursuant to Section R315-268-5, within this 48-month period.

R315-265-222. Surface Impoundments -- Action Leakage Rate.

(a) The owner or operator of surface impoundment units subject to Subsection R315-265-221(a) shall submit a proposed action leakage rate to the Director when submitting the notice required under Subsection R315-265-221(b). Within 60 days of receipt of the notification, the Director will: Establish an action leakage rate, either as proposed by the owner or operator or modified using the criteria in Section R315-265-222; or extend the review period for up to 30 days. If no action is taken by the Director before the original 60 or extended 90 day review periods, the action leakage rate will be approved as proposed by the owner or operator.

(b) The Director shall approve an action leakage rate for surface impoundment units subject to Subsection R315-265-221(a). The action leakage rate is the maximum design flow rate that the leak detection system (LDS) can remove without the fluid head on the bottom liner exceeding 1 foot. The action leakage rate shall include an adequate safety margin to allow for uncertainties in the design, for example, slope, hydraulic conductivity, and thickness of drainage material, construction, operation, and location of the LDS, waste and leachate characteristics, likelihood and amounts of other sources of liquids in the LDS, and proposed response actions, for example, the action leakage rate must consider decreases in the flow capacity of the system over time resulting from siltation and

clogging, rib layover and creep of synthetic components of the system, overburden pressures, etc.

(c) To determine if the action leakage rate has been exceeded, the owner or operator shall convert the weekly or monthly flow rate from the monitoring data obtained under Subsection R315-265-226(b), to an average daily flow rate, gallons per acre per day, for each sump. Unless the Director approves a different calculation, the average daily flow rate for each sump shall be calculated weekly during the active life and closure period, and if the unit closes in accordance with Subsection R315-265-228(a)(2), monthly during the post-closure care period when monthly monitoring is required under Subsection R315-265-226(b).

R315-265-223. Surface Impoundments -- Containment System.

All earthen dikes shall have a protective cover, such as grass, shale, or rock, to minimize wind and water erosion and to preserve their structural integrity.

R315-265-224. Surface Impoundments -- Response Actions.

(a) The owner or operator of surface impoundment units subject to Subsection R315-265-221(a) shall develop and keep on site until closure of the facility a response action plan. The response action plan shall set forth the actions to be taken if the action leakage rate has been exceeded. At a minimum, the response action plan shall describe the actions specified in Subsection R315-265-224(b).

(b) If the flow rate into the leak detection system exceeds the action leakage rate for any sump, the owner or operator shall:

(1) Notify the Director in writing of the exceedance within 7 days of the determination;

(2) Submit a preliminary written assessment to the Director within 14 days of the determination, as to the amount of liquids, likely sources of liquids, possible location, size, and cause of any leaks, and short-term actions taken and planned;

(3) Determine to the extent practicable the location, size, and cause of any leak;

(4) Determine whether waste receipt should cease or be curtailed, whether any waste should be removed from the unit for inspection, repairs, or controls, and whether or not the unit should be closed;

(5) Determine any other short-term and longer-term actions to be taken to mitigate or stop any leaks; and

(6) Within 30 days after the notification that the action leakage rate has been exceeded, submit to the Director the results of the analyses specified in Subsections R315-265-224(b)(3), (4), and (5), the results of actions taken, and actions planned. Monthly thereafter, as long as the flow rate in the leak detection system exceeds the action leakage rate, the owner or operator must submit to the Director a report summarizing the results of any remedial actions taken and actions planned.

(c) To make the leak, remediation or both determinations in Subsections R315-265-224(b)(3), (4), and (5), the owner or operator shall:

(1)(i) Assess the source of liquids and amounts of liquids by source,

(ii) Conduct a fingerprint, hazardous constituent, or other analyses of the liquids in the leak detection system to identify the source of liquids and possible location of any leaks, and the hazard and mobility of the liquid; and

(iii) Assess the seriousness of any leaks in terms of potential for escaping into the environment; or

(2) Document why such assessments are not needed.

R315-265-225. Surface Impoundments -- Waste Analysis and Trial Tests.

(a) In addition to the waste analyses required by Section R315-265-13, whenever a surface impoundment is to be used to:

(1) Chemically treat a hazardous waste which is substantially different from waste previously treated in that impoundment; or

(2) Chemically treat hazardous waste with a substantially different process than any previously used in that impoundment; the owner or operator shall, before treating the different waste or using the different process:

(i) Conduct waste analyses and trial treatment tests, for example, bench scale or pilot plant scale tests; or

(ii) Obtain written, documented information on similar treatment of similar waste under similar operating conditions; to show that this treatment will comply with Subsection R315-265-17(b).

Comment: As required by Section R315-265-13, the waste analysis plan shall include analyses needed to comply with Sections R315-265-229 and 265-230. As required by Section R315-265-73, the owner or operator shall place the results from each waste analysis and trial test, or the documented information, in the operating record of the facility.

R315-265-226. Surface Impoundments -- Monitoring and Inspection.

(a) The owner or operator shall inspect:

(1) The freeboard level at least once each operating day to ensure compliance with Section R315-265-222, and

(2) The surface impoundment, including dikes and vegetation surrounding the dike, at least once a week to detect any leaks, deterioration, or failures in the impoundment.

(b)(1) An owner or operator required to have a leak detection system under Subsection R315-265-221(a) shall record the amount of liquids removed from each leak detection system sump at least once each week during the active life and closure period.

(2) After the final cover is installed, the amount of liquids removed from each leak detection system sump shall be recorded at least monthly. If the liquid level in the sump stays below the pump operating level for two consecutive months, the amount of liquids in the sumps shall be recorded at least quarterly. If the liquid level in the sump stays below the pump operating level for two consecutive quarters, the amount of liquids in the sumps shall be recorded at least semi-annually. If at any time during the post-closure care period the pump operating level is exceeded at units on quarterly or semi-annual recording schedules, the owner or operator shall return to monthly recording of amounts of liquids removed from each sump until the liquid level again stays below the pump operating level for two consecutive months.

(3) "Pump operating level" is a liquid level proposed by the owner or operator and approved by the Director based on pump activation level, sump dimensions, and level that avoids backup into the drainage layer and minimizes head in the sump. The timing for submission and approval of the proposed "pump operating level" will be in accordance with Subsection R315-265-222(a).

Comment: As required by Subsection R315-265-15(c), the owner or operator shall remedy any deterioration or malfunction he finds.

R315-265-228. Surface Impoundments -- Closure and Post-Closure Care.

(a) At closure, the owner or operator shall:

(1) Remove or decontaminate all waste residues, contaminated containment system components, liners, etc., contaminated subsoils, and structures and equipment contaminated with waste and leachate, and manage them as hazardous waste unless Subsection R315-261-3(d) applies; or

(2) Close the impoundment and provide post-closure care

for a landfill under Sections R315-265-110 through 265-121 and 40 CFR 265.310, which is adopted and incorporated by reference, including the following:

(i) Eliminate free liquids by removing liquid wastes or solidifying the remaining wastes and waste residues;

(ii) Stabilize remaining wastes to a bearing capacity sufficient to support the final cover; and

(iii) Cover the surface impoundment with a final cover designed and constructed to:

(A) Provide long-term minimization of the migration of liquids through the closed impoundment;

(B) Function with minimum maintenance;

(C) Promote drainage and minimize erosion or abrasion of the cover;

(D) Accommodate settling and subsidence so that the cover's integrity is maintained; and

(E) Have a permeability less than or equal to the permeability of any bottom liner system or natural subsoils present.

(b) In addition to the requirements of Sections R315-265-110 through R315-265-121, and 40 CFR 265.310, which is adopted and incorporated by reference, during the post-closure care period, the owner or operator of a surface impoundment in which wastes, waste residues, or contaminated materials remain after closure in accordance with the provisions of Subsection R315-265-228(a)(2)shall:

(1) Maintain the integrity and effectiveness of the final cover, including making repairs to the cover as necessary to correct the effects of settling, subsidence, erosion, or other events;

(2) Maintain and monitor the leak detection system in accordance with Subsections R315-264-221(c)(2)(iv) and (3) and Subsection R315-265-226(b) and comply with all other applicable leak detection system requirements of Rule R315-265;

(3) Maintain and monitor the ground-water monitoring system and comply with all other applicable requirements of Sections R315-265-90 through 265-94; and

(4) Prevent run-on and run-off from eroding or otherwise damaging the final cover.

R315-265-229. Surface Impoundments -- Special Requirements for Ignitable or Reactive Waste.

Ignitable or reactive waste shall not be placed in a surface impoundment, unless the waste and impoundment satisfy all applicable requirements of Rule R315-268, and:

(a) The waste is treated, rendered, or mixed before or immediately after placement in the impoundment so that:

(1) The resulting waste, mixture, or dissolution of material no longer meets the definition of ignitable or reactive waste under Sections R315-261-21 or R315-261-23; and

(2) Subsection R315-265-17(b) is complied with; or

(b)(1) The waste is managed in such a way that it is protected from any material or conditions which may cause it to ignite or react; and

(2) The owner or operator obtains a certification from a qualified chemist or engineer that, to the best of his knowledge and opinion, the design features or operating plans of the facility will prevent ignition or reaction; and

(3) The certification and the basis for it are maintained at the facility; or

(c) The surface impoundment is used solely for emergencies.

R315-265-230. Surface Impoundments -- Special Requirements for Incompatible Wastes.

Incompatible wastes, or incompatible wastes and materials, see 40 CFR 265 appendix V, which is adopted and incorporated by reference for examples, shall not be placed in the same surface impoundment, unless Subsection R315-265-17(b) is complied with.

R315-265-231. Surface Impoundments -- Air Emission Standards.

The owner or operator shall manage all hazardous waste placed in a surface impoundment in accordance with the applicable requirements of 40 CFR 265 subparts BB and CC, which are adopted and incorporated by reference.

R315-265-250. Waste Piles-- Applicability.

The regulations in Sections R315-265-250 through R315-265-260 apply to owners and operators of facilities that treat or store hazardous waste in piles, except as Section R315-265-1 provides otherwise. Alternatively, a pile of hazardous waste may be managed as a landfill under 40 CFR subpart N.

R315-265-251. Waste Piles-- Protection from Wind.

The owner or operator of a pile containing hazardous waste which could be subject to dispersal by wind shall cover or otherwise manage the pile so that wind dispersal is controlled.

R315-265-252. Waste Piles-- Waste Analysis.

In addition to the waste analyses required by Section R315-265-13, the owner or operator shall analyze a representative sample of waste from each incoming movement before adding the waste to any existing pile, unless (1) The only wastes the facility receives which are amenable to piling are compatible with each other, or (2) the waste received is compatible with the waste in the pile to which it is to be added. The analysis conducted shall be capable of differentiating between the types of hazardous waste the owner or operator places in piles, so that mixing of incompatible waste does not inadvertently occur. The analysis shall include a visual comparison of color and texture.

Comment: As required by Section R315-265-13, the waste analysis plan shall include analyses needed to comply with Sections R315-265-256 and 265-257. As required by Section R315-265-73, the owner or operator shall place the results of this analysis in the operating record of the facility.

R315-265-253. Waste Piles-- Containment.

If leachate or run-off from a pile is a hazardous waste, then either:

(a)(1) The pile shall be placed on an impermeable base that is compatible with the waste under the conditions of treatment or storage;

(2) The owner or operator shall design, construct, operate, and maintain a run-on control system capable of preventing flow onto the active portion of the pile during peak discharge from at least a 25-year storm;

(3) The owner or operator shall design, construct, operate, and maintain a run-off management system to collect and control at least the water volume resulting from a 24-hour, 25-year storm; and

(4) Collection and holding facilities, for example, tanks or basins, associated with run-on and run-off control systems shall be emptied or otherwise managed expeditiously to maintain design capacity of the system; or

(b)(1) The pile shall be protected from precipitation and run-on by some other means; and

(2) No liquids or wastes containing free liquids may be placed in the pile.

Comment: If collected leachate or run-off is discharged through a point source to waters of the United States, it is subject to the requirements of section 402 of the Clean Water Act, as amended.

R315-265-254. Waste Piles-- Design and Operating Requirements.

The owner or operator of each new waste pile on which construction commences after January 29, 1992, each lateral expansion of a waste pile unit on which construction commences after July 29, 1992, and each such replacement of an existing waste pile unit that is to commence reuse after July 29, 1992 shall install two or more liners and a leachate collection and removal system above and between such liners, and operate the leachate collection and removal systems, in accordance with Subsection R315-264-251(c), unless exempted under Subsections R315-264-251(d), (e), or (f); and shall comply with the procedures of Subsection R315-265-221(b). "Construction commences" is as defined in Section R315-260-10 under "existing facility".

R315-265-255. Waste Piles-- Action Leakage Rates.

(a) The owner or operator of waste pile units subject to Section R315-265-254 shall submit a proposed action leakage rate to the Director when submitting the notice required under Section R315-265-254. Within 60 days of receipt of the notification, the Director will: Establish an action leakage rate, either as proposed by the owner or operator or modified using the criteria in this Section R315-265-255; or extend the review period for up to 30 days. If no action is taken by the Director before the original 60 or extended 90 day review periods, the action leakage rate will be approved as proposed by the owner or operator.

(b) The Director shall approve an action leakage rate for waste pile units subject to Section R315-265-254. The action leakage rate is the maximum design flow rate that the leak detection system (LDS) can remove without the fluid head on the bottom liner exceeding 1 foot. The action leakage rate shall include an adequate safety margin to allow for uncertainties in the design, for example, slope, hydraulic conductivity, thickness of drainage material, construction, operation, and location of the LDS, waste and leachate characteristics, likelihood and amounts of other sources of liquids in the LDS, and proposed response actions, for example, the action leakage rate shall consider decreases in the flow capacity of the system over time resulting from siltation and clogging, rib layover and creep of synthetic components of the system, overburden pressures, etc.

(c) To determine if the action leakage rate has been exceeded, the owner or operator shall convert the weekly flow rate from the monitoring data obtained under Section R315-265-260, to an average daily flow rate, gallons per acre per day, for each sump. Unless the Director approves a different calculation, the average daily flow rate for each sump shall be calculated weekly during the active life and closure period.

R315-265-256. Waste Piles-- Special Requirements for Ignitable or Reactive Waste.

(a) Ignitable or reactive waste shall not be placed in a pile unless the waste and pile satisfy all applicable requirements of Rule R315-268, and:

(1) Addition of the waste to an existing pile (i) results in the waste or mixture no longer meeting the definition of ignitable or reactive waste under Sections R315-261-21 or R315-261-23, and (ii) complies with Subsection R315-265-17(b); or

(2) The waste is managed in such a way that it is protected from any material or conditions which may cause it to ignite or react.

R315-265-257. Waste Piles-- Special Requirements for Incompatible Wastes.

(a) Incompatible wastes, or incompatible wastes and materials, see 40 CFR 265 appendix V, which is adopted and incorporated by reference, for examples, shall not be placed in the same pile, unless Subsection R315-265-17(b) is complied with.

(b) A pile of hazardous waste that is incompatible with any waste or other material stored nearby in other containers, piles, open tanks, or surface impoundments shall be separated from the other materials, or protected from them by means of a dike, berm, wall, or other device.

Comment: The purpose of this is to prevent fires, explosions, gaseous emissions, leaching, or other discharge of hazardous waste or hazardous waste constituents which could result from the contact or mixing of incompatible wastes or materials.

(c) Hazardous waste shall not be piled on the same area where incompatible wastes or materials were previously piled, unless that area has been decontaminated sufficiently to ensure compliance with Subsection R315-265-17(b).

R315-265-258. Waste Piles-- Closure and Post-Closure Care.

(a) At closure, the owner or operator shall remove or decontaminate all waste residues, contaminated containment system components, liners, etc., contaminated subsoils, and structures and equipment contaminated with waste and leachate, and manage them as hazardous waste unless Subsection R315-261-3(d) applies; or

(b) If, after removing or decontaminating all residues and making all reasonable efforts to effect removal or decontamination of contaminated components, subsoils, structures, and equipment as required in Subsection R315-265-258(a), the owner or operator finds that not all contaminated subsoils can be practicably removed or decontaminated, he shall close the facility and perform post-closure care in accordance with the closure and post-closure requirements that apply to landfills, see 40 CFR 265.310.

R315-265-259. Waste Piles-- Response Actions.

(a) The owner or operator of waste pile units subject to Section R315-265-254 shall develop and keep on-site until closure of the facility a response action plan. The response action plan shall set forth the actions to be taken if the action leakage rate has been exceeded. At a minimum, the response action plan shall describe the actions specified in Subsection R315-265-259(b).

(b) If the flow rate into the leak determination system exceeds the action leakage rate for any sump, the owner or operator shall:

(1) Notify the Director in writing of the exceedance within seven days of the determination;

(2) Submit a preliminary written assessment to the Director within 14 days of the determination, as to the amount of liquids, likely sources of liquids, possible location, size, and cause of any leaks, and short-term actions taken and planned;

(3) Determine to the extent practicable the location, size, and cause of any leak;

(4) Determine whether waste receipts should cease or be curtailed, whether any waste should be removed from the unit for inspection, repairs, or controls, and whether or not the unit should be closed;

(5) Determine any other short-term and longer-term actions to be taken to mitigate or stop any leaks; and

(6) Within 30 days after the notification that the action leakage rate has been exceeded, submit to the Director the results of the analyses specified in Subsections R315-265-259(b)(3), (4), and (5), the results of actions taken, and actions planned. Monthly thereafter, as long as the flow rate in the leak detection system exceeds the action leakage rate, the owner or operator shall submit to the Director a report summarizing the results of any remedial actions taken and actions planned.

(c) To make the either the leak or remediation or both determinations in Subsections R315-265-259(b)(3), (4), and (5), the owner or operator shall:

(1)(i) Assess the source of liquids and amounts of liquids by source,

(ii) Conduct a fingerprint, hazardous constituent, or other analyses of the liquids in the leak detection system to identify the source of liquids and possible location of any leaks, and the hazard and mobility of the liquid; and

(iii) Assess the seriousness of any leaks in terms of potential for escaping into the environment; or

(2) Document why such assessments are not needed.

R315-265-260. Waste Piles-- Monitoring and Inspection.

An owner or operator required to have a leak detection system under Section R315-265-254 shall record the amount of liquids removed from each leak detection system sump at least once each week during the active life and closure period.

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R315. Environmental Quality, Waste Management and Radiation Control, Waste Management.
R315-266. Standards for the Management of Specific Hazardous Wastes and Specific Types of Hazardous Waste Management Facilities.
R315-266-20. Recyclable Materials Used in a Manner Constituting Disposal -- Applicability.

(a) The regulations of Sections R315-266-20 through 23 apply to recyclable materials that are applied to or placed on the land:

(1) Without mixing with any other substance(s); or

(2) After mixing or combination with any other substance(s). These materials shall be referred to throughout Sections R315-266-20 through 23 as "materials used in a manner that constitutes disposal."

(b) Products produced for the general public's use that are used in a manner that constitutes disposal and that contain recyclable materials are not presently subject to regulation if the recyclable materials have undergone a chemical reaction in the course of producing the products so as to become inseparable by physical means and if such products meet the applicable treatment standards in Sections R315-268-40 through 49, or applicable prohibition levels in Section R315-268-32 or RCRA section 3004(d), where no treatment standards have been established, for each recyclable material, i.e., hazardous waste, that they contain, and the recycler complies with Subsection R315-268-7(b)(6).

(c) Anti-skid/deicing uses of slags, which are generated from high temperature metals recovery (HTMR) processing of hazardous waste K061, K062, and F006, in a manner constituting disposal are not covered by the exemption in Subsection R315-266-20(b) and remain subject to regulation.

(d) Fertilizers that contain recyclable materials are not subject to regulation provided that:

(1) They are zinc fertilizers excluded from the definition of solid waste according to Subsection R315-261-4(a)(21); or

(2) They meet the applicable treatment standards in Sections R315-268-40 through 49 for each hazardous waste that they contain.

R315-266-21. Recyclable Materials Used in a Manner Constituting Disposal -- Standards Applicable to Generators and Transporters of Materials Used in a Manner That Constitutes Disposal.

Generators and transporters of materials that are used in a manner that constitutes disposal are subject to the applicable requirements of Rules R315-262 and 263, and the notification requirement under section 3010 of RCRA.

R315-266-22. Recyclable Materials Used in a Manner Constituting Disposal -- Standards Applicable to Storers of Materials That Are to Be Used in a Manner That Constitutes Disposal Who Are Not the Ultimate Users.

Owners or operators of facilities that store recyclable materials that are to be used in a manner that constitutes disposal, but who are not the ultimate users of the materials, are regulated under all applicable provisions of Sections R315-264-1 through 259; 40 CFR 265.1 through 260, which are adopted by reference; and Rules R315-270 and 124 and the notification requirement under section 3010 of RCRA.

R315-266-23. Recyclable Materials Used in a Manner Constituting Disposal -- Standards Applicable to Users of Materials That Are Used in a Manner That Constitutes Disposal.

(a) Owners or operators of facilities that use recyclable materials in a manner that constitutes disposal are regulated under all applicable provisions of Rules R315-124, 264, 265, 268, and 270 and the notification requirement under section 3010 of RCRA. These requirements do not apply to products which contain these recyclable materials under the provisions of Subsection R315-266-20(b).

(b) The use of waste or used oil or other material, which is contaminated with dioxin or any other hazardous waste, other than a waste identified solely on the basis of ignitability, for dust suppression or road treatment is prohibited.

R315-266-70. Recyclable Materials Utilized for Precious Metal Recovery -- Applicability and Requirements.

(a) The regulations of Section R315-266-70 apply to recyclable materials that are reclaimed to recover economically significant amounts of gold, silver, platinum, palladium, iridium, osmium, rhodium, ruthenium, or any combination of these.

(b) Persons who generate, transport, or store recyclable materials that are regulated under Section R315-266-70 are subject to the following requirements:

(1) Notification requirements under section 3010 of RCRA;

(2) Sections R315-262-20 through 262-27, for generators, Sections R315-263-20 and 263-21, for transporters; and Sections R315-265-71 and 265-72, for persons who store; and

(3) For precious metals exported to or imported from other countries for recovery, Sections R315-262-80 through 262-84 and Section R315-265-12.

(c) Persons who store recycled materials that are regulated under Section R315-266-70 shall keep the following records to document that they are not accumulating these materials speculatively, as defined in Subsection R315-261-1(c);

(1) Records showing the volume of these materials stored at the beginning of the calendar year;

(2) The amount of these materials generated or received during the calendar year; and

(3) The amount of materials remaining at the end of the calendar year.

(d) Recyclable materials that are regulated under Section R315-266-70 that are accumulated speculatively, as defined in Subsection R315-261-1(c), are subject to all applicable provisions of Rules R315-262 through 265, 270, and 124.

R315-266-80. Spent Lead-Acid Batteries Being Reclaimed -- Applicability and Requirements.

(a) Are spent lead-acid batteries exempt from hazardous waste management requirements? If you generate, collect, transport, store, or regenerate lead-acid batteries for reclamation purposes, you may be exempt from certain hazardous waste management requirements. Use Subsections R315-266-80(a)(1) through (7) to determine which requirements apply to you. Alternatively, you may choose to manage your spent lead-acid batteries under the "Universal Waste" rule in Rule R315-273.

(1) If your batteries will be reclaimed through regeneration, such as by electrolyte replacement, then you are exempt from Rules R315-262, except for Section R315-262-11; 263; 264; 265; 266; 268; 270; and 124, and the notification requirements at section 3010 of RCRA and you are subject to Rule R315-261 and Section R315-262-11.

(2) If your batteries will be reclaimed other than through regeneration and if you generate, collect, and/or transport these batteries then you are exempt from Rule R315-262, except for Section R315-262-11; 263; 264; 265; 266; 270; and 124, and the notification requirements at section 3010 of RCRA and you are subject to Rule R315-261 and Section R315-262-11, and applicable provisions under Rule R315-268.

(3) If your batteries will be reclaimed other than through regeneration and if you store these batteries but you aren't the reclaimer then you are exempt from Rule R315-262, except for Section R315-262-11; 263; 264; 265; 266; 270; and 124, and the notification requirements at section 3010 of RCRA and you

are subject to Rule R315-261 and Section R315-262-11, and applicable provisions under Rule R315-268.

(4) If your batteries will be reclaimed other than through regeneration and if you store these batteries before you reclaim them then you shall comply with Subsection R315-266-80(b) and as appropriate other regulatory provisions described in Subsection R315-266-80(b) and you are subject to Rule R315-261 and Section R315-262-11, and applicable provisions under Rule R315-268.

(5) If your batteries will be reclaimed other than through regeneration and if you don't store these batteries before you reclaim them then you are exempt from Rule R315-262, except for Section R315-262-11; 263; 264; 265; 266; 270; and 124, and the notification requirements at section 3010 of RCRA and you are subject to Rule R315-261 and Section R315-262-11, and applicable provisions under Rule R315-268.

(6) If your batteries will be reclaimed through regeneration or any other means and if you export these batteries for reclamation in a foreign country then you are exempt from Rules R315-262, except for Sections R315-262-11, R315-262-18, and R315-262-80 through R315-262-84, R315-263, R315-264, R315-265, R315-266, R315-268, R315-270, R315-124, and the notification requirements at section 3010 of RCRA and you are subject to Rule R315-261, Sections R315-262-11 and R315-262-18, and Sections R315-262-80 through R315-262-84.

(7) If your batteries will be reclaimed through regeneration or any other means and if you transport these batteries in the U.S. to export them for reclamation in a foreign country then you are exempt from Rules R315-263, 264, 265, 266, 268, 270, 124, and the notification requirements at section 3010 of RCRA and you shall comply with applicable requirements in Sections R315-262-80 through R315-262-84.

(8) If your batteries will be reclaimed other than through regeneration and if you import these batteries from foreign country and store these batteries but you aren't the reclaimer then you are exempt from Rules R315-262, except for Sections R315-262-11, 262-18 and 262-80 through 262-84, Rules R315-263, R315-264, R315-265, R315-266, R315-270, R315-124, and the notification requirements at section 3010 of RCRA and you are subject to Rule R315-261, Sections R315-262-11, 262-18, and 262-80 through 262-84, and applicable provisions under Rule R315-268.

(9) If your batteries will be reclaimed other than through regeneration and if you import these batteries from foreign country and store these batteries before you reclaim them then you shall comply with Subsection R315-266-80(b) and as appropriate other regulatory provisions described in Subsection R315-266-80(b) and you are subject to Rule R315-261, Sections R315-262-11, 262-18, and 262-80 through 262-84, and applicable provisions under Rule R315-268.

(10) If your batteries will be reclaimed other than through regeneration and if you import these batteries from foreign country and don't store these batteries before you reclaim them then you are exempt from Rules R315-262, except for Sections 262-11, 262-18 and 262-80 through 262-84, Rules R315-263, R315-264, R315-265, R315-266, R315-270, and R315-124, and the notification requirements at section 3010 of RCRA and you are subject to Rule R315-261, Sections R315-262-11, 262-18, and 262-80 through 262-84, and applicable provisions under Rule R315-268.

(b) If I store spent lead-acid batteries before I reclaim them but not through regeneration, which requirements apply? The requirements of Subsection R315-266-80(b) apply to you if you store spent lead-acid batteries before you reclaim them, but you don't reclaim them through regeneration. The requirements are slightly different depending on your permit status.

(1) For Interim Status Facilities, you shall comply with:

(i) Notification requirements under section 3010 of RCRA.

(ii) All applicable provisions in Sections R315-265-1 through 265-4.

(iii) All applicable provisions in Sections R315-265-10 through 265-19, except Section R315-265-13, waste analysis.

(iv) All applicable provisions in Sections R315-265-30 through 265-56.

(v) All applicable provisions in Sections R315-265-70 through 265-77, except Sections R315-265-71 and 265-72, dealing with the use of the manifest and manifest discrepancies.

(vi) All applicable provisions in Sections R315-265-90 through 265-260.

(vii) All applicable provisions in Rules R315-270 and 124.

(2) For Permitted Facilities:

(i) Notification requirements under section 3010 of RCRA.

(ii) All applicable provisions in Sections R315-264-1 through 4.

(iii) All applicable provisions in Sections R315-264-10 through 19, but not Section R315-264-13, waste analysis.

(iv) All applicable provisions in Sections R315-264-30 through 56.

(v) All applicable provisions in Sections R315-264-70 through 77, but not Sections R315-264-71 or 72, dealing with the use of the manifest and manifest discrepancies.

(vi) All applicable provisions in Sections R315-264-90 through 259.

(vii) All applicable provisions in Rules R315-270 and 124.

R315-266-100. Hazardous Waste Burned in Boilers and Industrial Furnaces -- Applicability.

(a) The regulations of Sections R315-266-100 through 112 apply to hazardous waste burned or processed in a boiler or industrial furnace, as defined in Section R315-260-10, irrespective of the purpose of burning or processing, except as provided by Subsections R315-266-100(b), (c), (d), (g), and (h). In Sections R315-266-100 through 112, the term "burn" means burning for energy recovery or destruction, or processing for materials recovery or as an ingredient. The emissions standards of Subsections R315-266-104, 105 through 107 apply to facilities operating under interim status or under a RCRA permit as specified in Subsections R315-266-102 and 103.

(b) Integration of the MACT standards.

(1) Except as provided by Subsections R315-266-100(b)(2), (b)(3), and (b)(4), the standards of Rule R315-266 do not apply to a new hazardous waste boiler or industrial furnace unit that becomes subject to RCRA permit requirements after October 12, 2005; or no longer apply when an owner or operator of an existing hazardous waste boiler or industrial furnace unit demonstrates compliance with the maximum achievable control technology (MACT) requirements of Subsection R307-214-2(39), which incorporates 40 CFR 63, subpart EEE, by conducting a comprehensive performance test and submitting to the Director a Notification of Compliance under 40 CFR 63.1207(j) and 63.1210(d),which are incorporated by Subsection R307-214-2(29), documenting compliance with the requirements of Subsection R307-214-2(29), which incorporates 40 CFR 63, subpart EEE. Nevertheless, even after this demonstration of compliance with the MACT standards, RCRA permit conditions that were based on the standards of Rule R315-266 shall continue to be in effect until they are removed from the permit or the permit is terminated or revoked, unless the permit expressly provides otherwise.

(2) The following standards continue to apply:

(i) If you elect to comply with Subsection R315-270-235(a)(1)(i) to minimize emissions of toxic compounds from startup, shutdown, and malfunction events, Subsection R315-266-102(e)(1) requiring operations in accordance with the operating requirements specified in the permit at all times that hazardous waste is in the unit, and Subsection R315-266-

102(e)(2)(iii) requiring compliance with the emission standards and operating requirements during startup and shutdown if hazardous waste is in the combustion chamber, except for particular hazardous wastes. These provisions apply only during startup, shutdown, and malfunction events;

(ii) The closure requirements of Subsections R315-266-102(e)(11) and 103(l);

(iii) The standards for direct transfer of Section R315-266-111;

(iv) The standards for regulation of residues of Section R315-266-112; and

(v) The applicable requirements of Sections R315-264-1 through 151, 1050 through 1065 and 1080 through 1090 and 40 CFR 265.1 through 150, 1050 through 1064, and 1080 through 1090, which are adopted by reference.

(3) If you own or operate a boiler or hydrochloric acid production furnace that is an area source under 40 CFR 63.2 and you elect not to comply with the emission standards under 40 CFR 63.1216, 63.1217, and 63.1218 for particulate matter, semivolatile and low volatile metals, and total chlorine, you also remain subject to:

(i) Section R315-266-105-Standards to control particulate matter;

(ii) Section R315-266-106-Standards to control metals emissions, except for mercury; and

(iii) Section R315-266-107-Standards to control hydrogen chloride and chlorine gas.

(4) The particulate matter standard of Section R315-266-105 remains in effect for boilers that elect to comply with the alternative to the particulate matter standard under 40 CFR 63.1216(e) and 63.1217(e).

(c) The following hazardous wastes and facilities are not subject to regulation under Sections R315-266-100 through 112:

(1) Used oil burned for energy recovery that is also a hazardous waste solely because it exhibits a characteristic of hazardous waste identified in Sections R315-261-20 through 24. Such used oil is subject to regulation under Rule R315-15;

(2) Gas recovered from hazardous or solid waste landfills when such gas is burned for energy recovery;

(3) Hazardous wastes that are exempt from regulation under Section R315-261-4 and Subsections R315-261-6(a)(3)(iii) and (iv), and hazardous wastes that are subject to the special requirements for conditionally exempt small quantity generators under Section R315-261-5; and

(4) Coke ovens, if the only hazardous waste burned is EPA Hazardous Waste No. K087, decanter tank tar sludge from coking operations.

(d) Owners and operators of smelting, melting, and refining furnaces, including pyrometallurgical devices such as cupolas, sintering machines, roasters, and foundry furnaces, but not including cement kilns, aggregate kilns, or halogen acid furnaces burning hazardous waste, that process hazardous waste solely for metal recovery are conditionally exempt from regulation under Sections R315-266-100 through 112, except for Sections R315-266-101 and 266-112.

(1) To be exempt from Sections R315-266-102 through 111, an owner or operator of a metal recovery furnace or mercury recovery furnace shall comply with the following requirements, except that an owner or operator of a lead or a nickel-chromium recovery furnace, or a metal recovery furnace that burns baghouse bags used to capture metallic dusts emitted by steel manufacturing, shall comply with the requirements of Subsection R315-266-100(d)(3), and owners or operators of lead recovery furnaces that are subject to regulation under the Secondary Lead Smelting NESHAP shall comply with the requirements of Subsection R315-266-100(h).

(i) Provide a one-time written notice to the Director indicating the following:

(A) The owner or operator claims exemption under Subsection R315-266-100(d);

(B) The hazardous waste is burned solely for metal recovery consistent with the provisions of Subsection R315-266-100(d)(2);

(C) The hazardous waste contains recoverable levels of metals; and

(D) The owner or operator shall comply with the sampling and analysis and recordkeeping requirements of Subsection R315-266-100(d);

(ii) Sample and analyze the hazardous waste and other feedstocks as necessary to comply with the requirements of Subsection R315-266-100(d) by using appropriate methods; and

(iii) Maintain at the facility for at least three years records to document compliance with the provisions of Subsection R315-266-100(d) including limits on levels of toxic organic constituents and Btu value of the waste, and levels of recoverable metals in the hazardous waste compared to normal nonhazardous waste feedstocks.

(2) A hazardous waste meeting either of the following criteria is not processed solely for metal recovery:

(i) The hazardous waste has a total concentration of organic compounds listed in Rule R315-261, appendix VIII, exceeding 500 ppm by weight, as-fired, and so is considered to be burned for destruction. The concentration of organic compounds in a waste as-generated may be reduced to the 500 ppm limit by bona fide treatment that removes or destroys organic constituents. Blending for dilution to meet the 500 ppm limit is prohibited and documentation that the waste has not been impermissibly diluted shall be retained in the records required by Subsection R315-266-100(d)(1)(iii); or

(ii) The hazardous waste has a heating value of 5,000 Btu/lb or more, as-fired, and so is considered to be burned as fuel. The heating value of a waste as-generated may be reduced to below the 5,000 Btu/lb limit by bona fide treatment that removes or destroys organic constituents. Blending for dilution to meet the 5,000 Btu/lb limit is prohibited and documentation that the waste has not been impermissibly diluted shall be retained in the records required by Subsection R315-266-100(d)(1)(iii).

(3) To be exempt from Sections R315-266-102 through 111, an owner or operator of a lead or nickel-chromium or mercury recovery furnace, except for owners or operators of lead recovery furnaces subject to regulation under the Secondary Lead Smelting NESHAP, or a metal recovery furnace that burns baghouse bags used to capture metallic dusts emitted by steel manufacturing, shall provide a one-time written notice to the Director identifying each hazardous waste burned and specifying whether the owner or operator claims an exemption for each waste under Subsection R315-266-100(d)(3) or Subsection R315-266-100(d)(1). The owners or operator shall comply with the requirements of Subsection R315-266-100(d)(1) for those wastes claimed to be exempt under Subsection R315-266-100(d)(1) and shall comply with the requirements below for those wastes claimed to be exempt under Subsection R315-266-100(d)(3).

(i) The hazardous wastes listed in appendices XI, XII, and XIII, of Rule R315-266, and baghouse bags used to capture metallic dusts emitted by steel manufacturing are exempt from the requirements of Subsection R315-266-100(d)(1), provided that:

(A) A waste listed in appendix XI of Rule R315-266 shall contain recoverable levels of lead, a waste listed in appendix XII of Rule R315-266 shall contain recoverable levels of nickel or chromium, a waste listed in appendix XIII of Rule R315-266 shall contain recoverable levels of mercury and contain less than 500 ppm of Rule R315-261, appendix VIII organic constituents, and baghouse bags used to capture metallic dusts emitted by steel manufacturing shall contain recoverable levels of metal; and

(B) The waste does not exhibit the Toxicity Characteristic of Section R315-261-24 for an organic constituent; and

(C) The waste is not a hazardous waste listed in Sections R315-261-30 through 35 because it is listed for an organic constituent as identified in appendix VII of Rule R315-261; and

(D) The owner or operator certifies in the one-time notice that hazardous waste is burned under the provisions of Subsection R315-266-100(d)(3) and that sampling and analysis will be conducted or other information will be obtained as necessary to ensure continued compliance with these requirements. Sampling and analysis shall be conducted according to Subsection R315-266-100(d)(1)(ii) and records to document compliance with Subsection R315-266-100(d)(3) shall be kept for at least three years.

(ii) The Director may decide on a case-by-case basis that the toxic organic constituents in a material listed in appendix XI, XII, or XIII of Rule R315-266 that contains a total concentration of more than 500 ppm toxic organic compounds listed in appendix VIII, of Rule R315-261, may pose a hazard to human health and the environment when burned in a metal recovery furnace exempt from the requirements of Sections R315-266-100 through 112. In that situation, after adequate notice and opportunity for comment, the metal recovery furnace shall become subject to the requirements of Sections R315-266-100 through 112 when burning that material. In making the hazard determination, the Director shall consider the following factors:

(A) The concentration and toxicity of organic constituents in the material; and

(B) The level of destruction of toxic organic constituents provided by the furnace; and

(C) Whether the acceptable ambient levels established in appendices IV or V of Rule R315-266 may be exceeded for any toxic organic compound that may be emitted based on dispersion modeling to predict the maximum annual average off-site ground level concentration.

(e) The standards for direct transfer operations under Section R315-266-111 apply only to facilities subject to the permit standards of Section R315-266-102 or the interim status standards of Section R315-266-103.

(f) The management standards for residues under Section R315-266-112 apply to any boiler or industrial furnace burning hazardous waste.

(g) Owners and operators of smelting, melting, and refining furnaces, including pyrometallurgical devices such as cupolas, sintering machines, roasters, and foundry furnaces, that process hazardous waste for recovery of economically significant amounts of the precious metals gold, silver, platinum, palladium, iridium, osmium, rhodium, or ruthenium, or any combination of these are conditionally exempt from regulation under Sections R315-266-100 through 111. To be exempt from Sections R315-266-101 through 111, an owner or operator shall:

(1) Provide a one-time written notice to the Director indicating the following:

(i) The owner or operator claims exemption under Subsection R315-266-100(g);

(ii) The hazardous waste is burned for legitimate recovery of precious metal; and

(iii) The owner or operator shall comply with the sampling and analysis and recordkeeping requirements of Subsection R315-266-100(g); and

(2) Sample and analyze the hazardous waste as necessary to document that the waste contains economically significant amounts of the metals and that the treatment recovers economically significant amounts of precious metal; and

(3) Maintain at the facility for at least three years records to document that all hazardous wastes burned are burned for recovery of economically significant amounts of precious metal.

(h) Starting June 23, 1997, owners or operators of lead recovery furnaces that process hazardous waste for recovery of lead and that are subject to regulation under the Secondary Lead Smelting NESHAP, are conditionally exempt from regulation under Section R315-266-100 through 112, except for Subsection R315-266-101. To be exempt, an owner or operator shall provide a one-time notice to the Director identifying each hazardous waste burned and specifying that the owner or operator claims an exemption under Subsection R315-266-100(h). The notice also shall state that the waste burned has a total concentration of non-metal compounds listed in Rule R315-261, appendix VIII, of less than 500 ppm by weight, as fired and as provided in Subsection R315-266-100(d)(2)(i), or is listed in appendix XI to Rule R315-266.

R315-266-101. Hazardous Waste Burned in Boilers and Industrial Furnaces -- Management Prior to Burning.

(a) Generators. Generators of hazardous waste that is burned in a boiler or industrial furnace are subject to Rule R315-262.

(b) Transporters. Transporters of hazardous waste that is burned in a boiler or industrial furnace are subject to Rule R315-263.

(c) Storage and treatment facilities.

(1) Owners and operators of facilities that store or treat hazardous waste that is burned in a boiler or industrial furnace are subject to the applicable provisions of Rules R315-264, 265 and 270, except as provided by Subsection R315-266-101(c)(2). These standards apply to storage and treatment by the burner as well as to storage and treatment facilities operated by intermediaries, processors, blenders, distributors, etc., between the generator and the burner.

(2) Owners and operators of facilities that burn, in an onsite boiler or industrial furnace exempt from regulation under the small quantity burner provisions of Section R315-266-108, hazardous waste that they generate are exempt from the regulations of Rules R315-264, 265 and 270 applicable to storage units for those storage units that store mixtures of hazardous waste and the primary fuel to the boiler or industrial furnace in tanks that feed the fuel mixture directly to the burner. Storage of hazardous waste prior to mixing with the primary fuel is subject to regulation as prescribed in Subsection R315-266-101(c)(1).

R315-266-102. Hazardous Waste Burned in Boilers and Industrial Furnaces -- Permit Standards for Burners.

(a) Applicability

(1) General. Owners and operators of boilers and industrial furnaces burning hazardous waste and not operating under interim status shall comply with the requirements of Section R315-266-102 and Sections R315-270-22 and 66, unless exempt under the small quantity burner exemption of Subsections R315-266-108.

(2) Applicability of Rule R315-264 standards. Owners and operators of boilers and industrial furnaces that burn hazardous waste are subject to the following provisions of Rule R315-264, except as provided otherwise by Sections R315-266-100 through 112:

(i) Section R315-264-4, General;

(ii) Sections R315-264-11 through 18, General facility standards;

(iii) Sections R315-264-31 through 37, Preparedness and prevention;

(iv) Sections R315-264-51 through 56, Contingency plan and emergency procedures;

(v) The applicable provisions of Sections R315-264-71 through 77, Manifest system, recordkeeping, and reporting;

(vi) Sections R315-264-90 and 101, Releases from Solid Waste Management Units;

(vii) Sections R315-264-111 through 115, Closure and post-closure;

(viii) Sections R315-264-141 through 143 and 147 through 151, Financial requirements; except that States and the Federal government are exempt from the requirements of Sections R315-264-140 through 151; and

(ix) Sections R315-264-1050 through 1065, Air emission standards for equipment leaks, except Subsections R315-264-1050(a).

(b) Hazardous waste analysis.

(1) The owner or operator shall provide an analysis of the hazardous waste that quantifies the concentration of any constituent identified in appendix VIII of Rule R315-261 that may reasonably be expected to be in the waste. Such constituents shall be identified and quantified if present, at levels detectable by using appropriate analytical procedures. The appendix VIII, Rule R315-261 constituents excluded from this analysis shall be identified and the basis for their exclusion explained. This analysis shall be used to provide all information required by Sections R315-266-100 through 112 and Subsections R315-270-22 and 66 and to enable the permit writer to prescribe such permit conditions as necessary to protect human health and the environment. Such analysis shall be included as a portion of the part B permit application, or, for facilities operating under the interim status standards of Sections R315-266-100 through 112, as a portion of the trial burn plan that may be submitted before the part B application under provisions of Subsections R315-270-66(g) as well as any other analysis required by the permit authority in preparing the permit. Owners and operators of boilers and industrial furnaces not operating under the interim status standards shall provide the information required by Subsections R315-270-22 or 66(c) in the part B application to the greatest extent possible.

(2) Throughout normal operation, the owner or operator shall conduct sampling and analysis as necessary to ensure that the hazardous waste, other fuels, and industrial furnace feedstocks fired into the boiler or industrial furnace are within the physical and chemical composition limits specified in the permit.

(c) Emissions standards. Owners and operators shall comply with emissions standards provided by Subsections R315-266-104 through 107.

(d) Permits.

(1) The owner or operator may burn only hazardous wastes specified in the facility permit and only under the operating conditions specified under Subsection R315-266-102(e), except in approved trial burns under the conditions specified in Section R315-270-66.

(2) Hazardous wastes not specified in the permit may not be burned until operating conditions have been specified under a new permit or permit modification, as applicable. Operating requirements for new wastes may be based on either trial burn results or alternative data included with part B of a permit application under Section R315-270-22.

(3) Boilers and industrial furnaces operating under the interim status standards of Section R315-266-103 are permitted under procedures provided by Subsections R315-270-66(g).

(4) A permit for a new boiler or industrial furnace, those boilers and industrial furnaces not operating under the interim status standards, shall establish appropriate conditions for each of the applicable requirements of Section R315-266-102, including but not limited to allowable hazardous waste firing rates and operating conditions necessary to meet the requirements of Subsection R315-266-102(e), in order to comply with the following standards:

(i) For the period beginning with initial introduction of hazardous waste and ending with initiation of the trial burn, and only for the minimum time required to bring the device to a point of operational readiness to conduct a trial burn, not to exceed a duration of 720 hours operating time when burning hazardous waste, the operating requirements shall be those most likely to ensure compliance with the emission standards of Sections R315-266-104 through 107, based on the Director's engineering judgment. If the applicant is seeking a waiver from a trial burn to demonstrate conformance with a particular emission standard, the operating requirements during this initial period of operation shall include those specified by the applicable provisions of Sections R315-266-104, 105, 106, or 107. The Director may extend the duration of this period for up to 720 additional hours when good cause for the extension is demonstrated by the applicant.

(ii) For the duration of the trial burn, the operating requirements shall be sufficient to demonstrate compliance with the emissions standards of Sections R315-266-104 through 107 and shall be in accordance with the approved trial burn plan;

(iii) For the period immediately following completion of the trial burn, and only for the minimum period sufficient to allow sample analysis, data computation, submission of the trial burn results by the applicant, review of the trial burn results and modification of the facility permit by the Director to reflect the trial burn results, the operating requirements shall be those most likely to ensure compliance with the emission standards Sections R315-266-104 through 107 based on the Director's engineering judgment.

(iv) For the remaining duration of the permit, the operating requirements shall be those demonstrated in a trial burn or by alternative data specified in Section R315-270-22, as sufficient to ensure compliance with the emissions standards of Sections R315-266-104 through 107.

(e) Operating requirements

(1) General. A boiler or industrial furnace burning hazardous waste shall be operated in accordance with the operating requirements specified in the permit at all times where there is hazardous waste in the unit.

(2) Requirements to ensure compliance with the organic emissions standards

(i) DRE standard. Operating conditions shall be specified either on a case-by-case basis for each hazardous waste burned as those demonstrated, in a trial burn or by alternative data as specified in Sections R315-270-22, to be sufficient to comply with the destruction and removal efficiency (DRE) performance standard of Subsection R315-266-104(a) or as those special operating requirements provided by Subsection R315-266-104(a)(4) for the waiver of the DRE trial burn. When the DRE trial burn is not waived under Subsection R315-266-104(a)(4), each set of operating requirements shall specify the composition of the hazardous waste, including acceptable variations in the physical and chemical properties of the hazardous waste which will not affect compliance with the DRE performance standard, to which the operating requirements apply. For each such hazardous waste, the permit shall specify acceptable operating limits including, but not limited to, the following conditions as appropriate:

(A) Feed rate of hazardous waste and other fuels measured and specified as prescribed in Subsection R315-266-102(e)(6);

(B) Minimum and maximum device production rate when producing normal product expressed in appropriate units, measured and specified as prescribed in Subsection R315-266-102(e)(6);

(C) Appropriate controls of the hazardous waste firing system;

(D) Allowable variation in boiler and industrial furnace system design or operating procedures;

(E) Minimum combustion gas temperature measured at a location indicative of combustion chamber temperature, measured and specified as prescribed in Subsection R315-266-102(e)(6);

(F) An appropriate indicator of combustion gas velocity,

measured and specified as prescribed in Subsection R315-266-102(e)(6), unless documentation is provided under Section R315-270-66 demonstrating adequate combustion gas residence time; and

(G) Such other operating requirements as are necessary to ensure that the DRE performance standard of Subsection R315-266-104(a) is met.

(ii) Carbon monoxide and hydrocarbon standards. The permit shall incorporate a carbon monoxide (CO) limit and, as appropriate, a hydrocarbon (HC) limit as provided by Subsections R315-266-104(b), (c), (d), (e) and (f). The permit limits shall be specified as follows:

(A) When complying with the CO standard of Subsections R315-266-104(b)(1), the permit limit is 100 ppmv;

(B) When complying with the alternative CO standard under Subsection R315-266-104(c), the permit limit for CO is based on the trial burn and is established as the average over all valid runs of the highest hourly rolling average CO level of each run, and the permit limit for HC is 20 ppmv, as defined in Subsection R315-266-104(c)(1), except as provided in Subsection R315-266-104(f).

(C) When complying with the alternative HC limit for industrial furnaces under Subsection R315-266-104(f), the permit limit for HC and CO is the baseline level when hazardous waste is not burned as specified by Subsection R315-266-104(f).

(iii) Start-up and shut-down. During start-up and shut-down of the boiler or industrial furnace, hazardous waste, except waste fed solely as an ingredient under the Tier I, or adjusted Tier I, feed rate screening limits for metals and chloride/chlorine, and except low risk waste exempt from the trial burn requirements under Subsections R315-266-104(a)(5) and R315-266-105through 107, shall not be fed into the device unless the device is operating within the conditions of operation specified in the permit.

(3) Requirements to ensure conformance with the particulate standard.

(i) Except as provided in Subsections R315-266-102(e)(3)(ii) and (iii), the permit shall specify the following operating requirements to ensure conformance with the particulate standard specified in Section R315-266-105:

(A) Total ash feed rate to the device from hazardous waste, other fuels, and industrial furnace feedstocks, measured and specified as prescribed in Subsection R315-266-102(e)(6);

(B) Maximum device production rate when producing normal product expressed in appropriate units, and measured and specified as prescribed in Subsection R315-266-102(e)(6);

(C) Appropriate controls on operation and maintenance of the hazardous waste firing system and any air pollution control system;

(D) Allowable variation in boiler and industrial furnace system design including any air pollution control system or operating procedures; and

(E) Such other operating requirements as are necessary to ensure that the particulate standard in Subsection R315-266-105(a) is met.

(ii) Permit conditions to ensure conformance with the particulate matter standard shall not be provided for facilities exempt from the particulate matter standard under Subsection R315-266-105(b);

(iii) For cement kilns and light-weight aggregate kilns, permit conditions to ensure compliance with the particulate standard shall not limit the ash content of hazardous waste or other feed materials.

(4) Requirements to ensure conformance with the metals emissions standard.

(i) For conformance with the Tier I, or adjusted Tier I, metals feed rate screening limits of Subsections R315-266-106(b) or (e), the permit shall specify the following operating requirements:

(A) Total feed rate of each metal in hazardous waste, other fuels, and industrial furnace feedstocks measured and specified under provisions of Subsection R315-266-102(e)(6);

(B) Total feed rate of hazardous waste measured and specified as prescribed in Subsection R315-266-102(e)(6);

(C) A sampling and metals analysis program for the hazardous waste, other fuels, and industrial furnace feedstocks;

(ii) For conformance with the Tier II metals emission rate screening limits under Subsection R315-266-106(c) and the Tier III metals controls under Subsection R315-266-106(d), the permit shall specify the following operating requirements:

(A) Maximum emission rate for each metal specified as the average emission rate during the trial burn;

(B) Feed rate of total hazardous waste and pumpable hazardous waste, each measured and specified as prescribed in Subsection R315-266-102(e)(6)(i);

(C) Feed rate of each metal in the following feedstreams, measured and specified as prescribed in Subsection R315-266-102(e)(6):

(I) Total feedstreams;

(II) Total hazardous waste feed; and

(III) Total pumpable hazardous waste feed;

(D) Total feed rate of chlorine and chloride in total feedstreams measured and specified as prescribed in Subsection R315-266-102(e)(6);

(E) Maximum combustion gas temperature measured at a location indicative of combustion chamber temperature, and measured and specified as prescribed in Subsection R315-266-102(e)(6);

(F) Maximum flue gas temperature at the inlet to the particulate matter air pollution control system measured and specified as prescribed in Subsection R315-266-102(e)(6);

(G) Maximum device production rate when producing normal product expressed in appropriate units and measured and specified as prescribed in Subsection R315-266-102(e)(6);

(H) Appropriate controls on operation and maintenance of the hazardous waste firing system and any air pollution control system;

(I) Allowable variation in boiler and industrial furnace system design including any air pollution control system or operating procedures; and

(J) Such other operating requirements as are necessary to ensure that the metals standards under Subsections R315-266-106(c) or 106(d) are met.

(iii) For conformance with an alternative implementation approach approved by the Director under Subsection R315-266-106(f), the permit shall specify the following operating requirements:

(A) Maximum emission rate for each metal specified as the average emission rate during the trial burn;

(B) Feed rate of total hazardous waste and pumpable hazardous waste, each measured and specified as prescribed in Subsection R315-266-102(e)(6)(i);

(C) Feed rate of each metal in the following feedstreams, measured and specified as prescribed in Subsection R315-266-102(e)(6):

(I) Total hazardous waste feed; and

(II) Total pumpable hazardous waste feed;

(D) Total feed rate of chlorine and chloride in total feedstreams measured and specified prescribed in Subsection R315-266-102(e)(6);

(E) Maximum combustion gas temperature measured at a location indicative of combustion chamber temperature, and measured and specified as prescribed in Subsection R315-266-102(e)(6);

(F) Maximum flue gas temperature at the inlet to the particulate matter air pollution control system measured and specified as prescribed in Subsection R315-266-102(e)(6);

(G) Maximum device production rate when producing

normal product expressed in appropriate units and measured and specified as prescribed in Subsection R315-266-102(e)(6);

(H) Appropriate controls on operation and maintenance of the hazardous waste firing system and any air pollution control system;

(I) Allowable variation in boiler and industrial furnace system design including any air pollution control system or operating procedures; and

(J) Such other operating requirements as are necessary to ensure that the metals standards under Subsections R315-266-106(c) or 106(d) are met.

(5) Requirements to ensure conformance with the hydrogen chloride and chlorine gas standards.

(i) For conformance with the Tier I total chloride and chlorine feed rate screening limits of Subsection R315-266-107(b)(1), the permit shall specify the following operating requirements:

(A) Feed rate of total chloride and chlorine in hazardous waste, other fuels, and industrial furnace feedstocks measured and specified as prescribed in Subsection R315-266-102(e)(6);

(B) Feed rate of total hazardous waste measured and specified as prescribed in Subsection R315-266-102(e)(6);

(C) A sampling and analysis program for total chloride and chlorine for the hazardous waste, other fuels, and industrial furnace feedstocks;

(ii) For conformance with the Tier II HCl and Cl_2 emission rate screening limits under Subsection R315-266-107(b)(2) and the Tier III HCl and Cl_2 controls under Subsection R315-266-107(c), the permit shall specify the following operating requirements:

(A) Maximum emission rate for HCl and for Cl_2 specified as the average emission rate during the trial burn;

(B) Feed rate of total hazardous waste measured and specified as prescribed in Subsection R315-266-102(e)(6);

(C) Total feed rate of chlorine and chloride in total feedstreams, measured and specified as prescribed in Subsection R315-266-102(e)(6);

(D) Maximum device production rate when producing normal product expressed in appropriate units, measured and specified as prescribed in Subsection R315-266-102(e)(6);

(E) Appropriate controls on operation and maintenance of the hazardous waste firing system and any air pollution control system;

(F) Allowable variation in boiler and industrial furnace system design including any air pollution control system or operating procedures; and

(G) Such other operating requirements as are necessary to ensure that the HCl and Cl_2 standards under Subsections R315-266-107 (b)(2) or (c) are met.

(6) Measuring parameters and establishing limits based on trial burn data

(i) General requirements. As specified in Subsections R315-266-102(e)(2) through (e)(5), each operating parameter shall be measured, and permit limits on the parameter shall be established, according to either of the following procedures:

(A) Instantaneous limits. A parameter may be measured and recorded on an instantaneous basis, i.e., the value that occurs at any time, and the permit limit specified as the time-weighted average during all valid runs of the trial burn; or

(B) Hourly rolling average. The limit for a parameter may be established and continuously monitored on an hourly rolling average basis defined as follows:

(I) A continuous monitor is one which continuously samples the regulated parameter without interruption, and evaluates the detector response at least once each 15 seconds, and computes and records the average value at least every 60 seconds.

(II) An hourly rolling average is the arithmetic mean of the 60 most recent 1-minute average values recorded by the continuous monitoring system.

(III) The permit limit for the parameter shall be established based on trial burn data as the average over all valid test runs of the highest hourly rolling average value for each run.

(ii) Rolling average limits for carcinogenic metals and lead. Feed rate limits for the carcinogenic metals, i.e., arsenic, beryllium, cadmium and chromium, and lead may be established either on an hourly rolling average basis as prescribed by Subsection R315-266-102(e)(6)(i) or on, up to, a 24 hour rolling average basis. If the owner or operator elects to use an average period from 2 to 24 hours:

(A) The feed rate of each metal shall be limited at any time to ten times the feed rate that would be allowed on an hourly rolling average basis;

(B) The continuous monitor shall meet the following specifications:

(I) A continuous monitor is one which continuously samples the regulated parameter without interruption, and evaluates the detector response at least once each 15 seconds, and computes and records the average value at least every 60 seconds.

(I) The rolling average for the selected averaging period is defined as the arithmetic mean of one hour block averages for the averaging period. A one hour block average is the arithmetic mean of the one minute averages recorded during the 60-minute period beginning at one minute after the beginning of the preceding clock hour; and

(C) The permit limit for the feed rate of each metal shall be established based on trial burn data as the average over all valid test runs of the highest hourly rolling average feed rate for each run.

(iii) Feed rate limits for metals, total chloride and chlorine, and ash. Feed rate limits for metals, total chlorine and chloride, and ash are established and monitored by knowing the concentration of the substance, i.e., metals, chloride/chlorine, and ash, in each feedstream and the flow rate of the feedstream. To monitor the feed rate of these substances, the flow rate of each feedstream shall be monitored under the continuous monitoring requirements of Subsections R315-266-102(e)(6)(i) and (ii).

(iv) Conduct of trial burn testing.

(A) If compliance with all applicable emissions standards of Sections R315-266-104 through 107 is not demonstrated simultaneously during a set of test runs, the operating conditions of additional test runs required to demonstrate compliance with remaining emissions standards shall be as close as possible to the original operating conditions.

(B) Prior to obtaining test data for purposes of demonstrating compliance with the emissions standards of Sections R315-266-104 through 107 or establishing limits on operating parameters under Section R315-266-102, the facility shall operate under trial burn conditions for a sufficient period to reach steady-state operations. The Director may determine, however, that industrial furnaces that recycle collected particulate matter back into the furnace and that comply with an alternative implementation approach for metals under Subsection R315-266-106(f) need not reach steady state conditions with respect to the flow of metals in the system prior to beginning compliance testing for metals emissions.

(C) Trial burn data on the level of an operating parameter for which a limit shall be established in the permit shall be obtained during emissions sampling for the pollutant(s), i.e., metals, PM, HCl/Cl_2, organic compounds, for which the parameter shall be established as specified by Subsection R315-266-102(e).

(7) General requirements

(i) Fugitive emissions. Fugitive emissions shall be controlled by:

(A) Keeping the combustion zone totally sealed against

fugitive emissions; or

(B) Maintaining the combustion zone pressure lower than atmospheric pressure; or

(C) An alternate means of control demonstrated, with part B of the permit application, to provide fugitive emissions control equivalent to maintenance of combustion zone pressure lower than atmospheric pressure.

(ii) Automatic waste feed cutoff. A boiler or industrial furnace shall be operated with a functioning system that automatically cuts off the hazardous waste feed when operating conditions deviate from those established under Section R315-266-102. The Director may limit the number of cutoffs per an operating period on a case-by-case basis. In addition:

(A) The permit limit for, the indicator of, minimum combustion chamber temperature shall be maintained while hazardous waste or hazardous waste residues remain in the combustion chamber,

(B) Exhaust gases shall be ducted to the air pollution control system operated in accordance with the permit requirements while hazardous waste or hazardous waste residues remain in the combustion chamber; and

(C) Operating parameters for which permit limits are established shall continue to be monitored during the cutoff, and the hazardous waste feed shall not be restarted until the levels of those parameters comply with the permit limits. For parameters that may be monitored on an instantaneous basis, the Director shall establish a minimum period of time after a waste feed cutoff during which the parameter shall not exceed the permit limit before the hazardous waste feed may be restarted.

(iii) Changes. A boiler or industrial furnace shall cease burning hazardous waste when changes in combustion properties, or feed rates of the hazardous waste, other fuels, or industrial furnace feedstocks, or changes in the boiler or industrial furnace design or operating conditions deviate from the limits as specified in the permit.

(8) Monitoring and Inspections.

(i) The owner or operator shall monitor and record the following, at a minimum, while burning hazardous waste:

(A) If specified by the permit, feed rates and composition of hazardous waste, other fuels, and industrial furnace feedstocks, and feed rates of ash, metals, and total chloride and chlorine;

(B) If specified by the permit, carbon monoxide (CO), hydrocarbons (HC), and oxygen on a continuous basis at a common point in the boiler or industrial furnace downstream of the combustion zone and prior to release of stack gases to the atmosphere in accordance with operating requirements specified in Subsection R315-266-102(e)(2)(ii). CO, HC, and oxygen monitors shall be installed, operated, and maintained in accordance with methods specified in appendix IX of Rule R315-266.

(C) Upon the request of the Director, sampling and analysis of the hazardous waste, and other fuels and industrial furnace feedstocks as appropriate, residues, and exhaust emissions shall be conducted to verify that the operating requirements established in the permit achieve the applicable standards of Sections R315-266-104 through 107.

(ii) All monitors shall record data in units corresponding to the permit limit unless otherwise specified in the permit.

(iii) The boiler or industrial furnace and associated equipment, pumps, valves, pipes, fuel storage tanks, etc., shall be subjected to thorough visual inspection when it contains hazardous waste, at least daily for leaks, spills, fugitive emissions, and signs of tampering.

(iv) The automatic hazardous waste feed cutoff system and associated alarms shall be tested at least once every 7 days when hazardous waste is burned to verify operability, unless the applicant demonstrates to the Director that weekly inspections will unduly restrict or upset operations and that less frequent inspections will be adequate. At a minimum, operational testing shall be conducted at least once every 30 days.

(v) These monitoring and inspection data shall be recorded and the records shall be placed in the operating record required by Section R315-264-73.

(9) Direct transfer to the burner. If hazardous waste is directly transferred from a transport vehicle to a boiler or industrial furnace without the use of a storage unit, the owner and operator shall comply with Section R315-266-111.

(10) Recordkeeping. The owner or operator shall maintain in the operating record of the facility all information and data required by Section R315-266-102 for five years.

(11) Closure. At closure, the owner or operator shall remove all hazardous waste and hazardous waste residues, including, but not limited to, ash, scrubber waters, and scrubber sludges, from the boiler or industrial furnace.

R315-266-103. Hazardous Waste Burned in Boilers and Industrial Furnaces -- Interim Status Standards for Burners.

(a) Purpose, scope, applicability

(1) General.

(i) The purpose of Section R315-266-103 is to establish minimum national standards for owners and operators of "existing" boilers and industrial furnaces that burn hazardous waste where such standards define the acceptable management of hazardous waste during the period of interim status. The standards of Section R315-266-103 apply to owners and operators of existing facilities until either a permit is issued under Section R315-266-102(d) or until closure responsibilities identified in Section R315-266-103 are fulfilled.

(ii) Existing or in existence means a boiler or industrial furnace that on or before August 21, 1991 is either in operation burning or processing hazardous waste or for which construction, including the ancillary facilities to burn or to process the hazardous waste, has commenced. A facility has commenced construction if the owner or operator has obtained the Federal, State, and local approvals or permits necessary to begin physical construction; and either:

(A) A continuous on-site, physical construction program has begun; or

(B) The owner or operator has entered into contractual obligations-which cannot be canceled or modified without substantial loss-for physical construction of the facility to be completed within a reasonable time.

(iii) If a boiler or industrial furnace is located at a facility that already has a permit or interim status, then the facility shall comply with the applicable regulations dealing with permit modifications in Section R315-270-42 or changes in interim status in Section R315-270-72.

(2) Exemptions. The requirements of Section R315-266-103 do not apply to hazardous waste and facilities exempt under Subsection R315-266-100(b), or Section R315-266-108.

(3) Prohibition on burning dioxin-listed wastes. The following hazardous waste listed for dioxin and hazardous waste derived from any of these wastes may not be burned in a boiler or industrial furnace operating under interim status: F020, F021, F022, F023, F026, and F027.

(4) Applicability of Rule R315-265 standards. Owners and operators of boilers and industrial furnaces that burn hazardous waste and are operating under interim status are subject to the following provisions of Rule R315-265, except as provided otherwise by Section R315-266-103:

(i) 40 CFR 265.4, which is adopted by reference, General;

(ii) 40 CFR 265.11 through 17, which are adopted by reference, General facility standards;

(iii) 40 CFR 265.31 through 37, which are adopted by reference, Preparedness and prevention;

(iv) 40 CFR 265.51 through 56, which are adopted by reference, Contingency plan and emergency procedures;

(v) 40 CFR 265.71 through 77, which are adopted by reference, Manifest system, recordkeeping, and reporting, except that 40 CFR 265.265.71, 72, and 76, which are incorporated by reference in Rule R315-265, do not apply to owners and operators of on-site facilities that do not receive any hazardous waste from off-site sources;

(vi) 40 CFR 265.111 through 115, which are adopted by reference, Closure and post-closure;

(vii) 40 CFR 265.141, 142, 143, and 147 through 150, which are adopted by reference, Financial requirements, except that States and the Federal government are exempt from the requirements of 40 CFR 265.140 through 150, which are adopted by reference; and

(viii) 40 CFR 265.1050 through 1064, which are adopted by reference, Air emission standards for equipment leaks, except 265-1050(a).

(5) Special requirements for furnaces. The following controls apply during interim status to industrial furnaces, e.g., kilns, cupolas, that feed hazardous waste for a purpose other than solely as an ingredient, see Subsection R315-266-103(a)(5)(ii), at any location other than the hot end where products are normally discharged or where fuels are normally fired:

(i) Controls.

(A) The hazardous waste shall be fed at a location where combustion gas temperatures are at least 1800 deg. F;

(B) The owner or operator shall determine that adequate oxygen is present in combustion gases to combust organic constituents in the waste and retain documentation of such determination in the facility record;

(C) For cement kiln systems, the hazardous waste shall be fed into the kiln; and

(D) The hydrocarbon controls of Subsections R315-266-104(c) or 103(c)(5) apply upon certification of compliance under Subsection R315-266-103(c) irrespective of the CO level achieved during the compliance test.

(ii) Burning hazardous waste solely as an ingredient. A hazardous waste is burned for a purpose other than solely as an ingredient if it meets either of these criteria:

(A) The hazardous waste has a total concentration of nonmetal compounds listed in Rule R315-261, appendix VIII, exceeding 500 ppm by weight, as-fired, and so is considered to be burned for destruction. The concentration of nonmetal compounds in a waste as-generated may be reduced to the 500 ppm limit by bona fide treatment that removes or destroys nonmetal constituents. Blending for dilution to meet the 500 ppm limit is prohibited and documentation that the waste has not been impermissibly diluted shall be retained in the facility record; or

(B) The hazardous waste has a heating value of 5,000 Btu/lb or more, as-fired, and so is considered to be burned as fuel. The heating value of a waste as-generated may be reduced to below the 5,000 Btu/lb limit by bona fide treatment that removes or destroys organic constituents. Blending to augment the heating value to meet the 5,000 Btu/lb limit is prohibited and documentation that the waste has not been impermissibly blended shall be retained in the facility record.

(6) Restrictions on burning hazardous waste that is not a fuel. Prior to certification of compliance under Subsection R315-266-103(c), owners and operators shall not feed hazardous waste that has a heating value less than 5,000 Btu/lb, as-generated, except that the heating value of a waste as-generated may be increased to above the 5,000 Btu/lb limit by bona fide treatment; however, blending to augment the heating value to meet the 5,000 Btu/lb limit is prohibited and records shall be kept to document that impermissible blending has not occurred, in a boiler or industrial furnace, except that:

(i) Hazardous waste may be burned solely as an ingredient; or

(ii) Hazardous waste may be burned for purposes of compliance testing, or testing prior to compliance testing, for a total period of time not to exceed 720 hours; or

(iii) Such waste may be burned if the Director has documentation to show that, prior to August 21, 1991:

(A) The boiler or industrial furnace is operating under the interim status standards for incinerators provided by 40 CFR 265.340 through 352, which are adopted by reference, or the interim status standards for thermal treatment units provided by 40 CFR 265.370 through 383, which are adopted by reference; and

(B) The boiler or industrial furnace met the interim status eligibility requirements under Section R315-270-70 for 40 CFR 265.340 through 383, which are adopted by reference; and

(C) Hazardous waste with a heating value less than 5,000 Btu/lb was burned prior to that date; or

(iv) Such waste may be burned in a halogen acid furnace if the waste was burned as an excluded ingredient under Section R315-261-2(e) prior to February 21, 1991 and documentation is kept on file supporting this claim.

(7) Direct transfer to the burner. If hazardous waste is directly transferred from a transport vehicle to a boiler or industrial furnace without the use of a storage unit, the owner and operator shall comply with Section R315-266-111.

(b) Certification of precompliance

(1) General. The owner or operator shall provide complete and accurate information specified in Subsection R315-266-103(b)(2) to the Director on or before August 21, 1991, and shall establish limits for the operating parameters specified in Subsection R315-266-103(b)(3). Such information is termed a "certification of precompliance" and constitutes a certification that the owner or operator has determined that, when the facility is operated within the limits specified in Subsection R315-266-103(b)(3), the owner or operator believes that, using best engineering judgment, emissions of particulate matter, metals, and HCl and Cl_2 are not likely to exceed the limits provided by Sections R315-266-105 through 107. The facility may burn hazardous waste only under the operating conditions that the owner or operator establishes under Subsection R315-266-103(b)(3) until the owner or operator submits a revised certification of precompliance under Subsection R315-266-103(b)(8) or a certification of compliance under Subsection R315-266-103(c), or until a permit is issued.

(2) Information required. The following information shall be submitted with the certification of precompliance to support the determination that the limits established for the operating parameters identified in Subsection R315-266-103(b)(3) are not likely to result in an exceedance of the allowable emission rates for particulate matter, metals, and HCl and Cl_2.

(i) General facility information:

(A) EPA facility ID number;

(B) Facility name, contact person, telephone number, and address;

(C) Description of boilers and industrial furnaces burning hazardous waste, including type and capacity of device;

(D) A scaled plot plan showing the entire facility and location of the boilers and industrial furnaces burning hazardous waste; and

(E) A description of the air pollution control system on each device burning hazardous waste, including the temperature of the flue gas at the inlet to the particulate matter control system.

(ii) Except for facilities complying with the Tier I or Adjusted Tier I feed rate screening limits for metals or total chlorine and chloride provided by Subsections R315-266-106(b) or (e) and 107(b)(1) or (e), respectively, the estimated uncontrolled, at the inlet to the air pollution control system, emissions of particulate matter, each metal controlled by Section R315-266-106, and hydrogen chloride and chlorine, and the

following information to support such determinations:

(A) The feed rate (lb/hr) of ash, chlorine, antimony, arsenic, barium, beryllium, cadmium, chromium, lead, mercury, silver, and thallium in each feedstream, hazardous waste, other fuels, industrial furnace feedstocks;

(B) The estimated partitioning factor to the combustion gas for the materials identified in Subsection R315-266-103(b)(2)(ii)(A) and the basis for the estimate and an estimate of the partitioning to HCl and Cl_2 of total chloride and chlorine in feed materials. To estimate the partitioning factor, the owner or operator shall use either best engineering judgment or the procedures specified in appendix IX of Rule R315-266.

(C) For industrial furnaces that recycle collected particulate matter (PM) back into the furnace and that will certify compliance with the metals emissions standards under Subsection R315-266-103(c)(3)(ii)(A), the estimated enrichment factor for each metal. To estimate the enrichment factor, the owner or operator shall use either best engineering judgment or the procedures specified in "Alternative Methodology for Implementing Metals Controls" in appendix IX Rule R315-266.

(D) If best engineering judgment is used to estimate partitioning factors or enrichment factors under Subsections R315-266-103(b)(2)(ii)(B) or (b)(2)(ii)(C) respectively, the basis for the judgment. When best engineering judgment is used to develop or evaluate data or information and make determinations under Section R315-266-103, the determinations shall be made by a qualified, registered professional engineer and a certification of his/her determinations in accordance with Subsection R315-270-11(d) shall be provided in the certification of precompliance.

(iii) For facilities complying with the Tier I or Adjusted Tier I feed rate screening limits for metals or total chlorine and chloride provided by Subsections R315-266-106(b) or (e) and 107(b)(1) or (e), the feed rate (lb/hr) of total chloride and chlorine, antimony, arsenic, barium, beryllium, cadmium, chromium, lead, mercury, silver, and thallium in each feed stream, hazardous waste, other fuels, industrial furnace feedstocks.

(iv) For facilities complying with the Tier II or Tier III emission limits for metals or HCl and Cl_2, under Subsections R315-266-106(c) or (d) or 107(b)(2) or (c), the estimated controlled, outlet of the air pollution control system, emissions rates of particulate matter, each metal controlled by Section R315-266-106, and HCl and Cl_2, and the following information to support such determinations:

(A) The estimated air pollution control system (APCS) removal efficiency for particulate matter, HCl, Cl_2, antimony, arsenic, barium, beryllium, cadmium, chromium, lead, mercury, silver, and thallium.

(B) To estimate APCS removal efficiency, the owner or operator shall use either best engineering judgment or the procedures prescribed in appendix IX of Rule R315-266.

(C) If best engineering judgment is used to estimate APCS removal efficiency, the basis for the judgment. Use of best engineering judgment shall be in conformance with provisions of Subsection R315-266-103(b)(2)(ii)(D).

(v) Determination of allowable emissions rates for HCl, Cl_2, antimony, arsenic, barium, beryllium, cadmium, chromium, lead, mercury, silver, and thallium, and the following information to support such determinations:

(A) For all facilities:

(I) Physical stack height;

(II) Good engineering practice stack height as defined by 40 CFR 51.100(ii);

(III) Maximum flue gas flow rate;

(IV) Maximum flue gas temperature;

(V) Attach a US Geological Service topographic map, or equivalent, showing the facility location and surrounding land within 5 km of the facility;

(VI) Identify terrain type: complex or noncomplex; and

(VII) Identify land use: urban or rural.

(B) For owners and operators using Tier III site specific dispersion modeling to determine allowable levels under Subsection R315-266-106(d) or 107(c), or adjusted Tier I feed rate screening limits under Subsections R315-266-106(e) or 107(e):

(I) Dispersion model and version used;

(II) Source of meteorological data;

(III) The dilution factor in micrograms per cubic meter per gram per second of emissions for the maximum annual average off-site, unless on-site is required, ground level concentration (MEI location); and

(IV) Indicate the MEI location on the map required under Subsection R315-266-103(b)(2)(v)(A)(5);

(vi) For facilities complying with the Tier II or III emissions rate controls for metals or HCl and Cl_2, a comparison of the estimated controlled emissions rates determined under Subsection R315-266-103(b)(2)(iv) with the allowable emission rates determined under Subsection R315-266-103(b)(2)(v);

(vii) For facilities complying with the Tier I, or adjusted Tier I, feed rate screening limits for metals or total chloride and chlorine, a comparison of actual feed rates of each metal and total chlorine and chloride determined under Subsection R315-266-103(b)(2)(iii) to the Tier I allowable feed rates; and

(viii) For industrial furnaces that feed hazardous waste for any purpose other than solely as an ingredient, as defined by Subsection R315-266-103(a)(5)(ii), at any location other than the product discharge end of the device, documentation of compliance with the requirements of Subsections R315-266-103(a)(5)(i)(A), (B), and (C).

(ix) For industrial furnaces that recycle collected particulate matter (PM) back into the furnace and that will certify compliance with the metals emissions standards under Subsection R315-266-103(c)(3)(ii)(A):

(A) The applicable particulate matter standard in lb/hr; and

(B) The precompliance limit on the concentration of each metal in collected PM.

(3) Limits on operating conditions. The owner and operator shall establish limits on the following parameters consistent with the determinations made under Subsection R315-266-103(b)(2) and certify, under provisions of Subsection R315-266-103(b)(9), to the Director that the facility will operate within the limits during interim status when there is hazardous waste in the unit until revised certification of precompliance under Subsection R315-266-103(b)(8) or certification of compliance under Subsection R315-266-103(c):

(i) Feed rate of total hazardous waste and, unless complying with the Tier I or adjusted Tier I metals feed rate screening limits under Subsections R315-266-106(b) or (e), pumpable hazardous waste;

(ii) Feed rate of each metal in the following feed streams:

(A) Total feed streams, except that industrial furnaces that comply with the alternative metals implementation approach under Subsection R315-266-103(b)(4) shall specify limits on the concentration of each metal in collected particulate matter in lieu of feed rate limits for total feedstreams;

(B) Total hazardous waste feed, unless complying with the Tier I or Adjusted Tier I metals feed rate screening limits under Subsections R315-266-106(b) or (e); and

(C) Total pumpable hazardous waste feed, unless complying with the Tier I or adjusted Tier I metals feed rate screening limits under Subsections R315-266-106(b) or (e);

(iii) Total feed rate of chlorine and chloride in total feed streams;

(iv) Total feed rate of ash in total feed streams, except that the ash feed rate for cement kilns and light-weight aggregate kilns is not limited; and

(v) Maximum production rate of the device in appropriate

units when producing normal product, unless complying with the Tier I or Adjusted Tier I feed rate screening limits for chlorine under Subsections R315-266-107(b)(1) or (e) and for all metals under Subsections R315-266-106(b) or (e), and the uncontrolled particulate emissions do not exceed the standard under Subsection R315-266-105.

(4) Operating requirements for furnaces that recycle PM. Owners and operators of furnaces that recycle collected particulate matter (PM) back into the furnace and that will certify compliance with the metals emissions controls under Subsection R315-266-103(c)(3)(ii)(A) shall comply with the special operating requirements provided in "Alternative Methodology for Implementing Metals Controls" in appendix IX of Rule R315-266.

(5) Measurement of feed rates and production rate

(i) General requirements. Limits on each of the parameters specified in Subsection R315-266-103(b)(3), except for limits on metals concentrations in collected particulate matter (PM) for industrial furnaces that recycle collected PM, shall be established and continuously monitored under either of the following methods:

(A) Instantaneous limits. A limit for a parameter may be established and continuously monitored and recorded on an instantaneous basis, i.e., the value that occurs at any time, not to be exceeded at any time; or

(B) Hourly rolling average limits. A limit for a parameter may be established and continuously monitored on an hourly rolling average basis defined as follows:

(I) A continuous monitor is one which continuously samples the regulated parameter without interruption, and evaluates the detector response at least once each 15 seconds, and computes and records the average value at least every 60 seconds.

(II) An hourly rolling average is the arithmetic mean of the 60 most recent 1-minute average values recorded by the continuous monitoring system.

(ii) Rolling average limits for carcinogenic metals and lead. Feed rate limits for the carcinogenic metals, arsenic, beryllium, cadmium, and chromium, and lead may be established either on an hourly rolling average basis as prescribed by Subsection R315-266-103(b)(5)(i)(B) or on, up to, a 24 hour rolling average basis. If the owner or operator elects to use an averaging period from 2 to 24 hours:

(A) The feed rate of each metal shall be limited at any time to ten times the feed rate that would be allowed on an hourly rolling average basis;

(B) The continuous monitor shall meet the following specifications:

(I) A continuous monitor is one which continuously samples the regulated parameter without interruption, and evaluates the detector response at least once each 15 seconds, and computes and records the average value at least every 60 seconds.

(II) The rolling average for the selected averaging period is defined as the arithmetic mean of one hour block averages for the averaging period. A one hour block average is the arithmetic mean of the one minute averages recorded during the 60-minute period beginning at one minute after the beginning of preceding clock hour.

(iii) Feed rate limits for metals, total chloride and chlorine, and ash. Feed rate limits for metals, total chlorine and chloride, and ash are established and monitored by knowing the concentration of the substance, i.e., metals, chloride/chlorine, and ash, in each feedstream and the flow rate of the feedstream. To monitor the feed rate of these substances, the flow rate of each feedstream shall be monitored under the continuous monitoring requirements of Subsections R315-266-103(b)(5)(i) and (ii).

(6) Public notice requirements at precompliance. On or before August 21, 1991 the owner or operator shall submit a notice with the following information for publication in a major local newspaper of general circulation and send a copy of the notice to the appropriate units of State and local government. The owner and operator shall provide to the Director with the certification of precompliance evidence of submitting the notice for publication. The notice, which shall be entitled "Notice of Certification of Precompliance with Hazardous Waste Burning Requirements of Subsection R315-266-103(b)", shall include:

(i) Name and address of the owner and operator of the facility as well as the location of the device burning hazardous waste;

(ii) Date that the certification of precompliance is submitted to the Director;

(iii) Brief description of the regulatory process required to comply with the interim status requirements of Section R315-266-103 including required emissions testing to demonstrate conformance with emissions standards for organic compounds, particulate matter, metals, and HCl and Cl_2;

(iv) Types and quantities of hazardous waste burned including, but not limited to, source, whether solids or liquids, as well as an appropriate description of the waste;

(v) Type of device(s) in which the hazardous waste is burned including a physical description and maximum production rate of each device;

(vi) Types and quantities of other fuels and industrial furnace feedstocks fed to each unit;

(vii) Brief description of the basis for this certification of precompliance as specified in Subsection R315-266-103(b)(2);

(viii) Locations where the record for the facility can be viewed and copied by interested parties. These records and locations shall at a minimum include:

(A) The administrative record kept by the Agency office where the supporting documentation was submitted or another location designated by the Director; and

(B) The BIF correspondence file kept at the facility site where the device is located. The correspondence file shall include all correspondence between the facility and the Director and local regulatory officials, including copies of all certifications and notifications, such as the precompliance certification, precompliance public notice, notice of compliance testing, compliance test report, compliance certification, time extension requests and approvals or denials, enforcement notifications of violations, and copies of EPA and State site visit reports submitted to the owner or operator.

(ix) Notification of the establishment of a facility mailing list whereby interested parties shall notify the Director that they wish to be placed on the mailing list to receive future information and notices about this facility; and

(x) Location, mailing address, of the Division of Waste Management and Radiation Control, where further information can be obtained on regulation of hazardous waste burning.

(7) Monitoring other operating parameters. When the monitoring systems for the operating parameters listed in Subsections R315-266-103(c)(1)(v) through (xiii) are installed and operating in conformance with vendor specifications or, for CO, HC, and oxygen, specifications provided by appendix IX of Rule R315-266, as appropriate, the parameters shall be continuously monitored and records shall be maintained in the operating record.

(8) Revised certification of precompliance. The owner or operator may revise at any time the information and operating conditions documented under Subsections R315-266-103(b)(2) and (b)(3) in the certification of precompliance by submitting a revised certification of precompliance under procedures provided by Subsections R315-266-103(b)(2) and (b)(3).

(i) The public notice requirements of Subsection R315-266-103(b)(6) do not apply to recertifications.

(ii) The owner and operator shall operate the facility

within the limits established for the operating parameters under Subsection R315-266-103(b)(3) until a revised certification is submitted under Subsection R315-266-103(b)(8) or a certification of compliance is submitted under Subsection R315-266-103(c).

(9) Certification of precompliance statement. The owner or operator shall include the following signed statement with the certification of precompliance submitted to the Director:

"I certify under penalty of law that this information was prepared under my direction or supervision in accordance with a system designed to ensure that qualified personnel properly gathered and evaluated the information and supporting documentation. Copies of all emissions tests, dispersion modeling results and other information used to determine conformance with the requirements of Subsection R315-266-103(b) are available at the facility and can be obtained from the facility contact person listed above. Based on my inquiry of the person or persons who manages the facility, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations.

I also acknowledge that the operating limits established in this certification pursuant to Subsections R315-266-103(b)(3) and (4) are enforceable limits at which the facility can legally operate during interim status until: (1) A revised certification of precompliance is submitted, (2) a certification of compliance is submitted, or (3) an operating permit is issued."

(c) Certification of compliance. The owner or operator shall conduct emissions testing to document compliance with the emissions standards of Subsections R315-266-104(b) through (e) and 103(a)(5)(i)(D) and Sections R315-266-105, 106, 107, and, under the procedures prescribed by Subsection R315-266-103(c), except under extensions of time provided by Subsection R315-266-103(c)(7). Based on the compliance test, the owner or operator shall submit to the Director on or before August 21, 1992 a complete and accurate "certification of compliance," under Subsection R315-266-103(c)(4), with those emission standards establishing limits on the operating parameters specified in Subsection R315-266-103(c)(1).

(1) Limits on operating conditions. The owner or operator shall establish limits on the following parameters based on operations during the compliance test, under procedures prescribed in Subsection R315-266-103(c)(4)(iv), or as otherwise specified and include these limits with the certification of compliance. The boiler or industrial furnace shall be operated in accordance with these operating limits and the applicable emissions standards of Subsections R315-266-104(b) through (e) and 103(a)(5)(i)(D) and Sections R315-266-105, 106, and 107, at all times when there is hazardous waste in the unit.

(i) Feed rate of total hazardous waste and, unless complying with the Tier I or adjusted Tier I metals feed rate screening limits under Subsection R315-266-106(b) or (e), pumpable hazardous waste;

(ii) Feed rate of each metal in the following feedstreams:

(A) Total feedstreams, except that:

(I) Facilities that comply with Tier I or Adjusted Tier I metals feed rate screening limits may set their operating limits at the metals feed rate screening limits determined under Subsections R315-266-106(b) or (e); and

(II) Industrial furnaces that shall comply with the alternative metals implementation approach under Subsection R315-266-103(c)(3)(ii) shall specify limits on the concentration of each metal in the collected particulate matter in lieu of feed rate limits for total feedstreams;

(B) Total hazardous waste feed, unless complying with the Tier I or Adjusted Tier I metals feed rate screening limits under Subsections R315-266-106(b) or (e); and

(C) Total pumpable hazardous waste feed, unless complying with the Tier I or Adjusted Tier I metals feed rate screening limits under Subsection R315-266-106(b) or (e);

(iii) Total feed rate of chlorine and chloride in total feed streams, except that facilities that comply with Tier I or Adjusted Tier I feed rate screening limits may set their operating limits at the total chlorine and chloride feed rate screening limits determined under Subsections R315-266-107(b)(1) or (e);

(iv) Total feed rate of ash in total feed streams, except that the ash feed rate for cement kilns and light-weight aggregate kilns is not limited;

(v) Carbon monoxide concentration, and where required, hydrocarbon concentration in stack gas. When complying with the CO controls of Subsection R315-266-104(b), the CO limit is 100 ppmv, and when complying with the HC controls of Subsection R315-266-104(c), the HC limit is 20 ppmv. When complying with the CO controls of Subsection R315-266-104(c), the CO limit is established based on the compliance test;

(vi) Maximum production rate of the device in appropriate units when producing normal product, unless complying with the Tier I or Adjusted Tier I feed rate screening limits for chlorine under Subsections R315-266-107(b)(1) or (e) and for all metals under Subsections R315-266-106(b) or (e), and the uncontrolled particulate emissions do not exceed the standard under Section R315-266-105;

(vii) Maximum combustion chamber temperature where the temperature measurement is as close to the combustion zone as possible and is upstream of any quench water injection, unless complying with the Tier I or Adjusted Tier I metals feed rate screening limits under Subsections R315-266-106(b) or (e);

(viii) Maximum flue gas temperature entering a particulate matter control device, unless complying with Tier I or Adjusted Tier I metals feed rate screening limits under Subsections R315-266-106(b) or (e) and the total chlorine and chloride feed rate screening limits under Subsections R315-266-107(b) or (e);

(ix) For systems using wet scrubbers, including wet ionizing scrubbers, unless complying with the Tier I or Adjusted Tier I metals feed rate screening limits under Subsections R315-266-106(b) or (e) and the total chlorine and chloride feed rate screening limits under Subsections R315-266-107(b)(1) or (e):

(A) Minimum liquid to flue gas ratio;

(B) Minimum scrubber blowdown from the system or maximum suspended solids content of scrubber water; and

(C) Minimum pH level of the scrubber water;

(x) For systems using venturi scrubbers, the minimum differential gas pressure across the venture, unless complying with the Tier I or Adjusted Tier I metals feed rate screening limits under Subsections R315-266-106(b) or (e) and the total chlorine and chloride feed rate screening limits under Subsections R315-266-107(b)(1) or (e);

(xi) For systems using dry scrubbers, unless complying with the Tier I or Adjusted Tier I metals feed rate screening limits under Subsections R315-266-106(b) or (e) and the total chlorine and chloride feed rate screening limits under Subsections R315-266-107(b)(1) or (e):

(A) Minimum caustic feed rate; and

(B) Maximum flue gas flow rate;

(xii) For systems using wet ionizing scrubbers or electrostatic precipitators, unless complying with the Tier I or Adjusted Tier I metals feed rate screening limits under Subsections R315-266-106(b) or (e) and the total chlorine and chloride feed rate screening limits under Subsections R315-266-107(b)(1) or (e):

(A) Minimum electrical power in kilovolt amperes (kVA) to the precipitator plates; and

(B) Maximum flue gas flow rate;

(xiii) For systems using fabric filters (baghouses), the minimum pressure drop, unless complying with the Tier I or

Adjusted Tier I metal feed rate screening limits under Subsections R315-266-106(b) or (e) and the total chlorine and chloride feed rate screening limits under Subsections R315-266-107(b)(1) or (e).

(2) Prior notice of compliance testing. At least 30 days prior to the compliance testing required by Subsection R315-266-103(c)(3), the owner or operator shall notify the Director and submit the following information:

(i) General facility information including:

(A) EPA facility ID number;

(B) Facility name, contact person, telephone number, and address;

(C) Person responsible for conducting compliance test, including company name, address, and telephone number, and a statement of qualifications;

(D) Planned date of the compliance test;

(ii) Specific information on each device to be tested including:

(A) Description of boiler or industrial furnace;

(B) A scaled plot plan showing the entire facility and location of the boiler or industrial furnace;

(C) A description of the air pollution control system;

(D) Identification of the continuous emission monitors that are installed, including:

(I) Carbon monoxide monitor;

(II) Oxygen monitor;

(III) Hydrocarbon monitor, specifying the minimum temperature of the system and, if the temperature is less than 150 °C, an explanation of why a heated system is not used, see Subsection R315-266-103(c)(5), and a brief description of the sample gas conditioning system;

(E) Indication of whether the stack is shared with another device that will be in operation during the compliance test;

(F) Other information useful to an understanding of the system design or operation.

(iii) Information on the testing planned, including a complete copy of the test protocol and Quality Assurance/Quality Control (QA/QC) plan, and a summary description for each test providing the following information at a minimum:

(A) Purpose of the test, e.g., demonstrate compliance with emissions of particulate matter; and

(B) Planned operating conditions, including levels for each pertinent parameter specified in Subsection R315-266-103(c)(1).

(3) Compliance testing

(i) General. Compliance testing shall be conducted under conditions for which the owner or operator has submitted a certification of precompliance under Subsection R315-266-103(b) and under conditions established in the notification of compliance testing required by Subsection R315-266-103(c)(2). The owner or operator may seek approval on a case-by-case basis to use compliance test data from one unit in lieu of testing a similar onsite unit. To support the request, the owner or operator shall provide a comparison of the hazardous waste burned and other feedstreams, and the design, operation, and maintenance of both the tested unit and the similar unit. The Director shall provide a written approval to use compliance test data in lieu of testing a similar unit if he finds that the hazardous wastes, the devices, and the operating conditions are sufficiently similar, and the data from the other compliance test is adequate to meet the requirements of Subsection R315-266-103(c).

(ii) Special requirements for industrial furnaces that recycle collected PM. Owners and operators of industrial furnaces that recycle back into the furnace particulate matter (PM) from the air pollution control system shall comply with one of the following procedures for testing to determine compliance with the metals standards of Subsections R315-266-106(c) or (d):

(A) The special testing requirements prescribed in "Alternative Method for Implementing Metals Controls" in appendix IX of Rule R315-266; or

(B) Stack emissions testing for a minimum of 6 hours each day while hazardous waste is burned during interim status. The testing shall be conducted when burning normal hazardous waste for that day at normal feed rates for that day and when the air pollution control system is operated under normal conditions. During interim status, hazardous waste analysis for metals content shall be sufficient for the owner or operator to determine if changes in metals content may affect the ability of the facility to meet the metals emissions standards established under Subsections R315-266-106(c) or (d). Under this option, operating limits, under Subsection R315-266-103(c)(1), shall be established during compliance testing under Subsection R315-266-103(c)(3) only on the following parameters;

(I) Feed rate of total hazardous waste;

(II) Total feed rate of chlorine and chloride in total feed streams;

(III) Total feed rate of ash in total feed streams, except that the ash feed rate for cement kilns and light-weight aggregate kilns is not limited;

(IV) Carbon monoxide concentration, and where required, hydrocarbon concentration in stack gas;

(V) Maximum production rate of the device in appropriate units when producing normal product; or

(C) Conduct compliance testing to determine compliance with the metals standards to establish limits on the operating parameters of Subsection R315-266-103(c)(1) only after the kiln system has been conditioned to enable it to reach equilibrium with respect to metals fed into the system and metals emissions. During conditioning, hazardous waste and raw materials having the same metals content as will be fed during the compliance test shall be fed at the feed rates that will be fed during the compliance test.

(iii) Conduct of compliance testing.

(A) If compliance with all applicable emissions standards of Sections R315-266-104 through 107 is not demonstrated simultaneously during a set of test runs, the operating conditions of additional test runs required to demonstrate compliance with remaining emissions standards shall be as close as possible to the original operating conditions.

(B) Prior to obtaining test data for purposes of demonstrating compliance with the applicable emissions standards of Sections R315-266-104 through 107 or establishing limits on operating parameters under Section R315-266-103, the facility shall operate under compliance test conditions for a sufficient period to reach steady-state operations. Industrial furnaces that recycle collected particulate matter back into the furnace and that comply with Subsections R315-266-103(c)(3)(ii)(A) or (B), however, need not reach steady state conditions with respect to the flow of metals in the system prior to beginning compliance testing for metals.

(C) Compliance test data on the level of an operating parameter for which a limit shall be established in the certification of compliance shall be obtained during emissions sampling for the pollutant(s), i.e., metals, PM, HCl/Cl2, organic compounds, for which the parameter shall be established as specified by Subsection R315-266-103(c)(1).

(4) Certification of compliance. Within 90 days of completing compliance testing, the owner or operator shall certify to the Director compliance with the emissions standards of Subsections R315-266-104 (b), (c), and (e), and Sections R315-266-105, 106, and 107, and Subsection R315-266-103(a)(5)(i)(D). The certification of compliance shall include the following information:

(i) General facility and testing information including:

(A) EPA facility ID number;

(B) Facility name, contact person, telephone number, and

address;

(C) Person responsible for conducting compliance testing, including company name, address, and telephone number, and a statement of qualifications;

(D) Date(s) of each compliance test;

(E) Description of boiler or industrial furnace tested;

(F) Person responsible for quality assurance/quality control (QA/QC), title, and telephone number, and statement that procedures prescribed in the QA/QC plan submitted under Subsection R315-266-103(c)(2)(iii) have been followed, or a description of any changes and an explanation of why changes were necessary.

(G) Description of any changes in the unit configuration prior to or during testing that would alter any of the information submitted in the prior notice of compliance testing under Subsection R315-266-103(c)(2), and an explanation of why the changes were necessary;

(H) Description of any changes in the planned test conditions prior to or during the testing that alter any of the information submitted in the prior notice of compliance testing under Subsection R315-266-103(c)(2), and an explanation of why the changes were necessary; and

(I) The complete report on results of emissions testing.

(ii) Specific information on each test including:

(A) Purpose(s) of test, e.g., demonstrate conformance with the emissions limits for particulate matter, metals, HCl, Cl_2, and CO;

(B) Summary of test results for each run and for each test including the following information:

(I) Date of run;

(II) Duration of run;

(III) Time-weighted average and highest hourly rolling average CO level for each run and for the test;

(IV) Highest hourly rolling average HC level, if HC monitoring is required for each run and for the test;

(V) If dioxin and furan testing is required under Subsection R315-266-104(e), time-weighted average emissions for each run and for the test of chlorinated dioxin and furan emissions, and the predicted maximum annual average ground level concentration of the toxicity equivalency factor;

(VI) Time-weighted average particulate matter emissions for each run and for the test;

(VII) Time-weighted average HCl and Cl2 emissions for each run and for the test;

(VIII) Time-weighted average emissions for the metals subject to regulation under Subsection R315-266-106 for each run and for the test; and

(IX) QA/QC results.

(iii) Comparison of the actual emissions during each test with the emissions limits prescribed by Subsections R315-266-104(b), (c), and (e), and Sections R315-266-105, through 107 and established for the facility in the certification of precompliance under Subsection R315-266-103(b).

(iv) Determination of operating limits based on all valid runs of the compliance test for each applicable parameter listed in Subsection R315-266-103(c)(1) using either of the following procedures:

(A) Instantaneous limits. A parameter may be measured and recorded on an instantaneous basis, i.e., the value that occurs at any time, and the operating limit specified as the time-weighted average during all runs of the compliance test; or

(B) Hourly rolling average basis. The limit for a parameter may be established and continuously monitored on an hourly rolling average basis defined as follows:

(I) A continuous monitor is one which continuously samples the regulated parameter without interruption, and evaluates the detector response at least once each 15 seconds, and computes and records the average value at least every 60 seconds; and

(II) An hourly rolling average is the arithmetic mean of the 60 most recent 1-minute average values recorded by the continuous monitoring system.

(III) The operating limit for the parameter shall be established based on compliance test data as the average over all test runs of the highest hourly rolling average value for each run.

(C) Rolling average limits for carcinogenic metals and lead. Feed rate limits for the carcinogenic metals, i.e., arsenic, beryllium, cadmium and chromium, and lead may be established either on an hourly rolling average basis as prescribed by Subsection R315-266-103(c)(4)(iv)(B) or on,up to, a 24 hour rolling average basis. If the owner or operator elects to use an averaging period from 2 to 24 hours:

(I) The feed rate of each metal shall be limited at any time to ten times the feed rate that would be allowed on an hourly rolling average basis;

(II) The continuous monitor shall meet the following specifications:

(i) A continuous monitor is one which continuously samples the regulated parameter without interruption, and evaluates the detector response at least once each 15 seconds, and computes and records the average value at least every 60 seconds.

(ii) The rolling average for the selected averaging period is defined as arithmetic mean of one hour block averages for the averaging period. A one hour block average is the arithmetic mean of the one minute averages recorded during the 60-minute period beginning at one minute after the beginning of preceding clock hour; and

(III) The operating limit for the feed rate of each metal shall be established based on compliance test data as the average over all test runs of the highest hourly rolling average feed rate for each run.

(D) Feed rate limits for metals, total chloride and chlorine, and ash. Feed rate limits for metals, total chlorine and chloride, and ash are established and monitored by knowing the concentration of the substance, i.e., metals, chloride/chlorine, and ash, in each feedstream and the flow rate of the feedstream. To monitor the feed rate of these substances, the flow rate of each feedstream shall be monitored under the continuous monitoring requirements of Subsections R315-266-103(c)(4)(iv)(A) through (C).

(v) Certification of compliance statement. The following statement shall accompany the certification of compliance:

"I certify under penalty of law that this information was prepared under my direction or supervision in accordance with a system designed to ensure that qualified personnel properly gathered and evaluated the information and supporting documentation. Copies of all emissions tests, dispersion modeling results and other information used to determine conformance with the requirements of Subsection R315-266-103(c) are available at the facility and can be obtained from the facility contact person listed above. Based on my inquiry of the person or persons who manages the facility, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations.

I also acknowledge that the operating conditions established in this certification pursuant to Subsection R315-266-103(c)(4)(iv) are enforceable limits at which the facility can legally operate during interim status until a revised certification of compliance is submitted."

(5) Special requirements for HC monitoring systems. When an owner or operator is required to comply with the hydrocarbon (HC) controls provided by Subsections R315-266-104(c) or 103(a)(5)(i)(D), a conditioned gas monitoring system

may be used in conformance with specifications provided in appendix IX of Rule R315-266 provided that the owner or operator submits a certification of compliance without using extensions of time provided by Subsection R315-266-103(c)(7).

(6) Special operating requirements for industrial furnaces that recycle collected PM. Owners and operators of industrial furnaces that recycle back into the furnace particulate matter (PM) from the air pollution control system shall:

(i) When complying with the requirements of Subsection R315-266-103(c)(3)(ii)(A), comply with the operating requirements prescribed in "Alternative Method to Implement the Metals Controls" in appendix IX of Rule R315-266; and

(ii) When complying with the requirements of Subsection R315-266-103(c)(3)(ii)(B), comply with the operating requirements prescribed by Subsection R315-266-103(c).

(7) Extensions of time.

(i) If the owner or operator does not submit a complete certification of compliance for all of the applicable emissions standards of Sections R315-266-104, through 107 by August 21, 1992, he/she shall either:

(A) Stop burning hazardous waste and begin closure activities under Subsection R315-266-103(l) for the hazardous waste portion of the facility; or

(B) Limit hazardous waste burning only for purposes of compliance testing, and pretesting to prepare for compliance testing, a total period of 720 hours for the period of time beginning August 21, 1992, submit a notification to the Director by August 21, 1992 stating that the facility is operating under restricted interim status and intends to resume burning hazardous waste, and submit a complete certification of compliance by August 23, 1993; or

(C) Obtain a case-by-case extension of time under Subsection R315-266-103(c)(7)(ii).

(ii) The owner or operator may request a case-by-case extension of time to extend any time limit provided by Subsection R315-266-103(c) if compliance with the time limit is not practicable for reasons beyond the control of the owner or operator.

(A) In granting an extension, the Director may apply conditions as the facts warrant to ensure timely compliance with the requirements of Section R315-266-103 and that the facility operates in a manner that does not pose a hazard to human health and the environment;

(B) When an owner or operator requests an extension of time to enable the facility to comply with the alternative hydrocarbon provisions of Subsection R315-266-104(f) and obtain a RCRA operating permit because the facility cannot meet the HC limit of Subsection R315-266-104(c):

(1) The Director shall, in considering whether to grant the extension:

(i) Determine whether the owner and operator have submitted in a timely manner a complete part B permit application that includes information required under Subsection R315-270-22(b); and

(ii) Consider whether the owner and operator have made a good faith effort to certify compliance with all other emission controls, including the controls on dioxins and furans of Subsection R315-266-104(e) and the controls on PM, metals, and HCl/Cl_2.

(2) If an extension is granted, the Director shall, as a condition of the extension, require the facility to operate under flue gas concentration limits on CO and HC that, based on available information, including information in the part B permit application, are baseline CO and HC levels as defined by Subsection R315-266-104(f)(1).

(8) Revised certification of compliance. The owner or operator may submit at any time a revised certification of compliance, recertification of compliance, under the following procedures:

(i) Prior to submittal of a revised certification of compliance, hazardous waste may not be burned for more than a total of 720 hours under operating conditions that exceed those established under a current certification of compliance, and such burning may be conducted only for purposes of determining whether the facility can operate under revised conditions and continue to meet the applicable emissions standards of Sections R315-266-104 through 107;

(ii) At least 30 days prior to first burning hazardous waste under operating conditions that exceed those established under a current certification of compliance, the owner or operator shall notify the Director and submit the following information:

(A) EPA facility ID number, and facility name, contact person, telephone number, and address;

(B) Operating conditions that the owner or operator is seeking to revise and description of the changes in facility design or operation that prompted the need to seek to revise the operating conditions;

(C) A determination that when operating under the revised operating conditions, the applicable emissions standards of Sections R315-266-104 through 107 are not likely to be exceeded. To document this determination, the owner or operator shall submit the applicable information required under Subsection R315-266-103(b)(2); and

(D) Complete emissions testing protocol for any pretesting and for a new compliance test to determine compliance with the applicable emissions standards of Sections R315-266-104 through 107 when operating under revised operating conditions. The protocol shall include a schedule of pre-testing and compliance testing. If the owner and operator revises the scheduled date for the compliance test, he/she shall notify the Director in writing at least 30 days prior to the revised date of the compliance test;

(iii) Conduct a compliance test under the revised operating conditions and the protocol submitted to the Director to determine compliance with the applicable emissions standards of Sections R315-266-104 through 107; and

(iv) Submit a revised certification of compliance under Subsection R315-266-103(c)(4).

(d) Periodic Recertifications. The owner or operator shall conduct compliance testing and submit to the Director a recertification of compliance under provisions of Subsection R315-266-103(c) within five years from submitting the previous certification or recertification. If the owner or operator seeks to recertify compliance under new operating conditions, he/she shall comply with the requirements of Subsection R315-266-103(c)(8).

(e) Noncompliance with certification schedule. If the owner or operator does not comply with the interim status compliance schedule provided by Subsections R315-266-103(b), (c), and (d), hazardous waste burning shall terminate on the date that the deadline is missed, closure activities shall begin under Subsection R315-266-103(l), and hazardous waste burning may not resume except under an operating permit issued under Section R315-270-66. For purposes of compliance with the closure provisions of Subsection R315-266-103(l) and 40 CFR 265.112(d)(2) and 113, which are adopted by reference, the boiler or industrial furnace has received "the known final volume of hazardous waste" on the date that the deadline is missed.

(f) Start-up and shut-down. Hazardous waste, except waste fed solely as an ingredient under the Tier I, or adjusted Tier I, feed rate screening limits for metals and chloride/chlorine, shall not be fed into the device during start-up and shut-down of the boiler or industrial furnace, unless the device is operating within the conditions of operation specified in the certification of compliance.

(g) Automatic waste feed cutoff. During the compliance test required by Subsection R315-266-103(c)(3), and upon

certification of compliance under Subsection R315-266-103(c), a boiler or industrial furnace shall be operated with a functioning system that automatically cuts off the hazardous waste feed when the applicable operating conditions specified in Subsections R315-266-103(c)(1)(i) and (v) through (xiii) deviate from those established in the certification of compliance. In addition:

(1) To minimize emissions of organic compounds, the minimum combustion chamber temperature, or the indicator of combustion chamber temperature, that occurred during the compliance test shall be maintained while hazardous waste or hazardous waste residues remain in the combustion chamber, with the minimum temperature during the compliance test defined as either:

(i) If compliance with the combustion chamber temperature limit is based on an hourly rolling average, the minimum temperature during the compliance test is considered to be the average over all runs of the lowest hourly rolling average for each run; or

(ii) If compliance with the combustion chamber temperature limit is based on an instantaneous temperature measurement, the minimum temperature during the compliance test is considered to be the time-weighted average temperature during all runs of the test; and

(2) Operating parameters limited by the certification of compliance shall continue to be monitored during the cutoff, and the hazardous waste feed shall not be restarted until the levels of those parameters comply with the limits established in the certification of compliance.

(h) Fugitive emissions. Fugitive emissions shall be controlled by:

(1) Keeping the combustion zone totally sealed against fugitive emissions; or

(2) Maintaining the combustion zone pressure lower than atmospheric pressure; or

(3) An alternate means of control that the owner or operator can demonstrate provide fugitive emissions control equivalent to maintenance of combustion zone pressure lower than atmospheric pressure. Support for such demonstration shall be included in the operating record.

(i) Changes. A boiler or industrial furnace shall cease burning hazardous waste when changes in combustion properties, or feed rates of the hazardous waste, other fuels, or industrial furnace feedstocks, or changes in the boiler or industrial furnace design or operating conditions deviate from the limits specified in the certification of compliance.

(j) Monitoring and Inspections.

(1) The owner or operator shall monitor and record the following, at a minimum, while burning hazardous waste:

(i) Feed rates and composition of hazardous waste, other fuels, and industrial furnace feed stocks, and feed rates of ash, metals, and total chloride and chlorine as necessary to ensure conformance with the certification of precompliance or certification of compliance;

(ii) Carbon monoxide (CO), oxygen, and if applicable, hydrocarbons (HC), on a continuous basis at a common point in the boiler or industrial furnace downstream of the combustion zone and prior to release of stack gases to the atmosphere in accordance with the operating limits specified in the certification of compliance. CO, HC, and oxygen monitors shall be installed, operated, and maintained in accordance with methods specified in appendix IX of Rule R315-266.

(iii) Upon the request of the Director, sampling and analysis of the hazardous waste, and other fuels and industrial furnace feed stocks as appropriate, and the stack gas emissions shall be conducted to verify that the operating conditions established in the certification of precompliance or certification of compliance achieve the applicable standards of Sections R315-266-104 through 107.

(2) The boiler or industrial furnace and associated equipment, pumps, valves, pipes, fuel storage tanks, etc., shall be subjected to thorough visual inspection when they contain hazardous waste, at least daily for leaks, spills, fugitive emissions, and signs of tampering.

(3) The automatic hazardous waste feed cutoff system and associated alarms shall be tested at least once every 7 days when hazardous waste is burned to verify operability, unless the owner or operator can demonstrate that weekly inspections will unduly restrict or upset operations and that less frequent inspections will be adequate. Support for such demonstration shall be included in the operating record. At a minimum, operational testing shall be conducted at least once every 30 days.

(4) These monitoring and inspection data shall be recorded and the records shall be placed in the operating log.

(k) Recordkeeping. The owner or operator shall keep in the operating record of the facility all information and data required by Section R315-266-103 for five years.

(l) Closure. At closure, the owner or operator shall remove all hazardous waste and hazardous waste residues, including, but not limited to, ash, scrubber waters, and scrubber sludges, from the boiler or industrial furnace and shall comply with 40 CFR 265.111 through 115, which are adopted by reference.

R315-266-104. Hazardous Waste Burned in Boilers and Industrial Furnaces -- Standards to Control Organic Emissions.

(a) DRE standard

(1) General. Except as provided in Subsection R315-266-104(a)(3), a boiler or industrial furnace burning hazardous waste shall achieve a destruction and removal efficiency (DRE) of 99.99% for all organic hazardous constituents in the waste feed. To demonstrate conformance with this requirement, 99.99% DRE shall be demonstrated during a trial burn for each principal organic hazardous constituent (POHC) designated, under Subsection R315-266-104(a)(2), in its permit for each waste feed. DRE is determined for each POHC from the following equation:

$DRE = (1-W_{out}/W_{in})X100$

where:

W_{in} = Mass feed rate of one principal organic hazardous constituent (POHC) in the hazardous waste fired to the boiler or industrial furnace; and

W_{out} = Mass emission rate of the same POHC present in stack gas prior to release to the atmosphere.

(2) Designation of POHCs. Principal organic hazardous constituents (POHCs) are those compounds for which compliance with the DRE requirements of Section R315-266-104 shall be demonstrated in a trial burn in conformance with procedures prescribed in Section R315-270-66. One or more POHCs shall be designated by the Director for each waste feed to be burned. POHCs shall be designated based on the degree of difficulty of destruction of the organic constituents in the waste and on their concentrations or mass in the waste feed considering the results of waste analyses submitted with part B of the permit application. POHCs are most likely to be selected from among those compounds listed in Rule R315-261, appendix VIII that are also present in the normal waste feed. However, if the applicant demonstrates to the Director's satisfaction that a compound not listed in Rule R315-261, appendix VIII or not present in the normal waste feed is a suitable indicator of compliance with the DRE requirements of Section R315-266-104, that compound may be designated as a POHC. Such POHCs need not be toxic or organic compounds.

(3) Dioxin-listed waste. A boiler or industrial furnace burning hazardous waste containing, or derived from, EPA Hazardous Wastes Nos. F020, F021, F022, F023, F026, or F027

shall achieve a destruction and removal efficiency (DRE) of 99.9999% for each POHC designated, under Subsection R315-266-104(a)(2), in its permit. This performance shall be demonstrated on POHCs that are more difficult to burn than tetra-, penta-, and hexachlorodibenzo-p-dioxins and dibenzofurans. DRE is determined for each POHC from the equation in Subsection R315-266-104(a)(1). In addition, the owner or operator of the boiler or industrial furnace shall notify the Director of intent to burn EPA Hazardous Waste Nos. F020, F021, F022, F023, F026, or F027.

(4) Automatic waiver of DRE trial burn. Owners and operators of boilers operated under the special operating requirements provided by Section R315-266-110 are considered to be in compliance with the DRE standard of Subsection R315-266-104(a)(1) and are exempt from the DRE trial burn.

(5) Low risk waste. Owners and operators of boilers or industrial furnaces that burn hazardous waste in compliance with the requirements of Subsection R315-266-109(a) are considered to be in compliance with the DRE standard of Subsection R315-266-104(a)(1) and are exempt from the DRE trial burn.

(b) Carbon monoxide standard.

(1) Except as provided in Subsection R315-266-104(c), the stack gas concentration of carbon monoxide (CO) from a boiler or industrial furnace burning hazardous waste cannot exceed 100 ppmv on an hourly rolling average basis, i.e., over any 60 minute period, continuously corrected to 7 percent oxygen, dry gas basis.

(2) CO and oxygen shall be continuously monitored in conformance with "Performance Specifications for Continuous Emission Monitoring of Carbon Monoxide and Oxygen for Incinerators, Boilers, and Industrial Furnaces Burning Hazardous Waste" in appendix IX of Rule R315-266.

(3) Compliance with the 100 ppmv CO limit shall be demonstrated during the trial burn, for new facilities or an interim status facility applying for a permit, or the compliance test, for interim status facilities. To demonstrate compliance, the highest hourly rolling average CO level during any valid run of the trial burn or compliance test shall not exceed 100 ppmv.

(c) Alternative carbon monoxide standard.

(1) The stack gas concentration of carbon monoxide (CO) from a boiler or industrial furnace burning hazardous waste may exceed the 100 ppmv limit provided that stack gas concentrations of hydrocarbons (HC) do not exceed 20 ppmv, except as provided by Subsection R315-266-104(f) for certain industrial furnaces.

(2) HC limits shall be established under Section R315-266-104 on an hourly rolling average basis, i.e., over any 60 minute period, reported as propane, and continuously corrected to 7 percent oxygen, dry gas basis.

(3) HC shall be continuously monitored in conformance with "Performance Specifications for Continuous Emission Monitoring of Hydrocarbons for Incinerators, Boilers, and Industrial Furnaces Burning Hazardous Waste" in appendix IX of Rule R315-266. CO and oxygen shall be continuously monitored in conformance with Subsection R315-266-104(b)(2).

(4) The alternative CO standard is established based on CO data during the trial burn, for a new facility, and the compliance test, for an interim status facility. The alternative CO standard is the average over all valid runs of the highest hourly average CO level for each run. The CO limit is implemented on an hourly rolling average basis, and continuously corrected to 7 percent oxygen, dry gas basis.

(d) Special requirements for furnaces. Owners and operators of industrial furnaces, e.g., kilns or cupolas, that feed hazardous waste for a purpose other than solely as an ingredient, see Section R315-266-103(a)(5)(ii), at any location other than the end where products are normally discharged and where fuels are normally fired shall comply with the hydrocarbon limits provided by Subsections R315-266-104(c) or (f) irrespective of whether stack gas CO concentrations meet the 100 ppmv limit of Subsection R315-266-104(b).

(e) Controls for dioxins and furans. Owners and operators of boilers and industrial furnaces that are equipped with a dry particulate matter control device that operates within the temperature range of 450-750 °F, and industrial furnaces operating under an alternative hydrocarbon limit established under Subsection R315-266-104(f) shall conduct a site-specific risk assessment as follows to demonstrate that emissions of chlorinated dibenzo-p-dioxins and dibenzofurans do not result in an increased lifetime cancer risk to the hypothetical maximum exposed individual (MEI) exceeding 1 in 100,000:

(1) During the trial burn, for new facilities or an interim status facility applying for a permit, or compliance test, for interim status facilities, determine emission rates of the tetra-octa congeners of chlorinated dibenzo-p-dioxins and dibenzofurans (CDDs/CDFs) using Method 0023A, Sampling Method for Polychlorinated Dibenzo-p-Dioxins and Polychlorinated Dibenzofurans Emissions from Stationary Sources, EPA Publication SW-846, as incorporated by reference in Section R315-260-11.

(2) Estimate the 2,3,7,8-TCDD toxicity equivalence of the tetra-octa CDDs/CDFs congeners using "Procedures for Estimating the Toxicity Equivalence of Chlorinated Dibenzo-p-Dioxin and Dibenzofuran Congeners" in appendix IX of Rule R315-266. Multiply the emission rates of CDD/CDF congeners with a toxicity equivalence greater than zero, see the procedure, by the calculated toxicity equivalence factor to estimate the equivalent emission rate of 2,3,7,8-TCDD;

(3) Conduct dispersion modeling using methods recommended in appendix W of 40 CFR 51 ("Guideline on Air Quality Models (Revised)" (1986) and its supplements), the "Hazardous Waste Combustion Air Quality Screening Procedure", provided in appendix IX of Rule R315-266, or in Screening Procedures for Estimating the Air Quality Impact of Stationary Sources, Revised, incorporated by reference in R315-260-11, to predict the maximum annual average off-site ground level concentration of 2,3,7,8-TCDD equivalents determined under Subsection R315-266-104(e)(2). The maximum annual average concentration shall be used when a person resides on-site; and

(4) The ratio of the predicted maximum annual average ground level concentration of 2,3,7,8-TCDD equivalents to the risk-specific dose for 2,3,7,8-TCDD provided in appendix V of Rule R315-266, 2.2×10^{-7}, shall not exceed 1.0.

(f) Monitoring CO and HC in the by-pass duct of a cement kiln. Cement kilns may comply with the carbon monoxide and hydrocarbon limits provided by Subsections R315-266-104(b), (c), and (d) by monitoring in the by-pass duct provided that:

(1) Hazardous waste is fired only into the kiln and not at any location downstream from the kiln exit relative to the direction of gas flow; and

(2) The by-pass duct diverts a minimum of 10% of kiln off-gas into the duct.

(g) Use of emissions test data to demonstrate compliance and establish operating limits. Compliance with the requirements of Section R315-266-104 shall be demonstrated simultaneously by emissions testing or during separate runs under identical operating conditions. Further, data to demonstrate compliance with the CO and HC limits of Section R315-266-104 or to establish alternative CO or HC limits under Section R315-266-104 shall be obtained during the time that DRE testing, and where applicable, CDD/CDF testing under Subsection R315-266-104(e) and comprehensive organic emissions testing under Subsection R315-266-104(f) is conducted.

(h) Enforcement. For the purposes of permit enforcement,

compliance with the operating requirements specified in the permit, under Section R315-266-102, shall be regarded as compliance with Section R315-266-104. However, evidence that compliance with those permit conditions is insufficient to ensure compliance with the requirements of Section R315-266-104 may be "information" justifying modification or revocation and re-issuance of a permit under Section R315-270-41.

R315-266-105. Hazardous Waste Burned in Boilers and Industrial Furnaces -- Standards to Control Particulate Matter.

(a) A boiler or industrial furnace burning hazardous waste may not emit particulate matter in excess of 180 milligrams per dry standard cubic meter, 0.08 grains per dry standard cubic foot, after correction to a stack gas concentration of 7% oxygen, using procedures prescribed in 40 CFR part 60, appendix A, methods 1 through 5, and appendix IX of Rule R315-266.

(b) An owner or operator meeting the requirements of Subsection Rule R315-266-109(b) for the low risk waste exemption is exempt from the particulate matter standard.

(c) Oxygen correction.

(1) Measured pollutant levels shall be corrected for the amount of oxygen in the stack gas according to the formula:

$P_c = P_m x 14/(E-Y)$

Where:

P_c is the corrected concentration of the pollutant in the stack gas, P_m is the measured concentration of the pollutant in the stack gas, E is the oxygen concentration on a dry basis in the combustion air fed to the device, and Y is the measured oxygen concentration on a dry basis in the stack.

(2) For devices that feed normal combustion air, E will equal 21 percent. For devices that feed oxygen-enriched air for combustion, that is, air with an oxygen concentration exceeding 21 percent, the value of E will be the concentration of oxygen in the enriched air.

(3) Compliance with all emission standards provided by Sections R315-266-100 through 112 shall be based on correcting to 7 percent oxygen using this procedure.

(d) For the purposes of permit enforcement, compliance with the operating requirements specified in the permit, under Section R315-266-102, shall be regarded as compliance with Section R315-266-105. However, evidence that compliance with those permit conditions is insufficient to ensure compliance with the requirements of Section R315-266-105 may be "information" justifying modification or revocation and re-issuance of a permit under Section R315-270-41.

R315-266-106. Hazardous Waste Burned in Boilers and Industrial Furnaces -- Standards to Control Metals Emissions.

(a) General. The owner or operator shall comply with the metals standards provided by Subsections R315-266-106(b), (c), (d), (e), or (f) for each metal listed in Subsection R315-266-106(b) that is present in the hazardous waste at detectable levels by using appropriate analytical procedures.

(b) Tier I feed rate screening limits. Feed rate screening limits for metals are specified in appendix I of Rule R315-266 as a function of terrain-adjusted effective stack height and terrain and land use in the vicinity of the facility. Criteria for facilities that are not eligible to comply with the screening limits are provided in Subsection R315-266-106(b)(7).

(1) Noncarcinogenic metals. The feed rates of antimony, barium, lead, mercury, thallium, and silver in all feed streams, including hazardous waste, fuels, and industrial furnace feed stocks shall not exceed the screening limits specified in appendix I of Rule R315-266.

(i) The feed rate screening limits for antimony, barium, mercury, thallium, and silver are based on either:

(A) An hourly rolling average as defined in Subsection R315-266-102(e)(6)(i)(B); or

(B) An instantaneous limit not to be exceeded at any time.

(ii) The feed rate screening limit for lead is based on one of the following:

(A) An hourly rolling average as defined in Subsection R315-266-102(e)(6)(i)(B);

(B) An averaging period of 2 to 24 hours as defined in Subsection R315-266-102(e)(6)(ii) with an instantaneous feed rate limit not to exceed 10 times the feed rate that would be allowed on an hourly rolling average basis; or

(C) An instantaneous limit not to be exceeded at any time.

(2) Carcinogenic metals.

(i) The feed rates of arsenic, cadmium, beryllium, and chromium in all feed streams, including hazardous waste, fuels, and industrial furnace feed stocks shall not exceed values derived from the screening limits specified in appendix I of Rule R315-266. The feed rate of each of these metals is limited to a level such that the sum of the ratios of the actual feed rate to the feed rate screening limit specified in appendix I shall not exceed 1.0, as provided by the following equation:

The summation of $AFR_{(i)}/FRSL_{(i)}$ for i = 1 to n is less than or equal to 1.0

where:

n = number of carcinogenic metals

AFR = actual feed rate to the device for metal "i"

FRSL = feed rate screening limit provided by appendix I of Rule R315-266 for metal "i".

(ii) The feed rate screening limits for the carcinogenic metals are based on either:

(A) An hourly rolling average; or

(B) An averaging period of 2 to 24 hours as defined in Subsection R315-266-102(e)(6)(ii) with an instantaneous feed rate limit not to exceed 10 times the feed rate that would be allowed on an hourly rolling average basis.

(3) TESH.

(i) The terrain-adjusted effective stack height is determined according to the following equation:

TESH = Ha+H1 – Tr

where:

Ha = Actual physical stack height

H1 = Plume rise as determined from appendix VI of Rule R315-266 as a function of stack flow rate and stack gas exhaust temperature.

Tr = Terrain rise within five kilometers of the stack.

(ii) The stack height (Ha) may not exceed good engineering practice as specified in 40 CFR 51.100(ii).

(iii) If the TESH for a particular facility is not listed in the table in the appendices, the nearest lower TESH listed in the table shall be used. If the TESH is four meters or less, a value of four meters shall be used.

(4) Terrain type. The screening limits are a function of whether the facility is located in noncomplex or complex terrain. A device located where any part of the surrounding terrain within 5 kilometers of the stack equals or exceeds the elevation of the physical stack height (Ha) is considered to be in complex terrain and the screening limits for complex terrain apply. Terrain measurements are to be made from U.S. Geological Survey 7.5-minute topographic maps of the area surrounding the facility.

(5) Land use. The screening limits are a function of whether the facility is located in an area where the land use is urban or rural. To determine whether land use in the vicinity of the facility is urban or rural, procedures provided in appendices IX or X of Rule R315-266 shall be used.

(6) Multiple stacks. Owners and operators of facilities with more than one on-site stack from a boiler, industrial furnace, incinerator, or other thermal treatment unit subject to controls of metals emissions under a RCRA operating permit or interim status controls shall comply with the screening limits for

all such units assuming all hazardous waste is fed into the device with the worst-case stack based on dispersion characteristics. The worst-case stack is determined from the following equation as applied to each stack:

K = HVT

Where:

K = a parameter accounting for relative influence of stack height and plume rise;

H = physical stack height (meters);

V = stack gas flow rate (m3/second); and

T = exhaust temperature (deg. K).

The stack with the lowest value of K is the worst-case stack.

(7) Criteria for facilities not eligible for screening limits. If any criteria below are met, the Tier I and Tier II screening limits do not apply. Owners and operators of such facilities shall comply with either the Tier III standards provided by Subsection R315-266-106(d) or with the adjusted Tier I feed rate screening limits provided by Subsection R315-266-106(e).

(i) The device is located in a narrow valley less than one kilometer wide;

(ii) The device has a stack taller than 20 meters and is located such that the terrain rises to the physical height within one kilometer of the facility;

(iii) The device has a stack taller than 20 meters and is located within five kilometers of a shoreline of a large body of water such as an ocean or large lake;

(iv) The physical stack height of any stack is less than 2.5 times the height of any building within five building heights or five projected building widths of the stack and the distance from the stack to the closest boundary is within five building heights or five projected building widths of the associated building; or

(v) The Director determines that standards based on site-specific dispersion modeling are required.

(8) Implementation. The feed rate of metals in each feedstream shall be monitored to ensure that the feed rate screening limits are not exceeded.

(c) Tier II emission rate screening limits. Emission rate screening limits are specified in appendix I as a function of terrain-adjusted effective stack height and terrain and land use in the vicinity of the facility. Criteria for facilities that are not eligible to comply with the screening limits are provided in Subsection R315-266-106(b)(7).

(1) Noncarcinogenic metals. The emission rates of antimony, barium, lead, mercury, thallium, and silver shall not exceed the screening limits specified in appendix I of Rule R315-266.

(2) Carcinogenic metals. The emission rates of arsenic, cadmium, beryllium, and chromium shall not exceed values derived from the screening limits specified in appendix I of Rule R315-266. The emission rate of each of these metals is limited to a level such that the sum of the ratios of the actual emission rate to the emission rate screening limit specified in appendix I shall not exceed 1.0, as provided by the following equation:

The summation of $AER_{(i)}/ERSL_{(i)}$ for i = 1 to n is less than or equal to 1.0

where:

n = number of carcinogenic metals

AER = actual emission rate for metal "i"

ERSL = emission rate screening limit provided by appendix I of Rule R315-266 for metal "i".

(3) Implementation. The emission rate limits shall be implemented by limiting feed rates of the individual metals to levels during the trial burn, for new facilities or an interim status facility applying for a permit, or the compliance test, for interim status facilities. The feed rate averaging periods are the same as provided by Subsections R315-266-106(b)(1)(i) and (ii) and (b)(2)(ii). The feed rate of metals in each feedstream shall be monitored to ensure that the feed rate limits for the feedstreams specified under Sections R315-266-102 or 103 are not exceeded.

(4) Definitions and limitations. The definitions and limitations provided by Subsection R315-266-106(b) for the following terms also apply to the Tier II emission rate screening limits provided by Subsection R315-266-106(c): terrain-adjusted effective stack height, good engineering practice stack height, terrain type, land use, and criteria for facilities not eligible to use the screening limits.

(5) Multiple stacks.

(i) Owners and operators of facilities with more than one onsite stack from a boiler, industrial furnace, incinerator, or other thermal treatment unit subject to controls on metals emissions under a RCRA operating permit or interim status controls shall comply with the emissions screening limits for any such stacks assuming all hazardous waste is fed into the device with the worst-case stack based on dispersion characteristics.

(ii) The worst-case stack is determined by procedures provided in Subsection R315-266-106(b)(6).

(iii) For each metal, the total emissions of the metal from those stacks shall not exceed the screening limit for the worst-case stack.

(d) Tier III and Adjusted Tier I site-specific risk assessment. The requirements of Subsection R315-266-106(d) apply to facilities complying with either the Tier III or Adjusted Tier I controls, except where specified otherwise.

(1) General. Conformance with the Tier III metals controls shall be demonstrated by emissions testing to determine the emission rate for each metal. In addition, conformance with either the Tier III or Adjusted Tier I metals controls shall be demonstrated by air dispersion modeling to predict the maximum annual average off-site ground level concentration for each metal, and a demonstration that acceptable ambient levels are not exceeded.

(2) Acceptable ambient levels. Appendices IV and V of Rule R315-266 list the acceptable ambient levels for purposes of Rule R315-266. Reference air concentrations (RACs) are listed for the noncarcinogenic metals and 10^{-5} risk-specific doses (RSDs) are listed for the carcinogenic metals. The RSD for a metal is the acceptable ambient level for that metal provided that only one of the four carcinogenic metals is emitted. If more than one carcinogenic metal is emitted, the acceptable ambient level for the carcinogenic metals is a fraction of the RSD as described in Subsection R315-266-106(d)(3).

(3) Carcinogenic metals. For the carcinogenic metals, arsenic, cadmium, beryllium, and chromium, the sum of the ratios of the predicted maximum annual average off-site ground level concentrations, except that on-site concentrations shall be considered if a person resides on site, to the risk-specific dose (RSD) for all carcinogenic metals emitted shall not exceed 1.0 as determined by the following equation:

The summation of Predicted Ambient $Concentration_{(i)}$/Risk-Specific $Dose_{(i)}$ for i = 1 to n is less than or equal to 1.0

where: n = number of carcinogenic metals

(4) Noncarcinogenic metals. For the noncarcinogenic metals, the predicted maximum annual average off-site ground level concentration for each metal shall not exceed the reference air concentration (RAC).

(5) Multiple stacks. Owners and operators of facilities with more than one on-site stack from a boiler, industrial furnace, incinerator, or other thermal treatment unit subject to controls on metals emissions under a RCRA operating permit or interim status controls shall conduct emissions testing, except that facilities complying with Adjusted Tier I controls need not conduct emissions testing, and dispersion modeling to demonstrate that the aggregate emissions from all such on-site stacks do not result in an exceedance of the acceptable ambient

levels.

(6) Implementation. Under Tier III, the metals controls shall be implemented by limiting feed rates of the individual metals to levels during the trial burn, for new facilities or an interim status facility applying for a permit, or the compliance test, for interim status facilities. The feed rate averaging periods are the same as provided by Subsections R315-266-106(b)(1)(i) and (ii) and (b)(2)(ii). The feed rate of metals in each feedstream shall be monitored to ensure that the feed rate limits for the feedstreams specified under Sections R315-266-102 or 103 are not exceeded.

(e) Adjusted Tier I feed rate screening limits. The owner or operator may adjust the feed rate screening limits provided by appendix I of Rule R315-266 to account for site-specific dispersion modeling. Under this approach, the adjusted feed rate screening limit for a metal is determined by back-calculating from the acceptable ambient level provided by appendices IV and V of Rule R315-266 using dispersion modeling to determine the maximum allowable emission rate. This emission rate becomes the adjusted Tier I feed rate screening limit. The feed rate screening limits for carcinogenic metals are implemented as prescribed in Subsection R315-266-106(b)(2).

(f) Alternative implementation approaches.

(1) The Director may approve on a case-by-case basis approaches to implement the Tier II or Tier III metals emission limits provided by Subsections R315-266-106(c) or (d) alternative to monitoring the feed rate of metals in each feedstream.

(2) The emission limits provided by Subsection R315-266-106(d) shall be determined as follows:

(i) For each noncarcinogenic metal, by back-calculating from the RAC provided in appendix IV of Rule R315-266 to determine the allowable emission rate for each metal using the dilution factor for the maximum annual average ground level concentration predicted by dispersion modeling in conformance with Subsection R315-266-106(h); and

(ii) For each carcinogenic metal by:

(A) Back-calculating from the RSD provided in appendix V of Rule R315-266 to determine the allowable emission rate for each metal if that metal were the only carcinogenic metal emitted using the dilution factor for the maximum annual average ground level concentration predicted by dispersion modeling in conformance with Subsection R315-266-106(h); and

(B) If more than one carcinogenic metal is emitted, selecting an emission limit for each carcinogenic metal not to exceed the emission rate determined by Subsection R315-266-106(f)(2)(ii)(A) such that the sum for all carcinogenic metals of the ratios of the selected emission limit to the emission rate determined by Subsection R315-266-106(f)(2)(ii)(A) does not exceed 1.0.

(g) Emission testing

(1) General. Emission testing for metals shall be conducted using Method 0060, Determinations of Metals in Stack Emissions, EPA Publication SW-846, as incorporated by reference in Section R315-260-11.

(2) Hexavalent chromium. Emissions of chromium are assumed to be hexavalent chromium unless the owner or operator conducts emissions testing to determine hexavalent chromium emissions using procedures prescribed in Method 0061, Determination of Hexavalent Chromium Emissions from Stationary Sources, EPA Publication SW-846, as incorporated by reference in Section R315-260-11.

(h) Dispersion Modeling. Dispersion modeling required under Section R315-266-106 shall be conducted according to methods recommended in appendix W of 40 CFR 51, "Guideline on Air Quality Models (Revised)" (1986) and its supplements, the "Hazardous Waste Combustion Air Quality Screening Procedure", provided in appendix IX of Rule R315-266, or in Screening Procedures for Estimating the Air Quality Impact of Stationary Sources, Revised, incorporated by reference in Section R315-260-11, to predict the maximum annual average off-site ground level concentration. However, on-site concentrations shall be considered when a person resides on-site.

(i) Enforcement. For the purposes of permit enforcement, compliance with the operating requirements specified in the permit, under Section R315-266-102, shall be regarded as compliance with Section R315-266-106. However, evidence that compliance with those permit conditions is insufficient to ensure compliance with the requirements of Section R315-266-106 may be "information" justifying modification or revocation and re-issuance of a permit under Section R315-270-41.

R315-266-107. Hazardous Waste Burned in Boilers and Industrial Furnaces -- Standards to Control Hydrogen Chloride (HCl) and Chlorine Gas (Cl_2) Emissions.

(a) General. The owner or operator shall comply with the hydrogen chloride (HCl) and chlorine (Cl_2) controls provided by Subsection R315-266-107(b), (c), or (e).

(b) Screening limits

(1) Tier I feed rate screening limits. Feed rate screening limits are specified for total chlorine in appendix II of Rule R315-266 as a function of terrain-adjusted effective stack height and terrain and land use in the vicinity of the facility. The feed rate of total chlorine and chloride, both organic and inorganic, in all feed streams, including hazardous waste, fuels, and industrial furnace feed stocks shall not exceed the levels specified.

(2) Tier II emission rate screening limits. Emission rate screening limits for HCl and Cl_2 are specified in appendix III of Rule R315-266 as a function of terrain-adjusted effective stack height and terrain and land use in the vicinity of the facility. The stack emission rates of HCl and Cl_2 shall not exceed the levels specified.

(3) Definitions and limitations. The definitions and limitations provided by Subsection R315-266-106(b) for the following terms also apply to the screening limits provided by Subsection R315-266-107(b): terrain-adjusted effective stack height, good engineering practice stack height, terrain type, land use, and criteria for facilities not eligible to use the screening limits.

(4) Multiple stacks. Owners and operators of facilities with more than one on-site stack from a boiler, industrial furnace, incinerator, or other thermal treatment unit subject to controls on HCl or Cl_2 emissions under a RCRA operating permit or interim status controls shall comply with the Tier I and Tier II screening limits for those stacks assuming all hazardous waste is fed into the device with the worst-case stack based on dispersion characteristics.

(i) The worst-case stack is determined by procedures provided in Subsection R315-266-106(b)(6).

(ii) Under Tier I, the total feed rate of chlorine and chloride to all subject devices shall not exceed the screening limit for the worst-case stack.

(iii) Under Tier II, the total emissions of HCl and Cl_2 from all subject stacks shall not exceed the screening limit for the worst-case stack.

(c) Tier III site-specific risk assessments

(1) General. Conformance with the Tier III controls shall be demonstrated by emissions testing to determine the emission rate for HCl and Cl_2, air dispersion modeling to predict the maximum annual average off-site ground level concentration for each compound, and a demonstration that acceptable ambient levels are not exceeded.

(2) Acceptable ambient levels. Appendix IV of Rule R315-266 lists the reference air concentrations (RACs) for HCl,

7 micrograms per cubic meter, and Cl_2, 0.4 micrograms per cubic meter.

(3) Multiple stacks. Owners and operators of facilities with more than one on-site stack from a boiler, industrial furnace, incinerator, or other thermal treatment unit subject to controls on HCl or Cl_2 emissions under a RCRA operating permit or interim status controls shall conduct emissions testing and dispersion modeling to demonstrate that the aggregate emissions from all such on-site stacks do not result in an exceedance of the acceptable ambient levels for HCl and Cl_2.

(d) Averaging periods. The HCl and Cl_2 controls are implemented by limiting the feed rate of total chlorine and chloride in all feedstreams, including hazardous waste, fuels, and industrial furnace feed stocks. Under Tier I, the feed rate of total chloride and chlorine is limited to the Tier I Screening Limits. Under Tier II and Tier III, the feed rate of total chloride and chlorine is limited to the feed rates during the trial burn, for new facilities or an interim status facility applying for a permit, or the compliance test, for interim status facilities). The feed rate limits are based on either:

(1) An hourly rolling average as defined in Section R315-266-102(e)(6); or

(2) An instantaneous basis not to be exceeded at any time.

(e) Adjusted Tier I feed rate screening limits. The owner or operator may adjust the feed rate screening limit provided by appendix II of Rule R315-266 to account for site-specific dispersion modeling. Under this approach, the adjusted feed rate screening limit is determined by back-calculating from the acceptable ambient level for Cl_2 provided by appendix IV of Rule R315-266 using dispersion modeling to determine the maximum allowable emission rate. This emission rate becomes the adjusted Tier I feed rate screening limit.

(f) Emissions testing. Emissions testing for HCl and Cl_2 shall be conducted using the procedures described in Methods 0050 or 0051, EPA Publication SW-846, as incorporated by reference in Section R315-260-11.

(g) Dispersion modeling. Dispersion modeling shall be conducted according to the provisions of Subsection R315-266-106(h).

(h) Enforcement. For the purposes of permit enforcement, compliance with the operating requirements specified in the permit, under Section R315-266-102, shall be regarded as compliance with Section R315-266-107. However, evidence that compliance with those permit conditions is insufficient to ensure compliance with the requirements of Section R315-266-107 may be "information" justifying modification or revocation and re-issuance of a permit under Section R315-270-41.

R315-266-108. Hazardous Waste Burned in Boilers and Industrial Furnaces -- Small Quantity On-Site Burner Exemption.

(a) Exempt quantities. Owners and operators of facilities that burn hazardous waste in an on-site boiler or industrial furnace are exempt from the requirements of Sections R315-266-100 through 112 provided that:

(1) The quantity of hazardous waste burned in a device for a calendar month does not exceed the limits provided in the following table based on the terrain-adjusted effective stack height as defined in Subsection R315-266-106(b)(3):

Table
Exempt Quantities for Small Quantity Burner Exemption

Terrain-adjusted effective (meters)	Allowable hazardous waste stack height of device burning rate(gallons/month)
0 to 3.9	0
4.0 to 5.9	13
6.0 to 7.9	18
8.0 to 9.9	27
10.0 to 11.9	40
12.0 to 13.9	48
14.0 to 15.9	59
16.0 to 17.9	69
18.0 to 19.9	76
20.0 to 21.9	84
22.0 to 23.9	93
24.0 to 25.9	100
26.0 to 27.9	110
28.0 to 29.9	130
30.0 to 34.9	140
35.0 to 39.9	170
40.0 to 44.9	210
45.0 to 49.9	260
50.0 to 54.9	330
55.0 to 59.9	400
60.0 to 64.9	490
65.0 to 69.9	610
70.0 to 74.9	680
75.0 to 79.9	760
80.0 to 84.9	850
85.0 to 89.9	960
90.0 to 94.9	1,100
95.0 to 99.9	1,200
100.0 to 104.9	1,300
105.0 to 109.9	1,500
110.0 to 114.9	1,700
115.0 or greater	1,900

(2) The maximum hazardous waste firing rate does not exceed at any time 1 percent of the total fuel requirements for the device, hazardous waste plus other fuel, on a total heat input or mass input basis, whichever results in the lower mass feed rate of hazardous waste.

(3) The hazardous waste has a minimum heating value of 5,000 Btu/lb, as generated; and

(4) The hazardous waste fuel does not contain, and is not derived from, EPA Hazardous Waste Nos. F020, F021, F022, F023, F026, or F027.

(b) Mixing with nonhazardous fuels. If hazardous waste fuel is mixed with a nonhazardous fuel, the quantity of hazardous waste before such mixing is used to comply with Subsection R315-266-108(a).

(c) Multiple stacks. If an owner or operator burns hazardous waste in more than one on-site boiler or industrial furnace exempt under Section R315-266-108, the quantity limits provided by Subsection R315-266-108(a)(1) are implemented according to the following equation:

The summation of Actual Quantity $Burned_{(i)}$/Allowable quantity $Burned_{(i)}$ for i = 1 to n is less than or equal to 1.0

where:

n means the number of stacks;

Actual Quantity Burned means the waste quantity burned per month in device "i";

Allowable Quantity Burned means the maximum allowable exempt quantity for stack "i" from the table in Subsection R315-266-108(a)(1).

Hazardous wastes that are subject to the special requirements for small quantity generators under Section R315-261-5 may be burned in an off-site device under the exemption provided by Section R315-266-108, but shall be included in the quantity determination for the exemption.

(d) Notification requirements. The owner or operator of facilities qualifying for the small quantity burner exemption under Section R315-266-108 shall provide a one-time signed, written notice to the Director indicating the following:

(1) The combustion unit is operating as a small quantity burner of hazardous waste;

(2) The owner and operator are in compliance with the requirements of Section R315-266-108; and

(3) The maximum quantity of hazardous waste that the facility may burn per month as provided by Subsection R315-266-108(a)(1).

(e) Recordkeeping requirements. The owner or operator shall maintain at the facility for at least three years sufficient records documenting compliance with the hazardous waste quantity, firing rate, and heating value limits of Section R315-

266-108. At a minimum, these records shall indicate the quantity of hazardous waste and other fuel burned in each unit per calendar month, and the heating value of the hazardous waste.

R315-266-109. Hazardous Waste Burned in Boilers and Industrial Furnaces -- Low Risk Waste Exemption.

(a) Waiver of DRE standard. The DRE standard of Subsection R315-266-104(a) does not apply if the boiler or industrial furnace is operated in conformance with Subsection R315-266-109(a)(1) and the owner or operator demonstrates by procedures prescribed in Subsection R315-266-109(a)(2) that the burning will not result in unacceptable adverse health effects.

(1) The device shall be operated as follows:

(i) A minimum of 50 percent of fuel fired to the device shall be fossil fuel, fuels derived from fossil fuel, tall oil, or, if approved by the Director on a case-by-case basis, other nonhazardous fuel with combustion characteristics comparable to fossil fuel. Such fuels are termed "primary fuel" for purposes of Section R315-266-109. Tall oil is a fuel derived from vegetable and rosin fatty acids. The 50 percent primary fuel firing rate shall be determined on a total heat or mass input basis, whichever results in the greater mass feed rate of primary fuel fired;

(ii) Primary fuels and hazardous waste fuels shall have a minimum as-fired heating value of 8,000 Btu/lb;

(iii) The hazardous waste is fired directly into the primary fuel flame zone of the combustion chamber; and

(iv) The device operates in conformance with the carbon monoxide controls provided by Subsection R315-266-104(b)(1). Devices subject to the exemption provided by Section R315-266-109 are not eligible for the alternative carbon monoxide controls provided by Subsection R315-266-104(c).

(2) Procedures to demonstrate that the hazardous waste burning will not pose unacceptable adverse public health effects are as follows:

(i) Identify and quantify those nonmetal compounds listed in appendix VIII, Rule R315-261 that could reasonably be expected to be present in the hazardous waste. The constituents excluded from analysis shall be identified and the basis for their exclusion explained;

(ii) Calculate reasonable, worst case emission rates for each constituent identified in Subsection R315-266-109(a)(2)(i) by assuming the device achieves 99.9 percent destruction and removal efficiency. That is, assume that 0.1 percent of the mass weight of each constituent fed to the device is emitted.

(iii) For each constituent identified in Subsection R315-266-109(a)(2)(i), use emissions dispersion modeling to predict the maximum annual average ground level concentration of the constituent.

(A) Dispersion modeling shall be conducted using methods specified in Subsection R315-266-106(h).

(B) Owners and operators of facilities with more than one on-site stack from a boiler or industrial furnace that is exempt under Section R315-266-109 shall conduct dispersion modeling of emissions from all stacks exempt under Section R315-266-109 to predict ambient levels prescribed by Subsection R315-266-109(a).

(iv) Ground level concentrations of constituents predicted under Subsection R315-266-109(a)(2)(iii) shall not exceed the following levels:

(A) For the noncarcinogenic compounds listed in appendix IV of Rule R315-266, the levels established in appendix IV;

(B) For the carcinogenic compounds listed in appendix V of Rule R315-266, the sum for all constituents of the ratios of the actual ground level concentration to the level established in appendix V cannot exceed 1.0; and

(C) For constituents not listed in appendix IV or V, 0.1 micrograms per cubic meter.

(b) Waiver of particulate matter standard. The particulate matter standard of Section R315-266-105 does not apply if:

(1) The DRE standard is waived under Subsection R315-266-109(a); and

(2) The owner or operator complies with the Tier I or adjusted Tier I metals feed rate screening limits provided by Subsections R315-266-106(b) or (e).

R315-266-110. Hazardous Waste Burned in Boilers and Industrial Furnaces -- Waiver of DRE Trial Burn for Boilers.

Boilers that operate under the special requirements of Section R315-266-110, and that do not burn hazardous waste containing, or waste derived from, EPA Hazardous Waste Nos. F020, F021, F022, F023, F026, or F027, are considered to be in conformance with the DRE standard of Subsection R315-266-104(a), and a trial burn to demonstrate DRE is waived. When burning hazardous waste:

(a) A minimum of 50 percent of fuel fired to the device shall be fossil fuel, fuels derived from fossil fuel, tall oil, or, if approved by the Director on a case-by-case basis, other nonhazardous fuel with combustion characteristics comparable to fossil fuel. Such fuels are termed "primary fuel" for purposes of Section R315-266-110. Tall oil is a fuel derived from vegetable and rosin fatty acids. The 50 percent primary fuel firing rate shall be determined on a total heat or mass input basis, whichever results in the greater mass feed rate of primary fuel fired;

(b) Boiler load shall not be less than 40 percent. Boiler load is the ratio at any time of the total heat input to the maximum design heat input;

(c) Primary fuels and hazardous waste fuels shall have a minimum as-fired heating value of 8,000 Btu/lb, and each material fired in a burner where hazardous waste is fired shall have a heating value of at least 8,000 Btu/lb, as-fired;

(d) The device shall operate in conformance with the carbon monoxide standard provided by Subsection R315-266-104(b)(1). Boilers subject to the waiver of the DRE trial burn provided by Section R315-266-110 are not eligible for the alternative carbon monoxide standard provided by Subsection R315-266-104(c);

(e) The boiler shall be a watertube type boiler that does not feed fuel using a stoker or stoker type mechanism; and

(f) The hazardous waste shall be fired directly into the primary fuel flame zone of the combustion chamber with an air or steam atomization firing system, mechanical atomization system, or a rotary cup atomization system under the following conditions:

(1) Viscosity. The viscosity of the hazardous waste fuel as-fired shall not exceed 300 SSU;

(2) Particle size. When a high pressure air or steam atomizer, low pressure atomizer, or mechanical atomizer is used, 70% of the hazardous waste fuel shall pass through a 200 mesh, 74 micron, screen, and when a rotary cup atomizer is used, 70% of the hazardous waste shall pass through a 100 mesh, 150 micron, screen;

(3) Mechanical atomization systems. Fuel pressure within a mechanical atomization system and fuel flow rate shall be maintained within the design range taking into account the viscosity and volatility of the fuel;

(4) Rotary cup atomization systems. Fuel flow rate through a rotary cup atomization system shall be maintained within the design range taking into account the viscosity and volatility of the fuel.

R315-266-111. Hazardous Waste Burned in Boilers and Industrial Furnaces -- Standards for Direct Transfer.

(a) Applicability. The regulations in Section R315-266-

111 apply to owners and operators of boilers and industrial furnaces subject to Sections R315-266-102 or 103 if hazardous waste is directly transferred from a transport vehicle to a boiler or industrial furnace without the use of a storage unit.

(b) Definitions.

(1) When used in Section R315-266-111, the following terms have the meanings given below:

Direct transfer equipment means any device, including but not limited to, such devices as piping, fittings, flanges, valves, and pumps, that is used to distribute, meter, or control the flow of hazardous waste between a container, i.e., transport vehicle, and a boiler or industrial furnace.

Container means any portable device in which hazardous waste is transported, stored, treated, or otherwise handled, and includes transport vehicles that are containers themselves, e.g., tank trucks, tanker-trailers, and rail tank cars, and containers placed on or in a transport vehicle.

(2) Section R315-266-111 references several requirements provided in Sections R315-264-170 through 200 and 40 CFR 265.170 through 202, which are adopted by reference. For purposes of Section R315-266-111, the term "tank systems" in those referenced requirements means direct transfer equipment as defined in Subsection R315-266-111(b)(1).

(c) General operating requirements.

(1) No direct transfer of a pumpable hazardous waste shall be conducted from an open-top container to a boiler or industrial furnace.

(2) Direct transfer equipment used for pumpable hazardous waste shall always be closed, except when necessary to add or remove the waste, and shall not be opened, handled, or stored in a manner that may cause any rupture or leak.

(3) The direct transfer of hazardous waste to a boiler or industrial furnace shall be conducted so that it does not:

(i) Generate extreme heat or pressure, fire, explosion, or violent reaction;

(ii) Produce uncontrolled toxic mists, fumes, dusts, or gases in sufficient quantities to threaten human health;

(iii) Produce uncontrolled flammable fumes or gases in sufficient quantities to pose a risk of fire or explosions;

(iv) Damage the structural integrity of the container or direct transfer equipment containing the waste;

(v) Adversely affect the capability of the boiler or industrial furnace to meet the standards provided by Sections R315-266-104 through 107; or

(vi) Threaten human health or the environment.

(4) Hazardous waste shall not be placed in direct transfer equipment, if it could cause the equipment or its secondary containment system to rupture, leak, corrode, or otherwise fail.

(5) The owner or operator of the facility shall use appropriate controls and practices to prevent spills and overflows from the direct transfer equipment or its secondary containment systems. These include at a minimum:

(i) Spill prevention controls, e.g., check valves, dry discount couplings; and

(ii) Automatic waste feed cutoff to use if a leak or spill occurs from the direct transfer equipment.

(d) Areas where direct transfer vehicles, containers, are located. Applying the definition of container under Section R315-266-111, owners and operators shall comply with the following requirements:

(1) The containment requirements of Section R315-264-175;

(2) The use and management requirements of 40 CFR 265.171 through 178, which are adopted by reference, except for 265-174, and except that in lieu of the special requirements of 265-176 for ignitable or reactive waste, the owner or operator may comply with the requirements for the maintenance of protective distances between the waste management area and any public ways, streets, alleys, or an adjacent property line that can be built upon as required in Tables 2-1 through 2-6 of the National Fire Protection Association's (NFPA) "Flammable and Combustible Liquids Code," (1977 or 1981), incorporated by reference, see Section R315-260-11. The owner or operator shall obtain and keep on file at the facility a written certification by the local Fire Marshall that the installation meets the subject NFPA codes; and

(3) The closure requirements of Section R315-264-178.

(e) Direct transfer equipment. Direct transfer equipment shall meet the following requirements:

(1) Secondary containment. Owners and operators shall comply with the secondary containment requirements of 40 CFR 265.193, which are adopted by reference, except for 265-193(a), (d), (e), and (i) as follows:

(i) For all new direct transfer equipment, prior to their being put into service; and

(ii) For existing direct transfer equipment within 2 years after August 21, 1991.

(2) Requirements prior to meeting secondary containment requirements.

(i) For existing direct transfer equipment that does not have secondary containment, the owner or operator shall determine whether the equipment is leaking or is unfit for use. The owner or operator shall obtain and keep on file at the facility a written assessment reviewed and certified by a qualified, registered professional engineer in accordance with Subsection R315-270-11(d) that attests to the equipment's integrity by August 21, 1992.

(ii) This assessment shall determine whether the direct transfer equipment is adequately designed and has sufficient structural strength and compatibility with the waste(s) to be transferred to ensure that it will not collapse, rupture, or fail. At a minimum, this assessment shall consider the following:

(A) Design standard(s), if available, according to which the direct transfer equipment was constructed;

(B) Hazardous characteristics of the waste(s) that have been or will be handled;

(C) Existing corrosion protection measures;

(D) Documented age of the equipment, if available, otherwise, an estimate of the age; and

(E) Results of a leak test or other integrity examination such that the effects of temperature variations, vapor pockets, cracks, leaks, corrosion, and erosion are accounted for.

(iii) If, as a result of the assessment specified above, the direct transfer equipment is found to be leaking or unfit for use, the owner or operator shall comply with the requirements of 40 CFR 265.196(a) and (b), which are adopted by reference.

(3) Inspections and recordkeeping.

(i) The owner or operator shall inspect at least once each operating hour when hazardous waste is being transferred from the transport vehicle, container, to the boiler or industrial furnace:

(A) Overfill/spill control equipment, e.g., waste-feed cutoff systems, bypass systems, and drainage systems, to ensure that it is in good working order;

(B) The above ground portions of the direct transfer equipment to detect corrosion, erosion, or releases of waste, e.g., wet spots, dead vegetation; and

(C) Data gathered from monitoring equipment and leak-detection equipment, e.g., pressure and temperature gauges, to ensure that the direct transfer equipment is being operated according to its design.

(ii) The owner or operator shall inspect cathodic protection systems, if used, to ensure that they are functioning properly according to the schedule provided by 40 CFR 265.195(b), which is adopted by reference:

(iii) Records of inspections made under Subsection R315-266-11(e)(3) shall be maintained in the operating record at the facility, and available for inspection for at least 3 years from the

date of the inspection.

(4) Design and installation of new ancillary equipment. Owners and operators shall comply with the requirements of 40 CFR 265.192, which is adopted by reference.

(5) Response to leaks or spills. Owners and operators shall comply with the requirements of 40 CFR 265.196, which is adopted by reference.

(6) Closure. Owners and operators shall comply with the requirements of 40 CFR 265.197, which are adopted by reference, except for 265-197(c)(2) through (c)(4).

R315-266-112. Hazardous Waste Burned in Boilers and Industrial Furnaces -- Regulation of Residues.

A residue derived from the burning or processing of hazardous waste in a boiler or industrial furnace is not excluded from the definition of a hazardous waste under Subsections R315-261-4(b)(4), (7), or (8) unless the device and the owner or operator meet the following requirements:

(a) The device meets the following criteria:

(1) Boilers. Boilers shall burn at least 50% coal on a total heat input or mass input basis, whichever results in the greater mass feed rate of coal;

(2) Ore or mineral furnaces. Industrial furnaces subject to Subsection R315-261-4(b)(7) shall process at least 50% by weight normal, nonhazardous raw materials;

(3) Cement kilns. Cement kilns shall process at least 50% by weight normal cement-production raw materials;

(b) The owner or operator demonstrates that the hazardous waste does not significantly affect the residue by demonstrating conformance with either of the following criteria:

(1) Comparison of waste-derived residue with normal residue. The waste-derived residue shall not contain appendix VIII, Rule R315-261 constituents, toxic constituents, that could reasonably be attributable to the hazardous waste at concentrations significantly higher than in residue generated without burning or processing of hazardous waste, using the following procedure. Toxic compounds that could reasonably be attributable to burning or processing the hazardous waste, constituents of concern, include toxic constituents in the hazardous waste, and the organic compounds listed in appendix VIII of Rule R315-266 that may be generated as products of incomplete combustion. For polychlorinated dibenzo-p-dioxins and polychlorinated dibenzo-furans, analyses shall be performed to determine specific congeners and homologues, and the results converted to 2,3,7,8-TCDD equivalent values using the procedure specified in section 4.0 of appendix IX of Rule R315-266.

(i) Normal residue. Concentrations of toxic constituents of concern in normal residue shall be determined based on analyses of a minimum of 10 samples representing a minimum of 10 days of operation. Composite samples may be used to develop a sample for analysis provided that the compositing period does not exceed 24 hours. The upper tolerance limit, at 95% confidence with a 95% proportion of the sample distribution, of the concentration in the normal residue shall be considered the statistically-derived concentration in the normal residue. If changes in raw materials or fuels reduce the statistically-derived concentrations of the toxic constituents of concern in the normal residue, the statistically-derived concentrations shall be revised or statistically-derived concentrations of toxic constituents in normal residue shall be established for a new mode of operation with the new raw material or fuel. To determine the upper tolerance limit in the normal residue, the owner or operator shall use statistical procedures prescribed in "Statistical Methodology for Bevill Residue Determinations" in appendix IX of Rule R315-266.

(ii) Waste-derived residue. Waste-derived residue shall be sampled and analyzed as often as necessary to determine whether the residue generated during each 24-hour period has concentrations of toxic constituents that are higher than the concentrations established for the normal residue under Subsection R315-266-112(b)(1)(i). If so, hazardous waste burning has significantly affected the residue and the residue shall not be excluded from the definition of a hazardous waste. Concentrations of toxic constituents of concern in the waste-derived residue shall be determined based on analysis of one or more samples obtained over a 24-hour period. Multiple samples may be analyzed, and multiple samples may be taken to form a composite sample for analysis provided that the sampling period does not exceed 24 hours. If more than one sample is analyzed to characterize waste-derived residues generated over a 24-hour period, the concentration of each toxic constituent shall be the arithmetic mean of the concentrations in the samples. No results may be disregarded; or

(2) Comparison of waste-derived residue concentrations with health-based limits

(i) Nonmetal constituents: The concentration of each nonmetal toxic constituent of concern, specified in Subsection R315-266-112(b)(1), in the waste-derived residue shall not exceed the health-based level specified in appendix VII of Rule R315-266, or the level of detection, whichever is higher. If a health-based limit for a constituent of concern is not listed in appendix VII of Rule R315-266, then a limit of 0.002 micrograms per kilogram or the level of detection, which shall be determined by using appropriate analytical procedures, whichever is higher, shall be used. The levels specified in appendix VII of Rule R315-266, and the default level of 0.002 micrograms per kilogram or the level of detection for constituents as identified in Note 1 of appendix VII of Rule R315-266, are administratively stayed under the condition, for those constituents specified in Subsection R315-266-112(b)(1), that the owner or operator complies with alternative levels defined as the land disposal restriction limits specified in Section R315-268-43 for F039 nonwastewaters. In complying with those alternative levels, if an owner or operator is unable to detect a constituent despite documenting use of best good-faith efforts as defined by applicable guidance or standards, the owner or operator is deemed to be in compliance for that constituent. Until new guidance or standards are developed, the owner or operator may demonstrate such good-faith efforts by achieving a detection limit for the constituent that does not exceed an order of magnitude above the level provided by Section R315-268-43 for F039 nonwastewaters. In complying with the Section R315-268-43 F039 nonwastewater levels for polychlorinated dibenzo-p-dioxins and polychlorinated dibenzo-furans, analyses shall be performed for total hexachlorodibenzo-p-dioxins, total hexachlorodibenzofurans, total pentachlorodibenzo-p-dioxins, total pentachlorodibenzofurans, total tetrachlorodibenzo-p-dioxins, and total tetrachlorodibenzofurans.

Note to Subsection R315-266-112(b)(2)(i): The administrative stay, under the condition that the owner or operator complies with alternative levels defined as the land disposal restriction limits specified in Section R315-268-43 for F039 nonwastewaters, remains in effect until further administrative action is taken and notice is published.

(ii) Metal constituents. The concentration of metals in an extract obtained using the Toxicity Characteristic Leaching Procedure of Section R315-261-24 shall not exceed the levels specified in appendix VII of Rule R315-266; and

(iii) Sampling and analysis. Waste-derived residue shall be sampled and analyzed as often as necessary to determine whether the residue generated during each 24-hour period has concentrations of toxic constituents that are higher than the health-based levels. Concentrations of toxic constituents of concern in the waste-derived residue shall be determined based on analysis of one or more samples obtained over a 24-hour period. Multiple samples may be analyzed, and multiple

samples may be taken to form a composite sample for analysis provided that the sampling period does not exceed 24 hours. If more than one sample is analyzed to characterize waste-derived residues generated over a 24-hour period, the concentration of each toxic constituent shall be the arithmetic mean of the concentrations in the samples. No results may be disregarded; and

(c) Records sufficient to document compliance with the provisions of Section R315-266-112 shall be retained until closure of the boiler or industrial furnace unit. At a minimum, the following shall be recorded.

(1) Levels of constituents in appendix VIII, Rule R315-261, that are present in waste-derived residues;

(2) If the waste-derived residue is compared with normal residue under Subsection R315-266-112(b)(1):

(i) The levels of constituents in appendix VIII, Rule R315-261, that are present in normal residues; and

(ii) Data and information, including analyses of samples as necessary, obtained to determine if changes in raw materials or fuels would reduce the concentration of toxic constituents of concern in the normal residue.

R315-266-202. Military Munitions -- Definition of Solid Waste.

(a) Reserved.

(b) Reserved.

(c) Reserved.

(d) For purposes of Subsection 19-6-102(19)(a), a used or fired military munition is a solid waste, and, therefore, is potentially subject to RCRA corrective action authorities under sections 3004(u) and (v), and 3008(h), or imminent and substantial endangerment authorities under section 7003, if the munition lands off-range and is not promptly rendered safe and/or retrieved. Any imminent and substantial threats associated with any remaining material shall be addressed. If remedial action is infeasible, the operator of the range shall maintain a record of the event for as long as any threat remains. The record shall include the type of munition and its location, to the extent the location is known.

R315-266-203. Appendix I to Rule R315-266 -- Tier I and Tier II Feed Rate and Emissions Screening Limits for Metals.

Appendix I of 40 CFR 266, 2015 edition, is adopted and incorporated by reference.

R315-266-204. Appendix II to Rule R315-266 -- Tier I Feed Rate Screening Limits for Total Chlorine.

Table

Terrain-adjusted effective stack height (m)	Noncomplex Terrain Urban (g/hr)	Noncomplex Terrain Rural (g/hr)	Complex Terrain (g/hr)
4	8.2E+01	4.2E+01	1.9E+01
6	9.1E+01	4.8E+01	2.8E+01
8	1.0E+02	5.3E+01	4.1E+01
10	1.2E+02	6.2E+01	5.8E+01
12	1.3E+02	7.7E+01	7.2E+01
14	1.5E+02	9.1E+01	9.1E+01
16	1.7E+02	1.2E+02	1.1E+02
18	1.9E+02	1.4E+02	1.2E+02
20	2.1E+02	1.8E+02	1.3E+02
22	2.4E+02	2.3E+02	1.4E+02
24	2.7E+02	2.9E+02	1.6E+02
26	3.1E+02	3.7E+02	1.7E+02
28	3.5E+02	4.7E+02	1.9E+02
30	3.9E+02	5.8E+02	2.1E+02
35	5.3E+02	9.6E+02	2.6E+02
40	6.2E+02	1.4E+03	3.3E+02
45	8.2E+02	2.0E+03	4.0E+02
50	1.1E+03	2.6E+03	4.8E+02
55	1.3E+03	3.5E+03	6.2E+02
60	1.6E+03	4.6E+03	7.7E+02
65	2.0E+03	6.2E+03	9.1E+02
70	2.3E+03	7.2E+03	1.1E+03
75	2.5E+03	8.6E+03	1.2E+03
80	2.9E+03	1.0E+04	1.3E+03
85	3.3E+03	1.2E+04	1.4E+03
90	3.7E+03	1.4E+04	1.6E+03
95	4.2E+03	1.7E+04	1.8E+03
100	4.8E+03	2.1E+04	2.0E+03
105	5.3E+03	2.4E+04	2.3E+03
110	6.2E+03	2.9E+04	2.5E+03
115	7.2E+03	3.5E+04	2.8E+03
120	8.2E+03	4.1E+04	3.2E+03

R315-266-205. Appendix III to Rule R315-266 -- Tier II Emission Rate Screening Limits for Free Chlorine and Hydrogen Chloride.

Appendix III of 40 CFR 266, 2015 edition, is adopted and incorporated by reference.

R315-266-206. Appendix IV to Rule R315-266 -- Reference Air Concentrations*.

Table

Constituent	CAS No.	RAC (ug/m^3)
Acetaldehyde	75-07-0	10
Acetonitrile	75-05-8	10
Acetophenone	98-86-2	100
Acrolein	107-02-8	20
Aldicarb	116-06-3	1
Aluminum Phosphide	20859-73-8	0.3
Allyl Alcohol	107-18-6	5
Antimony	7440-36-0	0.3
Barium	7440-39-3	50
Barium Cyanide	542-62-1	50
Bromomethane	74-83-9	0.8
Calcium Cyanide	592-01-8	30
Carbon Disulfide	75-15-0	200
Chloral	75-87-6	2
Chlorine (free)		0.4
2-Chloro-1,3-butadiene	126-99-8	3
Chromium III	16065-83-1	1000
Copper Cyanide	544-92-3	5
Cresols	1319-77-3	50
Cumene	98-82-8	1
Cyanide (free)	57-12-15	20
Cyanogen	460-19-5	30
Cyanogen Bromide	506-68-3	80
Di-n-butyl Phthalate	84-74-2	100
o-Dichlorobenzene	95-50-1	10
p-Dichlorobenzene	106-46-7	10
Dichlorodifluoromethane	75-71-8	200
2,4-Dichlorophenol	120-83-2	3
Diethyl Phthalate	84-66-2	800
Dimethoate	60-51-5	0.8
2,4-Dinitrophenol	51-28-5	2
Dinoseb	88-85-7	0.9
Diphenylamine	122-39-4	20
Endosulfan	115-29-1	0.05
Endrin	72-20-8	0.3
Fluorine	7782-41-4	50
Formic Acid	64-18-6	2000
Glycidyaldehyde	765-34-4	0.3
Hexachlorocyclopentadiene	77-47-4	5
Hexachlorophene	70-30-4	0.3
Hydrocyanic Acid	74-90-8	20
Hydrogen Chloride	7647-01-1	7
Hydrogen Sulfide	7783-06-4	3
Isobutyl Alcohol	78-83-1	300
Lead	7439-92-1	0.09
Maleic Anhydride	108-31-6	100
Mercury	7439-97-6	0.3
Methacrylonitrile	126-98-7	0.1
Methomyl	16752-77-5	20
Methoxychlor	72-43-5	50
Methyl Chlorocarbonate	79-22-1	1000
Methyl Ethyl Ketone	78-93-3	80
Methyl Parathion	298-00-0	0.3
Nickel Cyanide	557-19-7	20
Nitric Oxide	10102-43-9	100
Nitrobenzene	98-95-3	0.8
Pentachlorobenzene	608-93-5	0.8
Pentachlorophenol	87-86-5	30
Phenol	108-95-2	30
M-Phenylenediamine	108-45-2	5
Phenylmercuric Acetate	62-38-4	0.075
Phosphine	7803-51-2	0.3
Phthalic Anhydride	85-44-9	2000

Potassium Cyanide	151-50-8	50
Potassium Silver Cyanide	506-61-6	200
Pyridine	110-86-1	1
Selenious Acid	7783-60-8	3
Selenourea	630-10-4	5
Silver	7440-22-4	3
Silver Cyanide	506-64-9	100
Sodium Cyanide	143-33-9	30
Strychnine	57-24-9	0.3
1,2,4,5-Tetrachlorobenzene	95-94-3	0.3
2,3,4,6-Tetrachlorophenol	58-90-2	30
Tetraethyl Lead	78-00-2	0.0001
Tetrahydrofuran	109-99-9	10
Thallic Oxide	1314-32-5	0.3
Thallium	7440-28-0	0.5
Thallium (I) Acetate	563-68-8	0.5
Thallium (I) Carbonate	6533-73-9	0.3
Thallium (I) Chloride	7791-12-0	0.3
Thallium (I) Nitrate	10102-45-1	0.5
Thallium Selenite	12039-52-0	0.5
Thallium (I) Sulfate	7446-18-6	0.075
Thiram	137-26-8	5
Toluene	108-88-3	300
1,2,4-Trichlorobenzene	120-82-1	20
Trichloromonofluoromethane	75-69-4	300
2,4,5-Trichlorophenol	95-95-4	100
Vanadium Pentoxide	1314-62-1	20
Warfarin	81-81-2	0.3
Xylenes	1330-20-7	80
Zinc Cyanide	557-21-1	50
Zinc Phosphide	1314-84-7	0.3

*The RAC for other appendix VIII Rule R315-261 constituents not listed herein or in appendix V of Rule R315-266 is 0.1 ug/m^3.

R315-266-207. Appendix V to Rule R315-266 -- Risk Specific Doses.

Table

Constituent	CAS No.	Unit risk (m3/microg)	RsD (microg/m3)
Acrylamide	79-06-1	1.3E-03	7.7E-03
Acrylonitrile	107-13-1	6.8E-05	1.5E-01
Aldrin	309-00-2	4.9E-03	2.0E-03
Aniline	62-53-3	7.4E-06	1.4E+00
Arsenic	7440-38-2	4.3E-03	2.3E-03
Benz(a)anthracene	56-55-3	8.9E-04	1.1E-02
Benzene	71-43-2	8.3E-06	1.2E+00
Benzidine	92-87-5	6.7E-02	1.5E-04
Benzo(a)pyrene	50-32-8	3.3E-03	3.0E-03
Beryllium	7440-41-7	2.4E-03	4.2E-03
Bis(2-chloroethyl) ether	111-44-4	3.3E-04	3.0E-02
Bis(chloromethyl)ether	542-88-1	6.2E-02	1.6E-04
Bis(2-ethylhexyl) -phthalate	117-81-7	2.4E-07	4.2E+01
1,3-Butadiene	106-99-0	2.8E-04	3.6E-02
Cadmium	7440-43-9	1.8E-03	5.6E-03
Carbon Tetrachloride	56-23-5	1.5E-05	6.7E-01
Chlordane	57-74-9	3.7E-04	2.7E-02
Chloroform	67-66-3	2.3E-05	4.3E-01
Chloromethane	74-87-3	3.6E-06	2.8E+00
Chromium VI	7440-47-3	1.2E-02	8.3E-04
DDT	50-29-3	9.7E-05	1.0E-01
Dibenz(a,h)anthracene	53-70-3	1.4E-02	7.1E-04
1,2-Dibromo-3 -chloropropane	96-12-8	6.3E-03	1.6E-03
1,2-Dibromoethane	106-93-4	2.2E-04	4.5E-02
1,1-Dichloroethane	75-34-3	2.6E-05	3.8E-01
1,2-Dichloroethane	107-06-2	2.6E-05	3.8E-01
1,1-Dichloroethylene	75-35-4	5.0E-05	2.0E-01
1,3-Dichloropropene	542-75-6	3.5E-01	2.9E-05
Dieldrin	60-57-1	4.6E-03	2.2E-03
Diethylstilbestrol	56-53-1	1.4E-01	7.1E-05
Dimethylnitrosamine	62-75-9	1.4E-02	7.1E-04
2,4-Dinitrotoluene	121-14-2	8.8E-05	1.1E-01
1,2-Diphenylhydrazine	122-66-7	2.2E-04	4.5E-02
1,4-Dioxane	123-91-1	1.4E-06	7.1E+00
Epichlorohydrin	106-89-8	1.2E-06	8.3E+00
Ethylene Oxide	75-21-8	1.0E-04	1.0E-01
Ethylene Dibromide	106-93-4	2.2E-04	4.5E-02
Formaldehyde	50-00-0	1.3E-05	7.7E-01
Heptachlor	76-44-8	1.3E-03	7.7E-03
Heptachlor Epoxide	1024-57-3	2.6E-03	3.8E-03
Hexachlorobenzene	118-74-1	4.9E-04	2.0E-02
Hexachlorobutadiene	87-68-3	2.0E-05	5.0E-01
Alpha-hexachloro -cyclohexane	319-84-6	1.8E-03	5.6E-03
Beta-hexachloro -cyclohexane	319-85-7	5.3E-04	1.9E-02
Gamma-hexachloro -cyclohexane	58-89-9	3.8E-04	2.6E-02
Hexachlorocyclo -hexane, Technical		5.1E-04	2.0E-02
Hexachlorodibenzo-		1.3E+0	7.7E-06 p-dioxin (1,2 Mixture)
Hexachloroethane	67-72-1	4.0E-06	2.5E+00
Hydrazine	302-01-2	2.9E-03	3.4E-03
Hydrazine Sulfate	302-01-2	2.9E-03	3.4E-03
3-Methylcholanthrene	56-49-5	2.7E-03	3.7E-03
Methyl Hydrazine	60-34-4	3.1E-04	3.2E-02
Methylene Chloride	75-09-2	4.1E-06	2.4E+00
4,4'-Methylene-bis-2 -chloroaniline	101-14-4	4.7E-05	2.1E-01
Nickel	7440-02-0	2.4E-04	4.2E-02
Nickel Refinery Dust	7440-02-0	2.4E-04	4.2E-02
Nickel Subsulfide	12035-72-2	4.8E-04	2.1E-02
2-Nitropropane	79-46-9	2.7E-02	3.7E-04
N-Nitroso-n-butylamine	924-16-3	1.6E-03	6.3E-03
N-Nitroso-n-methylurea	684-93-5	8.6E-02	1.2E-04
N-Nitrosodiethylamine	55-18-5	4.3E-02	2.3E-04
N-Nitrosopyrrolidine	930-55-2	6.1E-04	1.6E-02
Pentachloronitrobenzene	82-68-8	7.3E-05	1.4E-01
PCBs	1336-36-3	1.2E-03	8.3E-03
Pronamide	23950-58-5	4.6E-06	2.2E+00
Reserpine	50-55-5	3.0E-03	3.3E-03
2,3,7,8-Tetrachloro -dibenzo-p-dioxin	1746-01-6	4.5E+01	2.2E-07
1,1,2,2-	79-34-5	5.8E-05	1.7E-01 Tetrachloroethane
Tetrachloroethylene	127-18-4	4.8E-07	2.1E+01
Thiourea	62-56-6	5.5E-04	1.8E-02
1,1,2-Trichloroethane	79-00-5	1.6E-05	6.3E-01
Trichloroethylene	79-01-6	1.3E-06	7.7E+00
2,4,6-Trichlorophenol	88-06-2	5.7E-06	1.8E+00
Toxaphene	8001-35-2	3.2E-04	3.1E-02
Vinyl Chloride	75-01-4	7.1E-06	1.4E+00

R315-266-208. Appendix VI to Rule R315-266 -- Stack Plume Rise.

Appendix VI of 40 CFR 266, 2015 edition, is adopted and incorporated by reference.

R315-266-209. Appendix VII to Rule R315-266 -- Health-Based Limits for Exclusion of Waste-Derived Residues.

Table

Metals -- TCLP Extract Concentration Limits.

Constituent	CAS No.	Concentration limits (mg/L)
Antimony	7440-36-0	1xE+00
Arsenic	7440-38-2	5xE+00
Barium	7440-39-3	1xE+02
Beryllium	7440-41-7	7xE-03
Cadmium	7440-43-9	1xE+00
Chromium	7440-47-3	5xE+00
Lead	7439-92-1	5xE+00
Mercury	7439-97-6	2xE-01
Nickel	7440-02-0	7xE+01
Selenium	7782-49-2	1xE+00
Silver	7440-22-4	5xE+00
Thallium	7440-28-0	7xE+00

Nonmetals -- Residue Concentration Limits

Constituent	CAS No.	Concentration limits for residues (mg/kg)
Acetonitrile	75-05-8	2xE-01
Acetophenone	98-86-2	4xE+00
Acrolein	107-02-8	5xE-01
Acrylamide	79-06-1	2xE-04
Acrylonitrile	107-13-1	7xE-04
Aldrin	309-00-2	2xE-05
Allyl alcohol	107-18-6	2xE-01
Aluminum phosphide	20859-73-8	1xE-02
Aniline	62-53-3	6xE-02
Barium cyanide	542-62-1	1xE+00
Benz(a)anthracene	56-55-3	1xE-04
Benzene	71-43-2	5xE-03

Benzidine	92-87-5	1xE-06
Bis(2-chloroethyl) ether	111-44-4	3xE-04
Bis(chloroethyl) ether	542-88-1	2xE-06
Bis(2-ethylhexyl) phthalate	117-81-7	3xE+01
Bromoform	75-25-2	7xE-01
Calcium cyanide	592-01-8	1xE-06
Carbon disulfide	75-15-0	4xE+00
Carbon tetrachloride	56-23-5	5xE-03
Chlordane	57-74-9	3xE-04
Chlorobenzene	108-90-7	1xE+00
Chloroform	67-66-3	6xE-02
Copper cyanide	544-92-3	2xE-01
Cresols (Cresylic acid)	1319-77-3	2xE+00
Cyanogen	460-19-5	1xE+00
DDT	50-29-3	1xE-03
Dibenz(a, h)-anthracene	53-70-3	7xE-06
1,2-Dibromo-3 -chloropropane	96-12-8	2xE-05
p-Dichlorobenzene	106-46-7	7.5xE-02
Dichlorodifluoromethane	75-71-8	7xE+00
1,1-Dichloroethylene	75-35-4	5xE-03
2,4-Dichlorophenol	120-83-2	1xE-01
1,3-Dichloropropene	542-75-6	1xE-03
Dieldrin	60-57-1	2xE-05
Diethyl phthalate	84-66-2	3xE+01
Diethylstilbesterol	56-53-1	7xE-07
Dimethoate	60-51-5	3xE-02
2,4-Dinitrotoluene	121-14-2	5xE-04
Diphenylamine	122-39-4	9xE-01
1,2-Diphenylhydrazine	122-66-7	5xE-04
Endosulfan	115-29-7	2xE-03
Endrin	72-20-8	2xE-04
Epichlorohydrin	106-89-8	4xE-02
Ethylene dibromide	106-93-4	4xE-07
Ethylene oxide	75-21-8	3xE-04
Fluorine	7782-41-4	4xE+00
Formic acid	64-18-6	7xE+01
Heptachlor	76-44-8	8xE-05
Heptachlor epoxide	1024-57-3	4xE-05
Hexachlorobenzene	118-74-1	2xE-04
Hexachlorobutadiene	87-68-3	5xE-03
Hexachlorocyclopentadiene	77-47-4	2xE-01
Hexachlorodibenzo-p -dioxins	19408-74-3	6xE-08
Hexachloroethane	67-72-1	3xE-02
Hydrazine	302-01-1	1xE-04
Hydrogen cyanide	74-90-8	7xE-05
Hydrogen sulfide	7783-06-4	1xE-06
Isobutyl alcohol	78-83-1	1xE+01
Methomyl	16752-77-5	1xE+00
Methoxychlor	72-43-5	1xE-01
3-Methylcholanthrene	56-49-5	4xE-05
4,4'-Methylenebis (2-chloroaniline)	101-14-4	2xE-03
Methylene chloride	75-09-2	5xE-02
Methyl ethyl ketone (MEK)	78-93-3	2xE+00
Methyl hydrazine	60-34-4	3xE-04
Methyl parathion	298-00-0	2xE-02
Naphthalene	91-20-3	1xE+01
Nickel cyanide	557-19-7	7xE-01
Nitric oxide	10102-43-9	4xE+00
Nitrobenzene	98-95-3	2xE-02
N-Nitrosodi-n -butylamine	924-16-3	6xE-05
N-Nitrosodiethylamine	55-18-5	2xE-06
N-Nitroso-N-methylurea	684-93-5	1xE-07
N-Nitrosopyrrolidine	930-55-2	2xE-04
Pentachlorobenzene	608-93-5	3xE-02
Pentachloronitrobenzene (PCNB)	82-68-8	1xE-01
Pentachlorophenol	87-86-5	1xE+00
Phenol	108-95-2	1xE+00
Phenylmercury acetate	62-38-4	3xE-03
Phosphine	7803-51-2	1xE-02
Polychlorinated biphenyls, N.O.S	1336-36-3	5xE-05
Potassium cyanide	151-50-8	2xE+00
Potassium silver cyanide	506-61-6	7xE+00
Pronamide	23950-58-5	3xE+00
Pyridine	110-86-1	4xE-02
Reserpine	50-55-5	3xE-05
Selenourea	630-10-4	2xE-01
Silver cyanide	506-64-9	4xE+00
Sodium cyanide	143-33-9	1xE+00
Strychnine	57-24-9	1xE-02
1,2,4,5-Tetrachlorobenzene	95-94-3	1xE-02
1,1,2,2-tetrachloroethane	79-34-5	2xE-03
Tetrachloroethylene	127-18-4	7xE-01
2,3,4,6-Tetrachlorophenol	58-90-2	1xE-02
Tetraethyl lead	78-00-2	4xE-06
Thiourea	62-56-6	2xE-04
Toluene	108-88-3	1xE+01
Toxaphene	8001-35-2	5xE-03
1,1,2-Trichloroethane	79-00-5	6xE-03
Trichloroethylene	79-01-6	5xE-03
Trichloromonofluoromethane	75-69-4	1xE+01
2,4,5-Trichlorophenol	95-95-4	4xE+00
2,4,6-Trichlorophenol	88-06-2	4xE+00
Vanadium pentoxide	1314-62-1	7xE-01
Vinyl chloride	75-01-4	2xE-03

*Note 1: The health-based concentration limits for appendix VIII Rule R315-261 constituents for which a health-based concentration is not provided below is 2xE-06 mg/kg.

Note 2: The levels specified in this appendix and the default level of 0.002 micrograms per kilogram or the level of detection for constituents as identified in Note 1 of this appendix are administratively stayed under the condition, for those constituents specified in Susection R315-266-112(b)(1), that the owner or operator complies with alternative levels defined as the land disposal restriction limits specified in Section R315-268-43 for F039 nonwastewaters. See Subsection R315-266-112(b)(2)(i).

R315-266-210. Appendix VIII to Rule R315-266 -- Organic Compounds for Which Residues Shall Be Analyzed.

Table

Volatiles

Benzene
Toluene
Carbon tetrachloride
Chloroform
Methylene chloride
Trichloroethylene
Tetra chloroethylene
1,1,1-Trichloroethane
Chlorobenzene
cis-1,4-Dichloro-2-butene
Bromochloromethane
Bromodichloromethane
Bromoform
Bromomethane
Methylene bromide
Methyl ethyl ketone

Semivolatiles

Bis(2-ethylhexyl)phthalate
Naphthalene
Phenol
Diethyl phthalate
Butyl benzyl phthalate
2,4-Dimethylphenol
o-Dichlorobenzene
m-Dichlorobenzene
p-Dichlorobenzene
Hexachlorobenzene
2,4,6-Trichlorophenol
Fluoranthene
o-Nitrophenol
1,2,4-Trichlorobenzene
o-Chlorophenol
Pentachlorophenol
Pyrene
Dimethyl phthalate
Mononitrobenzene
2,6-Toluene diisocyanate
Polychlorinated dibenzo-p-dioxins(1)
Polychlorinated dibenzo-furans(1)

(1) Analyses for polychlorinated dibenzo-p-dioxins and polychlorinated dibenzo-furans are required only for residues collected from areas downstream of the combustion chamber, e.g., ductwork, boiler tubes, heat exchange surfaces, air pollution control devices, etc.

Note to Appendix VIII: Analysis is not required for those compounds that do not have an established F039

nonwastewater concentration limit.

R315-266-211. Appendix IX to Rule R315-266 -- Methods Manual for Compliance With the BIF Regulations.

Appendix IX of 40 CFR 266, 2015 edition, is adopted and incorporated by reference.

R315-266-212. Appendix XI to Rule R315-266 -- Lead-Bearing Materials That May Be Processed in Exempt Lead Smelters.

A. Exempt Lead-Bearing Materials When Generated or Originally Produced By Lead-Associated Industries(1)

Acid dump/fill solids
Sump mud
Materials from laboratory analyses
Acid filters
Baghouse bags
Clothing, e.g., coveralls, aprons, shoes, hats, gloves
Sweepings
Air filter bags and cartridges
Respiratory cartridge filters
Shop abrasives
Stacking boards
Waste shipping containers, e.g., cartons, bags, drums, cardboard
Paper hand towels
Wiping rags and sponges
Contaminated pallets
Water treatment sludges, filter cakes, residues, and solids
Emission control dusts, sludges, filter cakes, residues, and solids from lead-associated industries, e.g., K069 and D008 wastes
Spent grids, posts, and separators
Spent batteries
Lead oxide and lead oxide residues
Lead plates and groups
Spent battery cases, covers, and vents
Pasting belts
Water filter media
Cheesecloth from pasting rollers
Pasting additive bags
Asphalt paving materials

B. Exempt Lead-Bearing Materials When Generated or Originally Produced By Any Industry

Charging jumpers and clips
Platen abrasive
Fluff from lead wire and cable casings
Lead-based pigments and compounding pigment dust

(1) Lead-associated industries are lead smelters, lead-acid battery manufacturing, and lead chemical manufacturing, e.g., manufacturing of lead oxide or other lead compounds.

R315-266-213. Appendix XII to Rule R315-266 -- Nickel or Chromium-Bearing Materials That May Be Processed in Exempt Nickel-Chromium Recovery Furnaces.

A. Exempt Nickel or Chromium-Bearing Materials when Generated by Manufacturers or Users of Nickel, Chromium, or Iron

Baghouse bags
Raney nickel catalyst
Floor sweepings
Air filters
Electroplating bath filters
Wastewater filter media
Wood pallets
Disposable clothing (coveralls, aprons, hats, and gloves)
Laboratory samples and spent chemicals
Shipping containers and plastic liners from containers or vehicles used to transport nickel or chromium-containing wastes
Respirator cartridge filters
Paper hand towels

B. Exempt Nickel or Chromium-Bearing Materials when Generated by Any Industry

Electroplating wastewater treatment sludges (F006)
Nickel and/or chromium-containing solutions
Nickel, chromium, and iron catalysts
Nickel-cadmium and nickel-iron batteries
Filter cake from wet scrubber system water treatment plants in the specialty steel industry(1)
Filter cake from nickel-chromium alloy pickling operations(1)

(1) If a hazardous waste under an authorized State program.

R315-266-214. Appendix XIII to Rule R315-266 -- Mercury Bearing Wastes That May Be Processed in Exempt Mercury Recovery Units.

These are exempt mercury-bearing materials with less than 500 ppm of Rule R315-261, appendix VIII organic constituents when generated by manufacturers or users of mercury or mercury products.

1. Activated carbon
2. Decomposer graphite
3. Wood
4. Paper
5. Protective clothing
6. Sweepings
7. Respiratory cartridge filters
8. Cleanup articles
9. Plastic bags and other contaminated containers
10. Laboratory and process control samples
11. K106 and other wastewater treatment plant sludge and filter cake
12. Mercury cell sump and tank sludge
13. Mercury cell process solids
14. Recoverable levels of mercury contained in soil

KEY: hazardous waste
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19-6-106

R315. Environmental Quality, Waste Management and Radiation Control, Waste Management.
R315-273. Standards for Universal Waste Management.
R315-273-1. Standards for Universal Waste Management -- Scope.

(a) Rule R315-273 establishes requirements for managing the following:

(1) Batteries as described in Section R315-273-2;

(2) Pesticides as described in Section R315-273-3;

(3) Mercury-containing equipment as described in Section R315-273-4;

(4) Lamps as described in Section R315-273-5;

(5) Antifreeze as described in Subsection R315-273-6(a); and

(6) Aerosol cans as described in Subsection R315-273-6(b).

(b) Rule R315-273 provides an alternative set of management standards in lieu of regulation under Rules R315-260 through 266, 268, and 270. If a waste handler chooses to manage its universal waste under the Rule R315-273, but fails to meet requirements in this rule, the waste handler remains subject to, and shall comply with, all applicable requirements of Rules R315-260 through 266, 268, 270 and 124.

Note: Only wastes that are hazardous, i.e., are listed or exhibit one or more characteristics of hazardous waste, are subject to the Rule R315-273 universal waste regulations. Compliance with the reduced set of Rule R315-273 requirements is an option that waste handlers may choose for managing their universal wastes, batteries, pesticides, mercury-containing devices, aerosol cans, lamps, and antifreeze. If universal waste handlers wish, they may instead continue to manage these hazardous wastes under the full hazardous waste regulations for generators, transporters, and treatment, storage, and disposal facilities.

R315-273-2. Standards for Universal Waste Management -- Applicability-Batteries.

(a) Batteries covered under Section R315-273.

(1) The requirements of Rule R315-273 apply to persons managing batteries, as described in Section R315-273-9, except those listed in Section R315-273-2(b).

(2) Spent lead-acid batteries which are not managed under Section R315-266-80 are subject to management under Rule R315-273.

(b) Batteries not covered under Rule R315-273. The requirements of Rule R315-273 do not apply to persons managing the following batteries:

(1) Spent lead-acid batteries that are managed under Section R315-266-80.

(2) Batteries, as described in Section R315-273-9, that are not yet wastes under Rule R315-261, including those that do not meet the criteria for waste generation in Subsection R315-273-2(c).

(3) Batteries, as described in Section R315-273-9 that are not hazardous waste. A battery is a hazardous waste if it exhibits one or more of the characteristics identified in Sections R315-261-20 through 24.

(c) Generation of waste batteries.

(1) A used battery becomes a waste on the date it is discarded, e.g., when sent for reclamation.

(2) An unused battery becomes a waste on the date the handler decides to discard it.

R315-273-3. Standards for Universal Waste Management -- Applicability-Pesticides.

(a) Pesticides covered under Rule R315-273. The requirements of Rule R315-273 apply to persons managing pesticides, as described in Section R315-273-9, meeting the following conditions, except those listed in Subsection R315-273-3(b):

(1) Recalled pesticides that are:

(i) Stocks of a suspended and canceled pesticide that are part of a voluntary or mandatory recall under FIFRA Section 19(b), including, but not limited to those owned by the registrant responsible for conducting the recall; or

(ii) Stocks of a suspended or cancelled pesticide, or a pesticide that is not in compliance with FIFRA, that are part of a voluntary recall by the registrant.

(2) Stocks of other unused pesticide products that are collected and managed as part of a waste pesticide collection program.

(b) Pesticides not covered under Rule R315-273. The requirements of Rule R315-273 do not apply to persons managing the following pesticides:

(1) Recalled pesticides described in Subsection R315-273-3(a)(1), and unused pesticide products described in Subsection R315-273-3(a)(2), that are managed by farmers in compliance with Section R315-262-70. Section R315-262-70 addresses pesticides disposed of on the farmer's own farm in a manner consistent with the disposal instructions on the pesticide label, providing the container is triple rinsed in accordance with Subsection R315-261-7(b)(3);

(2) Pesticides not meeting the conditions set forth in Subsection R315-273-3(a). These pesticides shall be managed in compliance with the hazardous waste regulations in Rules R315-260 through 266, 268, and 270;

(3) Pesticides that are not wastes under Rule R315-261, including those that do not meet the criteria for waste generation in Subsection R315-273-3(c) or those that are not wastes as described in Subsection R315-273-3(d); and

(4) Pesticides that are not hazardous waste. A pesticide is a hazardous waste if it is listed in Sections R315-261-30 through 35 or if it exhibits one or more of the characteristics identified in Sections R315-261-20 through 24.

(c) When a pesticide becomes a waste.

(1) A recalled pesticide described in Subsection R315-273-3(a)(1) becomes a waste on the first date on which both of the following conditions apply:

(i) The generator of the recalled pesticide agrees to participate in the recall; and

(ii) The person conducting the recall decides to discard, e.g., burn the pesticide for energy recovery.

(2) An unused pesticide product described in Subsection R315-273-3(a)(2) becomes a waste on the date the generator decides to discard it.

(d) Pesticides that are not wastes. The following pesticides are not wastes:

(1) Recalled pesticides described in Subsection R315-273-3(a)(1), provided that the person conducting the recall:

(i) Has not made a decision to discard, e.g., burn for energy recovery, the pesticide. Until such a decision is made, the pesticide does not meet the definition of "solid waste" under Section R315-261.2; thus the pesticide is not a hazardous waste and is not subject to hazardous waste requirements, including Rule R315-273. This pesticide remains subject to the requirements of FIFRA; or

(ii) Has made a decision to use a management option that, under Section R315-261-2, does not cause the pesticide to be a solid waste; i.e., the selected option is use, other than use constituting disposal, or reuse, other than burning for energy recovery, or reclamation. Such a pesticide is not a solid waste and therefore is not a hazardous waste, and is not subject to the hazardous waste requirements including Rule R315-273. This pesticide, including a recalled pesticide that is exported to a foreign destination for use or reuse, remains subject to the requirements of FIFRA.

(2) Unused pesticide products described in Subsection R315-273-3(a)(2), if the generator of the unused pesticide

product has not decided to discard, e.g., burn for energy recovery, them. These pesticides remain subject to the requirements of FIFRA.

R315-273-4. Standards for Universal Waste Management -- Applicability -- Mercury-Containing Equipment.

(a) Mercury-containing equipment covered under Rule R315-273. The requirements of Rule R315-273 apply to persons managing mercury-containing equipment, as described in Section R315-273-9, except those listed in Subsection R315-273-4(b).

(b) Mercury-containing equipment not covered under Rule R315-273. The requirements of Rule R315-273 do not apply to persons managing the following mercury-containing equipment:

(1) Mercury-containing equipment that is not yet a waste under Rule R315-261. Subsection R315-273-4(c) describes when mercury-containing equipment becomes a waste;

(2) Mercury-containing equipment that is not a hazardous waste. Mercury-containing equipment is a hazardous waste if it exhibits one or more of the characteristics identified in Sections R315-261-20 through 24 or is listed in Sections R315-261-30 through 35; and

(3) Equipment and devices from which the mercury-containing components have been removed.

(c) Generation of waste mercury-containing equipment.

(1) Used mercury-containing equipment becomes a waste on the date it is discarded.

(2) Unused mercury-containing equipment becomes a waste on the date the handler decides to discard it.

R315-273-5. Standards for Universal Waste Management -- Applicability-Lamps.

(a) Lamps covered under Rule R315-273. The requirements of Rule R315-273 apply to persons managing lamps as described in Section R315-273-9, except those listed in Subsection R315-273-5(b).

(b) Lamps not covered under Rule R315-273. The requirements of Rule R315-273 do not apply to persons managing the following lamps:

(1) Lamps that are not yet wastes under Rule R315-261 as provided in Subsection R315-273-5(c).

(2) Lamps that are not hazardous waste. A lamp is a hazardous waste if it exhibits one or more of the characteristics identified in Sections R315-261-20 through 24.

(c) Generation of waste lamps.

(1) A used lamp becomes a waste on the date it is discarded, e.g., sent for reclamation.

(2) An unused lamp becomes a waste on the date the handler decides to discard it.

R315-273-6. Standards for Universal Waste Management -- Applicability for Utah Specific Wastes.

(a) Antifreeze.

(1) The requirements of Rule R315-273 apply to persons managing antifreeze, as described in Section R315-273-9, except those listed in Subsection R315-273-6(a)(2).

(2) Antifreeze not covered under Rule R315-273. The requirements of Rule R315-273 do not apply to persons managing the following antifreeze:

(i) Antifreeze, as described in Section R315-273-9,that is not yet a waste under Rule R315-261, including antifreeze that does not meet the criteria for waste generation in Subsection R315-273-6(a)(4).

(ii) Antifreeze, as described in Section R315-273-9 that is not hazardous waste. Antifreeze is a hazardous waste if it exhibits one or more of the characteristics identified in Sections R315-261-20 through 24.

(3) Generation of waste antifreeze.

(i) Antifreeze becomes a waste on the date it is discarded, e.g., when sent for reclamation.

(ii) Antifreeze becomes a waste on the date the handler decides to discard it.

(b) Aerosol Cans

(1) The requirements of Rule R315-273 apply to persons managing aerosol cans, as described in Section R315-273-9, except those listed in Subsection R315-273-6(b)(2).

(2) Aerosol cans not covered under Rule R315-273. The requirements of Rule R315-273 do not apply to persons managing the following aerosol cans:

(i) Aerosol cans, as described in Section R315-273-9, that are not yet wastes under Rule R315-261, including those that do not meet the criteria for waste generation in subsection R315-273(b)(3).

(ii) Aerosol cans, as described in Section R315-273-9, that are not hazardous waste. An aerosol can shall be managed as a hazardous waste if the can or its contents exhibit one or more of the characteristics identified in Sections R315-261-20 through 24, or if its contents are listed in Sections R315-261-30 through 35.

(3) Generation of waste aerosol cans.

(i) An aerosol can becomes a waste on the date it is discarded or is no longer useable. For purposes of Rule R315-273, an aerosol can is considered to be no longer useable when:

(A) the can is as empty as proper work practices allow;

(B) the spray mechanism no longer operates as designed;

(C) the propellant is spent; or

(D) the product is no longer used.

(ii) An unused aerosol can becomes a waste on the date the handler decides to discard it.

R315-273-8. Standards for Universal Waste Management -- Applicability -- Household and Very Small Quantity Generator Waste.

(a) Persons managing the wastes listed below may, at their option, manage them under the requirements of Rule R315-273:

(1) Household wastes that are exempt under Subsection R315-261-4(b)(1) and are also of the same type as the universal wastes defined at Section R315-273-9; and/or

(2) Very small quantity generator wastes that are exempt under Section R315-262-14 and are also of the same type as the universal wastes defined at Section R315-273-9.

(b) Persons who commingle the wastes described in Subsections R315-273-8(a)(1) and (a)(2) together with universal waste regulated under Rule R315-273 shall manage the commingled waste under the requirements of Rule R315-273.

R315-273-9. Standards for Universal Waste Management -- Definitions.

(a) "Aerosol can" means a container with a total capacity of no more than 24 ounces of gas under pressure and is used to aerate and dispense any material through a valve in the form of a spray or foam.

(b) "Ampule" means an airtight vial made of glass, plastic, metal, or any combination of these materials.

(c) "Antifreeze" means an ethylene glycol or propylene glycol based mixture that lowers the freezing point of water and is used as an engine coolant.

(d) "Battery" means a device consisting of one or more electrically connected electrochemical cells, which is designed to receive, store, and deliver electric energy. An electrochemical cell is a system consisting of an anode, cathode, and an electrolyte, plus such connections, electrical and mechanical, as may be needed to allow the cell to deliver or receive electrical energy. The term battery also includes an intact, unbroken battery from which the electrolyte has been removed.

(e) "Destination facility" means a facility that treats, disposes of, or recycles a particular category of universal waste,

except those management activities described in Subsections R315-273-13(a) and (c) and Subsections R315-273-33(a) and (c). A facility, at which a particular category of universal waste is only accumulated, is not a destination facility for purposes of managing that category of universal waste.

(f) "Drum-top lamp crusher" means a device attached to a drum or container that mechanically reduces the size of lamps and includes a bag filter followed in series by a HEPA filter and an activated carbon filter. Drum-top crushers are the only devices that can be approved for the use of crushing lamps.

(g) "FIFRA" means the Federal Insecticide, Fungicide, and Rodenticide Act (7 U.S.C. 136-136y).

(h) "Generator" means any person, by site, whose act or process produces hazardous waste identified or listed in Rule R315-261 or whose act first causes a hazardous waste to become subject to regulation.

(i) "Lamp," also referred to as "universal waste lamp" is defined as the bulb or tube portion of an electric lighting device. A lamp is specifically designed to produce radiant energy, most often in the ultraviolet, visible, and infra-red regions of the electromagnetic spectrum. Examples of common universal waste electric lamps include, but are not limited to, fluorescent, high intensity discharge, neon, mercury vapor, high pressure sodium, and metal halide lamps.

(j) "Large Quantity Handler of Universal Waste" means a universal waste handler, as defined in Section R315-273-9 who accumulates 5,000 kilograms or more total of universal waste; batteries, pesticides, mercury-containing equipment, lamps, or any other universal waste regulated in Rule R315-273, calculated collectively; at any time. This designation as a large quantity handler of universal waste is retained through the end of the calendar year in which the 5,000 kilogram limit is met or exceeded.

(k) "Mercury-containing equipment" means a device or part of a device, including thermostats, but excluding batteries and lamps, that contains elemental mercury integral to its function.

(l) "On-site" means the same or geographically contiguous property which may be divided by public or private right-of-way, provided that the entrance and exit between the properties is at a cross-roads intersection, and access is by crossing as opposed to going along the right of way. Non-contiguous properties owned by the same person but connected by a right-of-way which he controls and to which the public does not have access, are also considered on-site property.

(m) "Pesticide" means any substance or mixture of substances intended for preventing, destroying, repelling, or mitigating any pest, or intended for use as a plant regulator, defoliant, or desiccant, other than any article that:

(1) Is a new animal drug under FFDCA section 201(w), or

(2) Is an animal drug that has been determined by regulation of the Secretary of Health and Human Services not to be a new animal drug, or

(3) Is an animal feed under FFDCA section 201(x) that bears or contains any substances described by (1) or (2) above.

(n) "Small Quantity Handler of Universal Waste" means a universal waste handler, as defined in this Section R315-273-9 who does not accumulate 5,000 kilograms or more of universal waste at any time.

(o) "Thermostat" means a temperature control device that contains metallic mercury in an ampule attached to a bimetal sensing element, and mercury-containing ampules that have been removed from these temperature control devices in compliance with the requirements of Subsection R315-273-13(c)(2) or 33(c)(2).

(p) "Universal Waste" means any of the following hazardous wastes that are subject to the universal waste requirements of Rule R315-273:

(1) Batteries as described in Section R315-273-2;

(2) Pesticides as described in Section R315-273-3;

(3) Mercury-containing equipment as described in Section R315-273-4;

(4) Lamps as described in Section R315-273-5;

(5) Antifreeze as described in Subsection R315-273-6(a); and

(6) Aerosol cans as described in Subsection R315-273-6(b).

(q) "Universal Waste Handler:"

(1) Means:

(i) A generator, as defined in Section R315-273-9, of universal waste; or

(ii) The owner or operator of a facility, including all contiguous property, that receives universal waste from other universal waste handlers, accumulates universal waste, and sends universal waste to another universal waste handler, to a destination facility, or to a foreign destination.

(2) Does not mean:

(i) A person who treats, except under the provisions of Subsection R315-273-13(a) or (c), or 33(a) or (c), disposes of, or recycles universal waste; or

(ii) A person engaged in the off-site transportation of universal waste by air, rail, highway, or water, including a universal waste transfer facility.

(r) "Universal Waste Transfer Facility" means any transportation-related facility including loading docks, parking areas, storage areas and other similar areas where shipments of universal waste are held during the normal course of transportation for ten days or less.

(s) "Universal Waste Transporter" means a person engaged in the off-site transportation of universal waste by air, rail, highway, or water.

R315-273-10. Standards for Universal Waste Management, Standards for Small Quantity Handlers of Universal Waste -- Applicability.

Sections R315-273-10 through 20 apply to small quantity handlers of universal waste, as defined in Section R315-273-9.

R315-273-11. Standards for Universal Waste Management, Standards for Small Quantity Handlers of Universal Waste -- Prohibitions.

A small quantity handler of universal waste is:

(a) Prohibited from disposing of universal waste; and

(b) Prohibited from diluting or treating universal waste, except by responding to releases as provided in Section R315-273-17; or by managing specific wastes as provided in Section R315-273-13.

R315-273-12. Standards for Universal Waste Management, Standards for Small Quantity Handlers of Universal Waste -- Notification.

A small quantity handler of universal waste is not required to notify the Director of universal waste handling activities except as required under Subsection R315-273-13(3).

R315-273-13. Standards for Universal Waste Management, Standards for Small Quantity Handlers of Universal Waste -- Waste Management.

(a) Batteries. A small quantity handler of universal waste shall manage universal waste batteries in a way that prevents releases of any universal waste or component of a universal waste to the environment, as follows:

(1) A small quantity handler of universal waste shall contain any universal waste battery that shows evidence of leakage, spillage, or damage that could cause leakage under reasonably foreseeable conditions in a container. The container shall be closed, structurally sound, compatible with the contents of the battery, and shall lack evidence of leakage, spillage, or

damage that could cause leakage under reasonably foreseeable conditions.

(2) A small quantity handler of universal waste may conduct the following activities as long as the casing of each individual battery cell is not breached and remains intact and closed, except that cells may be opened to remove electrolyte but shall be immediately closed after removal:

(i) Sorting batteries by type;

(ii) Mixing battery types in one container;

(iii) Discharging batteries so as to remove the electric charge;

(iv) Regenerating used batteries;

(v) Disassembling batteries or battery packs into individual batteries or cells;

(vi) Removing batteries from consumer products; or

(vii) Removing electrolyte from batteries.

(3) A small quantity handler of universal waste who removes electrolyte from batteries, or who generates other solid waste, e.g., battery pack materials, discarded consumer products, as a result of the activities listed above, shall determine whether the electrolyte and/or other solid waste exhibit a characteristic of hazardous waste identified in Sections R315-261-20 through 24.

(i) If the electrolyte and/or other solid waste exhibit a characteristic of hazardous waste, it is subject to all applicable requirements of Rules R315-260 through 266, 268 and 270. The handler is considered the generator of the hazardous electrolyte and/or other waste and is subject to Rule R315-262.

(ii) If the electrolyte or other solid waste is not hazardous, the handler may manage the waste in any way that is in compliance with applicable federal, state or local solid waste regulations.

(b) Pesticides. A small quantity handler of universal waste shall manage universal waste pesticides in a way that prevents releases of any universal waste or component of a universal waste to the environment. The universal waste pesticides shall be contained in one or more of the following:

(1) A container that remains closed, structurally sound, compatible with the pesticide, and that lacks evidence of leakage, spillage, or damage that could cause leakage under reasonably foreseeable conditions; or

(2) A container that does not meet the requirements of Subsection R315-273-13(b)(1), provided that the unacceptable container is overpacked in a container that does meet the requirements of Subsection R315-273-13(b)(1); or

(3) A tank that meets the requirements of 40 CFR 265.190 through 202, except for 40 CFR 265.197(c) and 40 CFR 265.200 and 201, 40 CFR 265 is adopted by reference in R315-265; or

(4) A transport vehicle or vessel that is closed, structurally sound, compatible with the pesticide, and that lacks evidence of leakage, spillage, or damage that could cause leakage under reasonably foreseeable conditions.

(c) Mercury-containing equipment. A small quantity handler of universal waste shall manage universal waste mercury-containing equipment in a way that prevents releases of any universal waste or component of a universal waste to the environment, as follows:

(1) A small quantity handler of universal waste shall place in a container any universal waste mercury-containing equipment with non-contained elemental mercury or that shows evidence of leakage, spillage, or damage that could cause leakage under reasonably foreseeable conditions. The container shall be closed, structurally sound, compatible with the contents of the device, shall lack evidence of leakage, spillage, or damage that could cause leakage under reasonably foreseeable conditions, and shall be reasonably designed to prevent the escape of mercury into the environment by volatilization or any other means.

(2) A small quantity handler of universal waste may remove mercury-containing ampules from universal waste mercury-containing equipment provided the handler:

(i) Removes and manages the ampules in a manner designed to prevent breakage of the ampules;

(ii) Removes the ampules only over or in a containment device, e.g., tray or pan sufficient to collect and contain any mercury released from an ampule in case of breakage;

(iii) Ensures that a mercury clean-up system is readily available to immediately transfer any mercury resulting from spills or leaks from broken ampules from that containment device to a container that meets the requirements of Section R315-262-34;

(iv) Immediately transfers any mercury resulting from spills or leaks from broken ampules from the containment device to a container that meets the requirements of Section R315-262-34;

(v) Ensures that the area in which ampules are removed is well ventilated and monitored to ensure compliance with applicable OSHA exposure levels for mercury;

(vi) Ensures that employees removing ampules are thoroughly familiar with proper waste mercury handling and emergency procedures, including transfer of mercury from containment devices to appropriate containers;

(vii) Stores removed ampules in closed, non-leaking containers that are in good condition;

(viii) Packs removed ampules in the container with packing materials adequate to prevent breakage during storage, handling, and transportation;

(3) A small quantity handler of universal waste mercury-containing equipment that does not contain an ampule may remove the open original housing holding the mercury from universal waste mercury-containing equipment provided the handler:

(i) Immediately seals the original housing holding the mercury with an air-tight seal to prevent the release of any mercury to the environment; and

(ii) Follows all requirements for removing ampules and managing removed ampules under Subsection R315-273-13(c)(2); and

(4)(i) A small quantity handler of universal waste who removes mercury-containing ampules from mercury-containing equipment or seals mercury from mercury-containing equipment in its original housing shall determine whether the following exhibit a characteristic of hazardous waste identified in Sections R315-261-20 through 24:

(A) Mercury or clean-up residues resulting from spills or leaks; and/or

(B) Other solid waste generated as a result of the removal of mercury-containing ampules or housings, e.g., the remaining mercury-containing device.

(ii) If the mercury, residues, and/or other solid waste exhibits a characteristic of hazardous waste, it shall be managed in compliance with all applicable requirements of Rules R315-260 through 266, 268, and 270. The handler is considered the generator of the mercury, residues, and/or other waste and shall manage it in compliance with Rule R315-262.

(iii) If the mercury, residues, and/or other solid waste is not hazardous, the handler may manage the waste in any way that is in compliance with applicable federal, state or local solid waste regulations.

(d) Lamps. A small quantity handler of universal waste shall manage lamps in a way that prevents releases of any universal waste or component of a universal waste to the environment, as follows:

(1) A small quantity handler of universal waste shall contain any lamp in containers or packages that are structurally sound, adequate to prevent breakage, and compatible with the contents of the lamps. Such containers and packages shall

remain closed and shall lack evidence of leakage, spillage or damage that could cause leakage under reasonably foreseeable conditions.

(2) A small quantity handler of universal waste shall immediately clean up and place in a container any lamp that is broken and shall place in a container any lamp that shows evidence of breakage, leakage, or damage that could cause the release of mercury or other hazardous constituents to the environment. Containers shall be closed, structurally sound, compatible with the contents of the lamps and shall lack evidence of leakage, spillage or damage that could cause leakage or releases of mercury or other hazardous constituents to the environment under reasonably foreseeable conditions.

(3) A small quantity handler of universal waste may crush universal waste lamps using a drum-top lamp crusher designed specifically for crushing lamps provided that the small quantity handler submits a drum-top lamp crusher registration application to and receives approval from the Director. The registration application shall demonstrate that the small quantity handler shall operate the drum-top lamp crusher to ensure the following:

(i) The lamps are crushed in a closed accumulation container as specified by the manufacturer of the drum-top lamp crusher;

(ii) The lamps are crushed in a controlled manner that prevents the release of mercury vapor or other contaminants in exceedance of the manufacturer's specifications;

(iii) The drum-top lamp crusher shall have a filtration system consisting of, at a minimum, a bag filter followed in series by a HEPA filter and an activated carbon filter;

(iv) The drum-top lamp crusher is installed, maintained, and operated in accordance with written procedures developed by the manufacturer of the equipment including specific instructions for the frequency of filter changes;

(v) Filters are either characterized to demonstrate that they are not a hazardous waste or managed as a hazardous waste;

(vi) A spill clean-up kit is available;

(vii) The area in which the drum-top crusher is operated is well ventilated and monitored to ensure compliance with applicable OSHA exposure levels for mercury;

(viii) An employee using the drum-top lamp crusher is trained annually on the written operating, safety, personal protection and maintenance procedures of the system;

(ix) An employee using the drum-top lamp crusher is trained annually in emergency procedures;

(x) An operating record is kept and consists of the following:

(A) the number and size of lamps crushed per calendar day, per calendar month, and per calendar year;

(B) the schedule for the change out of filters;

(C) date and time of filter change out;

(D) date, type, and time of equipment maintenance;

(E) any occurrence of equipment malfunction; and

(F) procedures for preventing equipment malfunctions.

(4) The operating record shall be maintained for at least three years.

(5) When a drum-top crusher is no longer used or is relocated, the area where the crusher was located shall be decontaminated of all mercury and other contaminants caused by the use of the drum-top lamp crusher. A report documenting the decontamination steps as well as supporting analytical data demonstrating successful remediation shall be submitted to the Director for approval within 30 days following completion of decontamination.

(6) The small quantity handler shall provide a closure plan along with a detailed written estimate, in current dollars, of the cost of disposing of the drum-top lamp crusher; decontamination of the area surrounding the drum-top lamp crusher, and any analytical costs required to show that decontamination is complete. Drum-top lamp crushers operated by the state or the federal government are exempt from the cost estimate requirement of Subsection R315-273-13(d)(6).

(7) The small quantity handler shall demonstrate financial assurance for the detailed cost estimates determined in Subsection R315-273-13(d)(6) using one of the options in Subsections R315-261-143(a) through (e). Drum-top lamp crushers operated by the state or the federal government are exempt from the financial assurance requirement of Subsection R315-273-13(d)(7).

(8) Crushed universal waste lamps may be managed as universal waste lamps under Rule R315-273 or they may be managed as hazardous waste in accordance with all applicable requirements of Rules R315-260 through 266 and 268.

(e) Antifreeze. A small quantity handler of universal waste shall manage universal waste antifreeze in a way that prevents releases of any universal waste or component of a universal waste to the environment. The universal waste antifreeze shall be contained in one or more of the following:

(1) A container that remains closed, structurally sound, compatible with the antifreeze, and that lacks evidence of leakage, spillage, or damage that could cause leakage under reasonably foreseeable conditions; or

(2) A container that does not meet the requirements of Subsection R315-273-13(e)(1), provided that the unacceptable container is overpacked in a container that does meet the requirements of Subsection R315-273-13(e)(1); or

(3) A tank that meets the requirements of 40 CFR 265.190 through 202, except for 40 CFR 265.197(c) and 40 CFR 265.200 and 201, 40 CFR 265 is adopted by reference in R315-265; or

(4) A transport vehicle or vessel that is closed, structurally sound, compatible with the antifreeze, and that lacks evidence of leakage, spillage, or damage that could cause leakage under reasonably foreseeable conditions.

(f) Aerosol cans. A small quantity handler of universal waste shall manage universal waste aerosol cans in a way that prevents release of any universal waste or component of a universal waste or accelerant to the environment as follows:

(1) A small quantity handler of universal waste shall immediately contain any universal waste aerosol can that shows evidence of leakage, spillage, or damage that could cause leakage under reasonably foreseeable conditions in a separate individual container. The individual container shall be closed, structurally sound, compatible with the contents of the universal waste aerosol can, and shall lack evidence of leakage, spillage, or damage that could cause leakage under reasonably foreseeable conditions.

(2) A small quantity handler of universal waste may accumulate universal waste aerosol cans in a specially designated accumulation container provided it is clearly marked for such use. The accumulation container shall be closed, structurally sound, compatible with the contents of the universal waste aerosol can, and shall lack evidence of leakage, spillage, or damage that could cause leakage under reasonably foreseeable conditions. The universal waste aerosol cans shall be sorted by type and compatibility of contents to ensure that incompatible materials are segregated and managed appropriately in separate accumulation containers.

(3) A small quantity handler of universal waste may puncture universal waste aerosol cans to remove and collect the contents of the aerosol can provided the handler:

(i) Ensures that the universal waste aerosol can is punctured in a manner designed to prevent the release of any universal waste or component of universal waste or accelerant to the environment;

(ii) Ensures that the puncturing operations are performed safely by developing and implementing a written procedure detailing how to safely puncture universal waste aerosol cans.

This procedure shall include:

(A) the type of equipment to be used to puncture the universal waste aerosol cans safely;

(B) operation and maintenance of the unit;

(C) segregation of incompatible wastes;

(D) proper waste management practices, i.e., ensuring that flammable wastes are stored away from heat or open flames; and

(E) waste characterization;

(iii) Ensures that a spill clean-up kit is readily available to immediately clean up spills or leaks of the contents of the universal waste aerosol can which may occur during the can-puncturing operation;

(iv) Immediately transfers the contents of the universal waste aerosol can, or puncturing device if applicable, to a container that meets the requirements of Section R315-262-34;

(v) Ensures that the area in which the universal waste aerosol cans are punctured is well ventilated; and

(vi) Ensures that employees are thoroughly familiar with the procedure for sorting and puncturing universal waste aerosol cans, and proper waste handling and emergency procedures, relevant to their responsibilities during normal facility operations and emergencies.

(4)(i) A small quantity handler of universal waste who punctures universal waste aerosol cans to remove the contents of the aerosol can, or who generates other solid waste as a result of the activities listed above, shall determine whether the contents of the universal waste aerosol can, residues and/or other solid wastes exhibit a characteristic of hazardous waste identified in Sections R315-261-20 through 24, or are listed as a hazardous waste identified in Sections R315-261-30 through 35.

(ii) If the contents of the universal waste aerosol can, residues and/or other solid waste exhibit a characteristic of hazardous waste or are listed hazardous wastes, they shall be managed in compliance with all applicable requirements of Rules R315-260 through 266, 268, 270 and 124. The handler is considered the generator of the contents of the universal waste aerosol can, residues, and/or other waste and is subject to the requirements of Rule R315-262. In addition to the Rule R315-262 labeling requirements, the container used to accumulate, store, or transport the hazardous waste contents removed from the punctured universal waste aerosol can shall be labeled with all applicable EPA Hazardous Waste Codes found in Sections R315-261-20 through 24 and Sections R315-261-30 through 35.

(iii) If the contents of the universal waste aerosol can, residues, and/or other solid waste are not hazardous, the handler may manage the waste in a way that is in compliance with applicable federal, state or local solid waste regulations.

R315-273-14. Standards for Universal Waste Management, Standards for Small Quantity Handlers of Universal Waste -- Labeling/Marking.

A small quantity handler of universal waste shall label or mark the universal waste to identify the type of universal waste as specified below:

(a) Universal waste batteries, i.e., each battery, or a container in which the batteries are contained, shall be labeled or marked clearly with any one of the following phrases: "Universal Waste-Battery(ies)," or "Waste Battery(ies)," or "Used Battery(ies);"

(b) A container, or multiple container package unit, tank, transport vehicle or vessel in which recalled universal waste pesticides as described in Subsection R315-273-3(a)(1) are contained shall be labeled or marked clearly with:

(1) The label that was on or accompanied the product as sold or distributed; and

(2) The words "Universal Waste-Pesticide(s)" or "Waste-Pesticide(s);"

(c) A container, tank, or transport vehicle or vessel in which unused pesticide products as described in Subsection R315-273-3(a)(2) are contained shall be labeled or marked clearly with:

(1)(i) The label that was on the product when purchased, if still legible;

(ii) If using the labels described in Subsection R315-273-14(c)(1)(i) is not feasible, the appropriate label as required under the Department of Transportation regulation 49 CFR part 172;

(iii) If using the labels described in Subsections R315-273-14(c)(1)(i) and (ii) is not feasible, another label prescribed or designated by the waste pesticide collection program administered or recognized by a state; and

(2) The words "Universal Waste-Pesticide(s)" or "Waste-Pesticide(s)."

(d)(1) Universal waste mercury-containing equipment, i.e., each device, or a container in which the equipment is contained, shall be labeled or marked clearly with any of the following phrases: "Universal Waste-Mercury Containing Equipment," "Waste Mercury-Containing Equipment," or "Used Mercury-Containing Equipment."

(2) A universal waste mercury-containing thermostat or container containing only universal waste mercury-containing thermostats may be labeled or marked clearly with any of the following phrases: "Universal Waste-Mercury Thermostat(s)," "Waste Mercury Thermostat(s)," or "Used Mercury Thermostat(s)."

(e) Each lamp or a container or package in which such lamps are contained shall be labeled or marked clearly with one of the following phrases: "Universal Waste-Lamp(s)," or "Waste Lamp(s)," or "Used Lamp(s)".

(f) A container, tank, or transport vehicle or vessel in which antifreeze is contained shall be labeled or marked clearly with the words "Universal Waste-antifreeze".

(g) Universal waste aerosol cans, i.e., each can, or a container in which the universal waste aerosol cans are contained or accumulated, shall be labeled or marked clearly with any one of the following phrases: "Universal Waste-Aerosol Can(s)", or "Waste Aerosol Can(s)".

R315-273-15. Standards for Universal Waste Management, Standards for Small Quantity Handlers of Universal Waste -- Accumulation Time Limits.

(a) A small quantity handler of universal waste may accumulate universal waste for no longer than one year from the date the universal waste is generated, or received from another handler, unless the requirements of Subsection R315-273-15(b) are met.

(b) A small quantity handler of universal waste may accumulate universal waste for longer than one year from the date the universal waste is generated, or received from another handler, if such activity is solely for the purpose of accumulation of such quantities of universal waste as necessary to facilitate proper recovery, treatment, or disposal. However, the handler bears the burden of proving that such activity is solely for the purpose of accumulation of such quantities of universal waste as necessary to facilitate proper recovery, treatment, or disposal.

(c) A small quantity handler of universal waste who accumulates universal waste shall be able to demonstrate the length of time that the universal waste has been accumulated from the date it becomes a waste or is received. The handler may make this demonstration by:

(1) Placing the universal waste in a container and marking or labeling the container with the earliest date that any universal waste in the container became a waste or was received;

(2) Marking or labeling each individual item of universal waste with the date it became a waste or was received;

(3) Maintaining an inventory system on-site that identifies

the date each universal waste became a waste or was received;

(4) Maintaining an inventory system on-site that identifies the earliest date that any universal waste in a group of universal waste items or a group of containers of universal waste became a waste or was received;

(5) Placing the universal waste in a specific accumulation area and identifying the earliest date that any universal waste in the area became a waste or was received; or

(6) Any other method which clearly demonstrates the length of time that the universal waste has been accumulated from the date it becomes a waste or is received.

R315-273-16. Standards for Universal Waste Management, Standards for Small Quantity Handlers of Universal Waste -- Employee Training.

A small quantity handler of universal waste shall inform all employees who handle or have responsibility for managing universal waste. The information shall describe proper handling and emergency procedures appropriate to the type(s) of universal waste handled at the facility.

R315-273-17. Standards for Universal Waste Management, Standards for Small Quantity Handlers of Universal Waste -- Response to Releases.

(a) A small quantity handler of universal waste shall immediately contain all releases of universal wastes and other residues from universal wastes.

(b) A small quantity handler of universal waste shall determine whether any material resulting from the release is hazardous waste, and if so, shall manage the hazardous waste in compliance with all applicable requirements of Rules R315-260 through 266, 268 and 270. The handler is considered the generator of the material resulting from the release, and shall manage it in compliance with Rule R315-262.

R315-273-18. Standards for Universal Waste Management, Standards for Small Quantity Handlers of Universal Waste -- Off-Site Shipments.

(a) A small quantity handler of universal waste is prohibited from sending or taking universal waste to a place other than another universal waste handler, a destination facility, or a foreign destination.

(b) If a small quantity handler of universal waste self-transports universal waste off-site, the handler becomes a universal waste transporter for those self-transportation activities and shall comply with the transporter requirements of Sections R315-273-50 through 56 while transporting the universal waste.

(c) If a universal waste being offered for off-site transportation meets the definition of hazardous materials under 49 CFR parts 171 through 180, a small quantity handler of universal waste shall package, label, mark and placard the shipment, and prepare the proper shipping papers in accordance with the applicable Department of Transportation regulations under 49 CFR parts 172 through 180;

(d) Prior to sending a shipment of universal waste to another universal waste handler, the originating handler shall ensure that the receiving handler agrees to receive the shipment.

(e) If a small quantity handler of universal waste sends a shipment of universal waste to another handler or to a destination facility and the shipment is rejected by the receiving handler or destination facility, the originating handler shall either:

(1) Receive the waste back when notified that the shipment has been rejected, or

(2) Agree with the receiving handler on a destination facility to which the shipment will be sent.

(f) A small quantity handler of universal waste may reject a shipment containing universal waste, or a portion of a shipment containing universal waste that he has received from another handler. If a handler rejects a shipment or a portion of a shipment, he shall contact the originating handler to notify him of the rejection and to discuss reshipment of the load. The handler shall:

(1) Send the shipment back to the originating handler, or

(2) If agreed to by both the originating and receiving handler, send the shipment to a destination facility.

(g) If a small quantity handler of universal waste receives a shipment containing hazardous waste that is not a universal waste, the handler shall immediately notify the Director of the illegal shipment, and provide the name, address, and phone number of the originating shipper. The Director shall provide instructions for managing the hazardous waste.

(h) If a small quantity handler of universal waste receives a shipment of non-hazardous, non-universal waste, the handler may manage the waste in any way that is in compliance with applicable federal, state or local solid waste regulations.

R315-273-19. Standards for Universal Waste Management, Standards for Small Quantity Handlers of Universal Waste -- Tracking Universal Waste Shipments.

A small quantity handler of universal waste is not required to keep records of shipments of universal waste.

R315-273-20. Standards for Universal Waste Management, Standards for Small Quantity Handlers of Universal Waste -- Exports.

A small quantity handler of universal waste who sends universal waste to a foreign destination is subject to the requirements of Sections R315-262-80 through 262-84, shall:

(a) Comply with the requirements applicable to a primary exporter in Section R315-262-53, Subsections R315-262-56(a)(1) through (4), (6), and (b) and Section R315-262-57;

(b) Export such universal waste only upon consent of the receiving country and in conformance with the EPA Acknowledgement of Consent as defined in Sections R315-262-50 through 58; and

(c) Provide a copy of the EPA Acknowledgment of Consent for the shipment to the transporter transporting the shipment for export.

R315-273-30. Standards for Universal Waste Management, Standards for Large Quantity Handlers of Universal Waste -- Applicability.

Sections R315-273-30 through 40 apply to large quantity handlers of universal waste, as defined in Section R315-273-9.

R315-273-31. Standards for Universal Waste Management, Standards for Large Quantity Handlers of Universal Waste -- Prohibitions.

A large quantity handler of universal waste is:

(a) Prohibited from disposing of universal waste; and

(b) Prohibited from diluting or treating universal waste, except by responding to releases as provided in Section R315-273-37; or by managing specific wastes as provided in Section R315-273-33.

R315-273-32. Standards for Universal Waste Management, Standards for Large Quantity Handlers of Universal Waste -- Notification.

(a)(1) Except as provided in Subsections R315-273-32(a)(2) and (3), a large quantity handler of universal waste shall have sent written notification of universal waste management to the Director, and received an EPA Identification Number, before meeting or exceeding the 5,000 kilogram storage limit.

(2) A large quantity handler of universal waste who has already notified the Director of his hazardous waste

management activities and has received an EPA Identification Number is not required to renotify under this section except as required in Subsection R315-273-33(d)(3).

(3) A large quantity handler of universal waste who manages recalled universal waste pesticides as described in Subsection R315-273-3(a)(1) and who has sent notification to EPA as required by 40 CFR part 165 is not required to notify for those recalled universal waste pesticides under this section.

(b) This notification shall include:

(1) The universal waste handler's name and mailing address;

(2) The name and business telephone number of the person at the universal waste handler's site who should be contacted regarding universal waste management activities;

(3) The address or physical location of the universal waste management activities;

(4) A list of all the types of universal waste managed by the handler; and

(5) A statement indicating that the handler is accumulating more than 5,000 kilograms of universal waste at one time.

R315-273-33. Standards for Universal Waste Management, Standards for Large Quantity Handlers of Universal Waste -- Waste Management.

(a) Batteries. A large quantity handler of universal waste shall manage universal waste batteries in a way that prevents releases of any universal waste or component of a universal waste to the environment, as follows:

(1) A large quantity handler of universal waste shall contain any universal waste battery that shows evidence of leakage, spillage, or damage that could cause leakage under reasonably foreseeable conditions in a container. The container shall be closed, structurally sound, compatible with the contents of the battery, and shall lack evidence of leakage, spillage, or damage that could cause leakage under reasonably foreseeable conditions.

(2) A large quantity handler of universal waste may conduct the following activities as long as the casing of each individual battery cell is not breached and remains intact and closed, except that cells may be opened to remove electrolyte but shall be immediately closed after removal:

(i) Sorting batteries by type;

(ii) Mixing battery types in one container;

(iii) Discharging batteries so as to remove the electric charge;

(iv) Regenerating used batteries;

(v) Disassembling batteries or battery packs into individual batteries or cells;

(vi) Removing batteries from consumer products; or

(vii) Removing electrolyte from batteries.

(3) A large quantity handler of universal waste who removes electrolyte from batteries, or who generates other solid waste, e.g., battery pack materials, discarded consumer products, as a result of the activities listed above, shall determine whether the electrolyte and/or other solid waste exhibit a characteristic of hazardous waste identified in Sections R315-261-20 through 24.

(i) If the electrolyte and/or other solid waste exhibit a characteristic of hazardous waste, it shall be managed in compliance with all applicable requirements of Rules R315-260 through 266, 268 and 270. The handler is considered the generator of the hazardous electrolyte and/or other waste and is subject to Rule R315-262.

(ii) If the electrolyte or other solid waste is not hazardous, the handler may manage the waste in any way that is in compliance with applicable federal, state or local solid waste regulations.

(b) Pesticides. A large quantity handler of universal waste shall manage universal waste pesticides in a way that prevents releases of any universal waste or component of a universal waste to the environment. The universal waste pesticides shall be contained in one or more of the following:

(1) A container that remains closed, structurally sound, compatible with the pesticide, and that lacks evidence of leakage, spillage, or damage that could cause leakage under reasonably foreseeable conditions; or

(2) A container that does not meet the requirements of Subsection R315-273-33(b)(1), provided that the unacceptable container is overpacked in a container that does meet the requirements of Subsection R315-273-33(b)(1); or

(3) A tank that meets the requirements of 40 CFR 265.190 through 202, except for 40 CFR 265.197(c) and 40 CFR 265.200 and 201, 40 CFR 265 is adopted by reference in R315-265; or

(4) A transport vehicle or vessel that is closed, structurally sound, compatible with the pesticide, and that lacks evidence of leakage, spillage, or damage that could cause leakage under reasonably foreseeable conditions.

(c) Mercury-containing equipment. A large quantity handler of universal waste shall manage universal waste mercury-containing equipment in a way that prevents releases of any universal waste or component of a universal waste to the environment, as follows:

(1) A large quantity handler of universal waste shall place in a container any universal waste mercury-containing equipment with non-contained elemental mercury or that shows evidence of leakage, spillage, or damage that could cause leakage under reasonably foreseeable conditions. The container shall be closed, structurally sound, compatible with the contents of the device, shall lack evidence of leakage, spillage, or damage that could cause leakage under reasonably foreseeable conditions, and shall be reasonably designed to prevent the escape of mercury into the environment by volatilization or any other means.

(2) A large quantity handler of universal waste may remove mercury-containing ampules from universal waste mercury-containing equipment provided the handler:

(i) Removes and manages the ampules in a manner designed to prevent breakage of the ampules;

(ii) Removes the ampules only over or in a containment device, e.g., tray or pan sufficient to collect and contain any mercury released from an ampule in case of breakage;

(iii) Ensures that a mercury clean-up system is readily available to immediately transfer any mercury resulting from spills or leaks of broken ampules from that containment device to a container that meets the requirements of Section R315-262-34;

(iv) Immediately transfers any mercury resulting from spills or leaks from broken ampules from the containment device to a container that meets the requirements of Section R315-262-34;

(v) Ensures that the area in which ampules are removed is well ventilated and monitored to ensure compliance with applicable OSHA exposure levels for mercury;

(vi) Ensures that employees removing ampules are thoroughly familiar with proper waste mercury handling and emergency procedures, including transfer of mercury from containment devices to appropriate containers;

(vii) Stores removed ampules in closed, non-leaking containers that are in good condition;

(viii) Packs removed ampules in the container with packing materials adequate to prevent breakage during storage, handling, and transportation;

(3) A large quantity handler of universal waste mercury-containing equipment that does not contain an ampule may remove the open original housing holding the mercury from universal waste mercury-containing equipment provided the handler:

(i) Immediately seals the original housing holding the mercury with an air-tight seal to prevent the release of any mercury to the environment; and

(ii) Follows all requirements for removing ampules and managing removed ampules under Subsection R315-273-33(c)(2); and

(4)(i) A large quantity handler of universal waste who removes mercury-containing ampules from mercury-containing equipment or seals mercury from mercury-containing equipment in its original housing shall determine whether the following exhibit a characteristic of hazardous waste identified in Sections R315-261-20 through 24:

(A) Mercury or clean-up residues resulting from spills or leaks and/or

(B) Other solid waste generated as a result of the removal of mercury-containing ampules or housings, e.g., the remaining mercury-containing device.

(ii) If the mercury, residues, and/or other solid waste exhibits a characteristic of hazardous waste, it shall be managed in compliance with all applicable requirements of Rules R315-260 through 266, 268 and 270. The handler is considered the generator of the mercury, residues, and/or other waste and shall manage it in compliance with Rule R315-262.

(iii) If the mercury, residues, and/or other solid waste is not hazardous, the handler may manage the waste in any way that is in compliance with applicable federal, state or local solid waste regulations.

(d) Lamps. A large quantity handler of universal waste shall manage lamps in a way that prevents releases of any universal waste or component of a universal waste to the environment, as follows:

(1) A large quantity handler of universal waste shall contain any lamp in containers or packages that are structurally sound, adequate to prevent breakage, and compatible with the contents of the lamps. Such containers and packages shall remain closed and shall lack evidence of leakage, spillage or damage that could cause leakage under reasonably foreseeable conditions.

(2) A large quantity handler of universal waste shall immediately clean up and place in a container any lamp that is broken and shall place in a container any lamp that shows evidence of breakage, leakage, or damage that could cause the release of mercury or other hazardous constituents to the environment. Containers shall be closed, structurally sound, compatible with the contents of the lamps and shall lack evidence of leakage, spillage or damage that could cause leakage or releases of mercury or other hazardous constituents to the environment under reasonably foreseeable conditions.

(3) A large quantity handler of universal waste may crush universal waste lamps using a drum-top lamp crusher designed specifically for crushing lamps provided that the Large quantity handler submits a drum-top lamp crusher registration application to and receives approval from the Director. The registration application shall demonstrate that the large quantity handler shall operate the drum-top lamp crusher to ensure the following:

(i) The lamps are crushed in a closed accumulation container as specified by the manufacturer of the drum-top lamp crusher;

(ii) The lamps are crushed in a controlled manner that prevents the release of mercury vapor or other contaminants in exceedance of the manufacturer's specifications;

(iii) The drum-top lamp crusher shall have a filtration system consisting of, at a miniumum, a bag filter followed in series by a HEPA filter and an activated carbon filter;

(iv) The drum-top lamp crusher is installed, maintained, and operated in accordance with written procedures developed by the manufacturer of the equipment including specific instructions for the frequency of filter changes;

(v) Filters are either characterized to demonstrate that they are not a hazardous waste or managed as a hazardous waste;

(vi) A spill clean-up kit is available;

(vii) The area in which the drum-top crusher is operated is well ventilated and monitored to ensure compliance with applicable OSHA exposure levels for mercury;

(viii) The employee using the drum-top lamp crusher is trained annually on the written operating, safety, personal protection and maintenance procedures of the system;

(ix) The employee using the drum-top lamp crusher is trained annually in emergency procedures;

(x) An operating record is kept and consists of the following:

(A) the number and size of lamps crushed per calendar day, per calendar month, and per calendar year;

(B) the schedule for the change out of filters;

(C) date and time of filter change out;

(D) date, type, and time of equipment maintenance;

(E) any occurrence of equipment malfunction; and

(F) procedures for preventing equipment malfunctions.

(4) The operating record shall be maintained for at least three years.

(5) When a drum-top crusher is no longer used or is relocated, the area where the crusher was located shall be decontaminated of all mercury and other contaminants caused by the use of the drum-top lamp crusher. A report documenting the decontamination steps as well as supporting analytical data demonstrating successful remediation shall be submitted to the Director for approval within 30 days following completion of decontamination.

(6) The large quantity handler shall provide a closure plan along with a detailed written estimate, in current dollars, of the cost of disposing the drum-top lamp crusher; decontamination of the area surrounding the drum-top lamp crusher, and any analytical costs required to show that decontamination is complete. Drum-top lamp crushers operated by the state or the federal government are exempt from the cost estimate requirement of Subsection R315-273-33(d)(6).

(7) The large quantity handler shall demonstrate financial assurance for the detailed cost estimates determined in Subsection R315-273-33(d)(6) using one of the options in Subsections R315-261-143(a) through (e). Drum-top lamp crushers operated by the state or the federal government are exempt from the financial assurance requirement of Subsection R315-273-33(d)(7).

(8) Crushed universal waste lamps may be managed as universal waste lamps under Rule R315-273 or they may be managed as hazardous waste in accordance with all applicable requirements of Rules R315-260 through 266 and 268.

(e) Antifreeze. A large quantity handler of universal waste shall manage universal waste antifreeze in a way that prevents releases of any universal waste or component of a universal waste to the environment. The universal waste antifreeze shall be contained in one or more of the following:

(1) A container that remains closed, structurally sound, compatible with the antifreeze, and that lacks evidence of leakage, spillage, or damage that could cause leakage under reasonably foreseeable conditions; or

(2) A container that does not meet the requirements of Subsection R315-273-13(e)(1), provided that the unacceptable container is overpacked in a container that does meet the requirements of Subsection R315-273-13(e)(1); or

(3) A tank that meets the requirements of 40 CFR 265.190 through 202, except for 40 CFR 265.197(c) and 40 CFR 265.200 and 201, 40 CFR 265 is adopted by reference in R315-265; or

(4) A transport vehicle or vessel that is closed, structurally sound, compatible with the antifreeze, and that lacks evidence of leakage, spillage, or damage that could cause leakage under

reasonably foreseeable conditions.

(f) Aerosol cans. A large quantity handler of universal waste shall manage universal waste aerosol cans in a way that prevents release of any universal waste or component of a universal waste or accelerant to the environment as follows:

(1) A large quantity handler of universal waste shall immediately contain any universal waste aerosol can that shows evidence of leakage, spillage, or damage that could cause leakage under reasonably foreseeable conditions in a separate individual container. The individual container shall be closed, structurally sound, compatible with the contents of the universal waste aerosol can, and shall lack evidence of leakage, spillage, or damage that could cause leakage under reasonably foreseeable conditions.

(2) A large quantity handler of universal waste may accumulate universal waste aerosol cans in a specially designated accumulation container provided it is clearly marked for such use. The accumulation container shall be closed, structurally sound, compatible with the contents of the universal waste aerosol can, and shall lack evidence of leakage, spillage, or damage that could cause leakage under reasonably foreseeable conditions. The universal waste aerosol cans shall be sorted by type and compatibility of contents to ensure that incompatible materials are segregated and managed appropriately in separate accumulation containers.

(3) A large quantity handler of universal waste may puncture universal waste aerosol cans to remove and collect the contents of the aerosol can provided the handler:

(i) Ensures that the universal waste aerosol can is punctured in a manner designed to prevent the release of any universal waste or component of universal waste or accelerant to the environment;

(ii) Ensures that the puncturing operations are performed safely by developing and implementing a written procedure detailing how to safely puncture universal waste aerosol cans. This procedure shall include:

(A) the type of equipment to be used to puncture the universal waste aerosol cans safely;

(B) operation and maintenance of the unit;

(C) segregation of incompatible wastes;

(D) proper waste management practices, i.e., ensuring that flammable wastes are stored away from heat or open flames; and

(E) waste characterization;

(iii) Ensures that a spill clean-up kit is readily available to immediately clean up spills or leaks of the contents of the universal waste aerosol can which may occur during the can-puncturing operation;

(iv) Immediately transfers the contents of the universal waste aerosol can, or puncturing device if applicable, to a container that meets the requirements of Section R315-262-34;

(v) Ensures that the area in which the universal waste aerosol cans are punctured is well ventilated; and

(vi) Ensures that employees are thoroughly familiar with the procedure for sorting and puncturing universal waste aerosol cans, and proper waste handling and emergency procedures, relevant to their responsibilities during normal facility operations and emergencies.

(4)(i) A large quantity handler of universal waste who punctures universal waste aerosol cans to remove the contents of the aerosol can, or who generates other solid waste as a result of the activities listed above, shall determine whether the contents of the universal waste aerosol can, residues and/or other solid wastes exhibit a characteristic of hazardous waste identified in Sections R315-261-20 through 24, or are listed as a hazardous waste identified in Sections R315-261-30 through 35.

(ii) If the contents of the universal waste aerosol can, residues and/or other solid waste exhibit a characteristic of hazardous waste or are listed hazardous wastes, they shall be managed in compliance with all applicable requirements of Rules R315-260 through 266, 268, 270 and 124. The handler is considered the generator of the contents of the universal waste aerosol can, residues, and/or other waste and is subject to the requirements of Rule R315-262. In addition to the Rule R315-262 labeling requirements, the container used to accumulate, store, or transport the hazardous waste contents removed from the punctured universal waste aerosol can shall be labeled with all applicable EPA Hazardous Waste Codes found in Sections R315-261-20 through 24 and Sections R315-261-30 through 35.

(iii) If the contents of the universal waste aerosol can, residues, and/or other solid waste are not hazardous, the handler may manage the waste in a way that is in compliance with applicable federal, state or local solid waste regulations.

R315-273-34. Standards for Universal Waste Management, Standards for Large Quantity Handlers of Universal Waste -- Labeling/Marking.

A large quantity handler of universal waste shall label or mark the universal waste to identify the type of universal waste as specified below:

(a) Universal waste batteries, i.e., each battery, or a container or tank in which the batteries are contained, shall be labeled or marked clearly with any one of the following phrases: "Universal Waste-Battery(ies)," or "Waste Battery(ies)," or "Used Battery(ies);"

(b) A container, or multiple container package unit, tank, transport vehicle or vessel in which recalled universal waste pesticides as described in Subsection R315-273-3(a)(1) are contained shall be labeled or marked clearly with:

(1) The label that was on or accompanied the product as sold or distributed; and

(2) The words "Universal Waste-Pesticide(s)" or "Waste-Pesticide(s);"

(c) A container, tank, or transport vehicle or vessel in which unused pesticide products as described in Subsection R315-273-3(a)(2) are contained shall be labeled or marked clearly with:

(1)(i) The label that was on the product when purchased, if still legible;

(ii) If using the labels described in Subsection R315-273-34(c)(1)(i) is not feasible, the appropriate label as required under the Department of Transportation regulation 49 CFR part 172;

(iii) If using the labels described in Subsections R315-273-34(c)(1)(i) and (1)(ii) is not feasible, another label prescribed or designated by the pesticide collection program; and

(2) The words "Universal Waste-Pesticide(s)" or "Waste-Pesticide(s)."

(d)(1) Mercury-containing equipment, i.e., each device, or a container in which the equipment is contained, shall be labeled or marked clearly with any of the following phrases: "Universal Waste-Mercury Containing Equipment," "Waste Mercury-Containing Equipment," or "Used Mercury-Containing Equipment."

(2) A universal waste mercury-containing thermostat or container containing only universal waste mercury-containing thermostats may be labeled or marked clearly with any of the following phrases: "Universal Waste-Mercury Thermostat(s)," "Waste Mercury Thermostat(s)," or "Used Mercury Thermostat(s)."

(e) Each lamp or a container or package in which such lamps are contained shall be labeled or marked clearly with any one of the following phrases: "Universal Waste-Lamp(s)," or "Waste Lamp(s)," or "Used Lamp(s)".

(f) A container, tank, or transport vehicle or vessel in which antifreeze is contained shall be labeled or marked clearly

with the words "Universal Waste-antifreeze".

(g) Universal waste aerosol cans, i.e., each can, or a container in which the universal waste aerosol cans are contained or accumulated, shall be labeled or marked clearly with any one of the following phrases: "Universal Waste-Aerosol Can(s)", or "Waste Aerosol Can(s)".

R315-273-35. Standards for Universal Waste Management, Standards for Large Quantity Handlers of Universal Waste -- Accumulation Time Limits.

(a) A large quantity handler of universal waste may accumulate universal waste for no longer than one year from the date the universal waste is generated, or received from another handler, unless the requirements of Subsection R315-273-35(b) are met.

(b) A large quantity handler of universal waste may accumulate universal waste for longer than one year from the date the universal waste is generated, or received from another handler, if such activity is solely for the purpose of accumulation of such quantities of universal waste as necessary to facilitate proper recovery, treatment, or disposal. However, the handler bears the burden of proving that such activity was solely for the purpose of accumulation of such quantities of universal waste as necessary to facilitate proper recovery, treatment, or disposal.

(c) A large quantity handler of universal waste shall be able to demonstrate the length of time that the universal waste has been accumulated from the date it becomes a waste or is received. The handler may make this demonstration by:

(1) Placing the universal waste in a container and marking or labeling the container with the earliest date that any universal waste in the container became a waste or was received;

(2) Marking or labeling the individual item of universal waste, e.g., each battery or thermostat, with the date it became a waste or was received;

(3) Maintaining an inventory system on-site that identifies the date the universal waste being accumulated became a waste or was received;

(4) Maintaining an inventory system on-site that identifies the earliest date that any universal waste in a group of universal waste items or a group of containers of universal waste became a waste or was received;

(5) Placing the universal waste in a specific accumulation area and identifying the earliest date that any universal waste in the area became a waste or was received; or

(6) Any other method which clearly demonstrates the length of time that the universal waste has been accumulated from the date it becomes a waste or is received.

R315-273-36. Standards for Universal Waste Management, Standards for Large Quantity Handlers of Universal Waste -- Employee Training.

A large quantity handler of universal waste shall ensure that all employees are thoroughly familiar with proper waste handling and emergency procedures, relative to their responsibilities during normal facility operations and emergencies.

R315-273-37. Standards for Universal Waste Management, Standards for Large Quantity Handlers of Universal Waste -- Response To Releases.

(a) A large quantity handler of universal waste shall immediately contain all releases of universal wastes and other residues from universal wastes.

(b) A large quantity handler of universal waste shall determine whether any material resulting from the release is hazardous waste, and if so, shall manage the hazardous waste in compliance with all applicable requirements of Rules R315-260 through 266, 268 and 270. The handler is considered the generator of the material resulting from the release, and is subject to Rule R315-262.

R315-273-38. Standards for Universal Waste Management, Standards for Large Quantity Handlers of Universal Waste -- Off-Site Shipments.

(a) A large quantity handler of universal waste is prohibited from sending or taking universal waste to a place other than another universal waste handler, a destination facility, or a foreign destination.

(b) If a large quantity handler of universal waste self-transports universal waste off-site, the handler becomes a universal waste transporter for those self-transportation activities and shall comply with the transporter requirements of Sections R315-273-50 through 56 while transporting the universal waste.

(c) If a universal waste being offered for off-site transportation meets the definition of hazardous materials under 49 CFR 171 through 180, a large quantity handler of universal waste shall package, label, mark and placard the shipment, and prepare the proper shipping papers in accordance with the applicable Department of Transportation regulations under 49 CFR parts 172 through 180;

(d) Prior to sending a shipment of universal waste to another universal waste handler, the originating handler shall ensure that the receiving handler agrees to receive the shipment.

(e) If a large quantity handler of universal waste sends a shipment of universal waste to another handler or to a destination facility and the shipment is rejected by the receiving handler or destination facility, the originating handler shall either:

(1) Receive the waste back when notified that the shipment has been rejected, or

(2) Agree with the receiving handler on a destination facility to which the shipment will be sent.

(f) A large quantity handler of universal waste may reject a shipment containing universal waste, or a portion of a shipment containing universal waste that he has received from another handler. If a handler rejects a shipment or a portion of a shipment, he shall contact the originating handler to notify him of the rejection and to discuss reshipment of the load. The handler shall:

(1) Send the shipment back to the originating handler, or

(2) If agreed to by both the originating and receiving handler, send the shipment to a destination facility.

(g) If a large quantity handler of universal waste receives a shipment containing hazardous waste that is not a universal waste, the handler shall immediately notify the Director of the illegal shipment, and provide the name, address, and phone number of the originating shipper. The Director shall provide instructions for managing the hazardous waste.

(h) If a large quantity handler of universal waste receives a shipment of non-hazardous, non-universal waste, the handler may manage the waste in any way that is in compliance with applicable federal, state or local solid waste regulations.

R315-273-39. Standards for Universal Waste Management, Standards For Large Quantity Handlers Of Universal Waste -- Tracking Universal Waste Shipments.

(a) Receipt of shipments. A large quantity handler of universal waste shall keep a record of each shipment of universal waste received at the facility. The record may take the form of a log, invoice, manifest, bill of lading, movement document or other shipping document. The record for each shipment of universal waste received shall include the following information:

(1) The name and address of the originating universal waste handler or foreign shipper from whom the universal waste was sent;

(2) The quantity of each type of universal waste received;
(3) The date of receipt of the shipment of universal waste.
(b) Shipments off-site. A large quantity handler of universal waste shall keep a record of each shipment of universal waste sent from the handler to other facilities. The record may take the form of a log, invoice, manifest, bill of lading movement document or other shipping document. The record for each shipment of universal waste sent shall include the following information:
(1) The name and address of the universal waste handler, destination facility, or foreign destination to whom the universal waste was sent;
(2) The quantity of each type of universal waste sent;
(3) The date the shipment of universal waste left the facility.
(c) Record retention.
(1) A large quantity handler of universal waste shall retain the records described in Subsection R315-273-39(a) for at least three years from the date of receipt of a shipment of universal waste.
(2) A large quantity handler of universal waste shall retain the records described in Subsection R315-273-39(b) for at least three years from the date a shipment of universal waste left the facility.

R315-273-40. Standards for Universal Waste Management, Standards for Large Quantity Handlers of Universal Waste -- Exports.

A large quantity handler of universal waste who sends universal waste to a foreign destination is subject to the requirements of Sections R315-262-80 through 262-84, shall:
(a) Comply with the requirements applicable to a primary exporter in Section R315-262-53, Subsections R315-262-56(a)(1) through (4), (6), and (b) and Section R315-262-57;
(b) Export such universal waste only upon consent of the receiving country and in conformance with the EPA Acknowledgement of Consent as defined in Sections R315-262-50 through 58; and
(c) Provide a copy of the EPA Acknowledgement of Consent for the shipment to the transporter transporting the shipment for export.

R315-273-50. Standards for Universal Waste Management, Standards for Universal Waste Transporters -- Applicability.

Sections R315-273-50 through 56 apply to universal waste transporters, as defined in Section R315-273-9.

R315-273-51. Standards for Universal Waste Management, Standards for Universal Waste Transporters -- Prohibitions.

A universal waste transporter is:
(a) Prohibited from disposing of universal waste; and
(b) Prohibited from diluting or treating universal waste, except by responding to releases as provided in Section R315-273-54.

R315-273-52. Standards for Universal Waste Management, Standards for Universal Waste Transporters -- Waste Management.

(a) A universal waste transporter shall comply with all applicable U.S. Department of Transportation regulations in 49 CFR part 171 through 180 for transport of any universal waste that meets the definition of hazardous material in 49 CFR 171.8. For purposes of the Department of Transportation regulations, a material is considered a hazardous waste if it is subject to the Hazardous Waste Manifest Requirements of Rule R315-262. Because universal waste does not require a hazardous waste manifest, it is not considered hazardous waste under the Department of Transportation regulations.
(b) Some universal waste materials are regulated by the Department of Transportation as hazardous materials because they meet the criteria for one or more hazard classes specified in 49 CFR 173.2. As universal waste shipments do not require a manifest under Rule R315-262, they may not be described by the DOT proper shipping name "hazardous waste, (l) or (s), n.o.s.", nor may the hazardous material's proper shipping name be modified by adding the word "waste".

R315-273-53. Standards for Universal Waste Management, Standards for Universal Waste Transporters -- Storage Time Limits.

(a) A universal waste transporter may only store the universal waste at a universal waste transfer facility for ten days or less.
(b) If a universal waste transporter stores universal waste for more than ten days, the transporter becomes a universal waste handler and shall comply with the applicable requirements of Sections R315-273-10 through 20 and 30 through 40 while storing the universal waste.

R315-273-54. Standards for Universal Waste Management, Standards for Universal Waste Transporters -- Response to Releases.

(a) A universal waste transporter shall immediately contain all releases of universal wastes and other residues from universal wastes.
(b) A universal waste transporter shall determine whether any material resulting from the release is hazardous waste, and if so, it is subject to all applicable requirements of Rules R315-260 through 266, 268 and 270. If the waste is determined to be a hazardous waste, the transporter is subject to Rule R315-262.

R315-273-55. Standards for Universal Waste Management, Standards for Universal Waste Transporters -- Off-site Shipments.

(a) A universal waste transporter is prohibited from transporting the universal waste to a place other than a universal waste handler, a destination facility, or a foreign destination.
(b) If the universal waste being shipped off-site meets the Department of Transportation's definition of hazardous materials under 49 CFR 171.8, the shipment shall be properly described on a shipping paper in accordance with the applicable Department of Transportation regulations under 49 CFR part 172.

R315-273-56. Standards for Universal Waste Management, Standards for Universal Waste Transporters -- Exports.

A universal waste transporter transporting a shipment of universal waste to a foreign destination is subject to the requirements of Sections R315-262-80 through 262-84, may not accept a shipment if the transporter knows the shipment does not conform to the EPA Acknowledgment of Consent. In addition the transporter shall ensure that:
(a) A copy of the EPA Acknowledgment of Consent accompanies the shipment; and
(b) The shipment is delivered to the facility designated by the person initiating the shipment.

R315-273-60. Standards for Universal Waste Management, Standards for Destination Facilities -- Applicability.

(a) The owner or operator of a destination facility, as defined in Section R315-273-9, is subject to all applicable requirements of Rules R315-264, 265, 266, 268, 270, and 124, and the notification requirement under section 3010 of RCRA.
(b) The owner or operator of a destination facility that recycles a particular universal waste without storing that universal waste before it is recycled shall comply with Subsection R315-261-6(c)(2).

R315-273-61. Standards for Universal Waste Management, Standards for Destination Facilities -- Off-site Shipments.

(a) The owner or operator of a destination facility is prohibited from sending or taking universal waste to a place other than a universal waste handler, another destination facility or foreign destination.

(b) The owner or operator of a destination facility may reject a shipment containing universal waste, or a portion of a shipment containing universal waste. If the owner or operator of the destination facility rejects a shipment or a portion of a shipment, he shall contact the shipper to notify him of the rejection and to discuss reshipment of the load. The owner or operator of the destination facility shall:

(1) Send the shipment back to the original shipper, or

(2) If agreed to by both the shipper and the owner or operator of the destination facility, send the shipment to another destination facility.

(c) If the owner or operator of a destination facility receives a shipment containing hazardous waste that is not a universal waste, the owner or operator of the destination facility shall immediately notify the Director of the illegal shipment, and provide the name, address, and phone number of the shipper. The Director shall provide instructions for managing the hazardous waste.

(d) If the owner or operator of a destination facility receives a shipment of non-hazardous, non-universal waste, the owner or operator may manage the waste in any way that is in compliance with applicable federal or state solid waste regulations.

R315-273-62. Standards for Universal Waste Management, Standards for Destination Facilities -- Tracking Universal Waste Shipments.

(a) The owner or operator of a destination facility shall keep a record of each shipment of universal waste received at the facility. The record may take the form of a log, invoice, manifest, bill of lading, movement document or other shipping document. The record for each shipment of universal waste received shall include the following information:

(1) The name and address of the universal waste handler, destination facility, or foreign shipper from whom the universal waste was sent;

(2) The quantity of each type of universal waste received;

(3) The date of receipt of the shipment of universal waste.

(b) The owner or operator of a destination facility shall retain the records described in Subsection R315-273-62(a) for at least three years from the date of receipt of a shipment of universal waste.

R315-273-70. Standards for Universal Waste Management -- Imports.

Persons managing universal waste that is imported from a foreign country into the United States are subject to the requirements of Sections R315-262-80 through 262-84 and the applicable requirements of Rule R315-273, immediately after the waste enters the United States, as indicated in Subsection R315-273-70(a) through (c):

(a) A universal waste transporter is subject to the universal waste transporter requirements of Sections R315-273-50 through 56.

(b) A universal waste handler is subject to the small or large quantity handler of universal waste requirements of Sections R315-273-10 through 20 or 30 through 40, as applicable.

(c) An owner or operator of a destination facility is subject to the destination facility requirements of Sections R315-273-60 through 62.

(d) Persons managing universal waste that is imported from an OECD country as specified in Subsection R315-262-58(a)(1) are subject to Subsections R315-273-70(a) through (c), in addition to the requirements of Sections R315-262-80 through 262-84.

R315-273-80. Standards for Universal Waste Management, Petitions to Include Other Wastes Under Rule R315-273 -- General.

(a) Any person seeking to add a hazardous waste or a category of hazardous waste to Rule R315-273 may petition for a regulatory amendment under Sections R315-273-80 and 81 and Sections R315-260-20 and 23.

(b) To be successful, the petitioner shall demonstrate to the satisfaction of the Board that regulation under the universal waste regulations of Rule R315-273 is: appropriate for the waste or category of waste; will improve management practices for the waste or category of waste; and will improve implementation of the hazardous waste program. The petition shall include the information required by Subsection R315-260-20(b). The petition should also address as many of the factors listed in Section R315-273-81 as are appropriate for the waste or waste category addressed in the petition.

(c) The Board shall evaluate petitions using the factors listed in Section R315-273-81. The Board shall grant or deny a petition using the factors listed in Section R315-273-81. The decision shall be based on the weight of evidence showing that regulation under Rule R315-273 is appropriate for the waste or category of waste, shall improve management practices for the waste or category of waste, and shall improve implementation of the hazardous waste program.

(d) The Board may request additional information needed to evaluate the merits of the petition.

R315-273-81. Standards for Universal Waste Management -- Factors for Petitions to Include Other Wastes Under Rule R315-273.

(a) The waste or category of waste, as generated by a wide variety of generators, is listed in Sections R315-261-30 through 3, or, if not listed, a proportion of the waste stream exhibits one or more characteristics of hazardous waste identified in Sections R315-261-20 through 24. When a characteristic waste is added to the universal waste regulations of this Rule R315-273 by using a generic name to identify the waste category, e.g., batteries, the definition of universal waste in Section R315-260-10 and Section R315-273-9 shal be amended to include only the hazardous waste portion of the waste category, e.g., hazardous waste batteries. Thus, only the portion of the waste stream that does exhibit one or more characteristics, i.e., is hazardous waste, is subject to the universal waste regulations of Rule R315-273;

(b) The waste or category of waste is not exclusive to a specific industry or group of industries, is commonly generated by a wide variety of types of establishments, including, for example, households, retail and commercial businesses, office complexes, very small quantity generators, small businesses, government organizations, as well as large industrial facilities;

(c) The waste or category of waste is generated by a large number of generators, e.g., more than 1,000 nationally, and is frequently generated in relatively small quantities by each generator;

(d) Systems to be used for collecting the waste or category of waste, including packaging, marking, and labeling practices, would ensure close stewardship of the waste;

(e) The risk posed by the waste or category of waste during accumulation and transport is relatively low compared to other hazardous wastes, and specific management standards proposed or referenced by the petitioner, e.g., waste management requirements appropriate to be added to Sections R315-273-13, 33, and 52; and/or applicable Department of Transportation requirements, would be protective of human health and the environment during accumulation and transport;

(f) Regulation of the waste or category of waste under Rule R315-273 will increase the likelihood that the waste will be diverted from non-hazardous waste management systems; e.g., the municipal waste stream, non-hazardous industrial or commercial waste stream, municipal sewer or stormwater systems; to recycling; treatment; or disposal in compliance with Title 19 Chapter 6.

(g) Regulation of the waste or category of waste under Rule R315-273 will improve implementation of and compliance with the hazardous waste regulatory program; and/or

(h) Such other factors as may be appropriate.

KEY: hazardous waste, universal waste
October 15, 2019 **19-6-105**
19-6-106

R357. Governor, Economic Development.
R357-22. Rural Employment Expansion Program.
R357-22-101. Title.

This rule is known as the "Rural Employment Expansion Program Rule."

R357-22-102. Definitions.

In addition to the terms defined in 63N-4-402, the following terms are defined as follows:

(1) "Employee report" means a list of employees in a format approved by the office that includes:

(a) time-period of report;

(b) employee:

(i) names or ID numbers;

(ii) position titles;

(iii) hire dates;

(iv) termination dates, if applicable;

(v) hours paid;

(vi) wages paid.; and

(vii) benefits paid, if applicable.

(4) "New full-time employee position" means a positon that:

(a) has been newly created in addition to the number of baseline jobs as defined in subsection 63N-1-102(1);

(b) is a newly created full-time employee position where the annual gross wage or annualized wage of the employment position, not including health care or other paid or unpaid benefits, is at least 110% of the average wage of the county in which the employment position exists; and

(c) is filled;

(i) by a full-time employee as defined in subsection 63N-1-102(6) who is not a spouse, child, parent, sibling, grandparent, or grandchild of an owner or officer of the business entity; and

(ii) in any county in the state except Salt Lake, Utah, Davis, Weber, Washington, Cache, Tooele, and Summit counties.

(2) "REDI", Rural Economic Development Incentives, means the same as the Rural Employment Expansion Program.

R357-22-103. Authority.

This rule is adopted by the office under the authority of Subsection 63N-4-403(2)(c).

R357-22-104. Form and Content of Application for Rural Employment Expansion Program Participation.

(1) The content of the application for a rural employment expansion grant shall, at minimum, include the business entity's:

(a) name;

(b) physical operating address;

(c) telephone number;

(d) email address;

(e) Federal EIN number;

(f) primary NAICS code;

(g) vendor number, if the applicant is a registered vendor with the State of Utah;

(h) requested rural employment expansion grant amount; and

(i) forecasted:

(i) number of new full-time positions;

(ii) wage of new full-time employee positions; and

(iii) hire date of new full-time employee positions.

(2) The following documents shall, at minimum, be included in each application for participation in the program:

(a) copy of current W-9 form;

(b)(i) two most recent Form 33H - Utah Employer Quarterly Wage List and Contribution Reports; or

(ii) a copy of an executed professional employee agreement, as defined in Subsection 31A-40-102(15); and

(c) employee report covering the twelve months prior to application.

R357-22-105. Documentation Required to Demonstrate the Creation of New Full-Time Positions.

(1) The following documents shall, at minimum, be included when a business entity demonstrates the creation of new full-time employee positions after the position has been filled for 12 months:

(a) number of new full-time employee positions created;

(b) address of work location if different from the address supplied in the business entity's application for REDI Participation;

(c) employee report for the twelve months prior to grant funds disbursement request; and

(d)(i) two most recent Form 33H - Utah Employer Quarterly Wage List and Contribution Reports; or

(ii) a copy of an executed professional employee agreement, as defined in Subsection 31A-40-102(15).

(2) A business entity may apply for grant funds after the new employee position has been filled for a minimum of six months and the annualized wage is at least 110% of the county's annual wage by submitting, at minimum, the following:

(a) number of new full-time employee positions created;

(b) address of work if different from the address supplied in the business entity's application for REDI Participation;

(c) employee report covering the twelve months prior to grant disbursement request; and

(d)(i) two most recent Form 33H - Utah Employer Quarterly Wage List and Contribution Reports; or

(ii) a copy of an executed professional employee agreement, as defined in Subsection 31A-40-102(15).

(e) new full-time employee positions pay stubs at the second, fourth and sixth months.

(3) the office may request additional information in order to verify the creation and wage of new full-time employee positions.

R357-22-106. Documentation Required to Demonstrate the Creation of New Full-Time Positions -- Appeal Process.

(1) If, after a review of the documentation required to demonstrate the creation of a new full-time employee positions is inadequate the office shall:

(a) deny the request for a rural employment expansion grant; or

(b) inform the business entity that the documentation is inadequate and ask the business entity to submit additional documentation.

(2) If the office denies the request for a rural employment expansion grant the business entity may appeal the denial to the office, in writing, within 20 business days of the denial notice date.

(3) The office shall review any appeal within 20 business days and make a final determination of the business entity's request for a rural employment expansion grant.

R357-22-107. Administration of the Rural Employment Expansion Grant.

(1) From the date of entering a written agreement, as described in Subsection 63N-4-404(3), the business entity shall have six months to hire an employee to fill any new full-time employee positions.

(2) The business entity shall provide the documentation required to demonstrate the creation of new full-time employee positions within 90-days of the completion of all eligible employment periods for the new full-time positions.

(3) The business entity shall verify that newly hired employees are legal U.S. Citizens or meet eligible non-citizen requirements (employer must use the E-Verify and keep a record of citizen documentation on hand).

(4) If the office finds a material change in the baseline number of jobs after established in the contract, the administrator may cause the contract to be amended to reflect the correct number prior to issuance or denial of an incentive.

(5) The written agreement, as described in Subsection 63N-4-404(3), will establish the average county wage terms and requirements.

(6)(a) New full-time employee positions that qualify for a Rural Employment Expansion Grant are not eligible to be considered as new full-time employee positions for other grant or incentive programs administered by the office.

(b) Business entities that would like to apply for or receive another grant or incentive administered by the office must submit a separate application for each grant or incentive program.

KEY: rural employment expansion, economic development
October 28, 2019 63N-4-403(2)©

R357. Governor, Economic Development.
R357-24. Utah Works Program.
R357-24-101. Title.

This rule is known as the "Utah Works Program Rule."

R357-24-102. Purpose and Goals.

(1) The Talent Ready Utah Center's Utah Works Program promotes partnerships between companies and post-secondary institutions to fill high demand positions and/or provide skills training. This program teams industry, post-secondary institutions, and state agencies to address specific workforce gaps identified by companies.

(2) The goal of UWP is to accelerate hiring and skills training that will lead to economic growth.

R357-24-103. Definitions.

The following terms are defined as follows:

(1) "Applicant" means a collaboration between one or more companies and one or more post-secondary institutions for a particular hiring program.

(2) "Awardee(s)" means an applicant that has been awarded a UWP grant.

(3) "Collaboration" means the strategic coordination between a company and post-secondary institution to address a skilled labor gap.

(4) "Company" means a corporation, limited liability company, partnership, association, or other business entity and may include a federal military installation when such entity otherwise meets UWP eligibility requirements and does not include an individual, sole proprietorship, or educational institution.

(5) "Company representative" means a representative from a company that is designated to support the efforts of the collaboration.

(6) "High demand position" means a position in which there are hard to fill jobs with a lack of skilled labor employees or a large number of skilled labor positions needed in a short amount of time.

(7) "Pre-hire program" means an applicant's plan to vet potential hires prior to the skills training. The pre-hire program will typically consist of a training lasting from two days to two weeks.

(8) "Post-secondary institution" means an entity under the Utah System of Higher Education or the Utah System of Technical Colleges.

(9) "Skilled labor" means jobs that require skills training and a level of skill.

(10) "Skilled labor gap" means the disparity between a company's existing or future skill need.

(11) "Skills training program" means a training plan developed and agreed upon between the post-secondary institution and a company.

(12) "TRU" means the Talent Ready Utah Center.

(13) "UWP" means the Utah Works Program.

(14) "UWP grant" means the competitive grants awarded and administered under this Rule.

R357-24-104. Authority.

This rule is adopted by the office under the authority of subsection 63N-12-505(3).

R357-24-105. Eligibility Criteria.

(1) Proposal must be jointly developed by a company and a post-secondary institution.

(2) Applicants must submit proposals as outlined in section 106 below, and otherwise specified in TRU.

(3) A company representative must certify that:

(a) the company has a skilled labor gap;

(b) the proposed post-secondary institution partnership will meet that gap need;

(c) the company has significant one time or ongoing hiring demands; and

(d) the company commits to provide a cost-share contribution as outlined in subsection (5) below.

(4) The company must have a substantial presence in Utah.

(a) A substantial presence, for purposes of UWP requires the following:

(i) the company must be properly registered with the Utah Division of Corporations as an active, for-profit business entity, in good standing; and

(ii) the company must be properly licensed in the appropriate city or county.

(b) Additionally, TRU shall, according to its judgment and discretion, determine whether a company has a substantial presence for purposes of a UWP grant by weighing the following factors:

(i) total workforce and percentage of company's workforce in Utah;

(ii) amount of business taxes paid to the State of Utah;

(iii) relative size of the company;

(iv) whether the company's principal place of business is Utah;

(v) likelihood that the company will maintain a significant presence in the state of Utah;

(vi) a commitment of capital expenditure and/or new job creation in the state; and

(vii) the degree to which the company's activities and operations positively impact Utah's economy.

(5) The company must fulfill the following cost-sharing requirements:

(a) provide a company representative to support the collaboration;

(b) provide an "in-kind" contribution, approved by TRU, which may include:

(i) company representative's time spent on the collaboration;

(ii) materials and equipment;

(iii) work/research space;

(iv) travel and other company expenses budgeted for the collaboration; or

(v) other contributions approved by TRU.

(c) make available for audit all reported cost-share activities.

(6) Applicants may coordinate with the Department of Workforce Services when building pre-hire program objectives.

R357-24-106. Proposal and Submission Process.

(1) TRU will accept proposals for UWP grants on an ongoing basis subject to available funds.

(2) Applicants shall submit proposals in a form and manner specified by TRU.

(3) The proposal must include the following:

(a) a description of the applicant's eligibility as outlined in section 105 above;

(b) a detailed description of pre-hire program, if applicable, and skills training program;

(c) description of skilled labor positions;

(d) projected number of individuals who will start the program, finish the program and be successfully hired;

(e) potential economic impact on the Utah economy;

(f) an executed collaboration agreement between the company and post-secondary institution; and

(g) outlined budget for total program cost, including;

(i) a description of any funds already secured for activities related to the program;

(ii) breakdown of costs to complete the scope of work;

(iii) an itemized budget detailing planned use of grant funds, including how the funding will be allocated, tracked, and

reported;

(iv) awardee must use grant funds for expenses specific to the program and may include:

(A) instructors;

(B) marketing;

(C) equipment;

(D) tuition reimbursements;

(E) curriculum and program development;

(F) program management; and

(G) US security clearances as outlined in subsection 108(4)(b).

(4) All completed proposals will be reviewed and awardees selected via the criteria and method outlined in this Rule.

R357-24-107. Method for Selecting Awardees.

(1) TRU will evaluate grant proposals and recommend grant amounts.

(2) TRU will, according to its discretion and judgment, review the applicant's proposal by considering the following factors:

(a) statewide or regional importance of the industry to Utah's economy;

(b) relative size of the sector, its stability, and growth potential;

(c) characteristics of the state's workforce including education and training;

(d) the current availability of other sources of funding;

(e) the potential for the industry to develop new jobs and business opportunities in the state;

(f) likelihood that skilled labor in this sector will result in the creation of a company in Utah or growth of existing Utah company;

(g) number of positions to be trained and filled;

(h) impact on the local economy; and

(i) any other factor TRU deems relevant, considering the mission of UWP and the purpose of the UWP grant.

(3) The criteria will be designed to assess each proposal and may include:

(a) completeness of proposal;

(b) thorough pre-hire program and skills training program;

(c) reasonableness of proposal;

(d) reasonableness of the proposed timeline;

(e) reasonableness of the proposed budget (e.g., size and allocation of budget is appropriate for the work proposed and matching funds available);

(f) availability of UWP grant funds;

(g) potential for economic impact, as measured by:

(i) skilled labor gap mitigation;

(ii) meeting target head count;

(iii) potential revenue due to expansion of current business or development of new businesses;

(iv) projected time to fill job needs;

(v) market need or industry impact;

(h) any other factor of the applicant's ability to produce measurable and timely benefits to the state; and

(i) any factor relating to eligibility requirements outlined in section 105.

(4) UWP grants must be used to mitigate gaps and meet company hiring demands. The program proposals referenced in section 106 must identify specific pre-hire program and skills training.

(5) In the event of a favorable recommendation by TRU the proposal will be reviewed by the talent ready Utah board using the same criteria.

(6) An applicant will become an awardee only upon approval by TRU and the talent ready Utah board.

R357-24-108. Grant Amount, Award, and Required Contract.

(1) TRU will have the discretion to limit the maximum amount of funding that may be awarded for each UWP grant based on available funds, scope of the collaboration, and quality of proposal.

(2) TRU reserves the right to award funding for any proposal in full or in part, to request additional information, or to reject any or all proposals based on the eligibility and evaluation criteria set forth in these Rules, Utah law, and according to the judgment and discretion of TRU. TRU also reserves the right to certify any agreements between post-secondary institution and company on IP terms and confidentiality.

(3) Upon award of a UWP grant, and prior to disbursement of any funds, awardee must enter into a contract with GOED governing the use of UWP grant funding.

(4) Unless addressed in the terms and conditions of the contract between awardee and GOED the following provisions shall apply:

(a) UWP grant funding may not be used to provide a primary benefit to any state other than Utah;

(b) Subject to TRU approval, TRU may, via supplemental contract, allocate grant funds directly to an awardee company to pay for the cost of US security clearances for UWP grant program hires where a US security clearance is required as a condition of the position; and

(c) for all other eligibility requirements, awardees must maintain eligibility status for UWP program until the collaboration is complete, scope of work requirements have been met, final disbursement of funding has been made, and first year reporting has been completed.

(5) Any misrepresentation to TRU, violations of subsection (4) above, or this Rule may result in forfeiture of UWP grant funding and require repayment of all or a portion of the funding received as part of UWP grant and/or disqualification from continued funding.

(6) TRU reserves the right to audit the use of any UWP grant funding.

R357-24-109. Contract Modifications.

(1) Awardee may request a modification to the terms of a UWP contract.

(2) TRU may deny a modification request for any reason.

(3) TRU shall have discretion to agree to reasonable, nonsubstantive changes.

(a) Non-substantive changes may include the following:

(i) changes to timelines within the scope of work;

(ii) corrections to clerical errors in the proposal materials; and

(iii) technical changes to conditions that do not alter the budget, company's eligibility status, or violate any state or federal law.

(4) Substantive changes must be approved by TRU in consultation with the talent ready Utah board.

(5) All approved changes shall be made in writing and through an amendment modifying the terms of the grant contract.

(6) Awardees refusal or failure to sign contract within 90 days of receipt of contract constitutes a rejection of the UWP grant and a waiver of any rights and benefits.

R357-24-110. Funding Distribution.

(1) TRU shall reimburse the awardee for no more than the total amount specified in the contract.

(2) Payment will only be made for those costs authorized and approved by TRU after providing sufficient documentation in accordance with the terms and conditions provided in the contract.

(3) After execution of the contract between GOED and

awardee:

(a) awardee may receive up to fifty percent of the total grant amount, subject to TRU approval;

(b) remaining funds to be disbursed on a reimbursement basis, as outlined in scope of work and after company provides sufficient evidence of initial expenditures.

(4) Failure to successfully complete the scope of work requirements may result in a recapture of all or part of the grant funding and will be grounds to terminate the contract and any future funding.

R357-24-111. Reporting and Cooperation Requirements.

(1) The awardee shall report to TRU and provide documentation evidencing the following metrics for inclusion in the annual report described in section 63N-1-301:

(a) the number of participants in the program;

(b) the number of participants who have completed training offered by the program;

(c) the number of participants who have been hired by a business participating in the program; and

(d) any additional data needed as required and outlined in the terms of the contract.

(2) Awardee shall submit to any audit, by TRU or a third-party, to verify reported data.

KEY: economic development, Talent Ready Utah, Utah Works Program

October 15, 2019 63N-12-505

R357. Governor, Economic Development.
R357-15a. Non-Profit Enterprise Zone Program.
R357-15a-101. Title.

This rule is known as the "Non-Profit Enterprise Zone Rule."

R357-15a-103. Authority.

(1) Subsection 63N-2-213.5 (14) requires the office to make rules for administration of the program.

R357-15a-104. Content of Application.

(1) The following content shall, at minimum, be included in each entity's application for a grant:
(a) entity name;
(b) contact information including:
(i) contact name;
(ii) email address;
(iii) telephone number;
(iv) title; and
(v) mailing address.
(c) description of the primary use of funds, including:
(i) how the project will impact the enterprise zone;
(2) Supporting documentation including:
(a) IRS designation letter;
(b) non-profit organization W-9;
(c) charitable solicitation permit;
(d) certificate of good standing;
(e) articles of incorporation;
(f) by-laws;
(g) list of board members;
(h) evidence the legislative body of the county or municipality has approved the project; and
(i) project budget, including maps, drawings or renderings.

R357-15a-105. Tax Credit Procedure.

(1) A nonprofit corporation associated with an approved project shall submit, at minimum, submit the following upon completion of the approve project:
(a) complete donor list;
(b) verified project expenses on a format approved by the office.
(2) Claimants shall submit, at minimum, the following documentation for reimbursement and after completion of the approved project:
(a) a complete request form provided by the office;
(b) receipt from the non-profit for the donation; and
(c) donation documentation, which may include:
(i) canceled checks;
(ii) credit card statements;
(iii) bank statements; and
(iv) other financial instruments verifying payment had occurred.
(3) The office may deny a tax credit for claimants who were the recipient of funding for an approved project.

KEY: rural development, economic development, enterprise zone
October 28, 2019 63N-2-213.5(14)

R386. Health, Disease Control and Prevention, Epidemiology.
R386-702. Communicable Disease Rule.
R386-702-1. Purpose Statement.

(1) The Communicable Disease Rule is adopted under authority of Sections 26-1-30, 26-6-3, and 26-23b.

(2) This rule outlines a multidisciplinary approach to communicable and infectious disease control and emphasizes reporting, surveillance, isolation, treatment and epidemiological investigation to identify and control preventable causes of infectious diseases. Reporting requirements and authorizations are specified for communicable and infectious diseases, outbreaks, and unusual occurrence of any disease. Each section has been adopted with the intent of reducing disease morbidity and mortality through the rapid implementation of established practices and procedures.

(3) The successes of medicine and public health dramatically reduced the risk of epidemics and early loss of life due to infectious agents during the twentieth century. However, the emergence of diseases such as Middle Eastern Respiratory Syndrome (MERS), and the rapid spread of diseases such as West Nile virus to the United States from other parts of the world, made possible by advances in transportation, trade, food production, and other factors, highlight the continuing threat to health from infectious diseases. Continual attention to these threats and cooperation among all health care providers, government agencies, and other entities that are partners in protecting the public's health are crucial to maintain and improve the health of the citizens of Utah.

R386-702-2. Definitions.

(1) Terms in this rule defined in Section 26-6-2:
(a) Carrier
(b) Communicable disease
(c) Contact
(d) Epidemic
(e) Infection
(f) Schools
(2) Terms in this rule defined in Section 26-6-6:
(a) Health care provider
(3) Terms in this rule defined in Section 26-21-2:
(a) Assisted living facilities
(b) Nursing care facilities
(4) Terms in this rule defined in Section 26-23b-102:
(a) Bioterrorism
(5) Terms in this rule defined in Section 26-39-102:
(a) Childcare programs
(6) Terms in this rule defined in Section 78B-3-403:
(a) Health care facilities
(7) Terms in this rule defined in Section 62A-15-602:
(a) Mental health facilities
(8) Terms in this rule defined in Section R386-80-2:
(a) Local health department
(9) In addition, for purposes of this rule:

(a) "Blood and plasma center" is defined as a blood bank, blood storage facility, plasma center, hospital, any another facility where blood or blood products are collected, or any facility where blood services are provided.

(b) "Care facilities licensed through the Department of Human Services" is described as any facility licensed through the Utah Department of Human Services, and includes adult day care facilities, adult foster care facilities, crisis respite facilities, domestic violence shelters and treatment programs, foster care homes, mental health treatment programs, residential treatment and day treatment facilities for persons with disabilities, substance abuse treatment programs, and youth treatment programs.

(c) "Case" is defined as any person, living or deceased, identified as having a communicable disease, condition, or syndrome that meets criteria for being reportable under this rule, or that is otherwise under public health investigation.

(d) "Clinic" is defined as any facility where a health care provider practices.

(e) "Condition" is defined as an abnormal state of health that may interfere with a person's regular feelings of wellbeing.

(f) "Correctional facility" is defined as an facility that forcibly confines an individual under the authority of the government, including but not limited to prisons, detention centers, jails, juvenile detention centers.

(g) "Department" is defined as the Utah Department of Health.

(h) "Diagnostic facility" is defined as the facility where the case or suspect case was seen and evaluated by a healthcare provider.

(i) "Dispensary" is defined as an office in a school, hospital, industrial plant, or other organization that dispenses medications or medical supplies.

(j) "Electronic case reporting" is defined as the transmission of clinical, diagnostic, laboratory, and treatment related data from reporting entities to the Department in a structured, computer-readable format that reflects comparable content to HL7 CDA(reg trademark) R2 Implementation Guide: Public Health Case Report, Release 2 - US Realm - the Electronic Initial Case Report (eICR). Electronic Initial Case Reporting is a form of electronic reporting.

(k) "Electronic laboratory reporting" is defined as the transmission of laboratory or health related data from reporting entities to the Department using HL7 ORU-R01 2.3.1 or 2.5.1, LOINC, and SNOMED standard message structure and vocabulary. Electronic laboratory reporting is a form of electronic reporting.

(l) "Electronic reporting" is defined as the transmission of laboratory or health related data from reporting entities to the Department in a structured, computer-readable format that reflects comparable content to HL7 messaging.

(m) "Encounter" is defined as an instance of an individual presenting to a health care facility.

(n) "Event" is defined as any communicable disease, condition, laboratory result, syndrome, outbreak, epidemic, or other public health hazard that meets criteria for being reportable under this rule.

(o) "Good Samaritan" is defined as a person who gives reasonable aid to strangers in grave physical distress.

(p) "Invasive disease" is defined as infection occurring in parts of the body where organisms are not normally present, such as the bloodstream, organs, or the meninges.

(q) "Laboratory" is defined as any facility that receives, refers, or analyzes clinical specimens.

(r) "Manual reporting" is defined as the transmission of laboratory or health related data from reporting entities to the Department using processes that require hand keying for data to be incorporated into Department databases.

(s) "Normally sterile site" is defined as a part of the body where organisms are not normally present, such as the bloodstream, organs, or the meninges.

(t) "Outbreak" is defined as the increased occurrence of any communicable disease, health condition, or syndrome in a community, institution, or region; or two or more cases of a communicable disease, health condition, or syndrome in persons with a common exposure.

(u) "Public health hazard" is defined as the presence of an infectious organism or condition in the environment which endangers the health of a specified population.

(v) "Suspect case" is defined as any person, living or deceased, who a reporting entity, local health department, or the Department believes might be a case, but for whom it has not been established that the criteria necessary to become a case have been met.

(w) "Syndrome" is defined as a set of signs or symptoms that often occur together.

R386-702-3. Reportable Events.

(1) The Department declares the following events to be of concern to public health and reporting of all instances is required or authorized by Sections 26-6-6 and 26-23b.

(2) Events Reportable by All Entities.

(a) Acute flaccid myelitis;

(b) Adverse event resulting from smallpox vaccination (Vaccinia virus, Orthopox virus);

(c) Anaplasmosis (Anaplasma phagocytophilium);

(d) Anthrax (Bacillus anthracis) or anthrax-like illness caused by Bacillus cereus strains that express anthrax toxin genes;

(e) Antibiotic resistant organisms from any clinical specimen that meet the following criteria:

(i) Resistant to a carbapenem in:

(A) Acinetobacter species,

(B) Enterobacter species,

(C) Escherichia coli, or

(D) Klebsiella species,

(ii) Resistant to vancomycin in:

(A) Staphylococcus aureus (VRSA),

(iii) Demonstrated carbapenemase production in:

(A) Acinetobacter species,

(B) Enterobacter species,

(C) Escherichia coli,

(D) Klebsiella species, or

(E) Any other Enterobacteriaceae species.

(f) Arbovirus infection, including but not limited to:

(i) Chikungunya virus infection,

(ii) West Nile virus infection, and

(iii) Zika virus infection, including congenital;

(g) Babesiosis (Babesia spp.);

(h) Botulism (Clostridium botulinum);

(i) Brucellosis (Brucella spp.);

(j) Campylobacteriosis (Campylobacter spp.);

(k) Candida auris or Candida haemulonii from any body site;

(l) Chagas disease (Trypanosoma cruzi);

(m) Chancroid (Haemophilus ducreyi);

(n) Chickenpox (Varicella zoster virus, VZV, Human herpesvirus 3, HHV-3);

(o) Chlamydia (Chlamydia trachomatis);

(p) Coccidioidomycosis (Coccidioides spp.), also known as valley fever;

(q) Colorado tick fever (Colorado tick fever virus, Coltivirus spp.), also known as American mountain tick fever;

(r) Cryptosporidiosis (Cryptosporidium spp.);

(s) Cyclosporiasis (Cyclospora spp., including Cyclospora cayetanensis);

(t) Dengue fever (Dengue virus);

(u) Diphtheria (Corynebacterium diphtheriae);

(v) Ehrlichiosis (Ehrlichia spp.);

(w) Encephalitis (bacterial, fungal, parasitic, protozoan, and viral);

(x) Shiga toxin-producing Escherichia coli (STEC) infection;

(y) Giardiasis (Giardia lamblia), also known as beaver fever;

(z) Gonorrhea (Neisseria gonorrhoeae), including sexually transmitted and ophthalmia neonatorum;

(aa) Haemophilus influenzae, invasive disease;

(bb) Hantavirus infection (Sin Nombre virus);

(cc) Hemolytic uremic syndrome, postdiarrheal;

(dd) Hepatitis, viral, including but not limited to:

(i) Hepatitis A,

(ii) Hepatitis B (acute, chronic, and perinatal),

(iii) Hepatitis C (acute, chronic, and perinatal),

(iv) Hepatitis D, and

(v) Hepatitis E;

(ee) Human immunodeficiency virus (HIV) infection, including acquired immune deficiency syndrome (AIDS) diagnosis;

(ff) Influenza virus infection:

(i) Associated with a hospitalization,

(ii) Associated with a death in a person under 18 years of age, or

(iii) Suspected or confirmed to be caused by a non-seasonal influenza strain;

(gg) Legionellosis (Legionella spp.), also known as Legionnaires' disease;

(hh) Leptospirosis (Leptospira spp.);

(ii) Listeriosis (Listeria spp., including Listeria monocytogenes);

(jj) Lyme disease (Borrelia burgdorferi, Borrelia mayonii);

(kk) Malaria (Plasmodium spp.);

(ll) Measles (Measles virus), also known as rubeola;

(mm) Meningitis (bacterial, fungal, parasitic, protozoan, and viral);

(nn) Meningococcal disease (Neisseria meningitidis), invasive;

(oo) Middle East Respiratory Syndrome (MERS);

(pp) Mumps (Mumps virus);

(qq) Mycobacterial infections, including:

(i) Tuberculosis (Mycobacterium tuberculosis complex),

(ii) Leprosy (Mycobacterium leprae), also known as Hansen's Disease,

(iii) All other mycobacterial infections (Mycobacterium spp.);

(rr) Pertussis (Bordetella pertussis);

(ss) Plague (Yersinia pestis);

(tt) Poliomyelitis (Poliovirus), paralytic and nonparalytic;

(uu) Psittacosis (Chlamydophila psittaci), also known as ornithosis;

(vv) Q fever (Coxiella burnetii);

(ww) Rabies (Rabies virus), human and animal;

(xx) Relapsing fever (Borrelia spp.), tick-borne and louse-borne;

(yy) Rubella (Rubella virus), including congenital syndrome;

(zz) Salmonellosis (Salmonella spp.);

(aaa) Severe acute respiratory syndrome, also known as SARS (SARS coronavirus or SARS-CoV);

(bbb) Shigellosis (Shigella spp.);

(ccc) Smallpox (Variola major and Variola minor);

(ddd) Spotted fever rickettsioses (Rickettsia spp.), including Rocky Mountain spotted fever (Rickettsia rickettsii);

(eee) Streptococcal disease, invasive, due to:

(i) Streptococcus pneumoniae,

(ii) Group A Streptococcus (Streptococcus pyogenes), and

(iii) Group B Streptococcus (Streptococcus agalactiae);

(fff) Syphilis (Treponema pallidum), including:

(i) all stages,

(ii) congenital, and

(iii) syphilitic stillbirths;

(ggg) Tetanus (Clostridium tetani);

(hhh) Toxic shock syndrome, staphylococcal (Staphylococcus aureus) or streptococcal (Streptococcus pyogenes);

(iii) Transmissible spongiform encephalopathies (prion diseases), including Creutzfeldt-Jakob disease;

(jjj) Trichinellosis (Trichinella spp.);

(kkk) Tularemia (Francisella tularensis);

(lll) Typhoid (Salmonella typhi), cases and carriers;

(mmm) Vibriosis (Vibrio spp.), including Cholera (Vibrio cholerae);

(nnn) Viral hemorrhagic fevers, including but not limited to:

(i) Ebola fever (Ebolavirus spp.),

(ii) Lassa fever (Lassa virus), and

(iii) Marburg fever (Marburg virus);

(ooo) Yellow fever (Yellow fever virus).

(3) Perinatally Transmissible Conditions Reportable by All Entities.

(a) Pregnancy is a reportable event for the following communicable diseases, and reporting is required even if the communicable disease was reported to public health prior to the pregnancy:

(i) Hepatitis B infection;

(ii) Hepatitis C infection;

(iii) HIV infection;

(iv) Listeriosis;

(v) Rubella;

(vi) Syphilis infection; and

(vii) Zika virus infection.

(4) Antimicrobial Susceptibility Tests Reportable by All Entities.

(a) Full panel antimicrobial susceptibility test results, including minimum inhibitory concentration and results suppressed to the ordering clinician, are reportable when performed on the following organisms:

(i) Candida auris/Candida haemulonii from any body site;

(ii) Mycobacterium tuberculosis;

(iii) Neisseria gonorrhoeae;

(iv) Salmonella species;

(v) Shigella species; and

(vi) Streptococcus pneumoniae.

(vii) Organisms resistant to a carbapenem in:

(A) Acinetobacter species,

(B) Enterobacter species,

(C) Escherichia coli,

(D) Klebsiella species;

(viii) Organisms resistant to vancomycin in:

(A) Staphylococcus aureus (VRSA)

(b) All individual carbapenemase test results (positive, negative, equivocal, indeterminate), including the method used, are reportable when performed on the following organisms:

(i) Resistant to a carbapenem, or with demonstrated carbapenemase, in:

(A) Acinetobacter species,

(B) Enterobacter species,

(C) Escherichia coli, and

(D) Klebsiella species.

(b) Antiviral susceptibility test results; including nucleotide sequencing, genotyping, or phenotypic analysis; are reportable when performed on the following organisms:

(i) Human immunodeficiency virus (HIV).

(5) Unusual Events Reportable by All Entities.

(a) Unusual events include one or more cases or suspect cases of a communicable disease, condition, or syndrome considered:

(i) Rare, unusual, or new to Utah;

(ii) Previously controlled or eradicated;

(iii) Caused by an unidentified or newly identified organism;

(iv) Exposure or infection that may indicate a bioterrorism event with potential transmission to the public; or

(v) Any other infection not explicitly identified in Subsection R386-702-3(2) that public health considers a public health hazard.

(6) Outbreaks, Epidemics, or Unusual Occurrences of Events Reportable by All Entities.

(a) Entities shall report two or more cases or suspect cases, with or without an identified organism, including but not limited to:

(i) Gastrointestinal illnesses;

(ii) Respiratory illnesses;

(iii) Meningitis or encephalitis;

(iv) Infections caused by antimicrobial resistant organisms;

(v) Illnesses with suspected foodborne or waterborne transmission;

(vi) Illnesses with suspected ongoing transmission in any facility;

(vii) Infections that may indicate a bioterrorism event; or

(viii) Any other infections not explicitly identified in Subsection R386-702-3(2) that public health considers a public health hazard.

(b) Entities shall report increases or shifts in pharmaceutical sales that may indicate changes in disease trends; or

(7) Laboratory Results Reportable by Electronic Reporters.

(a) In addition to laboratory results set forth in Subsections R386-702-3(2) through R386-702-3(6), entities reporting electronically shall include the following laboratory results or laboratory results that provide presumptive evidence of the following communicable diseases:

(i) Influenza virus;

(ii) Norovirus infection;

(iii) Pseudomonas aeruginosa, resistant to a carbapenem, or with demonstrated carbapenemase production;

(iv) Staphylococcus aureus from a normally sterile site with methicillin testing performed, reported as either methicillin-susceptible Staphylococcus aureus (MSSA) or methicillin-resistant Staphylococcus aureus (MRSA); and

(v) Streptococcal disease, invasive due to all species.

(b) Entities reporting electronically shall include all laboratory results (positive, negative, equivocal, indeterminate) associated with the following tests or conditions:

(i) CD4+ T-Lymphocyte tests, regardless of known HIV status;

(ii) Chlamydia;

(iii) Clostridium difficile;

(iv) Cytomegalovirus (CMV), congenital (infants less than or equal to 12 months of age);

(v) Gonorrhea;

(vi) Hepatitis A;

(vii) Hepatitis B, including viral loads;

(viii) Hepatitis C, including viral loads;

(ix) HIV, including viral loads and confirmatory tests;

(x) Liver function tests, including ALT, AST, and bilirubin associated with a viral hepatitis case;

(xi) Lyme disease;

(xii) Respiratory syncytial virus (RSV);

(xiii) Syphilis;

(xiv) Tuberculosis; and

(xv) Zika virus.

(c) Entities reporting electronically shall report full panel antibiotic susceptibility test results, including minimum inhibitory concentration and results suppressed to the ordering clinician, are reportable when performed on the following organisms:

(i) Pseudomonas aeruginosa, resistant to a carbapenem, or with demonstrated carbapenemase.

(d) The Department may, by authority granted through Section 26-23b, identify additional reporting criteria when deemed necessary for the management of outbreaks or identification of exposures.

(e) Non-positive laboratory results reported for the events identified in Subsection R386-702-3(7)(b) will be used for the following purposes as authorized in Utah Health Code Subsections 26-1-30(2)(c), 26-1-30(2)(d), and 26-1-30(2)(f):

(i) To determine when a previously reported case becomes

non-infectious;

(ii) To identify newly acquired infections through identification of a seroconversion window; or

(iii) To provide information critical for assignment of a case status.

(f) Information associated with a non-positive laboratory result will be kept by the Department for a period of 18 months.

(i) At the end of the 18 month period, if the result has not been appended to an existing case, personal identifiers will be stripped and expunged from the result.

(ii) The de-identified result will be added to a de-identified, aggregate dataset.

(iii) The dataset will be kept for use by public health to analyze trends associated with testing patterns and case distribution, and identify and establish prevention and intervention efforts for at-risk populations.

(8) Authorized Reporting of Syndromes and Conditions.

(a) Reporting of encounters for the following syndromes and conditions is authorized by Chapter 26-23b, unless made mandatory by the declaration of a public health emergency:

(i) Respiratory illness, including but not limited to:

(A) Upper or lower respiratory tract infections,

(B) Difficulty breathing, or

(C) Adult respiratory distress syndrome;

(ii) Gastrointestinal illness, including but not limited to:

(A) Vomiting,

(B) Diarrhea, or

(C) Abdominal pain;

(iii) Influenza-like constitutional symptoms or signs;

(iv) Neurologic symptoms or signs indicating the possibility of meningitis, encephalitis, or unexplained acute encephalopathy or delirium;

(v) Rash illness;

(vi) Hemorrhagic illness;

(vii) Botulism-like syndrome;

(viii) Lymphadenitis;

(ix) Sepsis or unexplained shock;

(x) Febrile illness (illness with fever, chills or rigors);

(xi) Nontraumatic coma or sudden death; and

(xii) Other criteria specified by the Department as indicative of disease outbreaks or injurious exposures of uncertain origin.

(b) Reporting of encounters for syndromes and conditions not specified in Subsection R386-702-3(8)(a) is also authorized by Chapter 26-23b, unless made mandatory by the declaration of a public health emergency.

(c) Information included in the reporting of the events identified in Subsection R386-702-3(8)(a) and R386-702-3(8)(b) will be used for the following purposes:

(i) To support early identification and ruling out of public health threats, disasters, outbreaks, suspected incidents, and acts of bioterrorism;

(ii) To assist in characterizing population groups at greatest risk for disease or injury;

(iii) To support assessment of the severity and magnitude of possible threats; or

(iv) To satisfy syndromic surveillance objectives of the Federal Centers for Medicaid and Medicare Meaningful Use incentive program.

(9) Reporting Exceptions

(a) A university or hospital that conducts research studies exempt from reporting AIDS and HIV infection under Section 26-6-3.5 shall seek written approval of reporting exemption from the Department institutional review board prior to the study commencement.

(b) The university or hospital shall submit the following to the HIV Epidemiologist within 30 days of Department institutional review board approval:

(i) A summary of the research protocol, including funding sources and justification for requiring anonymity; and

(ii) Written approval from the Department institutional review board.

(c) The university or hospital shall submit a report that includes all of the indicators specified in Subsection 26-6-3.5(4)(a) to the HIV Epidemiologist annually during an ongoing research study.

(d) The university or hospital shall submit a final report that includes all of the indicators specified in Subsection 26-6-3.5(4)(a) to the HIV Epidemiologist within 30 days of the conclusion of the research study.

(e) Documents can be submitted to the HIV Epidemiologist by fax at (801) 538-9923 or by mail to 288 North 1460 West Salt Lake City, Utah 84116.

R386-702-4. Entities Required to Report.

(1) Section 26-6-6 lists those entities required to report cases or suspect cases of the reportable events set forth in Section R386-702-3. This includes:

(a) Health care providers, as defined in Section 78B-3-403;

(b) Health care facilities, as defined in Section 78B-3-403;

(c) Health care facilities operated by the federal government;

(d) Mental health facilities, as defined in Section 62A-15-602;

(e) Care facilities licensed through the Department of Human Services;

(f) Nursing care facilities and assisted living facilities, as defined in Section 26-21-2;

(g) Dispensaries;

(h) Clinics;

(i) Laboratories;

(j) Schools, as defined in Section 26-6-2;

(k) Childcare programs, as defined in Section 26-39-102; and

(l) Any individual with a knowledge of others who have a communicable disease.

(2) In addition, the following entities are required to report cases or suspect cases of the reportable events set forth in Section R386-702-3:

(a) Blood and plasma donation centers; and

(b) Correctional facilities

(3) When more than one entity is involved in the processing of a clinical specimen (receiving, forwarding, or analyzing); or the diagnosis, treatment, or care of a case or suspect case; all entities involved are required to report; even when diagnosis or testing is done outside of Utah.

(4) Health care entities may designate a single person or group of persons to report the events identified in Section R386-702-3 to public health on behalf of their health care providers or medical laboratories, as long as reporting complies with all requirements in this rule.

R386-702-5. Mandatory Submission of Clinical Material.

(1) Laboratories shall submit clinical material from all cases identified with organisms listed in Subsection R386-702-5(3) to the Utah Department of Health, Utah Public Health Laboratory (UPHL) within three working days of identification.

(a) Clinical material is defined as:

(i) A clinical isolate containing the organism for which submission of material is required; or

(ii) If an isolate is not available, material containing the organism for which submission of material is required, in the following order of preference:

(A) a patient specimen,

(B) nucleic acid, or

(C) other laboratory material.

(2) Laboratories submitting clinical material from cases

identified with organisms designated by UPHL as potential bioterrorism agents shall first notify UPHL via telephone immediately.

(a) UPHL can be contacted during business hours at (801) 965-2400, or after hours at (801) 560-6586, of all bioterrorism agents that are being submitted.

(3) Organisms mandated for standard clinical submission include:

(a) Antibiotic resistant organisms from any clinical specimen that meet the following criteria:

(i) Resistant to a carbapenemin:

(A) Acinetobacter species,

(B) Enterobacter species,

(C) Escherichia coli, or

(D) Klebsiella species,

(E) Pseudomonas aeruginosa,

(ii) Resistant to vancomycin in:

(A) Staphylococcus aureus (VRSA),

(iii) Demonstrated carbapenemase production in:

(A) Acinetobacter species,

(B) Enterobacter species,

(C) Escherichia coli,

(D) Klebsiella species,

(E) Any other Enterobacteriaceae species, or

(F) Pseudomonas aeruginosa.

(b) Campylobacter species;

(c) Candida auris or Candida haemulonii from any body site;

(d) Corynebacterium diphtheriae;

(e) Shiga toxin-producing Escherichia coli (STEC), including enrichment and/or MacConkey broths that tested positive by any method for Shiga toxin;

(f) Haemophilus influenzae, from normally sterile sites;

(g) Influenza A virus, unsubtypeable;

(h) Influenza virus (hospitalized cases only);

(i) Legionella species;

(j) Listeria monocytogenes;

(k) Measles (rubeola) virus;

(l) Mycobacterium tuberculosis complex;

(m) Neisseria meningitidis, from normally sterile sites;

(n) Salmonella species;

(o) Shigella species;

(p) Vibrio species;

(q) West Nile virus;

(r) Yersinia species;

(s) Zika virus; and

(t) Any organism implicated in an outbreak when instructed by authorized local or state health department personnel.

(4) Organisms mandated for bioterrorism clinical submission include:

(a) Bacillus anthracis;

(b) Brucella species;

(c) Clostridium botulinum;

(d) Francisella tularensis; and

(e) Yersinia pestis.

(5) Submission of clinical material does not replace the requirement for laboratories to report the event to public health as defined in Sections R386-702-6 and R386-702-7.

(6) For additional information on this process, contact UPHL at (801) 965-2400.

R386-702-6. Reporting Criteria.

(1) Manual Reporting

(a) Reporting Timeframes

(i) Entities shall report immediately reportable events by telephone as soon as possible, but no later than 24 hours after identification. Events designated as immediately reportable by the Department include cases and suspect cases of:

(A) Anthrax or anthrax-like illness;

(B) Botulism, excluding infant botulism;

(C) Cholera;

(D) Diphtheria;

(E) Haemophilus influenzae, invasive disease;

(F) Hepatitis A;

(G) Influenza infection suspected or confirmed to be caused by a non-seasonal influenza strain;

(H) Measles;

(I) Meningococcal disease, invasive;

(J) Middle East Respiratory Syndrome (MERS);

(K) Plague;

(L) Poliovirus, paralytic and nonparalytic;

(M) Rabies, human and animal;

(N) Rubella, excluding congenital syndrome;

(O) Severe acute respiratory syndrome (SARS);

(P) Smallpox;

(Q) Staphylococcus aureus from any clinical specimen that is resistant to vancomycin;

(R) Transmissible spongiform encephalopathies (prion diseases), including Creutzfeldt-Jakob disease;

(S) Tuberculosis;

(T) Tularemia;

(U) Typhoid, cases and carriers;

(V) Viral hemorrhagic fevers;

(W) Yellow fever; or

(X) Any event described in Subsections R386-702-3(5) or R386-702-3(6).

(ii) Entities shall report all events in Subsections R386-702-3(2) through R386-702-3(6) not required to be reported immediately within three working days from the time of identification.

(b) Methods for Reporting

(i) Entities reporting manually shall send reports to either a local health department or the Department by phone, secured fax, secured email, or mail.

(ii) Contact information for the Department is as follows:

(A) Phone: (801) 538-6191 during business hours, or 888-EPI-UTAH (888-374-8824) after hours;

(B) Secured fax: (801) 538-9923;

(C) Secured email: reporting@utah.gov (contact the Department at (801) 538-6191 for information on this option); and

(D) Mail: 288 North 1460 West Salt Lake City, Utah 84116.

(iii) A confidential morbidity report form is available at: http://health.utah.gov/epi/reporting/.

(iv) The Department incorporates by reference version 2.1 of the Utah Reporting Specifications for Communicable Diseases, which identifies individual laboratory tests that shall be reported to the Department by manual reporting entities.

(2) Electronic Reporting

(a) Reporting Timeframes

(i) All entities that report electronically shall report laboratory results within 24 hours of finalization.

(A) Entities can choose to report in real-time (as each report is released) or batch reports.

(B) Entities reporting electronically shall report preliminary positive results for the immediately reportable events specified in Subsection R386-702-6(1)(a)(i).

(b) Methods for Reporting

(i) All laboratories that identify cases or suspect cases shall report to the Department through electronic laboratory reporting, in a manner approved by the Department. Reportable events shall be identified by automated computer algorithms.

(A) Laboratories may substitute electronic reporting if electronic laboratory reporting is not available, with permission from the Department, and in a manner approved by the Department.

(B) Hospitals reporting electronically shall use HL7 2.5.1 message structure, and standard LOINC and SNOMED terminology in accordance with Meaningful Use regulations.

(C) Laboratories reporting electronically shall use HL7 2.3.1 or 2.5.1 message structure, and appropriate LOINC codes designating the test performed.

(D) Entities reporting electronically shall submit all local vocabulary codes with translations to the Division of Disease Control and Prevention Informatics Program, if applicable.

(E) The Department incorporates by reference version 1.2 of the Utah Electronic Laboratory Reporting Specifications for Communicable Diseases, which identifies individual laboratory tests that shall be reported to the Department by electronic reporting entities.

(F) For additional information on this process, refer to https://health.utah.gov/phaccess/public/elr/ or contact the Division of Disease Control and Prevention Informatics Program by phone (801-538-6191) or email (edx@utah.gov).

(ii) Electronic case reporting is an authorized method of reporting to the Department. For additional information on this process, contact the Division of Disease Control and Prevention Informatics Program by phone (801-538-6191) or email (edx@utah.gov).

(A) Entities reporting via electronic case reporting may send all clinical information for an encounter that meets criteria for reporting to public health.

(3) Syndromic Reporting

(a) Reporting Timeframes

(i) Entities reporting syndromes or conditions identified in Subsection R386-702-3(8) shall report as soon as practicable using a schedule approved by the Department.

(b) Methods for Reporting

(i) For information on reporting syndromic data, refer to https://health.utah.gov/phaccess/public/SS/ or contact the Division of Disease Control and Prevention Informatics Program by phone (801-538-6191) or email (edx@utah.gov).

R386-702-7. Required Information.

(1) Entities shall include as much of the following information as is known when reporting events specified in Subsections R386-702-3(2) through R386-702-3(6) to public health:

(a) Patient information:

(i) Full name;

(ii) Date of birth;

(iii) Address, including street address, city, state, and zip code;

(iv) Telephone number;

(v) Gender;

(vi) Race and ethnicity;

(vii) Date of onset;

(viii) Hospitalization status and date of admission; and

(ix) Pregnancy status and estimated due date.

(b) Diagnostic information:

(i) Name of the diagnostic facility;

(ii) Address, including street address, city, state, and zip code; of the diagnostic facility;

(iii) Telephone number of the diagnostic facility;

(iv) Full name of the ordering or diagnosing health care provider;

(v) Address, including street address, city, state, and zip code; of the ordering or diagnosing health care provider; and

(vi) Telephone number of the ordering or diagnosing health care provider.

(c) Reporter information:

(i) Full name of the person reporting;

(ii) Name of the facility reporting; and

(iii) Telephone number of the person or facility reporting.

(d) Laboratory testing information:

(i) Name of the laboratory performing the test;

(ii) The laboratory's name for, or description of, the test;

(iii) Specimen source;

(iv) Specimen collection date;

(v) Testing results;

(vi) Test reference range; and

(vii) Test status (e.g. preliminary, final, amended and/or corrected).

(2) Entities shall submit reports that are clearly legible and do not contain any internal codes or abbreviations to the Department.

(3) Entities submitting or forwarding a specimen for testing using a laboratory test identified in the Utah Electronic Laboratory Reporting Specifications for Communicable Diseases shall include the patient's address, so that the performing laboratory can report results to the appropriate public health agency.

(a) If the patient's address is not known by the submitting or forwarding entity, the submitting or forwarding entity shall provide the performing laboratory with the name and address of the facility where the specimen originated.

(4) Entities shall reference http://health.utah.gov/epi/reporting, or contact the Department at (801) 538-6191, for additional reporting specifications, including technical documents, reporting forms, and protocols.

(5) Full reporting of all relevant patient information is authorized when reporting events listed in Subsection R386-702-3(8) to public health.

(a) Entities shall include in reports at least the following information, if known:

(i) Name of the facility;

(ii) A patient identifier;

(iii) Date of visit;

(iv) Time of visit;

(v) Patient's age;

(vi) Patient's gender;

(vii) Zip code of patient's residence;

(viii) Chief complaint(s), reason for visit, and/or diagnosis; and

(ix) Whether the patient was admitted to the hospital.

R386-702-8. Confidentiality of Reports.

(1) All reports required by this rule are confidential and are not open to public inspection. All information collected pursuant to this rule shall not be released or made public, except as provided by Section 26-6-27. Penalties for violation of confidentiality are prescribed in Section 26-6-29.

(2) Nothing in this rule precludes the discussion of case information with an attending clinician or public health workers.

(3) Good Samaritans

(a) The Department or local health department shall disclose communicable disease-related information regarding the person who was assisted to the medical provider of a Good Samaritan when that medical provider submits a request to the Department or local health department. The request must include:

(i) Information regarding the occurrence of the accident, fire, or other life-threatening emergency;

(ii) A description of the exposure risk to the Good Samaritan; and

(iii) Contact information for the Good Samaritan and their medical provider.

(b) The Department or local health department will ensure that the disclosed information:

(i) Includes enough detail to allow for appropriate education and follow-up to the Good Samaritan; and

(ii) Ensures confidentiality is maintained for the person who was aided.

(c) No identifying information will be shared with the

Good Samaritan or their medical provider regarding the person who was assisted. The Good Samaritan shall receive written information warning them that information regarding the person who was assisted is protected by state law.

R386-702-9. Non-Compliance with Reporting Regulations.

(1) Any person who violates any provision of Section R386-702 may be assessed a penalty as provided in Section 26-23-6.

(a) Willful non-compliance may result in the Department working with other agencies to incur penalties which may include loss of accreditation or licensure.

(2) Records maintained by reporting entities are subject to review by Department personnel to assure the completeness and accuracy of reporting.

(3) If public health conducts a surveillance project, such as assessing the completeness of case finding or assessing another measure of data quality, the Department may, at its discretion, waive any penalties for participating entities if cases are found that were not originally reported for whatever reason.

R386-702-10. Information Necessary for Public Health Investigation and Surveillance.

(1) Reporting entities shall provide the Department or local health department with any records or other materials requested by public health that are necessary to conduct a thorough investigation.

(a) This includes, but is not limited to, medical records, additional laboratory testing results, treatment and vaccination history, clinical material, or contact information for cases, suspect cases, or persons potentially exposed.

(b) The Department or local health department shall be granted on-site access to a facility, when such access is critical to a public health investigation.

R386-702-11. General Measures for the Control of Communicable Diseases.

(1) The local health department shall maintain all reportable disease records as needed to enforce Chapter 6 of the Health Code and this rule, or as requested by the Utah Department of Health.

(2) General Control Measures for Reportable Diseases.

(a) The local health department shall, when an unusual or rare disease occurs in any part of the state or when any disease becomes so prevalent as to endanger the state as a whole, contact the Bureau of Epidemiology, Utah Department of Health for assistance, and shall cooperate with the representatives of the Utah Department of Health.

(b) The local health department shall investigate and control the causes of epidemic, infectious, communicable, and other disease affecting the public health. The local health department shall also provide for the detection, reporting, prevention, and control of communicable, infectious, and acute diseases that are dangerous or important or that may affect the public health. The local health department may require physical examination and measures to be performed as necessary to protect the health of others.

(c) If, in the opinion of the local health officer it is necessary or advisable to protect the public's health that any person shall be kept from contact with the public, the local health officer shall establish, maintain and enforce involuntary treatment, isolation and quarantine as provided by Section 26-6-4. Control measures shall be specific to the known or suspected disease agent. Guidance is available from the Bureau of Epidemiology, Utah Department of Health or official reference listed in R386-702-18.

(3) Prevention of the Spread of Disease From a Case.

The local health department shall take action and measures as may be necessary within the provisions of Section 26-6-4; Title 26, Chapter 6b; and this rule, to prevent the spread of any communicable disease, infectious agent, or any other condition which poses a public health hazard. Action shall be initiated upon discovery of a case or upon receipt of notification or report of any disease.

(4) Prevention of the Spread of Disease or Other Public Health Hazard.

A case, suspected case, carrier, contact, other person, or entity (e.g. facility, hotel, organization) shall, upon request of a public health authority, promptly cooperate during:

(a) An investigation of the circumstances or cause of a case, suspected case, outbreak, or suspected outbreak.

(b) The carrying out of measures for prevention, suppression, and control of a public health hazard, including, but not limited to, procedures of restriction, isolation, and quarantine.

(5) Public Food Handlers.

A person known to be infected with a communicable disease that can be transmitted by food or drink products, or who is suspected of being infected with such a disease, may not engage in the commercial handling of food or drink products, or be employed on any premises handling those types of products, unless those products are packaged off-site and remain in a closed container until purchased for consumption, until the person is determined by the local health department to be free of communicable disease, or incapable of transmitting the infection.

(6) Communicable Diseases in Places Where Food or Drink Products are Handled or Processed.

If a case, carrier, or suspected case of a disease that can be conveyed by food or drink products is found at any place where food or drink products are handled or offered for sale, or if a disease is found or suspected to have been transmitted by these food or drink products, the local health department may immediately prohibit the sale, or removal of drink and all other food products from the premises. Sale or distribution of food or drink products from the premises may be resumed when measures have been taken to eliminate the threat to health from the product and its processing as prescribed by R392-100.

(7) Request for State Assistance.

If a local health department finds it is not able to completely comply with this rule, the local health officer or his representative shall request the assistance of the Utah Department of Health. In such circumstances, the local health department shall provide all required information to the Bureau of Epidemiology. If the local health officer fails to comply with the provisions of this rule, the Utah Department of Health shall take action necessary to enforce this rule.

(8) Approved Laboratories.

Laboratory analyses that are necessary to identify the causative agents of reportable diseases or to determine adequacy of treatment of patients with a disease shall be ordered by the physician or other health care provider to be performed in or referred to a laboratory holding a valid certificate under the Clinical Laboratory Improvement Amendments of 1988.

R386-702-12. Special Measures for Control of Rabies.

(1) Rationale of Treatment.

A physician must evaluate individually each exposure to possible rabies infection. The physician shall also consult with local or state public health officials if questions arise about the need for rabies prophylaxis.

(2) Management of Biting Animals.

(a) A healthy dog, cat, or ferret that bites a person shall be confined and observed at least daily for ten days from the date of bite, regardless of vaccination status, as specified by local animal control ordinances. It is recommended that rabies vaccine not be administered during the observation period. Such animals shall be evaluated by a veterinarian at the first

sign of illness during confinement. A veterinarian or animal control officer shall immediately report any illness in the animal to the local health department. If signs suggestive of rabies develop, a veterinarian or animal control officer shall direct that the animal be euthanized, its head removed, and the head shipped under refrigeration, not frozen, for examination of the brain by a laboratory approved by the Utah Department of Health.

(b) If the dog, cat, or ferret shows no signs of rabies or illness during the ten day period, the veterinarian or animal control officer shall direct that the unvaccinated animal be vaccinated against rabies at the owner's expense before release to the owner. If a veterinarian is not available, the animal may be released, but the owner shall have the animal vaccinated within 72 hours of release. If the dog, cat, or ferret was appropriately vaccinated against rabies before the incident, the animal may be released from confinement after the 10-day observation period with no further restrictions.

(c) Any stray or unwanted dog, cat, or ferret that bites a person may be euthanized immediately by a veterinarian or animal control officer, if permitted by local ordinance, and the head submitted, as described in R386-702-12(2)(a), for rabies examination. If the brain is negative by fluorescent-antibody examination for rabies, one can assume that the saliva contained no virus, and the person bitten need not be treated.

(d) Wild animals include raccoons, skunks, coyotes, foxes, bats, the offspring of wild animals crossbred to domestic dogs and cats, and any carnivorous animal other than a domestic dog, cat, or ferret.

(e) Signs of rabies in wild animals cannot be interpreted reliably. If a wild animal bites or scratches a person, the person or attending medical personnel shall notify an animal control or law enforcement officer. A veterinarian, animal control officer or representative of the Division of Wildlife Resources shall kill the animal at once, without unnecessary damage to the head, and submit the brain, as described in R386-702-12(2)(a), for examination for evidence of rabies. If the brain is negative by fluorescent-antibody examination for rabies, one can assume that the saliva contained no virus, and the person bitten need not be treated.

(f) Rabbits, opossums, squirrels, chipmunks, rats, and mice are rarely infected and their bites rarely, if ever, call for rabies prophylaxis or testing. Unusual exposures to any animal should be reported to the local health department or the Bureau of Epidemiology, Utah Department of Health.

(g) When rare, valuable, captive wild animals maintained in zoological parks approved by the United States Department of Agriculture or research institutions, as defined by Section 26-26-1, bite or scratch a human, the Bureau of Epidemiology, Utah Department of Health shall be notified. The provisions of subsection R386-702-12(2)(e) may be waived by the Bureau of Epidemiology, Utah Department of Health if zoological park operators or research institution managers can demonstrate that the following rabies control measures are established:

(i) Employees who work with the animal have received preexposure rabies immunization.

(ii) The person bitten by the animal voluntarily agrees to accept postexposure rabies immunization provided by the zoological park or research facility.

(iii) The director of the zoological park or research facility shall direct that the biting animal be held in complete quarantine for a minimum of four months for dogs and cats, and six months for ferrets. Quarantine requires that the animal be prohibited from direct contact with other animals or humans.

(h) Any animal bitten or scratched by a wild, carnivorous animal or a bat that is not available for testing shall be regarded as having been exposed to rabies. The animal shall be placed in a strict quarantine for four months for dogs and cats, or six months for ferrets.

(i) For maximum protection of the public health, unvaccinated dogs, cats, and ferrets bitten or scratched by a confirmed or suspected rabid animal shall be euthanized immediately by a veterinarian or animal control officer. If the owner is unwilling to have the animal euthanized, the local health officer shall order that the animal be held in strict isolation in a municipal or county animal shelter or a veterinary medical facility approved by the local health department, at the owner's expense, for at least four months for dogs and cats, and six months for ferrets. The animal shall be vaccinated one month before being released. If any illness suggestive of rabies develops in the animal, the veterinarian or animal control officer shall immediately report the illness to the local health department and the veterinarian or animal control officer shall direct that the animal be euthanized and the head shall be handled as described in subsection R386-702-12(2)(a).

(j) Dogs, cats, and ferrets that are currently vaccinated and are bitten by rabid animals, shall be revaccinated immediately by a veterinarian and confined and observed by the animal's owner for 45 days. If any illness suggestive of rabies develops in the animal, the owner shall report immediately to the local health department and the animal shall be euthanized by a veterinarian or animal control officer and the head shall be handled as described in subsection R386-702-12(2)(a).

(k) Livestock exposed to a rabid animal and currently vaccinated with a vaccine approved by the United States Department of Agriculture for that species shall be revaccinated immediately by a veterinarian and observed by the owner for 45 days. Unvaccinated livestock shall be slaughtered immediately. If the owner is unwilling to have the animal slaughtered, the animal shall be kept under close observation by the owner for six months.

(l) Unvaccinated animals other than dogs, cats, ferrets, and livestock bitten by a confirmed or suspected rabid animal shall be euthanized immediately by a veterinarian or animal control officer.

(3) Testing Fees at Utah Public Health Laboratory (UPHL).

(a) Animals being submitted to UPHL for rabies testing must follow criteria defined in The Compendium of Animal Rabies Prevention and Control to be eligible for testing without a fee. Testing of animals that fit this criteria will be eligible for a waived fee for testing. Testing of animals that do not meet this criteria will incur a testing fee as set forth by UPHL.

(b) The following situations will not incur a rabies testing fee if testing is ordered for them through UPHL:

(i) Any bat in an instance where a person or animal has had an exposure, or reasonable probability of exposure, including, but not limited to: known bat bites, exposure to bat saliva, a bat found in a room with a sleeping person or unattended child, or a bat found near a child or mentally impaired or intoxicated person.

(ii) Dogs, cats, or ferrets, regardless of rabies vaccination status, if signs suggestive of rabies are documented in them.

(iii) Wild mammals and hybrids that expose persons, pets, or livestock (e.g., skunks, foxes, coyotes, and raccoons) may be tested.

(iv) Livestock may be tested if signs suggestive of rabies are documented.

(v) UDOH Bureau of Epidemiology staff are available to discuss additional situations that may warrant testing at (801) 538-6191.

(c) The following situations will incur a $95 testing fee if testing is ordered for them through UPHL:

(i) Any stray with unknown or undocumented vaccination history that exposes a person, if signs suggestive of rabies are not documented, or if the animal has not been confined and observed for at least 10 days.

(ii) Dogs, cats, and ferrets: currently vaccinated animals

that expose a person, if signs suggestive of rabies are not documented, or animals have not been confined and observed for at least 10 days.

(iii) Regardless of rabies vaccination status, a healthy dog, cat, or ferret that has not exposed a person.

(iv) Small rodents (e.g., rats, mice, squirrels, chipmunks, voles, or moles) and lagomorphs (rabbits and hares).

(v) Incomplete paperwork accompanying the sample will also result in a fee for testing; a thorough description of the situation must be included with each sample submission.

(vi) UDOH Bureau of Epidemiology staff are available to discuss additional situations that may not warrant testing at (801) 538-6191.

(d) If the submitting party feels they are charged inappropriately for rabies testing, they may send a letter describing the situation and requesting a waiver for fees to the: Utah Department of Health, Bureau of Epidemiology, P.O. Box 142104, Salt Lake City, UT 84114, attention: Zoonotic Diseases Epidemiologist. Information may be submitted electronically via email to: epi@utah.gov, with a note in the subject line "Attention: Zoonotic Diseases Epidemiologist".

(i) The submitting party has 30 days from receipt of the testing fee invoice to file an appeal. The letter must include copies of the original paperwork that was submitted, and a copy of the invoice received, for a waiver to be considered.

(ii) UDOH and UPHL have 30 days to review information after receipt of an appeal request to make an official decision and notify the submitter.

(iii) UDOH Bureau of Epidemiology staff are available to discuss questions about testing fees and the appeal process at (801) 538-6191.

(4) Measures for Standardized Rabies Control Practices.

(a) Humans requiring either pre- or post-exposure rabies prophylaxis shall be treated in accordance with the recommendations of the U.S. Public Health Service Immunization Practices Advisory Committee, as adopted and incorporated by reference in R386-702-18(2). A copy of the recommendations shall be made available to licensed medical personnel, upon request to the Bureau of Epidemiology, Utah Department of Health.

(b) A physician or other health care provider that administers rabies vaccine shall immediately report all serious systemic neuroparalytic or anaphylactic reactions to rabies vaccine through the Vaccine Adverse Event Reporting System (VAERS).

(c) The Compendium of Animal Rabies Prevention and Control, as adopted and incorporated by reference in R386-702-18(5), is the reference document for animal vaccine use.

(d) A county, city, town, or other political subdivision that requires licensure of animals shall also require rabies vaccination as a prerequisite to obtaining a license.

(e) Animal rabies vaccinations are valid only if performed by or under the direction of a licensed veterinarian in accordance with the Compendium of Animal Rabies Prevention and Control.

(f) All agencies and veterinarians administering vaccine shall document each vaccination on the National Association of State Public Health Veterinarians (NASPHV) form number 51, Rabies Vaccination Certificate, which can be obtained from vaccine manufacturers. The agency or veterinarian shall provide a copy of the report to the animal's owner. Computer-generated forms containing the same information are also acceptable.

(g) Animal rabies vaccines may be sold or otherwise provided only to licensed veterinarians or veterinary biologic supply firms. Animal rabies vaccine may be purchased by the Utah Department of Health and the Utah Department of Agriculture.

(5) Measures to Prevent or Control Rabies Outbreaks.

(a) The most important single factor in preventing human rabies is the maintenance of high levels of immunity in the pet dog, cat, and ferret populations through vaccination.

(i) All dogs, cats, and ferrets in Utah should be immunized against rabies by a licensed veterinarian; and

(ii) Local governments should establish effective programs to ensure vaccination of all dogs, cats, and ferrets and to remove strays and unwanted animals.

(b) If the Utah Department of Health determines that a rabies outbreak is present in an area of the state, the Utah Department of Health may require that:

(i) all dogs, cats, and ferrets in that area and adjacent areas be vaccinated or revaccinated against rabies as appropriate for each animal's age;

(ii) any such animal be kept under the control of its owner at all times until the Utah Department of Health declares the outbreak to be resolved;

(iii) an owner who does not have an animal vaccinated or revaccinated surrender the animal for confinement and possible destruction; and

(iv) such animals found at-large be confined and possibly destroyed.

R386-702-13. Special Measures for Control of Typhoid.

(1) Because typhoid control measures depend largely on sanitary precautions and other health measures designed to protect the public, the local health department shall investigate each case of typhoid and strictly manage the infected individual according to the following outline:

(2) Cases: Standard precautions are required during hospitalization. Use contact precautions for diapered or incontinent patients for the duration of illness. Hospital care is desirable during acute illness. Release of the patient from supervision by the local health department shall be based on three or more negative cultures of feces (and of urine in patients with schistosomiasis) taken at least 24 hours apart. Cultures must have been taken at least 48 hours after antibiotic therapy has ended and not earlier than one month after onset of illness as specified in R386-702-13(6). If any of these cultures is positive, repeat cultures at intervals of one month during the 12-month period following onset until at least three consecutive negative cultures are obtained as specified in R386-702-13(6). The patient shall be restricted from food handling, child care, and from providing patient care during the period of supervision by the local health department.

(3) Contacts: Administration of typhoid vaccine is recommended for all household members of known typhoid carriers. Household and close contacts of a carrier shall be restricted from food handling, child care, and patient care until two consecutive negative stool specimens, taken at least 24 hours apart, are submitted, or when approval is granted by the local health officer according to local jurisdiction.

(4) Carriers: If a laboratory or physician identifies a carrier of typhoid, the attending physician shall immediately report the details of the case by telephone to the local health department or the Bureau of Epidemiology, Utah Department of Health using the process described in R386-702-6. Each infected individual shall submit to the supervision of the local health department. Carriers are prohibited from food handling, child care, and patient care until released in accordance with R386-702-13(4)(a) or R386-702-13(4)(b). All reports and orders of supervision shall be kept confidential and may be released only as allowed by Subsection 26-6-27(2)(c).

(a) Convalescent Carriers: Any person who harbors typhoid bacilli for three but less than 12 months after onset is defined as a convalescent carrier. Release from occupational and food handling restrictions may be granted at any time from three to 12 months after onset, as specified in R386-702-13(6).

(b) Chronic Carriers: Any person who continues to excrete typhoid bacilli for more than 12 months after onset of

typhoid is a chronic carrier. Any person who gives no history of having had typhoid or who had the disease more than one year previously, and whose feces or urine are found to contain typhoid bacilli is also a chronic carrier.

(c) Other Carriers: If typhoid bacilli are isolated from surgically removed tissues, organs, including the gallbladder or kidney, or from draining lesions such as osteomyelitis, the attending physician shall report the case to the local health department or the Bureau of Epidemiology, Utah Department of Health. If the person continues to excrete typhoid bacilli for more than 12 months, he is a chronic carrier and may be released after satisfying the criteria for chronic carriers in R386-702-13(6).

(5) Carrier Restrictions and Supervision: The local health department shall report all typhoid carriers to the Bureau of Epidemiology, and shall:

(a) Require the necessary laboratory tests for release;

(b) Issue written instructions to the carrier;

(c) Supervise the carrier.

(6) Requirements for Release of Convalescent and Chronic Carriers: The local health officer or his representative may release a convalescent or chronic carrier from occupational and food handling restrictions only if at least one of the following conditions is satisfied:

(a) For carriers without schistosomiasis, three consecutive negative cultures obtained from fecal specimens authenticated by the attending physician, hospital personnel, laboratory personnel, or local health department staff taken at least one month apart and at least 48 hours after antibiotic therapy has stopped;

(b) for carriers with schistosomiasis, three consecutive negative cultures obtained from both fecal and urine specimens authenticated by the attending physician, hospital personnel, laboratory personnel, or local health department staff taken at least one month apart and at least 48 hours after antibiotic therapy has stopped;

(c) the local health officer or his representative determine that additional treatment such as cholecystectomy or nephrectomy has terminated the carrier state; or

(d) the local health officer or his representative determines the carrier no longer presents a risk to public health according to the evaluation of other factors.

R386-702-14. Special Measures for the Control of Ophthalmia Neonatorum.

Every physician or midwife practicing obstetrics or midwifery shall, within three hours of the birth of a child, instill or cause to be instilled in each eye of such newborn one percent silver nitrate solution contained in wax ampules, or tetracycline ophthalmic preparations or erythromycin ophthalmic preparations, as these are the only antibiotics of currently proven efficacy in preventing development of ophthalmia neonatorum. The value of irrigation of the eyes with normal saline or distilled water is unknown and not recommended.

R386-702-15. Special Measures for the Control of HIV/AIDS.

(1) Partner identification and notification:

(a) If an individual is tested and found to have an HIV infection, the Department and/or local health department shall provide partner services, linkage-to-care activities, and promote retention to HIV care.

(2) Definitions:

(a) "Partner" is defined as any individual, including a spouse, who has shared needles, syringes, or drug paraphernalia or who has had sexual contact with an HIV infected individual.

(b) "Spouse" is defined as any individual who is the marriage partner of that person at any time within the ten-year period prior to the diagnosis of HIV infection.

(c) "Linkage to care" is defined by a reported CD4+ T-Lymphocyte test and/or HIV viral load determination within three months of HIV positive diagnosis.

(d) "Retention to care" is defined by a reported CD4+ T-Lymphocyte test or HIV viral load determination once within a 12-month period.

(3) Partner services include:

(a) Confidential partner notification within 30 days of receiving a positive HIV result or when relevant additional information is found to aide in an investigation or case management;

(b) Prevention counseling;

(c) Testing for HIV;

(d) Providing recommendations for testing for other sexually transmitted diseases;

(e) Providing recommendations for hepatitis screening and vaccination;

(f) Treatment or linkage to medical care on an ongoing basis, as needed; and

(g) Linkage or referral to other prevention services and support.

(4) Re-engagement to care includes:

(a) Linkage to medical care, on an ongoing basis, as needed;

(b) Linkage or referral to other prevention services and support;

(c) Confidential partner notification, as needed;

(d) Prevention counseling;

(e) Providing recommendations for testing for other sexually transmitted diseases;

(f) Providing recommendations for hepatitis screening and vaccination;

(g) Medication adherence counseling; and

(h) Risk reduction counseling.

R386-702-16. Special Measures to Prevent Perinatal and Person-to-Person Transmission of Hepatitis B Infection.

(1) A licensed healthcare provider who provides prenatal care shall routinely test each pregnant woman for hepatitis B surface antigen (HBsAg) at an early prenatal care visit. The provisions of this section do not apply if the pregnant woman, after being informed of the possible consequences, objects to the test on the basis of religious or personal beliefs.

(2) The licensed healthcare provider who provides prenatal care shall repeat the HBsAg test during late pregnancy for those women who tested negative for HBsAg during early pregnancy, but who are at high risk based on:

(a) evidence of clinical hepatitis during pregnancy;

(b) injection drug use;

(c) occurrence during pregnancy or a history of a sexually transmitted disease;

(d) occurrence of hepatitis B in a household or close family contact; or

(e) the judgment of the healthcare provider.

(3) In addition to other reporting required by this rule, each positive HBsAg result detected in a pregnant woman shall be reported to the local health department or the Department, as specified in Section 26-6-6. That report shall indicate that the woman was pregnant at time of testing if that information is available to the reporting entity.

(4) A licensed healthcare provider who provides prenatal care shall document a woman's HBsAg test results, or the basis of the objection to the test, in the medical record for that patient.

(5) Every hospital and birthing facility shall develop a policy to assure that:

(a) when a pregnant woman is admitted for delivery, or for monitoring of pregnancy status, the result from a test for HBsAg performed on that woman during that pregnancy is available for review and documented in the hospital record;

(b) when a pregnant woman is admitted for delivery, if the woman's test result is not available to the hospital or birthing facility, the mother is tested for HBsAg as soon as possible, but before discharge from the hospital or birthing facility;

(c) if a pregnant woman who has not had prenatal care during that pregnancy is admitted for monitoring of pregnancy status only, and if the woman's test result is not available to the hospital or birthing facility, the mother is tested for HBsAg status before discharge from the hospital or birthing facility;

(d) positive HBsAg results identified by testing performed or documented during the hospital stay are reported as specified in this rule;

(e) infants born to HBsAg positive mothers receive hepatitis B immune globulin (HBIG) and hepatitis B vaccine, administered at separate injection sites, within 12 hours of birth;

(f) infants born to mothers whose HBsAg status is unknown receive hepatitis B vaccine within 12 hours of birth, and if the infant is born preterm with birth weight less than 2,000 grams, that infant also receives HBIG within 12 hours; and

(g) if at the time of birth the mother's HBsAg status is unknown and the HBsAg test result is later determined to be positive, that infant receives HBIG as soon as possible but within 7 days of birth.

(h) hepatitis B immune globulin (HBIG) administration and birth dose hepatitis B vaccine status of infants born to mothers who are HBsAg-positive are reported within 24 hours of delivery to the local health department and Utah Department of Health Immunization Program at (801) 538-9450.

(6) Local health departments shall perform the following activities or assure that they are performed:

(a) All females between the ages of 12 and 50 years at the time an HBsAg positive test result is reported will be screened for pregnancy status within one week of receipt of that lab result.

(b) Infants born to HBsAg positive mothers complete the hepatitis B vaccine series as specified in in the most current version of "The Red Book" as cited in R386-702-13 (4).

(c) Children born to HBsAg positive mothers are tested for HBsAg and antibody against hepatitis B surface antigen (anti-HBs) at 9 to 12 months of age (testing is done at least one month after the final dose of hepatitis B vaccine series is administered, and no earlier than 9 months of age) to monitor the success of therapy and identify cases of perinatal hepatitis B infection.

(i) Children who test negative for HBsAg and do not demonstrate serological evidence of immunity against hepatitis B when tested as described in (c) receive three additional vaccine doses and are retested as specified in the most current version of "The Red Book" as cited in R386-702-18 (4).

(d) HBsAg positive mothers are advised regarding how to reduce their risk of transmitting hepatitis B to others.

(e) Household members and sex partners of HBsAg positive mothers are evaluated to determine susceptibility to hepatitis B infection and if determined to be susceptible, are offered or advised to obtain vaccination against hepatitis B.

(i) All identified acute hepatitis B cases shall be investigated by the local health department, and identified household and sexual contacts shall be advised to obtain vaccination against hepatitis B.

(7) The provisions of subsections (5) and (6) do not apply if the pregnant woman or the child's guardian, after being informed of the possible consequences, objects to any of the required procedures on the basis of religious or moral beliefs. The hospital or birthing facility shall document the basis of the objection.

(8) Prevention of transmission by individuals with chronic hepatitis B infection.

(a) The Department defines a chronic hepatitis B case as a person that is HBsAg positive, total antibody against hepatitis B core antigen (anti-HBc) positive (if performed) and IgM anti-HBc negative.

(b) An individual with chronic hepatitis B infection shall be advised regarding how to reduce the risk that the individual will transmit hepatitis B to others.

(c) Household members and sex partners of individuals with chronic hepatitis B infection shall be evaluated to determine susceptibility to hepatitis B infection, and if determined to be susceptible, shall be offered or advised to obtain vaccination against Hepatitis B.

R386-702-17. Public Health Emergency.

(1) Declaration of Emergency: With the Governor's and Executive Director's or in the absence of the Executive Director, his designee's, concurrence, the Department or a local health department may declare a public health emergency by issuing an order mandating reporting emergency illnesses or health conditions specified in sections R386-702-3 for a reasonable time.

(2) For purposes of an order issued under this section and for the duration of the public health emergency, the following definitions apply.

(a) "emergency center" means:

(i) a health care facility licensed under the provisions of Chapter 26-21 that operates an emergency department; or

(ii) a clinic that provides emergency or urgent health care to an average of 20 or more persons daily.

(b) "encounter" means an instance of an individual presenting at the emergency center who satisfies the criteria in section R386-702-3(2); and

(c) "diagnostic information" means an emergency center's records of individuals who present for emergency or urgent treatment, including the reason for the visit, chief complaint, results of diagnostic tests, presenting diagnosis, and final diagnosis, including diagnostic codes.

(3) Reporting Encounters: The Department shall designate the fewest number of emergency centers as is practicable to obtain the necessary data to respond to the emergency.

(a) Designated emergency centers shall report using the process described in R386-702-6.

(b) An emergency center designated by the Department shall report the encounters to the Department by:

(i) allowing Department representatives or agents, including local health department representatives, to review its diagnostic information to identify encounters during the previous day; or

(ii) reviewing its diagnostic information on encounters during the previous day and reporting all encounters by 9:00 a.m. the following day, or

(iii) identifying encounters and submitting that information electronically to the Department, using a computerized analysis method, and reporting mechanism and schedule approved by the Department; or

(iv) by other arrangement approved by the Department.

(4) For purposes of epidemiological and statistical analysis, the emergency center shall report on encounters during the public health emergency that do not meet the definition for a reportable emergency illness or health condition. The report shall be made using the process described in R386-702-6 and shall include the following information for each such encounter:

(a) facility name;

(b) date of visit;

(c) time of visit;

(d) patient's age;

(e) patient's sex;

(f) patient's zip code for patient's residence.

(5) If either the Department or a local health department collects identifying health information on an individual who is

the subject of a report made mandatory under this section, it shall destroy that identifying information upon the earlier of its determination that the information is no longer necessary to carry out an investigation under this section or 180 days after the information was collected. However, the Department and local health departments shall retain identifiable information gathered under other sections of this rule or other legal authority.

(6) Reporting on encounters during the public health emergency does not relieve a reporting entity of its responsibility to report under other sections of this rule or other legal authority.

R386-702-18. Official References.

All treatment and management of individuals and animals who have or are suspected of having a communicable or infectious disease that must be reported pursuant to this rule shall comply with the following documents, which are adopted and incorporated by reference:

(1) American Public Health Association. "Control of Communicable Diseases Manual". 20th ed., Heymann, David L., editor, 2015.

(2) Centers for Disease Control and Prevention. "Human Rabies Prevention---United States, 2008: Recommendations of the Advisory Committee on Immunization Practices." Morbidity and Mortality Weekly Report. 57 (RR03) (2008):1-26, 28.

(3) National Association of State Public Health Veterinarians Committee. "Compendium of Animal Rabies Prevention and Control, 2016." Nasphv.org. National Association of State Public Health Veterinarians, 18 October 2016. Web. http://nasphv.org/Documents/NASPHVRabiesCompendium.pdf

(4) American Academy of Pediatrics. "Red Book: 2018-2021 Report of the Committee on Infectious Diseases" 30th Edition. Elk Grove Village, IL, American Academy of Pediatrics; 2018.

(5) National Association of State Public Health Veterinarians Animal Contact Compendium Committee 2017. "Compendium of Measures to Prevent Disease Associated with Animals in Public Settings, 2017." Journal of the American Veterinary Medicine Association 243 (2017): 1269-292.

KEY: communicable diseases, quarantines, rabies, rules and procedures

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Notice of Continuation April 15, 2016	**26-6-3**
	26-23b

R414. Health, Health Care Financing, Coverage and Reimbursement Policy.
R414-200. Non-Traditional Medicaid Health Plan Services.
R414-200-1. Introduction and Authority.

This rule lists the services under the Non-Traditional Medicaid Health Plan (NTHP). This plan is authorized by a waiver of federal Medicaid requirements approved by the federal Center for Medicare and Medicaid Services and allowed under Section 1115 of the Social Security Act effective January 1, 1999. This rule is authorized by Title 26, Chapter 18, UCA.

R414-200-2. Definitions.

The definitions in Rule R414-1 apply to this rule.

R414-200-3. Services Available.

(1) To meet the requirements of 42 CFR 431.107, the Department contracts with each provider who furnishes services under the NTHP.

(a) By signing a provider agreement with the Department, the provider agrees to follow the terms incorporated into the provider agreements, including policies and procedures, provider manuals, Medicaid Information Bulletins, and provider letters.

(b) By signing an application for Medicaid coverage, the applicant agrees that the Department's obligation to reimburse for services is governed by contract between the Department and the provider.

(2) Medical or hospital services for which providers are reimbursed under the Non-Traditional Medicaid (NTM) Health Plan are limited by federal guidelines as set forth under Title XIX of the federal Social Security Act and Title 42 of the Code of Federal Regulations (CFR).

(3) The following services, as more fully described and limited in provider contracts, provider manuals, and administrative rules, are available to NTM Health Plan members:

(a) inpatient hospital services, provided by bed occupancy for 24 hours or more in an approved acute care general hospital under the care of a physician if the admission meets the established criteria for severity of illness and intensity of service;

(b) outpatient hospital services which are medically necessary diagnostic, therapeutic, preventive, or palliative care provided for less than 24 hours in outpatient departments located in or physically connected to an acute care general hospital;

(c) emergency services in dedicated hospital emergency departments;

(d) physician services provided directly by licensed physicians or osteopaths, or by licensed certified nurse practitioners, licensed certified nurse midwives, or physician assistants under appropriate supervision of the physician or osteopath;

(e) services associated with surgery or administration of anesthesia provided by physicians or licensed certified nurse anesthetists;

(f) vision care services by licensed ophthalmologists or licensed optometrists, within their scope of practice, limited to one annual eye examination or refraction and no eyeglasses;

(g) laboratory and radiology services provided by licensed and certified providers;

(h) dialysis to treat end-stage renal failure provided at a Medicare-certified dialysis facility;

(i) home health services defined as intermittent nursing care or skilled nursing care provided by a Medicare-certified home health agency;

(j) hospice services provided by a Medicare-certified hospice to terminally ill members (six month or less life expectancy) who elect palliative versus aggressive care;

(k) abortion and sterilization services to the extent permitted by federal and state law and meeting the documentation requirement of 42 CFR 440, Subparts E and F;

(l) organ transplants, limited to kidney, liver, cornea, bone marrow, stem cell, heart, and lung transplants;

(m) services provided in freestanding emergency centers, surgical centers and birthing centers;

(n) transportation services, limited to ambulance (ground and air) service for medical emergencies. NTM does not cover non-emergency transportation (including bus passes);

(o) preventive services, immunizations and health education activities and materials to promote wellness, prevent disease, and manage illness;

(p) family planning services provided by or authorized by a physician, certified nurse midwife, or nurse practitioner to the extent permitted by federal and state law, but not to include infertility drugs, in-vitro fertilization, and genetic counseling;

(q) pharmacy services provided by a licensed pharmacy;

(r) inpatient mental health services;

(s) outpatient mental health services;

(t) outpatient substance abuse services;

(u) hearing evaluations or assessments for hearing aids. NTM, however, will only cover hearing aids for congenital hearing loss;

(v) dental services as allowed in the Utah Medicaid State Plan, ATTACHMENT 3.1-A, Attachment #10;

(w) interpretive services if they are provided by entities under contract with the Department of Health to provide medical translation services for people with limited English proficiency and interpretive services for the deaf;

(x) physical therapy services provided by a licensed physical therapist if authorized by a physician, limited to 16 aggregated physical or occupational therapy visits per calendar year; and

(y) occupational therapy services provided for fine motor development, limited to 16 aggregated physical or occupational therapy visits per year.

(4) NTM does not cover the following:

(a) chiropractic services;

(b) speech-language pathology services;

(c) long-term care; and

(d) private duty nursing.

KEY: Medicaid, non-traditional, cost sharing
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R426. Health, Family Health and Preparedness, Emergency Medical Services.
R426-5. Emergency Medical Services Training, Endorsement, Certification, and Licensing Standards.
R426-5-100. Authority and Purpose.

(1) This rule is established under to provide uniform minimum standards to be met by those providing emergency medical services in the State of Utah; and for the training, certification, and licensing of individuals who provide emergency medical service and for those providing instructions and training to pre-hospital emergency medical care providers.

R426-5-200. Scope of Practice.

(1) The Department may license an individual as an EMR, EMT, AEMT, EMT-IA Paramedic, or EMD who meets the requirements in this rule.

(2) The Committee adopts as the standard for EMR, EMT, AEMT, EMT-IA, or Paramedic training and competency in the state, the United States Department of Transportation's National Emergency Medical Services Education Standards.

(3) An EMR, EMT, AEMT, or Paramedic may perform the skills as described in the EMS National Education Standards, to their level of licensure, as adopted in this section.

R426-5-300. EMS Individual Licensure for EMR, EMT, AEMT, EMT-IA, and Paramedic.

(1) The Department may license an EMR, EMT, EMT-IA, AEMT, or Paramedic for a two-year period.

(2) An individual who wishes to become licensed as a EMR, EMT, AEMT, EMT-IA, or Paramedic shall:

(a) successfully complete a Department-approved EMR, EMT, AEMT, EMT-IA, or Paramedic course as described in this rule;

(b) be able to perform the functions listed in the National EMS Education Standards adopted in this rule as verified by personal attestation and successful accomplishment by certified EMS Instructors during the course;

(c) achieve a favorable recommendation from the course coordinator and course medical director stating technical competence during field and clinical training and successful completion of all training requirements for an EMR, EMT, AEMT, EMT-IA, or Paramedic certification;

(d) submit the applicable fees and a completed application, including social security number, to the Department;

(e) submit to and pass a background investigation, including an FBI background investigation;

(f) retain documentation of having completed a Department approved CPR course within the prior two years that is consistent with the most current American Heart Association Guidelines for the level of Healthcare Cardiopulmonary Resuscitation (CPR) and Emergency Cardiac Care (ECC) Basic Life Support (BLS); and

(g) retain TB test results.

(3) Age requirements:

(a) EMR may certify at 16 years of age or older; and

(b) EMT, AEMT, EMT-IA and Paramedic may certify at 18 years of age or older.

(4) Within two years after the official course end date the applicant shall successfully complete the Department's approved National Registry of Emergency Medical Technician's written and practical EMR, EMT, AEMT, EMT-IA, or Paramedic examinations, or reexaminations, if necessary.

(5) Licensed personnel shall retain and submit upon request by the Department any documentation required for licensure.

(6) An individual who wishes to enroll in an AEMT, EMT-IA, or Paramedic course shall have as a minimum a Utah EMT license. This license or other equivalent state license or certification approved by the Department shall remain current until new license level is obtained.

(7) The Department may extend time limits for an individual who has unusual circumstances or hardships.

R426-5-310. Emergency Medical Dispatcher (EMD) Individual Licensure.

(1) The Department may license an EMD for a two-year period.

(2) An individual who wishes to become licensed as an EMD shall:

(a) successfully complete and become certified in a Department approved EMD protocol system by the system vendor no later than July 1, 2020;

(b) submit to and pass a criminal background investigation and screening clearance;

(c) retain documentation of having completed a Department approved CPR course within the prior two years. CPR training shall be kept current during licensure.

(3) An EMD may be licensed at 18 years of age or older.

R426-5-400. Licensure at a Lower Level.

(1) An individual who has taken a Paramedic course, but has not been recommended for licensure, may request to become licensed at the AEMT levels if:

(a) the paramedic course coordinator submits to the Department a favorable letter of recommendation stating that the individual has successfully obtained the knowledge and skills of the AEMT level as required by this rule; and

(b) the individual successfully completes all other application and testing requirements for an AEMT.

R426-5-500. License Challenges.

(1) The Department may license an individual as an EMT or AEMT, in consecutive order; individuals with military medical training, a registered nurse licensed in Utah, a nurse practitioner licensed in Utah, a physician assistant licensed in Utah, or a physician licensed in Utah who:

(a) is able to demonstrate knowledge, proficiency and competency to perform all the functions listed in the National EMS Education Standards as verified by personal attestation and successful demonstration to a currently certified course coordinator and an off-line medical director;

(b) has a knowledge of:

(i) medical control protocols;

(ii) state and local protocols; and

(iii) the role and responsibilities of an EMT or AEMT respectively;

(c) maintain and submit documentation of having completed a CPR course within the prior two years that is consistent with the most current version of the American Heart Association Guidelines for adult and Pediatric Healthcare Professional CPR and ECC BLS; and

(d) is 18 years of age or older.

(2) To become licensed, the applicant shall:

(a) submit the applicable fees and a completed application, including social security number, signature, and, proof of current Utah license as a Registered Nurse, a Physician Assistant, or a Medical Doctor, or military transcripts for training;

(b) successfully complete the Department approved written and practical EMT or AEMT examinations, or reexaminations, if necessary; and

(c) submit to and pass a background screening clearance as per R426-5-3200.

R426-5-600. License Renewal Requirements for EMR, EMT, AEMT, EMT-IA, and Paramedic.

(1) The Department may renew an individual license for a two-year period or for a shorter period as modified by the

Department to standardize renewal cycles.

(2) An individual seeking recertification shall:

(a) submit the applicable fees and a completed application, including social security number to the Department;

(b) submit to and pass a background screening clearance as per R426-5-3200;

(c) retain documentation of having completed a CPR course within the prior two years that is consistent with the most current version of the American Heart Association Guidelines for the level of Adult and Pediatric Healthcare Professional CPR and ECC BLS. CPR shall be kept current during licensure; and

(d) provide documentation of completion of Department-approved CME requirements.

(3) The EMR, EMT, AEMT, EMT-IA and Paramedic shall complete the required CME hours, as outlined in the Department's Renewal Protocol for EMS Personnel Manual. The hours shall be completed throughout the prior two years.

(4) The EMR, EMT, AEMT, EMT-IA, or Paramedic shall complete and provide documentation upon request of demonstrating the psychomotor skills listed in the current National EMS Education Standards at their level of licensure.

(5) An EMR, EMT, AEMT, EMT-IA, or Paramedic who is affiliated with a licensed or designated EMS provider shall have the licensed or designated EMS provider's training officer submit a letter verifying the completion of the renewal requirements. An EMR, EMT, AEMT, EMT-IA, or Paramedic who is not affiliated with a licensed or designated EMS provider shall provide upon the request of the Department verification of all renewal requirements directly to the Department.

(6) An AEMT, EMT-IA or Paramedic shall obtain verification from a certified off-line medical director recommending the individual for renewal verifying the individual has demonstrated proficiency in the psychomotor skills listed in the current National EMS Education Standards at their license level.

(7) Individuals are responsible to complete and submit all required renewal material to the Department at one time, no later than 30 days and no earlier than six months prior to the individual's current license expiration date. Renewal material submitted less than 30 days may result in a license expiration. The Department processes renewal material in the order received.

(8) A Department approved entity who provides CME may compile and submit renewal materials on behalf of an EMR, EMT, AEMT, EMT-IA, or Paramedic; however, the individual EMR, EMT, AEMT, EMT-IA, or Paramedic is responsible for a timely and complete submission.

(9) The Department may not lengthen an individual's license period to more than the two-years, unless the individual is a member of the National Guard or reserve component of the armed forces and is on active duty when the license expired.

R426-5-700. License Renewal Requirements for EMD.

(1) The Department may renew an individual license for a two-year period or for a shorter period as modified by the Department to standardize renewal cycles.

(2) An individual seeking renewal shall:

(a) submit the applicable fees and a completed application, including social security number to the Department;

(b) submit to and pass a background screening clearance as per R426-5-3100;

(c) retain documentation of having completed a CPR course within the prior two years that is consistent with the most current version of the American Heart Association Guidelines for the level of Adult and Pediatric Healthcare Professional CPR and ECC BLS. CPR shall be kept current during licensure;

(d) a minimum of a two-hour course in critical incident stress management (CISM);

(e) successfully complete certification in a Department approved EMD protocol system; and

(3) An EMD applying for renewal shall have the communications center supervisor or Department endorsed training officer of the designated medical dispatch center submit a letter verifying the completion of renewal requirements.

(4) Individuals are responsible to complete and submit all required renewal material to the Department at one time, no later than 30 days and no earlier than one year prior to the individual's current license expiration date. Renewal material submitted less than 30 days may result in license expiration. The Department processes renewal material in the order received.

(5) The Department may shorten an individual's license period.

(6) The Department may not lengthen an individual's license period to more than two years unless the individual is a member of the National Guard or reserve component of the armed forces and was on active duty when their license expired.

R426-5-800. Reciprocity for EMR, EMT, AEMT, and Paramedic.

(1) The Department may license an individual as an EMR, EMT, AEMT, or Paramedic who is licensed or certified by another state or certifying body if the applicant can demonstrate the applicant's out-of-state training and experience requirements are equivalent to or greater than what is required in Utah.

(2) An individual seeking reciprocity for licensure in Utah based on out-of-state training and experience shall:

(a) Submit the applicable fees and a completed application, including social security number to the Department and complete all of the following within two years of submitting the application;

(b) submit to and pass a background screening clearance as per R426-5-3200;

(c) retain documentation of having completed a CPR course within the prior two years that is consistent with the most current version of the American Heart Association Guidelines for the level of Healthcare Professional CPR and ECC and BLS. A Paramedic candidate shall also retain documentation of successful completion of ACLS or equivalent. All AMET, EMT-IA, and Paramedic licensed personnel shall retain documentation of PEPP, PALS, or equivalent courses within the prior two years;

(d) successfully complete the National Registry of Emergency Medical Technician's written and practical EMR, EMT, AEMT, or Paramedic examinations, or reexaminations, if necessary; and

(e) submit a current certification or license from one of the states of the United States or its possessions, or current registration and the name of the training institution if registered with the National Registry of EMTs.

R426-5-900. Lapsed Licenses.

(1) An individual whose EMR, EMT, AEMT, EMT-IA, Paramedic, or EMD license has expired for less than one year may, within one year after expiration, complete all renewal requirements, pay a late licensure fee. Individuals applying for EMR, EMT, AEMT, or Paramedic licensure also may be required to successfully pass the Department's approved written examination to become licensed. The individual's new expiration date will be two years from the previous expiration date.

(2) An individual whose license for EMR, EMT, AEMT, EMT-IA, or Paramedic has expired for more than one year shall:

(a) submit a letter of recommendation including results of an oral examination, from a certified off-line medical director, verifying proficiency in patient care skills at the licensure level;

(b) successfully complete the applicable Department's approved written examination;

(c) complete all renewal requirements; and

(d) the individual's new expiration date will be two years from the completion of all renewal materials.

(3) An individual whose certification has lapsed, is not authorized to provide care as an EMR, EMT, AEMT, EMT-IA, Paramedic, or EMD until the individual completes the renewal process.

R426-5-1000. Emergency Medical Care During Clinical Training.

A student enrolled in a Department-approved training program may, under the direct supervision of the course coordinator, an instructor in the course, or a preceptor for the course, perform activities delineated within the training curriculum that otherwise requires licensure to perform.

R426-5-1100. Instructor Requirements.

(1) The Department may endorse an individual as an EMS Instructor an individual who:

(a) meets the initial licensure requirements in R426-5-1200; and

(b) is currently in Utah as an EMR, EMT, AEMT,EMT-IA, or Paramedic.

(2) The Department adopts the United States Department of Transportation's "EMS Instructor Training Program as the standard for EMS Instructor training and competency in the state, which is adopted and incorporated by reference.

(3) An EMS instructor may only teach up to the license level to which the instructor is licensed.

(4) An EMS instructor shall comply with the teaching standards and procedures in the EMS Instructor Manual.

(5) An EMS instructor shall maintain the EMS license for the level the instructor is endorsed to teach. If an individual's EMS license lapses, the instructor endorsement is invalid until EMS license is renewed.

(6) The Department may waive a particular instructor endorsement requirement if the applicant can demonstrate the applicant's training and experience requirements are equivalent or greater to what are required in Utah.

R426-5-1200. Instructor Endorsement.

(1) The Department may endorse a license an individual who is an EMR, EMT, AEMT, EMT-IA, or Paramedic as an EMS Instructor for a two-year period.

(2) An individual who wishes to become endorsed as an EMS Instructor shall:

(a) submit an application and pay all applicable fees;

(b) submit three letters of recommendation regarding EMS skills and teaching abilities;

(c) submit documentation of 15 hours of teaching experience;

(d) successfully complete all required examinations; and

(e) successfully complete the Department-sponsored initial EMS instructor training course, or equivalent.

(3) An individual who wishes to become endorsed as an EMS Instructor to teach EMR, EMT, AEMT, or Paramedic courses shall provide documentation of 30 hours of patient care within the prior year.

(4) The Department may waive portions of the initial EMS instructor training courses for previously completed Department-approved instructor programs.

(5) An individual shall submit every two years a completed and signed "instructor contract" to the Department agreeing to abide by the standards and procedures in the current Instructor Manual.

R426-5-1300. Instructor Endorsement Renewal.

(1) An EMS instructor who wishes to renew an endorsement as an instructor shall:

(a) maintain current EMS licensure;

(b) attend the required Department-approved instructor seminar at least once in the two year endorsement renewal cycle; and

(c) submit an application and pay all applicable fees.

R426-5-1400. Instructor Lapsed Endorsement.

(1) An EMS instructor whose instructor endorsement has expired for less than two years may again become endorsed by completing the endorsement requirements.

(2) An EMS instructor whose instructor endorsement has expired for more than two years shall complete all initial instructor endorsement requirements and reapply as if there were no prior endorsement, however the Department may waive portions of the initial EMS instructor training courses if the individual is able to demonstrate competency to the Department.

R426-5-1500. Training Officer Endorsement.

(1) The Department may endorse a licensed of an individual who is an endorsed EMS instructor as a training officer for a two-year period.

(2) An individual who wishes to become endorsed as an EMS Training officer shall:

(a) Be currently endorsed as an EMS instructor;

(b) successfully complete the Department's course for new training officers;

(c) submit an application and pay all applicable fees; and

(d) submit biennially a completed and signed "Training Officer Contract" to the Department agreeing to abide by the standards and procedures in the then current Training Officer Manual.

(3) A training officer shall maintain EMS instructor endorsement to retain training officer endorsement.

(4) An EMS training officer shall abide by the terms of the Training Officer Contract, and comply with the standards and procedures in the Training Officer Manual as incorporated into the respective Training Officer Contract.

R426-5-1600. Training Officer Endorsement Renewal.

(1) A training officer who wishes to renew an endorsement as a training officer shall:

(a) Attend a training officer seminar at least once in the two year endorsement renewal cycle;

(b) maintain current EMS instructor and EMS license;

(c) submit an application and pay all applicable fees;

(d) successfully complete any Department-examination requirements; and

(e) submit a completed and signed new "Training Officer Contract" to the Department agreeing to abide by the standards and procedures in the current training officer manual.

R426-5-1700. Training Officer Lapsed Endorsement.

(1) An individual whose training officer endorsement has expired for less than two years may again become endorsed by completing the endorsement renewal requirements. The individual's new expiration date will be two years from the old expiration date.

(2) An individual whose training officer endorsement has expired for more than two year shall complete all initial training officer endorsement requirements and reapply as if there were no prior endorsement.

R426-5-1800. Course Coordinator Endorsement.

(1) The Department may endorse an individual as an EMS course coordinator for a two-year period.

(2) An individual who wishes to become endorsed as a course coordinator shall:

(a) Be endorsed as an EMS instructor;

(b) be a co-coordinator of record for one Department-

approved course with a endorsed course coordinator;

(c) submit a written evaluation and recommendation from the course coordinator in the co-coordinated course;

(d) complete endorsement requirements within one year of completion of the Department's course for new course coordinators;

(e) submit an application and pay all applicable fees;

(f) complete the Department's course for new course coordinators;

(g) sign and submit the "Course Coordinator Contract" to the Department agreeing to abide to the standards and procedures in the then current Course Coordinator Manual; and

(h) maintain EMS instructor endorsement.

(3) A Course Coordinator may only coordinate courses up to the licensure level to which the course coordinator is licensed.

(4) A course coordinator shall abide by the terms of the "Course Coordinator Contract" and comply with the standards and procedures in the Course Coordinator Manual as incorporated into the "Course Coordinator Contract."

(5) A Course Coordinator shall maintain an EMS Instructor endorsement and the EMS license for the level that the course coordinator is endorsed to coordinate. If an individual's EMS license lapses, the Course Coordinator endorsement is invalid until EMS license is renewed.

R426-5-1900. Course Coordinator Endorsement Renewal.

(1) A course coordinator who wishes to renew an endorsement as a course coordinator shall:

(a) Maintain current EMS instructor and EMR, EMT, AEMT, EMT-IA, or Paramedic license;

(b) coordinate or co-coordinate at least one Department-approved course every two years;

(c) attend a course coordinator seminar at least once in the two year endorsement renewal cycle;

(d) submit an application and pay all applicable fees; and

(e) sign and submit a Course Coordinator Contract to the Department agreeing to abide by the policies and procedures in the then current Course Coordinator Manual.

R426-5-2000. Course Coordinator Lapsed Endorsement.

(1) An individual whose course coordinator endorsement has expired for less than two year may again become endorsed by completing the renewal requirements. The individual's new expiration date will be two years from the renewal date.

(2) An individual whose course coordinator endorsement has expired for more than two year shall complete all initial course coordinator endorsement requirements and reapply as if there were no prior endorsement. The Department may waive portions of the initial course coordinator requirements such as the co-coordinator requirements if the candidate has coordinated or co-coordinated a course within the past three years.

R426-5-2100. Critical Care Paramedic Endorsement.

(1) The Department may endorse an individual as a critical care paramedic for up to a four-year period.

(2) An individual who wishes to become endorsed as a critical care paramedic shall:

(a) Be a licensed paramedic in the State of Utah;

(b) be certified by the International Board of Specialty Certification as a:

(i) Certified Critical Care Paramedic (CCP-C) or

(ii) Certified Flight Paramedic (FP-C)

(c) submit an application for critical care paramedic certification and pay all applicable fees;

(d) submit proof of certification from the International Board of Specialty Certification; and

(e) maintain paramedic license

(3) Education cannot be used in lieu of a valid and current IBSC Critical Care or Flight Paramedic Certification to maintain the critical care endorsement.

R426-5-2200. Critical Care Paramedic Endorsement Renewal.

(1) A Critical Care Paramedic who wishes to renew shall:

(a) Maintain a paramedic license;

(b) submit an application for critical care paramedic;

(c) pay all applicable fees; and

(d) submit proof of certification from the International Board of Specialty Certification.

R426-5-2300. Course Approvals.

(1) A course coordinator offering EMS training to individuals who wish to become licensed as an EMR, EMT, AEMT, EMT-IA, or Paramedic shall obtain Department approval prior to initiating an EMS training course. The Department shall approve a course if:

(a) The applicant submits the course application and fees no earlier than 90 days and no later than 30 days prior to commencing the course;

(b) the applicant has sufficient equipment available for the training or if the equipment is available for rental from the Department;

(c) the Department finds the course meets all the Department rules and contracts governing training;

(d) the course coordinators and instructors hold current respective course coordinator and EMS instructor endorsements; and

(e) the Department has the capacity to offer the applicable examinations in a timely manner after the conclusion of the course.

R426-5-2400. Paramedic Training Institutions Standards Compliance.

(1) A person shall be authorized by the Department to provide training leading to the licensure of a Paramedic.

(2) To become authorized and maintain authorization to provide Paramedic training, a person shall:

(a) Enter into the Department's standard Paramedic training contract; and

(b) adhere to the terms of the contract, including the requirement to provide training in compliance with the Course Coordinator Manual and the Utah Paramedic Training Program Accreditation Standards Manual.

R426-5-2500. Off-line Medical Director Requirements.

(1) The Department may certify an off-line medical director for a four-year period.

(2) An off-line medical director shall be:

(a) a physician actively engaged in the provision of emergency medical care or meets this requirement at the discretion of the State EMS Medical Director;

(b) familiar with the Utah EMS Systems Act, Title 26, Chapter 8a, and applicable state rules; and

(c) familiar with medical equipment and medications required.

R426-5-2600. Off-line Medical Director Certification.

(1) An individual who wishes to certify as an off-line medical director shall:

(a) have completed an American College of Emergency Physicians or National Association of Emergency Medical Services Physicians medical director training course or the Department's medical director training course within twelve months of becoming a medical director;

(b) submit an application and;

(c) pay all applicable fees.

(2) An individual who wishes to recertify as an off-line medical director shall:

(a) attend the medical directors annual workshop at least once every four years;
(b) submit an application; and
(c) pay all applicable fees.

R426-5-2700. Epinephrine Auto-Injector Use.
(1) Any qualified entities or qualified adults as defined in 26-41-102 in accordance with 26-41-107 shall receive training approved by the Department. The training shall include:
(a) recognition of life threatening symptoms of anaphylaxis;
(b) appropriate administration of an epinephrine auto-injector;
(c) proper storage of an epinephrine auto-injector;
(d) disposal of an epinephrine auto-injector; and
(e) an initial and annual refresher course.
(2) The annual refresher course requirement may be waived if:
(a) the qualified entities or qualified adults are currently licensed at the EMR or higher level by the State of Utah, or
(b) the approved trainings are the Red Cross and American Heart Association epinephrine auto-injector modules.
(3) Training in the school setting shall be based on approved Department trainings found on http://www.choosehealth.utah.gov/prek-12/school-nurses.php and provided in accordance with 26-41-104.
(4) All epinephrine auto injectors shall be stored and disposed of following the manufacturer's specifications.

R426-5-2800. Law Enforcement Blood Draws Authorized Individual Qualifications.
(1) Individuals who are not authorized to draw blood pursuant to Utah Code Title 41-6a-523(1)(b), or individuals who are not licensed by the Department such as AEMTs, EMT-IAs, or Paramedics shall meet one of the following requirements as a prerequisite for authorization to withdraw blood for the purpose of determining its alcohol or drug content when requested to do so by a peace officer:
(a) training in blood withdrawal procedures obtained as a defined part of a successfully completed college or university course taken for credit, or
(b) training in blood withdrawal procedures obtained as a defined part of a successfully completed training course which prepares individuals to function in routine clinical or emergency medical situations, or
(c) training of no less than three weeks duration in blood withdrawal procedures under the guidance of a licensed physician.

R426-5-2900. Permits for Blood Draws.
(1) The Department may issue permits to withdraw blood for the purpose of determining the alcohol or drug content therein, when requested by a peace officer, to qualified applicants, as determined by the Department. Individuals described in R426-5-2800 are exempt from permit requirements.
(2) Application to obtain a permit shall be made to the BEMSP on forms provided by the Department.
(3) When the permit holder is requested to withdraw blood for the above stated purpose at a location other than the facility indicated above, they shall possess a valid permit card.
(4) Permits shall be valid for a three year period. The date the permit expires shall appear on the permit.
(5) Application to renew permits shall be made to the Department within three months prior to the expiration date to ensure that it will not lapse. Such application shall be made on forms provided by the Department. The permit holder shall either verify that he has been engaged in performing blood withdrawal procedures during the current permit period or submit verification signed by a physician attesting to their competence to perform blood withdrawal procedures.
(6) Permit holders shall notify the Department within 15 days of a change in name or mailing address.

R426-5-3000. Cause for Blood Draw Permit Termination or Revocation.
(1) Permits shall be subject to termination or revocation under any one of the following:
(a) the permit holder has made any misrepresentation of a material fact in his application, or any other communication to the Department or its representatives, which misrepresentation was material to the eligibility of the permit holder;
(b) the permit holder is not qualified to hold a permit;
(c) the permit holder after having received a permit has been convicted of a felony or of a misdemeanor which misdemeanor involves moral turpitude; or
(d) the permit holder does not comply with the possession requirements.

R426-5-3100. Published List of Individuals Permitted to Draw Blood.
(1) The Department will make available to the public a list of individuals permitted to withdraw blood for determination of its alcohol or drug content.
(2) The Department may publish amended lists when deemed necessary.

R426-5-3200. Background Screening Clearance for EMS Licensure.
(1) The Department shall conduct a background screening on each individual who seeks licensure or renewal as an EMR, EMT, AEMT, EMT-IA, Paramedic, or EMD. The Department shall approve EMS licensure upon successful completion of a background screening. Background clearance indicates the individual does not pose an unacceptable risk to public health and safety.
(2) The individual seeking licensure or renewal shall submit the completed applications, including fees, prior to submission of finger prints.
(3) The Department may review relevant information obtained from the following sources:
(a) Department of Public Safety arrest, conviction, and disposition records described in Title 53, Chapter 10, Criminal Investigations and Technical Services Act, including information in state, regional, and national records files;
(b) juvenile court arrest, adjudication, and disposition records, as allowed under Section 78A-6- 209;
(c) federal criminal background databases available to the state;
(d) the Department of Human Services' Division of Child and Family Services Licensing Information System described in Section 62A-4a-1006;
(e) child abuse or neglect findings described in Section 78A-6-323;
(f) the Department of Human Services' Division of Aging and Adult Services vulnerable adult abuse, neglect, or exploitation database described in Section 62A-3-311.1; and
(g) licensing and certification records of individuals licensed or certified by the Division of Occupational and Professional Licensing under Title 58, Occupations and Professions.
(4) If the Department determines an individual is not eligible for licensure based upon the criminal background screening and the individual disagrees with the information provided by the Criminal Investigations and Technical Services Division or court record, the individual may challenge the information as provided in Utah Code Annotated Sections 77-18a.
(5) If the Department determines an individual is not

eligible for licensure based upon the non-criminal background screening and the individual disagrees with the information provided, the individual may challenge the information through the appropriate agency.

(6) Exclusion from licensure.

(a) Criminal Convictions or Pending Charges:

(i) If an individual has been convicted, has pleaded no contest, is subject to a plea in abeyance, or a diversion agreement, for the following offenses within the past 15 years, they shall not be approved for licensure:

(A) any felony or class A under Title 76, Chapter 5 Offenses Against the Person, Utah Criminal Code;

(B) any felony or class A under Title 76, Chapter 9, Offenses Against Public Order and Decency, Utah Criminal Code excluding sections 103 and 108;

(C) any felony or class A or B under the following Utah Criminal Codes:

(I) 76-9-301.8, Bestiality;

(II) 76-9-702.1, Sexual Battery; and

(III) 76-9-702.5, Lewdness Involving Child.

(ii) If an individual has been convicted or has pleaded no contest for the following offenses, 15 years have passed since the last conviction and the offense cannot be expunged they shall be considered for licensure:

(A) any felony or class A under Title 76, Chapter 5 Offenses Against the Person, Utah Criminal Code;

(B) any felony or class A under Title 76, Chapter 9, Offenses Against Public Order and Decency, Utah Criminal Code excluding sections 103 and 108;

(C) any felony or class A or B under the following Utah Criminal Codes:

(I) 76-9-301.8, Bestiality;

(II) 76-9-702.1, Sexual Battery; and

(III) 76-9-702.5, Lewdness Involving Child.

(iii) If an individual has been convicted, has pleaded no contest, is subject to a plea in abeyance, or a diversion agreement, for the following offenses, they shall be considered for licensure:

(A) any felony or class A under Utah Criminal Code not listed in R426-5-3200(6)(a)(i).

(B) any class B or C under Title 76, Chapter 5 Offenses Against the Person, Utah Criminal Code;

(C) any felony, class A under Title 76, Chapter 6, Offenses Against Property, Utah Criminal Code;

(D) any felony or class A under Title 76, Chapter 6a, Pyramid Schemes, Utah Criminal Code;

(E) any felony or class A under Title 76, Chapter 8, Offenses Against the Administration of Government, Utah Criminal Code;

(F) any felony, class A under Title 76, Chapter 10, Offenses Against Public Health, Welfare, Safety and Morals, Utah Criminal Code;

(G) any felony, class A, B or C under the following Utah Criminal Codes:

(I) 76-10-1201 to 1229.5, Pornographic and Harmful Materials and Performances; and

(II) 76-10-1301 to 1314, Prostitution;

(III) any felony or class A under Utah Criminal Code 76-10-2301, Contributing to the Delinquency of a Minor;

(H) any felony or class A or B under Utah Motor Vehicles Traffic Code 41-6a-502, 502.5, and 517.

(I) any felony or class A or B under Utah Occupations and Professions Utah Controlled Substances Act 58-37.

(J) any felony or class A or B under Alcoholic Beverage Control Act 32B-4-409.

(K) any criminal conviction or pattern of convictions that may represent an unacceptable risk to public health and safety.

(iv) An individual seeking licensure who has been convicted or has pleaded no contest, is subject to a plea in abeyance, a diversion agreement, a warrant for arrest, arrested or charged for any of the identified offenses in R426-5-3200(6)(a)(iii), shall be considered for licensure.

(v) A licensed EMS individual who is subject to a warrant of arrest, arrested or charged for any of the identified offenses in R426-5-3200(6)(a)(iii), and after an investigation and Peer Review Board process as established in R426-5-3400, the Department may issue license, or suspend or revoke a license, or place a license on probation.

(vi) A licensed EMS individual who is subject to a warrant of arrest, arrested or charged for any of the identified offenses in R426-5-3200(6)(a)(i), shall immediately have the individuals EMS license placed on restriction pending the outcome of a Department investigation as per the process established in R426-5-3300.

(b) Juvenile Records.

(i) As required by Utah Code Subsection 26-8a-310(5)(b), juvenile court records shall be reviewed if an individual is:

(A) under the age of 28; or

(B) over the age of 28 and has convictions or pending charges identified in R426-5-3200(6)(a).

(ii) Adjudications by a juvenile court may exclude the individual from licensure if the adjudications refer to an act that, if committed by an adult, would be a felony or a misdemeanor any of the identified offenses in R426-5-3200(6)(a).

(c) Non-Criminal Records.

(i) The Department may deny licensure based on a supported finding from:

(A) the Department of Human Services' Division of Child and Family Services Licensing Information System described in Section 62A-4a-1006;

(B) child abuse or neglect findings described in Section 78A-6-323;

(C) the Department of Human Services' Division of Aging and Adult Services vulnerable adult abuse, neglect, or exploitation database described in Section 62A-3-311.1;

(ii) The Department may deny licensure based on a finding from licensing records of individuals licensed by the Division of Occupational and Professional Licensing under Title 58, Occupations and Professions.

(d) Review of Relevant Information.

(i) Results of background screening review, as listed above in R426-5-3200(6)(a)(ii)-(iii), (b) or (c) may be reviewed to determine under what circumstance, if any, the individual may be granted licensure. The following factors may be considered:

(A) types and number;

(B) passage of time;

(C) surrounding circumstances;

(D) intervening circumstances; and

(E) steps taken to correct or improve.

(ii) The Department shall rely on relevant information identified in R426-5-3200(2) as conclusive evidence and may deny licensure based on that information.

(e) Appeal of Department licensure decision.

(i) A licensed EMS individual may appeal a Department licensure decision as listed in R426-5-3200(6)(d)(i)to the Department as per the process established in R426-5-3400.

(7) A licensed EMS individual who has been arrested, charged, or convicted shall notify the Department and all employers or affiliated entities who utilize the EMS individual's license within 7 business days. The licensed EMS individual shall also notify the Department of all entities they work for or are affiliated with.

(8) All licensed or designated EMS providers who are notified or become aware of a licensed EMS individual arrest, charge or conviction shall notify the Department within 7 business days.

R426-5-3300. Review and Investigation of Complaints and Referrals.

(1) The Department shall review all complaints filed against an EMS provider and a licensed EMS individual.

(2) Designated or licensed provider complaints will be investigated by the Department.

(a) The Department may conduct interviews with the provider.

(b) The Department will allow the provider an opportunity to respond to the allegations and to provide supporting witnesses and documentation.

(c) Based on the investigation, the Department will make a recommendation to the Department's Bureau Director.

(d) If the Department's recommendation is that the provider is to be placed on probation or suspension, the Department's recommendation should include terms and conditions.

(e) The Department may take action against a designated or licensed provider's license or designation based on the investigative findings.

(f) The Department shall notify the provider in writing of the Department's decision within 30 days of completion of the investigation.

(3) Licensed EMS individual complaints will be investigated either by the Department or by the Primary Affiliated Provider (PAP).

(a) The Department shall investigate and may take action if the Department determines any of the following applies to a licensed EMS individual;

(i) the licensed EMS individual demonstrates a threat to him or herself or to a coworker,

(ii) the licensed EMS individual demonstrates a threat to the public health,

(iii) the licensed EMS individual demonstrates a threat to the safety or welfare of the public,

(iv) the licensed EMS individual potentially violated R426-5-3200(4), or

(v) the Department determines the risk cannot be reasonably mitigated.

(vi) The Department may place the licensed EMS individual on a restricted license while an investigation is pending until terms are reached for a provisional license using the process outlined in R426-5-3300(5)(e).

(vii) The Department may conduct interviews with all parties necessary. The Department will gather information and evidence, which may include requiring the licensed EMS individual to submit to a drug or alcohol screening or any other appropriate evaluation.

(viii) The licensed EMS individual shall have an opportunity to respond to the allegations and to provide supporting witnesses and documentation.

(ix) Once the Department has completed its investigation it shall submit the report with all findings and recommendations to the Peer Review Board per R426-5-3400(4) for review.

(b) The PAP shall investigate a complaint against the licensed EMS individual who the Department refers to the PAP.

(i) The PAP investigation shall:

(A) be investigated by the licensed or designated EMS provider's EMS endorsed training officer or designee;

(B) be completed and findings submitted to the Department within 30 calendar days from receipt of complaint from the Department;

(ii) If the Department determines that the PAP actions are insufficient, the Department may initiate an investigation of the licensed EMS individual which follows the Department and the Peer Review Board process.

(4) The Department shall investigate an EMS individual's license or a provider's license or designation for any of the following:

(a) refusal to submit to a drug test requested by the EMS provider or the Department;

(b) failure to report by an individual or any affiliated provider pursuant to R426-5-3200(7)and(8);

(c) non-prescribed use of or addiction to narcotics or drugs;

(d) use of alcoholic beverages or being under the influence of alcoholic beverages at any level while on call or on duty as an EMS personnel or while driving any EMS vehicle;

(e) being under the influence of a prescribed or non-prescribed medication or drug(legal or illegal) while on call or on duty as a licensed EMS individual who affects the person's ability to operate or function safely.

(f) failure to comply with the training, licensing, or relicensing requirements for the license;

(g) failure to comply with a contractual agreement as an EMS instructor, a training officer, or a course coordinator. Action taken by the Department on this item shall only be against the individual's ability to perform this particular function and would not affect their base EMS license;

(h) fraud or deceit in applying for or obtaining a license;

(i) fraud, deceit, lack of professional competency, patient abuse, or theft in the performance of the duties as a licensed EMS individual;

(j) false or misleading information or failure to disclose criminal background information during an investigation or an EMS Personnel Peer Review Board proceeding;

(k) unauthorized use or removal of narcotics, medications, supplies or equipment from a provider, emergency vehicle or health care facility;

(l) performing procedures or skills beyond the level of an individual's EMS licensure or provider's licensure;

(m) violation of laws pertaining to medical practice, drugs, or controlled substances;

(n) mental incompetence as determined by a court of competent jurisdiction;

(o) demonstrated inability and failure to perform adequate patient care;

(p) inability to provide emergency medical services with reasonable skill and safety because of illness, or as a result of any other mental or physical condition, when the individual's condition demonstrates a clear and unjustifiable threat or potential threat to oneself, coworkers, or the public health, safety, or welfare that cannot be reasonably mitigated;

(q) misrepresentation of an individual's level of licensure;

(r) failure of a licensed EMS individual to display a clearly identifiable level of EMS licensure during an EMS response;

(s) unsafe, unnecessary or improper operation of an emergency vehicle that would likely cause concern or create a danger to the general public; or

(t) improper or unnecessary use of emergency equipment.

(5) Background screening referrals may be submitted to the Department for review and investigation.

(a) The Department shall review any case referred under R426-5-3200.

(b) The Department may require the licensed EMS individual to provide the proper criminal background documentation.

(c) The licensed EMS individual shall notify the Department of all entities they work for or are affiliated with or that they may become affiliated with in connection to their EMS licensure.

(d) Failure to comply with any Department requirements may result in disciplinary action against the licensed EMS individual's licensure.

(e) The Department may negotiate with the licensed EMS individual and their PAP to determine terms and conditions of the EMS individual's provisional licensure.

(i) When the Department determines a licensed EMS

individual's license will be restricted, the Department shall notify both the licensed EMS individual and all licensed or designated providers they are affiliated with.

(ii) The Department will attempt to contact and begin negotiations with the PAP and the licensed EMS individual. All parties will attempt to determine reasonable terms and conditions to the licensed EMS individual's license .

(iii) If terms and conditions are agreed upon between the parties, the licensed EMS individual and all affiliated licensed or designated providers shall be notified immediately. This notification will include information that the licensed EMS individual is under a provisional license with terms and conditions until the resolution of any criminal charge or the completion of an investigation.

(iv) If the licensed EMS individual is not employed or affiliated with a licensed or designated provider or if terms and conditions are not agreed upon, the Department may take action necessary to protect the public's best interest.

(v) The Department, the licensed EMS individual and the PAP, if applicable shall sign the terms of the provisional licensure agreement. Any other affiliated licensed or designated EMS providers shall be notified of the provisional license and its terms and conditions.

(vi) Once the provisional license has been signed, all known EMS providers who the licensed EMS individual is affiliated with will be notified immediately by the Department.

(vii) If any affiliated licensed or designated EMS providers or the licensed EMS individual fail to abide by the terms and conditions of a provisional license, they may be subject to sanctions by the Department.

(f) The Department shall submit recommended background clearance actions for licensed EMS individuals to the Peer Review Board under R426-5-3400.

(6) Appeal process;

(a) If a licensed or designated EMS provider chooses to appeal an action by the Department, they may appeal to the EMS Committee or pursue a remedy under the Utah Administrative Procedures Act, Title 63G, Chapter 4, Administrative Procedures Act.

(i) If the Department action is appealed to the EMS Committee, then the recommendation shall be given to the Department Executive Director for a final decision.

(b) If a licensed EMS individual chooses to appeal an action by the Department, they may appeal to the Executive Director, or pursue a remedy under the Utah Administrative Procedures Act, Title 63G, Chapter 4, Administrative Procedures Act.

R426-5-3400. EMS Personnel Peer Review Board.

The EMS Personnel Peer Review Board is created under section 26-8a-105(4).

(1) Membership of the EMS Personnel Peer Review Board. The EMS Personnel Peer Review Board shall be composed of the following 15 members appointed by the Executive Director of the Department of Health:

(a) One EMS administrative officer representing a licensed ambulance provider, a licensed paramedic provider, or a designated quick response unit provider from a county of the first or second class;

(b) One EMS administrative officer representing a licensed ambulance provider, a licensed paramedic provider, or a designated quick response unit provider from a county of the third through sixth class;

(c) One educational representative from an accredited EMS training program;

(d) One physician certified and practicing as an EMS Medical Director;

(e) One licensed EMD;

(f) Two representatives from professional employee groups, one fire based, and one non-fire based;

(g) Two endorsed EMS training officers;

(h) Two non-supervisory licensed EMT's;

(i) Two non-supervisory licensed AEMT's;

(j) Two non-supervisory licensed Paramedics;

(2) EMS Personnel Peer Review Board member terms of office:

(a) Except as provided in subsection (2)(b) members shall be appointed for a six year term beginning no later than October 1, 2015.

(b) The Department shall adjust the length of terms to ensure the terms of members of the board are staggered so approximately one third of the board is appointed every two years.

(c) No member shall serve consecutive full terms.

(d) When a vacancy occurs in the membership of the board for any reason, the Executive Director of the Department shall appoint the replacement for the balance of the unexpired term. If the balance of the term is greater than 50% of the initial term, then the term shall be considered a full term.

(e) The EMS Personnel Peer Review Board shall organize and select one of its members as Chair and one of its members as Vice Chair to serve no more than two years in each position.

(f) If a board member becomes ineligible for the EMS Personnel Peer Review Board membership position through promotion, an increase in level of licensure or transfer out of the employment position which qualified them for the appointment, they shall be replaced at the next two year interval.

(g) An equitable mix of urban and rural members is preferred.

(3) EMS Personnel Peer Review Board Meetings.

(a) Regular meetings of the Peer Review Board shall be scheduled quarterly.

(i) Regular meetings shall be noticed and posted to employers and posted in accordance with the Utah Open and Public Meetings Act, Section 52-4-202.

(ii) Failure to attend three or more consecutive meetings by any member may be grounds for removal of that member and replacement in accordance with subsection (2)(d).

(iii) A member may not receive compensation or benefits from the Department for the member's service. The member may receive per diem and travel expensed in accordance with Department rules and policies.

(4) Once a complaint or background screening finding against a licensed EMS individual is investigated, the Department shall refer the case and provide a report with all findings and recommendations to the EMS Personnel Peer Review Board.

(5) If the EMS Personnel Peer Review Board chooses to recommend any action that deviates from the Department recommendation, the Board shall provide written justification for that recommendation.

(6) The EMS Personnel Peer Review Board may make recommendations to the Department's Bureau Director, of:

(a) no Department action, or

(b) a letter of notice, or

(c) probation of the licensed EMS individual's license with specific terms and conditions for a period of time, or

(d) suspension of the licensed EMS individual's license for a defined period of time, or

(e) permanent revocation of the licensed EMS individual's license, or

(d) a combination of any of these actions.

(7) If the Department's Bureau Director modifies the recommended action of the EMS Personnel Peer Review Board, the Department's Bureau Director shall attach a written letter of dissent noting the reasoning for the decision. The Department's Bureau Director shall then notify the EMS Personnel Peer Review Board of the dissent and action taken.

(8) The licensed EMS individual shall be notified by the Department of any action taken within 15 days of the decision by mail.

(9) An action to restrict, place on probation, suspend, or revoke the licensed EMS individual's license shall be done in accordance with Title 63G, Chapter 4, Administrative Procedures Act.

R426-5-3500. EMS Rules Task Force.

The EMS Rules Task Force is created under Title 26, Chapter 8a, EMS Act.

(1) The EMS Rules Task Force shall be composed of the following members appointed by the Executive Director of the Department of Health:

(a) a representative from the Utah Fire Chiefs' Association;

(b) a representative from the Utah Rural EMS Directors' Association;

(c) a EMS medical director;

(d) a privately owned EMS representative;

(e) a rural EMS medical dispatch representative;

(f) a paramedic licensed provider representative;

(g) an urban EMS medical dispatch representative;

(h) an Emergency Nurses Association representative;

(i) a course coordinator from an accredited EMS training program;

(j) an endorsed EMS training officer;

(k) a representative from the State EMS Committee;

(l) a designated trauma center representative;

(m) a designated patient receiving facility representative;

(n) a designated nonemergency secured behavioral patient transport representative.

(2) EMS Rules Task Force member terms of office:

(a) Except as provided in subsection (2)(b) members shall be appointed for a three year term.

(b) The Department shall adjust the length of terms to ensure the terms of members of the EMS Rules Task Force are staggered so approximately one third of the EMS Rules Task Force is appointed every two years.

(c) Members may serve two consecutive full terms.

(d) When a vacancy occurs in the membership for any reason, the Department shall solicit applications for replacement for the balance of the unexpired term. If the balance of the term is greater than 50% of the initial term, then the term shall be considered a full term.

(e) The EMS Rules Task Force may organize and select one of its members as Chair and one of its members as Vice Chair to serve no more than two years in each position.

(f) If a EMS Rules Task Force member becomes ineligible for the EMS Rules Task Force membership position through promotion, an increase in level of license or transfer out of the employment position which qualified them for the appointment, they shall be replaced at the next two year interval.

(g) An equitable mix of urban and rural members is preferred.

(3) EMS Rules Task Force Meetings.

(a) Regular meetings of the EMS Rules Task Force shall be scheduled as determined by the membership and the Department.

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R432. Health, Family Health and Preparedness, Licensing.
R432-45. Nurse Aide Training and Competency Evaluation Program.
R432-45-1. Introduction and Authority.

The Nurse Aide Training and Competency Evaluation Program is authorized by the Omnibus Budget Reconciliation Act of 1987 (OBRA), Pub. L. No. 100 203, 101 Stat. 1330, Sec. 4211,(b)(5)(A)(B)(C)(D)(E)(F)(G), (e)(1)(2), f(2)(A)(B), which the Department adopts and incorporates by reference. The purpose of this program is to allow a certified nurse aide (CNA) to provide quality nursing services to nursing facility residents.

R432-45-2. Definitions.

(1) "Certified nurse aide" means any person who completes a nurse aide training and competency evaluation program (NATCEP) and passes the state certification examination.

(2) "Competency evaluation" means a written or oral examination that addresses each requirement of OBRA for a nurse aide and a demonstration of the tasks the nurse aide is expected to perform as part of the aide's function.

(3) "Nurse aide" means any individual who provides nursing or nursing-related services to residents in a nursing facility, but does not include an individual who is a licensed professional or who volunteers to provide these services without monetary consideration.

(4) "Nurse Aide Training and Competency Evaluation Program" (NATCEP) means any program that the Utah Nursing Assistant Registry (UNAR) approves to offer training to an individual who is interested in becoming a certified nurse aide.

(5) "Nursing facility" means any institution that is licensed and Medicare or Medicaid-certified to provide long-term care.

(6) "Resident" means an individual who resides in and receives medical long-term nursing services in a Medicare or Medicaid-certified nursing facility.

(7) "Renewal" means a two-year renewal for a CNA who has performed paid services for at least 200 hours of nursing or nursing-related services under the direction of a licensed nurse during the 24 months following the completion date of the NATCEP or certification renewal.

(8) "Retraining" means training for a CNA who has not performed paid services for a total of 200 hours of nursing or nursing-related services under the direction of a licensed nurse during the 24 months following the completion date of the state-approved nursing assistant training or certification renewal.

(9) "State survey agency" means the Bureau of Health Facility Licensing, Certification and Resident Assessment, within the Department of Health, which is responsible for nursing facility certification and for conducting surveys to determine compliance with Medicare and Medicaid requirements.

(10) "Supervised practical training" means training in a nursing facility in which the trainee demonstrates knowledge while performing tasks on an individual under the direct supervision of a licensed nurse, who is a UNAR-approved instructor.

(11) "Train-the-Trainer program" means a UNAR-approved program that consists of formal instructions to potential instructors on how to train a CNA candidate who is at least 16 years old through demonstrations and lectures.

(12) "Waiver of CNA Training Program" means a waiver that allows a qualified nursing professional and qualified in-state expired CNA to challenge the state written and skill examination.

(13) "Utah Nursing Assistant Registry" means the state agency that approves nurse aide training programs, monitors all UNAR test sites, maintains an abuse registry for all substantiated allegations of resident neglect, abuse or misappropriation of resident property by a CNA in a nursing, Medicare or Medicaid facility, certifies nurse aides who have completed a NATCEP, and renews certifications of qualified CNAs.

R432-45-3. Program Access Requirements.

(1) A nurse aide is required to complete a NATCEP and become certified within 120 days of the first date of employment.

(2) An individual who was certified as a nurse aide on or before July 1, 1989, meets the OBRA requirement upon completion of the approved in-service training on mental retardation and mental illness.

(3) If specific requirements are met in the following cases, the UNAR office may grant a waiver to:

(a) a nursing student who has completed the first semester of nursing school within the past two years with a passing grade. An official transcript of a nursing fundamentals class must accompany the Application for Certification Testing. If the candidate does not pass either the skills or written portion of the CNA examination after three attempts, the candidate must complete a NATCEP;

(b) a nurse with an expired license who can show proof of previous licensure in any state and who was in good standing with that state's professional board. UNAR shall grant the candidate 3 attempts to pass both the skills and written portion of the examination. If the candidate does not pass either portion, the candidate must complete a NATCEP;

(c) a CNA with an expired certificate from Utah who is in good standing with UNAR. UNAR shall grant the candidate 3 attempts to pass both the skills and written portion of the examination within two years of the certification expiration date. If the candidate does not pass either portion, the candidate must retrain; or

(d) any out-of-state CNA who is certified and in good standing with another state's survey agency. UNAR grants reciprocity upon the CNA providing proof of certification in that other state.

(4) An out-of-state CNA with an expired certificate must complete a NATCEP in the state of Utah.

R432-45-4. Competency Evaluation.

(1) An entity that proctors competency evaluations using both written or oral examinations and demonstrations of skills to nurse aides must be UNAR-approved.

(a) An individual shall perform the skills demonstration component in a facility or laboratory setting comparable to the setting in which the individual will function as a nurse aide, and a UNAR-approved representative must administer and evaluate the demonstration.

(b) The examiner must be a registered nurse (RN) with a current active license to practice nursing as an RN, who is in good standing with the Division of Occupational and Professional Licensing (DOPL) in the state of Utah, with at least one year of experience in providing care for the elderly or chronically ill of any age;

(c) If the individual fails to satisfactorily complete the skills or written examination after three attempts at either, the candidate must be advised of the areas in which the candidate is inadequate and must retrain at an approved NATCEP;

(d) UNAR shall advise an individual who takes the competency evaluation that a record of the outcome of the evaluation will be included in the nursing assistant registry. Further, UNAR shall require the individual to sign a Release of Information form that indicates the nurse aide's understanding of information that UNAR requires to be entered into the registry;

(e) UNAR shall periodically update and validate the competency evaluations;

(f) UNAR shall establish a written and oral examination

that addresses each requirement as prescribed in OBRA. UNAR must develop this examination from a pool of test questions, only a portion of which to use in any one evaluation, under a system that maintains the integrity of both the pool of questions and individual evaluations;

(g) The competency evaluation must include a demonstration of the tasks the nurse aide is expected to perform as part of the nurse aide's function as a CNA;

(h) For the skills training component of the evaluation, UNAR shall establish a performance record for each NATCEP of major duties and skills that include:

(i) a list of the duties and skills that UNAR expects a CNA to learn in the program in accordance with this section;

(ii) a record that documents when the nurse aide performs this duty or skill;

(iii) documentation of satisfactory or unsatisfactory performance;

(iv) the date of the performance; and

(v) the instructor supervising the performance.

(2) At the completion of the NATCEP, the NATCEP shall give the nurse aide a copy of this record.

(3) The demonstration aspect of the skills training portion of the competency evaluation must have at least five performance tasks, all of which are included in the performance record. UNAR shall select five tasks for each nurse aide from a pool of evaluation items ranked according to degree of difficulty. UNAR shall make a random selection of tasks with at least one task from each degree of difficulty.

R432-45-5. Nurse Aide Training Requirements Under UNAR.

(1) UNAR shall administer a NATCEP through a contract with the Department of Health.

(2) An agency that conducts a NATCEP must be UNAR-approved.

(3) Applicants for approval of a NATCEP and all new NATCEP instructors must successfully complete a background clearance.

(a) A NATCEP must submit required information to UNAR to initiate a background clearance for each applicant and instructor.

(b) UNAR shall ensure:

(i) required information is entered into the Direct Access Clearance System to initiate a clearance for each applicant and instructor;

(ii) each applicant and instructor signs a criminal background screening authorization form which must be available for review by the department;

(iii) each applicant and instructor submits fingerprints; and

(iv) the Direct Access Clearance System reflects the current status of the applicant and instructor.

(c) If the Department determines an applicant or instructor are not eligible, based on information obtained through the Direct Access Clearance System, the Department shall send a Notice of Agency Action to UNAR and the individual explaining the action and the individual's right of appeal as defined in R432-30.

(4) In accordance with this section, UNAR shall review and render a determination of approval or disapproval of any NATCEP when a Medicare or Medicaid participating nursing facility requests the determination. UNAR at its option, may also agree to review and render approval or disapproval of any private NATCEP.

(5) UNAR must, within 90 days of the date of an application, either advise the requestor of UNAR's determination, or must seek additional information from the requesting entity with respect to the program for which it is seeking approval.

(6) UNAR shall approve a NATCEP that meets the criteria specified in OBRA, the Centers for Medicare and Medicaid Service's guidelines, guidelines designated by the Department of Health, and all UNAR requirements.

(a) UNAR shall admit a student who is at least 16 years old on or before the first day the student begins class; and

(b) shall include an orientation to the training program.

(7) The nurse aide training program must meet certain content requirements to be UNAR-approved.

(a) NATCEP must consist of at least 100 hours of supervised and documented training by a licensed nurse.

(b) The curriculum of the training program must include the following subjects:

(i) communication and interpersonal skills;

(ii) infection control;

(iii) safety and emergency procedures;

(iv) promoting resident independence;

(v) respecting resident rights; and

(vi) basic nursing skills.

(c) The trainee must complete at least 24 hours of supervised practical training in a long-term care facility, and complete all skill curriculum and skill competencies before training in any facility. The skills training must ensure that each nurse aide demonstrates competencies in the following areas:

(i) Basic nursing skills:

(A) taking and recording vital signs;

(B) measuring and recording height;

(C) caring for residents' environment; and

(D) recognizing abnormal signs and symptoms of common diseases and conditions.

(ii) Personal care skills:

(A) bathing that includes mouth care;

(B) grooming;

(C) dressing;

(D) using the toilet;

(E) assisting with eating and hydration;

(F) proper feeding techniques; and

(G) skin care.

(iii) Basic restorative services:

(A) use of assistive devices in ambulation, eating, and dressing;

(B) maintenance of range of motion;

(C) proper turning and positioning in bed and chair;

(D) bowel and bladder training;

(E) care and use of prosthetic and orthotic devices; and

(F) transfer techniques.

(iv) Mental Health and Social Service Skills:

(A) modifying one's behavior in response to the resident's behavior;

(B) identifying developmental tasks associated with the aging process;

(C) training the resident in self-care according to the resident's ability;

(D) behavior management by reinforcing appropriate resident behavior and reducing or eliminating inappropriate behavior;

(E) allowing the resident to make personal choices, providing and reinforcing other behavior consistent with the resident's dignity; and

(F) using the resident's family as a source of emotional support.

(v) Resident's rights:

(a) providing privacy and maintaining confidentiality;

(b) promoting the resident's right to make personal choices to accommodate the resident's needs;

(c) giving assistance in solving grievances;

(d) providing needed assistance in getting to and participating in resident and family groups and other activities;

(e) maintaining care and security of resident's personal possessions;

(f) providing care that keeps a resident free from abuse, mistreatment, or neglect, and reporting any instances of poor care to appropriate facility staff; and

(g) maintaining the resident's environment and care through appropriate nurse aide behavior to minimize the need for physical and chemical restraints.

(8) Qualification of Instructors:

(a) a NATCEP must have a program coordinator who is a registered nurse with a current and active Utah license to practice;

(b) who is in good standing with DOPL;

(c) with two years of nursing experience, at least one of which is the provision of long-term care facility services or caring for the elderly or chronically ill of any age; and

(d) must have at least three hours of documented consulting time per month with the respective program.

(9) Nursing facility-based programs:

(a) the program coordinator in a nursing facility-based program may be the director of nursing for the facility as long as the facility remains in full compliance with OBRA requirements;

(b) the primary instructor must be a licensed nurse with a current and active Utah license to practice and must be in good standing with DOPL; and

(c) must have two years of nursing experience, at least one of which is the provision of long-term care facility services or caring for the elderly or chronically ill of any age.

(10) Before approval of a NATCEP, the program coordinator and primary instructor must successfully complete a UNAR-approved "Train-the-Trainer" program or demonstrate competence to teach a CNA candidate who is at least 16 years old. All high school instructors must be certified to teach in the classroom by completing a "Train the Trainer" program or be certified to teach as defined by the Utah State Office of Education before providing instruction in the classroom.

(11) Students who provide services to residents must be under the direct supervision of a licensed nurse who is a UNAR-approved clinical instructor and whose clinical time is separate from her facility employment.

(12) Qualified personnel from the health professions may supplement the program coordinator and primary instructor. The program coordinator or primary instructor must be present during all provided supplemental training.

(13) Qualified personnel include registered nurses, licensed practical or vocational nurses, pharmacists, dietitians, social workers, sanitarians, fire safety experts, nursing home administrators, gerontologists, psychologists, physical and occupational therapists, activities specialists, speech or language therapists, and any other qualified personnel.

(14) UNAR requires qualified personnel to have at least one year of current experience in the care of the elderly or chronically ill of any age, or to have equivalent experience. Qualified personnel must also meet current licensure requirements, whether they are registered or certified in their field.

(15) A NATCEP must have a student-to-instructor ratio of 12:1 for clinical instruction and shall not exceed a 30:1 ratio for theory instruction. UNAR requires an instructor assistant when the program has more than 20 students.

(16) A NATCEP must provide a classroom with the following:

(a) adequate space and furniture for the number of students;

(b) adequate lighting and ventilation;

(c) comfortable temperature;

(d) appropriate audio-visual equipment;

(e) skills lab equipment to simulate a resident's unit;

(f) clean and safe environment; and

(g) appropriate textbooks and reference materials.

(17) Initial post-approval and ongoing reviews:

(a) After the initial approval of a NATCEP, UNAR grants a one-year probationary period;

(b) During the probationary period, UNAR may withdraw program approval if there is a violation of OBRA, state, federal, or UNAR requirements;

(c) After the probationary period, UNAR shall complete an on-site review and then complete subsequent on-site reviews at least every two years;

(d) The CNA training program shall submit a self-evaluation to UNAR during the interim year that UNAR does not complete an on-site review;

(e) In the event that UNAR does not complete an on-site review within two years, the CNA training program is responsible to send a self-evaluation to UNAR for the applicable two-year period;

(f) If UNAR does not make an on-site visit within two years and the CNA training program sends in a self-evaluation, UNAR must make an on-site visit within one year of the self-evaluation.

(18) The training and evaluation program review must include:

(a) skills training experience;

(b) maintenance of qualified faculty members for both classroom and skills portions of the nurse aide training program;

(c) maintenance of the security of the competency evaluation examinations;

(d) a record of complaints received about the program;

(e) a record that each nursing facility has provided certified nurse aides with at least 12 hours of staff development training each year with the compensation for the training;

(f) curriculum content that meets state and federal requirements; and

(g) classroom facilities and required equipment that meet state, federal, and UNAR requirements.

R432-45-6. Certified Nurse Aide Misconduct.

CNA misconduct that adversely affects the health, safety or welfare of the public may result in loss of nurse aide certification.

(1) CNA misconduct related to client safety and integrity includes:

(a) leaving a nursing assistant assignment without properly notifying appropriate supervisory personnel;

(b) failing to report information regarding incompetent, unethical or illegal practice of any health care provider to proper authorities;

(c) failing to respect client rights and dignity regardless of social or economic status, personal attributes, or nature of health problems or disability; or

(d) failing to report actual or suspected incidents of client abuse.

(2) Engaging in sexual misconduct related to the client or to the workplace includes:

(a) engaging in sexual relations if the patient is receiving care from an institution or entity that employs the CNA;

(b) engaging in sexual relations with a client for a period when a generally recognized caregiver and patient relationship exists; or

(c) engaging in sexual relations for an extended period when a patient has reasonable cause to believe a professional relationship exists between the patient or anyone certified under the provisions of this rule (Rule R432-45).

(3) CNA misconduct related to administrative rules and state and federal law includes:

(a) knowingly aiding, abetting or assisting an individual to violate or circumvent any rule or regulation intended to guide the conduct of health care providers;

(b) violating the privacy rights and confidentiality of a client, unless disclosure of client information is required by law;

(c) discriminating against a client on the basis of age, race, religion, sex, sexual preference, national origin, or disability;

(d) abusing a client by intentionally causing physical harm or discomfort, or by striking a client, intimidating a client, threatening a client, or harassing a client;

(e) neglecting a client by allowing a client to be injured or remain in physical pain and discomfort;

(f) engaging in other unacceptable behavior or verbal abuse towards or in the presence of a client by using derogatory names or gestures or profane language;

(g) using the client relationship to exploit the client by gaining property or other items of value from the client either for personal gain or sale, beyond the compensation for services;

(h) possessing, obtaining, attempting to obtain, furnishing or administering prescription or controlled drugs to any person, including oneself, except as directed by a health care professional authorized by law to prescribe drugs; or

(i) removing or attempting to remove drugs, supplies, property, or money from the workplace without authorization.

(4) CNA misconduct related to communication includes:

(a) inaccurate recordkeeping in client or agency records;

(b) incomplete recordkeeping regarding client care that includes failure to document care given or other information important to the client's care or documentation which is inconsistent with the care given;

(c) falsifying a client or agency record that includes filling in someone else's omissions, signing someone else's name, recording care not given, or fabricating data and values;

(d) altering a client or agency record that includes changing words, letters and numbers from the original document to mislead the reader of the record, and adding to the record after the original time and date without indicating a late entry;

(e) destroying a client or agency record;

(f) failing to maintain client records in a timely manner which accurately reflect management of client care, including failure to make a late entry within a reasonable time period; or

(g) failing to communicate information regarding the client's status to the supervising nurse or other appropriate person in a timely manner.

(5) CNA misconduct related to the client's family includes:

(a) failing to respect the rights of the client's family regardless of social or economic status, race, religion, or national origin;

(b) using the CNA-client relationship to exploit the family for the CNA's personal gain or for any other reason;

(c) stealing money, property, services, or supplies from the family; or

(d) soliciting or borrowing money, materials or property from the family.

(6) CNA misconduct related to co-workers that includes violent, abusive, threatening, harassing, or intimidating behavior towards a co-worker, which either occurs in the presence of clients or otherwise relates to the delivery of safe care to clients.

(7) CNA misconduct related to achieving and maintaining clinical competency includes:

(a) failing to competently perform the duties of a nursing assistant;

(b) performing acts beyond the authorized duties for which the individual is certified; or

(c) assuming duties and responsibilities of a nursing assistant without nursing assistant training or when competency has not been established or maintained.

(8) CNA misconduct related to impaired function includes:

(a) using drugs, alcohol or mind-altering substances to an extent or in a manner dangerous or injurious to the nursing assistant or others, or to an extent that such use impairs the ability to safely conduct the duties of a nursing assistant; or

(b) having a physical or mental condition that makes the nursing assistant unable to safely perform the duties of a nursing assistant.

(9) CNA misconduct related to certificate violations includes:

(a) providing, selling, applying for, or attempting to procure a certificate by willful fraud or misrepresentation;

(b) functioning as a medication assistant without current certification as a medication assistant;

(c) altering a certificate of completion of training or nursing assistant certification;

(d) disclosing contents of the competency examination or soliciting, accepting or compiling information regarding the contents of the examination before, during or after its administration;

(e) allowing another person to use one's nursing assistant certificate for any purpose;

(f) using another's nursing assistant certificate for any purpose; or

(g) representing oneself as a CNA without current, valid CNA certification.

R432-45-7. Nurse Aide Registry.

(1) UNAR is the central registry for all certified nurse aides. This registry must identify all individuals who have successfully completed a NATCEP with a passing score of 75.

(2) A NATCEP must report to UNAR, within five days after the program ends, the names of all individuals who satisfactorily completed the program.

(3) UNAR processes all renewals for each nurse aide who has performed paid services for at least 200 hours of nursing or nursing-related services under the direction of a licensed nurse during the 24 months following the completion date of the NATCEP or certification renewal.

(4) The state survey agency shall enforce the standards of UNAR described in OBRA, Secs. 4211 and 4212.

(5) The state survey agency shall investigate all complaints of resident neglect, abuse or misappropriation of resident property by a CNA. A CNA is entitled to a hearing through the Division of Medicaid and Health Financing before a substantiated claim can be entered into the registry.

(6) After notification from the health facility licensing, certification and resident assessment agency of a substantiated claim of abuse, neglect or misappropriation of property of a vulnerable adult by a CNA, the name of the CNA and an accurate summary of the findings are placed in the abuse registry in accordance with UNAR protocol.

R432-45-8. Limitations.

(1) UNAR may approve a facility-based NATCEP only if the facility's participation in the Medicare and Medicaid programs has not been terminated within the last two years.

(2) UNAR must review and reapprove a NATCEP at least every two years.

(3) A skilled nursing facility that participates in a Medicare or Medicaid facility may not administer the written and skills components of the competency evaluation.

(4) A nursing facility may employ a nurse aide for more than 120 days only if the aide has completed a NATCEP.

(5) Upon review of program performance standards, UNAR shall terminate a program that does not provide an acceptable plan to correct deficiencies.

KEY: health care facilities
October 17, 2019 26-21-5
Notice of Continuation April 5, 2019 26-21-1

R523. Human Services, Substance Abuse and Mental Health.
R523-4. Certification Requirements for Screening, Assessment, Prevention, Treatment and Recovery Support Programs for Adults.
R523-4-1. Authority.

This rule is authorized by Section 62A-15-103(j) and 62A-15-103(2)(a)(v) requiring the Division of Substance Abuse and Mental Health (Division) to establish by rule, in accordance with Title 63G, Chapter 3, Utah Administrative Rulemaking Act, minimum standards and requirements for the provision of substance use disorder and mental health treatment for adults required to participate in treatment by the court or the Board of Pardons and Parole.

R523-4-2. Purpose.

This rule prescribes the minimum standards required for justice certification of mental health and substance use disorder (SUD) providers serving adults participating in mandatory education and treatment programs designed to reduce criminogenic risk.

R523-4-3. Definitions.

(1) "Screening" means a preliminary appraisal of an adult to determine if further assessment of mental health, and/or substance use risk and needs is warranted.

(2) "Assessment" means an in-depth clinical interview with a licensed mental health therapist, used to:

(a) Determine if an adult is in need of:

(i) Mental health or substance use disorder treatment;

(ii) An educational series;

(iii) Recovery support services;

(b) Recommend a needed level of care or array of services.

(3) "Criminogenic Risk" means individual characteristics that are directly related to researched causations of crime.

(4) "Level of Care" means the intensity of either substance use disorder services needed as defined by the American Society of Addiction Medicine (ASAM) or the array of services needed to address an individual's mental health issues.

(5) "Treatment" means the array of therapeutic services, including individual, family, group services, medications and interventions designed to improve and enhance social or psychological functioning and reduce criminogenic risk for individuals identified as having either mental health or substance use disorders.

(6) "Educational Series" means an evidence-based instructional series obtained at a substance use disorder program that is approved by the Division of Substance Abuse and Mental Health in accordance with Section 62A-15-105 designed to prevent the onset of substance use and/or mental health disorders.

(7) "Recovery" means a process of change through which individuals improve their health and wellness, live a self-directed life, and strive to reach their full potential.

(8) "Recovery Support" means social support services or activities provided before, during or after completion of acute treatment services to enhance an individual's ability to either attain or retain their recovery from either mental health or substance use disorders.

(9) "Mandatory" means education or treatment ordered, motivated, or supervised by the criminal justice system.

R523-4. Eligibility for Justice Certification.

(1) All programs or providers desiring to deliver mandatory education, or treatment services shall apply for and achieve a justice certification.

(2) The Division shall accept applications for certification from licensed human services programs providing SUD and mental health services, sole practitioners and health care facilities.

(3) Applicants for certification shall:

(a) Obtain and maintain facility license from the Department of Human Services, Office of Licensing or a health care facility license issued by Utah Department of Health, or;

(b) Sole practitioners shall submit proof of:

(i) An unencumbered license from the Utah Department of Occupational Licensing;

(ii) Adequate and appropriate malpractice insurance, and

(iii) An ability to meet all the requirements of R523-4-4 through R523-4-9.

(4) Justice certification is not required for the following programs and providers:

(a) Health care providers providing physical healthcare and limited behavioral health services and counseling;

(b) Health providers prescribing medication for physical health, substance use disorder or behavioral health treatment; and

(c) Opioid Treatment Programs engaged in opioid treatment of individuals with an opioid agonist treatment medication registered under 21 U.S.C. Sec. 823(g),licensed by the Office of Licensing, within the Department of Human Services, and certified by the Substance Abuse and Mental Health Services Administration in accordance with 42 C.F.R. 8.11;

(d) Recovery residences licensed by the Office of Licensing, within the Department of Human Services and in compliance with R501-18; and

(e) Programs and Sole Practitioners working with adults with low criminogenic risk identified using a valid and reliable screening instrument consistent with the standards in R523-4-5.

R523-4-5. Standards for Criminogenic Risk Screening.

(1) Prior to participating in any compelled education or treatment, adults shall complete a brief, validated criminogenic risk screen.

(2) The screen shall evaluate behaviors and characteristics known to predict re-offending including delinquency history, social history, and attitudes/behaviors about substance use, antisocial cognition, antisocial associates, family and marital relations, employment, and leisure and recreational activities;

(3) Screens shall be used to inform the probability of whether the adult is of low, moderate, or high risk to re-offend

(4) Screens may be completed by partner agencies such as the courts, law enforcement or supervising entity and reported to treatment providers.

(5) Screens shall be included and documented in the adult's service records.

(6) When a screen identifies an adult with low criminogenic risk the provider shall:

(a) Report the results of the screen to the court;

(b) Refer the adult to non-criminal justice agencies for any desired treatment, or

(c) Provide services in a manner that limits exposure to adults with high criminogenic risk.

(7) When a screen identifies an adult with moderate or high criminogenic risk, the provider shall refer the adult to a justice certified provider or deliver services that meet the standards outlined in this rule.

R523-4-6. Standards for Substance Use and Mental Health Disorder Screening and Assessment.

(1) All adults shall complete a mental health/substance use disorder screen using an instrument(s) that has been evaluated and found reliable and valid by the scientific community.

(2) If the screening indicates a low probability for a substance use disorder or mental illness, the screening agency may recommend participation in an educational series.

(3) An assessment shall be completed if the screening

indicates a need for further assessment for potential substance use and/or mental health disorders.

(4) An assessment shall be conducted prior to admission to a clinical treatment level of care.

(5) An initial assessments shall:

(a) Determine the adult's eligibility for treatment, provide the basis for a treatment plan, and establish a baseline measure for use in evaluating a patient's response to treatment.

(b) Identify comorbid medical and psychiatric conditions and diagnosis and to determine how, when and where they will be addressed;

(c) Identify communicable diseases and address them as needed;

(d) Evaluate the adult's level of physical, psychological and social functioning or impairment;

(e) Assess the adult's access to social supports, family, friends, employment, housing, finances and legal problems; and

(f) Determine the adult's readiness to participate in treatment.

(6) Substance use disorder assessments shall address:

(a) Risk of acute psychosis, intoxication/withdrawal;

(b) Biomedical conditions or complications;

(c) Emotional, behavioral, or cognitive conditions;

(d) Readiness to change;

(e) Relapse, continued use or continued problem potential; and

(f) Recovery environment.

(7) Individuals in need of treatment shall only be referred to agencies that are justice certified.

R523-4-7. Standards for Providers of an Educational Series.

(1) Applicants for certification shall:

(a) Use only educational series materials that meet the requirements for listing on Utah's registry of evidence-based practices identified in Section R523-9;

(b) Ensure all adults have received screens, and if indicated, assessed for criminogenic risk, SUD and mental illness prior to entry into services;

(c) Provide serves only to individuals that will benefit from an educational series;

(d) Provide accurate information designed to promote compliance with Utah laws;

(e) Address the risk factors related to substance use, and assist the adult in recognizing the harmful consequences of inappropriate substance use;

(f) Target adults whose problems and risk factors appear to be related to substance use, but do not appear to meet any diagnostic criteria for substance related disorders;

(g) Meet the requirements set forth in Subsection 62A-15-103(h) and Subsection R523-4-7(1)(b) through 1(f);

(h) Maintain records documenting the individual's attendance and course completion or failure to attend and/or complete;

(i) Serve adults and minors in separate groups;

(j) Serve individuals with low criminogenic risk in separate settings;

(k) Complete surveys and data requests as requested by the Division; and

(l) Provide communication with the court that includes appropriate clinical justification prior to referring individuals to higher levels of care.

R523-4-8. Standards for Community-Based Treatment.

(1) All substance use programs licensed by the Department of Human Services Office of Licensing shall annually complete and submit the National Survey on Substance Abuse Treatment Survey (N-SSATS), and all mental health programs shall annually complete and submit the National Mental Health Service Survey (N-MHSS).

(2) Certified programs, sole proprietors and health clinics providing behavioral health treatment shall:

(a) Conduct risk, need, and responsivity (RNR) screens and clinical assessments to determine effective supervision and treatment strategies;

(b) Base interventions on the person's level of criminogenic risk, and level of substance use disorder and/or mental illness;

(c) Ensure treatment is tailored to the individual and addresses:

(i) motivation,

(ii) problem solving,

(iii) skill building to improve cognitive, social, emotional, and coping skills, and

(iv) assists in building prosocial supports and activities;

(d) Ensure service for SUD including assessment, treatment planning, continued stay and discharge planning are consistent with the most current ASAM Criteria;

(e) Include medication assisted treatment (MAT) in opioid use disorder and alcohol use disorder interventions;

(f) Provide random, unpredictable, and frequent drug testing in the supervision of persons with SUD, and ensure drug testing procedures and policies are compliant with R523-15;

(g) Assist adults with housing, employment, vocational activities, and building social supports;

(h) Maintain a complete and accurate record of all clinical services for each individual served that contains the following information:

(i) any and all screenings and assessments completed,

(ii) any and all consent forms or required disclosures,

(iii) a comprehensive treatment plan,

(iv) progress notes,

(v) continuing recovery recommendations upon discharge, and

(vi) documentation of receipt for all payments made by participants as contributions to the cost of treatment; and

(i) Complete any training required by the Division as a condition of certification.

R523-4-9. Justice Certification Procedures.

(1) Providers seeking first-time approval or re-approval shall make application to the Division at least 60 days prior to delivering services.

(2) Each provider seeking certification shall submit a completed and signed application and assurances form to the Division.

(3) All application forms shall be reviewed by the Division.

(4) The Division shall determine if the application is complete and demonstrates compliance with this rule.

(5) If the Division approves the application and determines the program has met all other requirements, the Division shall provisionally certify the program for a period of up to one year.

(6) The Division shall notify all applicants of the status of their applications in writing. The status of an application may be:

(a) Approved,

(b) Denied, or

(c) Requires additional information.

(7) A final certification shall be completed within the one year provisional certification period of time, according to the procedures established by the Division.

(8) If an application for re-approval requires additional information, a previously certified program may continue to provide services for 30 days from the date of notification unless notified by the Division to cease and desist.

R523-4-10. Corrective Action.

(1) When the Division becomes aware that a provider is in violation of this rule the Division shall:

(a) Identify in writing the specific areas in which the provider is not in compliance; and

(b) Send written notice to the provider within 30 days after becoming aware of the violation.

(2) The provider shall submit a written plan for achieving compliance within 30 days of notification of noncompliance.

R523-4-11. Suspension and Revocation.

(1) The Division may suspend the approval of a provider when a provider fails to:

(a) Respond in writing to areas of noncompliance identified in writing by the Division within the defined period;

(b) Comply with corrective action as agreed upon in its written response to the Division; or

(c) Allow the Division access to information or records necessary to determine the provider's compliance under this rule.

(2) The Division may revoke approval if a provider:

(a) Continues to provide the educational series after suspension;

(b) Fails to comply with corrective action while under a suspension; or

(c) Commits a second violation which constitutes grounds for suspension when a previous violation resulted in a suspension during the last 24 months.

(3) The Division shall notify the Administrative Office of the Courts, the Utah Department of Corrections, the Department of Human Services, Office of Licensing and county local authorities when a certification is suspended or revoked.

R523-4-12. Procedure for Denial, Suspension, or Revocation.

(1) If the Division has grounds for action under this rule and intends to deny, suspend or revoke approval of a provider, the Division shall notify the applicant or provider of the action to be taken.

(2) A notice to deny, suspend or revoke approval shall contain the reasons for the action, to include all statutory or rule violations, and a date when the action shall become effective.

(3) The provider may request a meeting with the Director or their designee within ten calendar days of receipt of notification.

(4) A request for a meeting for this purpose shall be in writing.

(5) Within ten days following the close of the meeting the Division shall inform the provider or applicant in writing of the decision of the Director or Designee of the Division.

R523-4-13. Posting of Certified Providers.

(1) The Division shall maintain and make public a list of all certified educational or prevention series and treatment programs.

(2) The list shall include agency contact information, service location address, and target population, and a brief description of services offered.

KEY: justice certification assessment standards, justice certification requirements, justice certification screening standards, justice certification treatment standards

October 23, 2019 **62A-15-103(j)**
62A-15-103.5
42 CFR Part 2

R523. Human Services, Substance Abuse and Mental Health.
R523-20. Community Firearms Violence and Suicide Prevention Standards.
R523-20-1. Authority.

(1) This rule establishes procedures and standards for administration of suicide prevention education grant funds as granted by Subsection 62A-15-103(3)(d).

R523-20-2. Purpose.

(1) This rule establishes procedures for distribution of goods and services specified in Section 62A-15-103 (3).

R523-20-3. Development and Distribution of Suicide Prevention Pamphlets.

(1) The Division of Substance Abuse and Mental Health (DSAMH) will coordinate with the Department of Health, local mental health and substance abuse authorities, a nonprofit behavioral health advocacy group, and a representative from a Utah-based nonprofit organization with expertise in the field of firearm use and safety that represents firearm owners, to produce, periodically review and update, and to distribute firearm safety brochures and packets.

(2) Brochures shall be made available through the Utah Suicide Prevention Coalition and groups outlined in Section 62A-15-103(3)(b), and by request from other interested parties.

R523-20-4. Purchase and Distribution of Gun Locks.

(1) DSAMH shall use standard procurement processes to enter into a contract for ongoing purchase of cable style gun locks for distribution.

R523-20-5. Gun Safe Coupon Distribution.

(1) DSAMH shall coordinate with the Department of Public Safety (DPS) to administer a redeemable coupon program for Utah residents with a current concealed firearm permit, and Utah residents applying for concealed firearm permit.

(2) DSAMH shall establish a registration process for the coupons.

(a) DPS shall alert concealed firearm permit holders by post on the Bureau of Criminal Investigations webpage;

(b) coupons shall be dispensed on a first come first serve basis;

(c) individuals receiving coupons will be required to submit concealed firearm permit number and receipt for safe purchase for reimbursement of funds as outlined in application process, and

(d) only 1 coupon shall be available per permit number holder.

(3) This program operates on on-time funding, therefore, coupons shall be available until all funds are expended.

KEY: firearm safety and suicide prevention program, gun locks, gun safe coupons, firearm safety and suicide prevention pamphlets
October 23, 2019 **62A-15-103(3)(d)**
62A-15-1101(7)(b)(ii)

R652. Natural Resources; Forestry, Fire and State Lands.
R652-120. Wildland Fire Responsibilities.
R652-120-100. Authority and Purpose.

This rule is adopted pursuant to the authority of Subsection 65A-1-4(2), which requires the Division to promulgate rules, and by Section 65A-8-101 et seq., which requires the Division to determine and execute the best method for fire control and the preservation of forest, watershed, and other lands, and to enter into agreements related to fire protection.

R652-120-200. Responsibilities of Division.

1. The division in consultation with local authorities, the division shall determine and execute the best method for protecting private and public property by:

(a) except as provided by Subsection (1), preventing, preparing for, or mitigating the origin and spread of fire on nonfederal forest, range, watershed or wildland urban interface land in the state;

(b) encouraging a private landowner to conserve, protect, and manage forest or other land throughout the state;

(c) taking action the division considers appropriate to manage wildland fire and protect life and property on the non-federal forest, range, watershed, or wildland urban interface land within the state.

(d) implementing a limited fire suppression strategy, including allowing a fire to burn within limited or modified suppression, if the division determines the strategy is appropriate for a specific area or circumstance.

(e) the state forester shall make certain that appropriate action is taken to control wildland fires on unincorporated non-federal forest, range, watershed and wildland urban interface lands.

2. The division may enter into a cooperative agreement with a county, municipality, or other eligible entity to provide financial and wildland fire management assistance.

R652-120-300. Responsibilities of Counties.

1. A county shall abate the public nuisance caused by wildfire on unincorporated, privately owned or county owned forest, range, watershed, and wildland urban interface lands within its boundaries.

(a) reduce the risk of wildfire to unincorporated, privately owned or county owned forest, range, watershed, and wildland urban interface land within the county's boundaries, with private landowner permission, through appropriate wildfire prevention, preparedness, and mitigation actions; and

(b) ensure effective wildfire initial attack on unincorporated privately owned or county owned forest, range, watershed, and wildland urban interface land within the county's boundaries.

(c) a county may assign the responsibilities described in Subsections (a) and (b) to a fire service provider or an eligible entity through delegation, contract, interlocal agreement or another method.

2. In a county that has not entered into a cooperative agreement as described in Section 65A-8-203 the county sheriff shall take appropriate action to suppress wildfires on state or private lands.

3. In all cases the sheriff shall:

(a) report, as prescribed by the state forester, on wildland fire control action;

(b) investigate and report wildfire causes; and

(c) enforce the provisions of this rule either independently or in cooperation with the state forester.

4. A county that has entered into a cooperative agreement, as described in 65A-8-203 and R652-120-600, the primary responsibility for wildfire management is the division, upon the delegation of fire management authority as described in 65A-8-203.1 and R652-120-1200.

5. The county sheriff and the county sheriff's organization shall maintain cooperative support with the fire management organization.

6. Each county that participates in a cooperative agreement with the division as described in 65A-8-203 and R652-120-600(5), shall be represented by a county fire warden at minimum during the closed fire season, as described in Section 65A-8-211, except as provided in Subsections (1)(b) and (c).

7. A county may enter into a cooperative agreement with the division to receive financial and wildland fire management cooperation and assistance.

R652-120-400. Responsibilities of Municipalities.

1. A municipality shall abate the public nuisance caused by wildfire on forest, range, watershed, and wildland urban interface lands within the boundaries of the municipality if the land is privately owned or owned by the municipality.

(a) reduce the risk of wildfire to unincorporated, privately owned or municipality owned forest, range, watershed, and wildland urban interface land, with private landowner permission, through appropriate wildfire prevention, preparedness, and mitigation actions; and

(b) ensure effective wildfire initial attack on unincorporated privately owned or municipality owned forest, range, watershed, and wildland urban interface land within the municipality's fire protection boundaries.

(c) a municipality may assign the responsibilities described in Subsections (a) and (b) to a fire service provider or an eligible entity through delegation, contract, interlocal agreement or another method.

2. A municipality may enter into a cooperative agreement with the division to receive financial and wildland fire management cooperation and assistance.

R652-120-500. Burning Permits.

1. Burning permits shall be issued only by the following authorized officials: state forester, his staff, and persons designated by the state forester. Burning permits are required for open fires during the closed fire season as specified in Section 65A-8-211 and during any extension of the closed fire season proclaimed by the state forester.

2. The permit form, provided by the state forester, shall be filled out completely and in accordance with instructions determined and furnished by his office.

3. Permittees shall comply with any written restrictions or conditions imposed with the granting of the permit.

4. The permittee shall sign the permit form.

5. Burning permits will be issued only when in compliance with the Utah Air Conservation Regulations. The following requirements must be met with each burning permit issued:

(a) The permit is not valid and operative unless the Clearing Index is 500 or above. The clearing index is determined daily by the U.S. Weather Bureau and available from county health offices, the State Forester's Office or Area Offices of the Utah State Department of Health.

(b) A permit may be extended one day at a time, without inspection upon request to the issuing officer. The request must be made before the expiration of the permit.

6. Agriculture has a limited exemption to open burning restrictions for the Division of Forestry, Fire and State Lands rules as indicated in Section 65A-8-211 and the Utah Air Conservation Regulations as outlined in Section 19-2-114.

7. Burning permits shall not be issued when red flag conditions exist or are forecasted by the National Weather Service. Every permittee is required to contact the National Weather Service to assure that a red flag condition does not exist or is not forecasted. Permits are not valid or operative during declared red flag conditions.

R652-120-600. Limited Suppression Areas.

1. The division may establish fire management areas where the level and degree of suppression activities are to be commensurate with the value of the resources within the fire management area.

2. Fire management plans shall be available for public review and comment prior to implementation.

3. County commission approval is required for any fire management plan that provides for limited fire suppression action on private lands within a fire management area.

R652-120-700. Prescribed Fire.

1. All prescribed burns utilizing division assistance other than permitting must have a written burn plan that has been reviewed and approved by the division. Burn plans shall include at a minimum information to determine management objectives and procedures to attain the objectives. Data will be provided to deal with safety concerns and smoke management. The burn plan will detail needs to insure the prescribed burn occurs within prescription.

2. A private landowner or state lessee/permittee receiving assistance on a prescribed fire shall supply resources specified in the burn plan.

3. Fire-fighting equipment placed by the division in any county for fire protection purposes cannot be required to assist or be fully committed to a prescribed fire, but may be utilized as available.

R652-120-800. Management for Cultural Resources and Threatened and Endangered Species.

Cultural resources, paleontological resources, and threatened and endangered species which may be affected by a proposed prescribed fire or within a fire management plan will be considered, protected or mitigated, as may be required and practical.

KEY: administrative procedures, burns, permits, endangered species
January 10, 2017 65A-8-101
Notice of Continuation October 24, 2019 65A-8-211

R657. Natural Resources, Wildlife Resources.
R657-10. Taking Cougar.
R657-10-1. Purpose and Authority.

(1) Under authority of Sections 23-14-18 and 23-14-19 of the Utah Code, the Wildlife Board has established this rule for taking and pursuing cougar.

(2) Specific dates, areas, number of permits, limits, and other administrative details which may change annually are published in the guidebook of the Wildlife Board for taking cougar.

R657-10-2. Definitions.

(1) Terms used in this rule are defined in Section 23-13-2.

(2) In addition:

(a) "Canned hunt" means that a cougar is treed, cornered, held at bay or its ability to escape is otherwise restricted for the purpose of allowing a person who was not a member of the initial hunting party to arrive and take the cougar.

(b) "Compensation" means anything of economic value in excess of $100 that is paid, loaned, granted, given, donated, or transferred to a dog handler for or in consideration of pursuing cougar for any purpose.

(c) "Cougar" means Puma concolor, commonly known as mountain lion, lion, puma, panther or catamount.

(d) "Cougar control permit" means a harvest objective permit that authorizes a person to take a second cougar on harvest objective units that have an unlimited quota.

(e) "Cougar pursuit permit" means a permit that authorizes a person to pursue cougar during designated seasons.

(f) "Dog handler" means the person in the field that is responsible for transporting, releasing, tracking, controlling, managing, training, commanding and retrieving the dogs involved in the pursuit. The owner of the dogs is presumed the dog handler when the owner is in the field during pursuit.

(g) "Evidence of sex" means the sex organs of a cougar, including a penis, scrotum or vulva.

(h) "Green pelt" means the untanned hide or skin of any cougar.

(i) "Harvest objective hunt" means any hunt that is identified as harvest objective in the hunt table of the guidebook for taking cougar.

(j) "Harvest objective permit" means any permit valid on harvest objective units, including limited-entry permits for split units after the split-unit transition date.

(k) "Immediate family member" means a livestock owner's spouse, child, son-in-law, daughter-in-law, father, mother, father-in-law, mother-in-law, brother, sister, brother-in-law, sister-in-law, stepchild and grandchild.

(l) "Kitten" means a cougar less than one year of age.

(m) "Kitten with spots" means a cougar that has obvious spots on its sides or its back.

(n) "Limited entry hunt" means any hunt listed in the hunt tables of the guidebook of the Wildlife Board for taking cougar, which is identified as limited entry and does not include harvest objective hunts.

(o) "Limited entry permit" means any permit obtained for a limited entry hunt by any means, including conservation permits and sportsman permits.

(p) "Private lands" means any lands that are not public lands, excluding Indian trust lands.

(q) "Public lands" means any lands owned by the state, a political subdivision or independent entity of the state, or the United States, excluding Indian trust lands, that are open to the public for purposes of engaging in pursuit.

(r) "Pursue" means to chase, tree, corner or hold a cougar at bay.

(s) "Split unit" means a cougar hunting unit that begins as a limited entry unit then transitions into a harvest objective unit.

(t) "Unlimited quota unit" means a harvest objective unit that does not have a limit on the number of cougar that may be harvested during the open season.

(u) "Waiting period" means a specified period of time that a person who has obtained a cougar permit must wait before applying for any other cougar permit.

(v) "Written permission" means written authorization from the owner or person in charge to enter upon private lands and must include:

(i) the name and signature of the owner or person in charge;

(ii) the address and phone number of the owner or person in charge;

(iii) the name of the dog handler given permission to enter the private lands;

(iv) a brief description of the pursuit activity authorized;

(v) the appropriate dates; and

(vi) a general description of the property.

R657-10-3. Permits for Taking Cougar.

(1)(a) To harvest a cougar, a person must first obtain a valid limited entry cougar permit, harvest -objective cougar permit, or cougar control permit, for the specified management units as provided in the guidebook of the Wildlife Board for taking cougar.

(b) Any person who obtains a limited entry cougar permit, harvest objective cougar permit, or cougar control permit, may pursue cougar on the unit for which the permit is valid.

(2) A person may not apply for or obtain more than one cougar permit for the same season, except:

(a) as provided in Subsection R657-10-25(3);

(b) as provided in Subsection R657-10-33; or

(c) if the person is unsuccessful in the limited entry drawing, the person may purchase a harvest objective or cougar control permit.

(3) Any cougar permit purchased after the season opens is not valid until three days after the date of purchase.

(4) To obtain a cougar limited entry permit, harvest objective permit, cougar control permit, or pursuit permit, a person must possess a Utah hunting or combination license.

R657-10-4. Permits for Pursuing Cougar.

(1)(a) To pursue cougar without a limited entry, harvest objective, or cougar control permit, the dog handler must:

(i) obtain a valid cougar pursuit permit from a division office; or

(ii) possess the documentation and certifications required in R657-10-25(2) to pursue cougar for compensation.

(b) A cougar pursuit permit or exemption there from does not allow a person to kill a cougar.

(2) Residents and nonresidents may purchase cougar pursuit permits consistent with the requirements of this rule and the guidebooks of the Wildlife Board.

(3) To obtain a cougar pursuit permit, a person must possess a Utah hunting or combination license.

R657-10-5. Hunting Hours.

Cougar may be taken or pursued only between one-half hour before official sunrise through one-half hour after official sunset.

R657-10-6. Firearms, Archery Equipment, Crossbows, and Airguns.

(1) For limited entry and harvest objective hunts identified in the Wildlife Board's guidebook for taking cougar, a person may use the following to take cougar:

(a) any firearm not capable of being fired fully automatic, except a firearm using rimfire cartridge;

(b) archery equipment meeting the following requirements:

(i) the minimum bow pull is 30 pounds at the draw or the peak, whichever comes first;

(ii) arrowheads used have two or more sharp cutting edges that cannot pass through a 7/8 inch ring;

(iii) expanding arrowheads cannot pass through a 7/8 inch ring when expanded; and

(iv) arrows must be a minimum of 20 inches in length from the tip of the arrowhead to the tip of the nock;

(c) a crossbow meeting the following requirements:

(i) a minimum draw weight of 125 pounds;

(ii) a positive mechanical safety mechanism; and

(iii) an arrow or bolt that is at least 16 inches long with:

(A) a fixed broadhead that is at least 7/8 inch wide at the widest point; or

(B) an expandable, mechanical broadhead that is at least 7/8 inch wide at the widest point when the broadhead is in the open position; and

(d) an airgun used to hunt bear must:

(i) be pneumatically powered;

(ii) be pressurized solely through a separate charging device; and

(iii) may only fire a bolt or arrow:

(A) no less than 16 inches long;

(B) with a fixed or expandable broadhead at least 7/8 inch wide at its widest position; and

(C) traveling no less than 400 feet per second at the muzzle.

(2) Arrows and bolts carried in or on a vehicle where a person is riding must be in an arrow quiver or a closed case.

R657-10-7. Traps and Trapping Devices.

(1) Cougar may not be taken with a trap, snare or any other trapping device, except as authorized by the Division of Wildlife.

(2) Cougar accidentally caught in any trapping device must be released unharmed, and must not be pursued or taken.

(3)(a) Written permission must be obtained from a division representative to remove the carcass of a cougar from any trapping device.

(b) The carcass shall remain the property of the state of Utah and must be surrendered to the division.

R657-10-8. State Parks.

(1) Hunting of any wildlife is prohibited within the boundaries of all state park areas except those designated by the Division of Parks and Recreation in Section R651-614-4.

(2) Hunting with a rifle, handgun or muzzleloader in park areas designated open is prohibited within one mile of all park facilities including buildings, camp or picnic sites, overlooks, golf courses, boat ramps and developed beaches.

(3) Hunting with shotguns, crossbows and archery tackle is prohibited within one quarter mile of the above stated areas.

R657-10-9. Prohibited Methods.

(1) Cougar may be taken or pursued only during open seasons and using methods prescribed in this rule and the guidebook of the Wildlife Board for taking cougar. Otherwise, under the Wildlife Resources Code, it is unlawful for any person to possess, capture, kill, injure, drug, rope, trap, snare or in any way harm or transport cougar.

(2) After a cougar has been pursued, chased, treed, cornered or held at bay, a person may not, in any manner, restrict or hinder the animal's ability to escape.

(3) A person may not engage in a canned hunt.

(4) A person may not take any wildlife from an airplane or any other airborne vehicle or device or any motorized terrestrial or aquatic vehicle, including snowmobiles and other recreational vehicles.

(5) Electronic locating equipment may not be used to locate cougar wearing electronic radio devices.

R657-10-10. Spotlighting.

(1) Except as provided in Section 23-13-17:

(a) a person may not use or cast the rays of any spotlight, headlight or other artificial light to locate protected wildlife while having in possession a firearm or other weapon or device that could be used to take or injure protected wildlife; and

(b) the use of a spotlight or other artificial light in a field, woodland or forest where protected wildlife are generally found is prima facie evidence of attempting to locate protected wildlife.

(2) The provisions of this section do not apply to:

(a) the use of the headlights of a motor vehicle or other artificial light in a usual manner where there is no attempt or intent to locate protected wildlife; or

(b) a person licensed to carry a concealed weapon in accordance with Title 53, Chapter 5, Part 7 of the Utah Code, provided the person is not utilizing the concealed weapon to hunt or take wildlife.

R657-10-11. Party Hunting.

A person may not take a cougar for another person.

R657-10-12. Use of Dogs.

(1) Dogs may be used to take or pursue cougar only during open seasons as provided in the guidebook of the Wildlife Board for taking cougar.

(2) A dog handler may pursue cougar provided he or she possesses:

(a) a valid cougar permit issued to the dog handler;

(b) a valid cougar pursuit permit; or

(c) the documentation and certifications required in R657-10-25(2) to pursue cougar for compensation.

(3) When dogs are used in the pursuit of a cougar, the licensed hunter intending to take the cougar must be present when the dogs are released and must continuously participate in the hunt thereafter until the hunt is completed.

(4) When dogs are used to take a cougar and there is not an open pursuit season, the dog handler must have:

(a) a valid cougar permit issued to the dog handler for the unit being hunted;

(b)(i) a valid cougar pursuit permit; and

(ii) be accompanied, as provided in Subsection (3), by a hunter possessing a cougar permit for the area; or

(c)(i) the documentation and certifications required in R657-10-25(2) to pursue cougar for compensation and

(ii) be accompanied, as provided in Subsection (3), by a paying client possessing a valid cougar permit for the area.

(5) A dog handler may pursue cougar under:

(a) a cougar pursuit permit only during the season and in the areas designated by the Wildlife Board in guidebook open to pursuit;

(b) a valid cougar permit only during the season and in the area designated by the Wildlife Board in guidebook for that permit; or

(c) the pursuit for compensation provisions in this rule only during the seasons and in the areas designated by the Wildlife Board in guidebook open to pursuit.

(6) When dogs are used to take cougar and there is not an open pursuit season, the owner and handler of the dogs must have a valid pursuit permit and be accompanied by a licensed hunter as provided in Subsection (3), or have a cougar permit.

R657-10-13. Tagging Requirements.

(1) The carcass of a cougar must be tagged with a temporary possession tag before the carcass is moved from or the hunter leaves the site of kill as provided in Section 23-20-30.

(2) A person may not hunt or pursue a cougar after any of the notches have been removed from the tag or the tag has been detached from the permit.

(3) The temporary possession tag:

(a) must remain attached to the pelt or unskinned carcass until the permanent possession tag is attached; and

(b) is only valid for 48 hours after the date of kill.

(4) A person may not possess a cougar pelt or unskinned carcass without a valid permanent possession tag affixed to the pelt or unskinned carcass. This provision does not apply to a person in possession of a properly tagged carcass or pelt within 48 hours after the kill, provided the person was issued and is in possession of a valid permit.

R657-10-14. Evidence of Sex and Age.

(1) Evidence of sex must remain attached to the carcass or pelt of each cougar until a permanent tag has been attached by the division.

(2) The pelt and skull must be presented to the division in an unfrozen condition to allow the division to gather management data.

(3) It is mandatory that a tooth (PM1) be removed by the division at the time of permanent tagging to be used for aging purposes.

(4) The division may seize any pelt not accompanied by its skull or not having sufficient evidence of biological sex designation attached.

R657-10-15. Permanent Tag.

(1)(a) Each cougar must be taken by the permit holder to a conservation officer or division office within 48 hours after the date of kill to have a permanent possession tag affixed to the pelt or unskinned carcass and for the removal of a tooth.

(b) After regular business hours, on weekends, or on holidays, a conservation officer may be reached by contacting the local police dispatch office.

(2) A person may not possess a green pelt after the 48-hour check-in period, or ship a green pelt out of Utah, or present a green pelt to a taxidermist if the green pelt does not have a permanent possession tag attached.

(3) The location of harvest and a tooth sample must be provided to the division during the check-in process.

R657-10-16. Transporting Cougar.

Cougar that have been legally taken may be transported by the permit holder provided the cougar is properly tagged and the permittee possesses the appropriate permit.

R657-10-17. Exporting Cougar from Utah.

(1) A person may export a legally taken cougar or its parts if that person has a valid permit and the cougar is properly tagged with a permanent possession tag.

(2) A person may not ship or cause to be shipped from Utah, a cougar pelt without first obtaining a shipping permit issued by an authorized division representative.

R657-10-18. Donating.

(1) A person may donate protected wildlife or their parts to another person as provided in Section 23-20-9.

(2) A green pelt of any cougar donated to another person must have a permanent possession tag affixed.

(3) The written statement of donation must be retained with the pelt.

R657-10-19. Purchasing or Selling.

(1) Legally obtained, tanned cougar hides may be purchased or sold.

(2) A person may not purchase, sell, offer for sale, or barter a tooth, claw, paw, or skull of any cougar.

R657-10-20. Waste of Wildlife.

(1) A person may not waste or permit to be wasted or spoiled any protected wildlife or their parts.

(2) The skinned carcass of a cougar may be left in the field and does not constitute waste of wildlife.

R657-10-21. Livestock Depredation and Human Health and Safety.

(1) If a cougar is harassing, chasing, disturbing, harming, attacking or killing livestock, or has committed such an act within the past 72 hours:

(a) in depredation cases, the livestock owner, an immediate family member or an employee of the owner on a regular payroll, and not hired specifically to take cougar, may kill the cougar;

(b) a landowner or livestock owner may notify the division of the depredation or human health and safety concerns, who shall authorize a local hunter to take the offending cougar or notify a USDA, Wildlife Services specialist; or

(c) the livestock owner may notify a USDA, Wildlife Services specialist of the depredation who may take the depredating cougar.

(2) Depredating cougar may be taken at any time by a USDA, Wildlife Services specialist, supervised by the Wildlife Services program, while acting in the performance of the person's assigned duties and in accordance with procedures approved by the division.

(3) A depredating cougar may be taken by those persons authorized in Subsection (1)(a) with:

(a) any weapon authorized for taking cougar; or

(b) with the use of snares only with written authorization from the director of the division and subject to all the conditions and restrictions set out in the written authorization.

(i) The option in Subsection (3)(b) may only be authorized in the case of a chronic depredation situation where numerous livestock have been killed by a depredating cougar and must be verified by Wildlife Services or division personnel.

(4)(a) The Division may issue depredation permits to take cougar on specified private lands and public land grazing allotments with a chronic depredation situation where numerous livestock have been killed by cougar.

(b) The Division may:

(i) issue one or more depredation permits to the affected livestock owner or a designee, provided the livestock owner does not receive monetary consideration from the designee for the opportunity to use the depredation permit;

(ii) determine the legal weapons and methods of take allowed; and

(iii) specify the area and season that the permit is valid.

(5)(a) Any cougar taken under Subsection (1)(a) or (4)(a) shall remain the property of the state and must be delivered to a division office or employee within 72 hours.

(b) The division may issue a cougar damage permit to a person who has killed a depredating cougar under Subsection (1)(a) that authorizes the person to keep the carcass.

(c) A person that takes a cougar under Subsection (1)(a) or (4)(a) may acquire and use a limited entry permit or harvest objective cougar permit in the same year.

(d) Notwithstanding Subsections (5)(b) and (5)(c), a person may retain no more than one cougar annually.

(6)(a) Hunters interested in taking depredating cougar as provided in Subsection (1)(b) may contact the division.

(b) Hunters will be contacted by the division to take depredating cougar as needed.

R657-10-22. Survey.

Each permittee who is contacted for a survey about their cougar hunting experience should participate in the survey regardless of success. Participation in the survey helps the

division evaluate population trends, harvest success and collect other valuable information.

R657-10-23. Taking Cougar.

(1)(a) For each permit issued, a person may only take one cougar during the season and from the area specified on the permit.

(b) Limited entry permits may be obtained by following the application procedures provided in this rule and the guidebook of the Wildlife Board for taking cougar.

(c) Harvest -objective permits may be purchased on a first-come, first-served basis as provided in guidebook of the Wildlife Board for taking cougar.

(d) Cougar control permits may be purchased as provided in the guidebook of the Wildlife Board for taking cougar.

(2) A person may not:

(a) take or pursue a female cougar with kittens or kittens with spots; or

(b) repeatedly pursue, chase, tree, corner, or hold at bay, the same cougar during the same day after the cougar has been released.

(3) Any cougar may be taken during the prescribed seasons, except a kitten with spots, or any cougar accompanied by kittens, or any cougar accompanied by an adult.

(4) A person may not take a cougar wearing a radio collar from any areas that are published in the guidebook of the Wildlife Board for taking cougar.

(5) The division may authorize hunters who have obtained a valid cougar permit to take cougar in a specified area of the state in the interest of protecting wildlife from depredation.

(6) Season dates, closed areas, harvest objective permit areas, unlimited quota units, and limited entry permit areas are published in the guidebook of the Wildlife Board for taking cougar.

(7)(a) A person who obtains a limited entry cougar permit on a split unit may hunt on all harvest objective units after the date split units transition into harvest objective units. The split unit transition date is provided in the guidebook of the Wildlife Board for taking cougar.

(b) A person who obtains a limited entry cougar permit on a split unit and chooses to hunt on any harvest objective unit after the transition date is subject to all harvest objective unit closure requirements provided in Sections R657-10-29.

R657-10-24. Extended and Preseason Hunts.

(1) An extended or preseason hunt may be authorized by the division on selected cougar management units to control depredation or nuisance problems.

R657-10-25. Cougar Pursuit.

(1)(a) Except as provided in rule R657-10-3(1)(b) and Subsection (2), cougar may be pursued only by persons who have obtained a cougar pursuit permit.

(b) The cougar pursuit permit does not allow a person to:

(i) kill a cougar; or

(ii) pursue cougar for compensation.

(c) A person may pursue cougar for compensation only as provided in Subsection (2).

(d) To obtain a cougar pursuit permit, a person must possess a Utah hunting or combination license.

(2)(a) A person may pursue cougar on public lands for compensation, provided the dog handler:

(i) receives compensation from a client or customer to pursue cougar;

(ii) is a licensed hunting guide or outfitter under Title 58, Chapter 79 of the Utah Code and authorized to pursue cougar;

(iii) possesses on his or her person the Utah hunting guide or outfitter license;

(iv) possesses on his or her person all permits and authorizations required by the applicable public lands managing authority to pursue cougar for compensation; and

(v) is accompanied by the client or customer at all times during pursuit.

(b) A person may pursue cougar on private lands for compensation, provided the dog handler:

(i) receives compensation from a client or customer to pursue cougar;

(ii) is accompanied by the client or customer at all times during pursuit; and

(iii) possesses on his or her person written permission from all private landowners on whose property pursuit takes place.

(c) A person who is an employee or agent of the Division of Wildlife Services may pursue cougar on public lands and private lands while acting within the scope of their employment.

(3) A pursuit permit is not required to pursue cougar under Subsection (2).

(4)(a) A person pursuing cougar for compensation under subsections (2)(a) and (2)(b) shall comply with all other requirements and restrictions in statute, rule and the guidebooks of the Wildlife Board regulating the pursuit and take of cougar.

(b) Any violation of, or failure to comply with the provisions of Title 23 of the Utah Code, this rule, or the guidebooks of the Wildlife Board may be grounds for suspension of the privilege to pursue cougar for compensation under this subsection, as determined by a division hearing officer.

(5) A cougar pursuit permit authorizes the holder to pursue cougar with dogs on any unit open to pursuing cougar during the seasons and under the conditions prescribed by the Wildlife Board in guidebook.

(6) A person may not:

(a) take or pursue a female cougar with kittens or kittens with spots;

(b) repeatedly pursue, chase, tree, corner or hold at bay, the same cougar during the same day; or

(c) possess a firearm or any device that could be used to kill a cougar while pursuing cougar.

(i) The weapon restrictions set forth in the subsection do not apply to a person licensed to carry a concealed weapon in accordance with Title 53, Chapter 5, Part 7 of the Utah Code, provided the person is not utilizing or attempting to utilize the concealed weapon to injure or kill cougar.

(7) If eligible, a person who has obtained a cougar pursuit permit may also obtain a limited entry cougar permit, harvest objective cougar permit, or cougar control permit.

(8) Cougar may be pursued only on limited entry units, harvest objective units, or unlimited quota units during the dates provided in the guidebook of the Wildlife Board for taking cougar.

(9) A cougar pursuit permit is valid on a calendar year basis.

(10) A person must possess a valid hunting or combination license to obtain a cougar pursuit permit.

R657-10-26. Limited Entry Cougar Permit Application Information.

(1) Limited entry cougar permits are issued pursuant to R657-62-24.

R657-10-27. Harvest Objective General Information.

(1) Harvest objective permits are valid only for open harvest objective management units and for the specified seasons published in the guidebook of the Wildlife Board for taking cougar.

(2) Harvest objective permits are not valid in a specified management unit after the harvest objective has been met for that unit.

R657-10-28. Harvest Objective Permit Sales.

(1) Harvest objective permits are available on a first-come, first-served basis beginning on the date published in the guidebook of the Wildlife Board for taking cougar.

(2) Any cougar permit purchased after the season opens is not valid until three days after the date of purchase unless specifically authorized by the division.

(3) A person must possess a valid hunting or combination license to obtain a Harvest objective permit.

R657-10-29. Harvest Objective Unit Closures.

(1) To hunt in a harvest objective unit, a hunter must call 1-888-668-LION or visit the division's website to verify that the harvest objective unit is still open. The phone line and website will be updated each day by 12 noon. Updates become effective the following day thirty minutes before official sunrise.

(2) Harvest objective units are open to hunting until:

(a) the quota for that harvest objective unit is met and the division closes the unit; or

(b) the end of the hunting season as provided in the guidebook of the Wildlife Board for taking cougar.

(3) Upon closure of a harvest objective unit, a hunter may not take or pursue cougar except as provided in Section R657-10-25.

R657-10-30. Harvest Objective Unit Reporting.

(1) Any person taking a cougar with a harvest objective permit or a cougar control permit must report to the division, within 48 hours, where the cougar was taken and have a permanent tag affixed pursuant to Section R657-10-15.

(2) Failure to accurately report the correct harvest objective unit where the cougar was killed is unlawful.

(3) Any conviction for failure to accurately report, or aiding or assisting in the failure to accurately report as required in Subsection (1) shall be considered prima facie evidence of a knowing, intentional or reckless violation for purposes of permit suspension.

R657-10-31. Wildlife Management Areas.

(1) A person may not use motor vehicles on division-owned wildlife management areas closed to motor vehicle use during the winter without first obtaining written authorization from the appropriate division regional office.

(2) The division may, in its sole discretion, authorize limited motor vehicle access to its wildlife management areas closed to such use during the winter provided:

(a) the person seeking access possesses a valid cougar permit for the area;

(b) motor vehicle access is necessary to effectively utilize the cougar permit; and

(c) motor vehicle access will not interfere with wintering wildlife or wildlife habitat.

R657-10-32. Poaching-Reported Reward Permits.

(1) Cougar poaching-reported reward permits are issued pursuant to rule R657-51 Poaching-Reported Reward Permits.

R657-10-33. Cougar Control Permits.

(1)(a) The division, with approval of the Wildlife Board, may identify a harvest objective unit as an unlimited quota unit.

(b) An individual may acquire a cougar control permit to hunt on an unlimited quota unit if they first obtain:

(i) a harvest objective permit; or

(ii) a limited entry permit for a split unit and the split unit has transitioned to harvest objective status.

(c) An individual may retain a cougar lawfully harvested under a cougar control permit regardless of whether they lawfully harvested and retained a cougar under a permit listed in Subsections (1)(b)(i) or (ii).

(2) An individual may only acquire one cougar control permit each season.

(3) Cougar control permits are only valid within the boundaries of unlimited quota units and during the dates described on the permit and in the guidebook of the Wildlife Board for taking cougar.

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R657. Natural Resources, Wildlife Resources.
R657-69. Turkey Depredation.
R657-69-1. Purpose and Authority.

(1) Under authority of Section 23-17-5.1, 23-17-5.2, this rule provides:

(a) the procedures for responding to and verifying reports of material damage caused by turkey;

(b) the procedures, standards, requirements, and limits for addressing instances of material damage caused by turkeys; and

(c) a description of the various hunts that may be held to minimize future instances of material damage caused by turkeys.

R657-69-2. Definitions.

(1) As used in this rule, "turkey" means a wild, free-ranging turkey and does not include a privately-owned wild turkey, domestic turkey, or wild-domestic hybrids.

(2) "Alternate limited entry drawing list" means a chronological list, based upon the permit drawing procedures described in the Upland Game and Turkey Guidebook, of those persons who were unsuccessful in drawing a limited entry turkey hunting permit and would have been successful were additional permits available.

(3) "Control permit" means a nontransferable turkey hunting permit issued by the division under R657-69-6 or R657-69-7 that authorizes the holder to take a turkey for personal use within the described permit boundaries and described dates.

(4) "Control permit voucher" means a document issued to a landowner or lessee that may be retained for personal use or transferred to a third party, and which allows the holder to purchase a turkey control permit from the division.

(5) "Depredation Hunt" means a turkey hunt organized pursuant to R657-69-5, the Wildlife Code, and proclamations of the Wildlife Board.

(6) "Employee" means an individual regularly employed by the landowner or lessee for purposes unassociated with hunting on the private property owned or managed by the landowner or lessee.

(7) "Immediate family member" means the landowner's or lessee's spouse, child, son-in-law, daughter-in-law, father, mother, father-in-law, mother-in-law, brother, sister, brother-in-law, sister-in-law, stepchild, and grandchild.

(8) "Landowner" means any person, partnership, or corporation who owns private property in Utah and whose name appears on a deed as the owner or whose name appears as the purchaser on a contract for sale of private property.

(9) "Lessee" means any person, partnership, or corporation whose name appears as the lessee on a written lease, for at least a one-year period, of private property, and who is in actual physical control of the private property.

(10) "Material damage" means physical impacts to private property caused by turkeys that are visible, persistent, and detrimental to the landowner or lessee's use of the private property.

(11) "Personal property" means any moveable and tangible thing owned by the landowner or lessee.

(12) "Private property" means land in private fee ownership, structures located thereon, and personal property of the landowner or lessee on or adjacent to the land of the landowner or lessee, but not including tribal trust lands.

R657-69-3. Responding to Reports of Material Damage by Turkeys.

(1) Upon discovering material damage to private property attributable to turkeys, a landowner or lessee may request that the division take action to mitigate that damage.

(2) A request for action shall be delivered to a division representative in the appropriate regional office.

(3) A request for action may be made:

(a) orally to expedite a field investigation; or

(b) in writing.

(4)(a) The division will investigate a request for action within 72 hours after receiving the request.

(b) If after completing its investigation the division confirms that material damage did occur and it appears that material damage may continue, the division shall:

(i) remove or drive off turkeys causing material damage; or

(ii) with the written approval of the landowner or lessee, implement a damage mitigation and prevention plan in accordance with R657-69-4.

(5) A landowner or lessee may not harass, hunt, or otherwise take a turkey on private property unless:

(a)(i) they possess a valid turkey hunting permit authorizing them to hunt turkeys; or

(ii) a damage mitigation and prevention plan authorizes them to undertake such actions; and

(b) the landowner or lessee's actions are otherwise consistent with the Wildlife Code, its implementing regulations, and proclamations of the Wildlife Board.

R657-69-4. Turkey Damage Mitigation and Prevention Plans.

(1) A damage mitigation and prevention plan may authorize the division to undertake any or all of the following actions:

(a) provide educational materials regarding turkeys and turkey damage to the landowner or lessee, including strategies on how to alleviate damage;

(b) use, or allow the landowner or lessee to use, nonlethal methods to haze turkeys on private property experiencing material damage and, if necessary, provide the landowner or lessee equipment and supplies necessary to carry out hazing;

(c) exclude turkeys from areas in which material damage has occurred and is expected to continue to occur, using fencing, tarpaulins, or other similar materials;

(d) capture and relocate any turkeys causing, or reasonably likely to cause, material damage to the property to a location on the Wildlife Board approved turkey transplant list;

(e) allow expanded harvest of turkeys by:

(i) increasing permit numbers during limited entry or general season hunts;

(ii) expanding or increasing the areas for turkey hunts;

(iii) enrolling the property in the division's Walk-In Access Program in accordance with R657-56;

(iv) enrolling the property in the division's Cooperative Wildlife Management Unit Program in accordance with R657-37;

(v) schedule and hold a depredation hunt pursuant to R657-69-5;

(vi) issue control permits pursuant to R657-69-6; or

(vii) issue control permit vouchers pursuant to R657-69-7;

(f) allow landowners or lessees to capture and relocate turkeys causing, or reasonably likely to cause, material damage to the property to a location on the Wildlife Board approved turkey transplant list;

(g) allow landowners or lessees to use weapons or methods otherwise prohibited to take a turkey if traditional weapons are unsuitable for the location of the property; and

(h) other reasonable measures aimed at reducing instances of material damage to the private property in question.

(2) Damage mitigation and prevention plans shall have:

(a) a description of the private property covered by the plan;

(b) a specific effective date and effective term for the plan;

(c) a description of the verified instances of material damage and the dates of occurrence; and

(d) an assurance by the landowner or lessee that members of the public holding a control permit or a turkey depredation

permit may access the private property at no charge during the hunts for which they hold a permit.

(3) Damage mitigation and prevention plans may be amended or renewed with written consent of the division and the landowner or lessee during their effective term.

(4)(a) The landowner or lessee may unilaterally revoke and withdraw from a damage mitigation and prevention plan by providing the division 30 days prior written notice.

(b) A landowner or lessee's revocation of approval of a damage mitigation and prevention plan eliminates the division's obligations described in the plan.

(c) A landowner or lessee may not revoke approval of a damage mitigation and prevention plan after a depredation hunt has been scheduled on their private property until after the depredation hunt has taken place.

(4) The division may unilaterally revoke and withdraw from a damage mitigation and prevention plan if:

(a) the landowner or lessee fails to exercise reasonable care and diligence to avoid loss or minimize the damage caused by turkeys;

(b) the landowner or lessee fails to comply with the terms of the damage mitigation and prevention plan; or

(c) in the division's discretion, the damage mitigation and prevention plan is not necessary.

(5) The expiration or revocation of a damage mitigation and prevention plan does not preclude the landowner or lessee from making future requests for action.

(6) The division shall not be financially liable for damage to private property caused by:

(a) turkeys;

(b) its efforts to remove or drive off turkeys in response to a request for action; or

(c) actions taken or authorized by a damage mitigation and prevention plan.

(7) A landowner or lessee shall have a copy of the damage prevention and mitigation plan in their possession while undertaking any action authorized in the plan that otherwise violates the Wildlife Code, including, but not limited to, the hazing, capturing, and transplanting of turkeys.

R657-69-5. Depredation Hunts for Turkey.

(1) Turkey depredation hunts are intended to:

(a) mitigate verified reports of material damage by turkeys and prevent future instances of material damage in the vicinity of the hunt area;

(b) be a focused response to verified reports of material damage;

(c) be a rapid response mechanism to verified reports of material damage; and

(d) have limited permit numbers.

(2) Turkey depredation hunts shall operate consistent with the following guidelines:

(a) turkey depredation hunts may be held August 1 through March 14;

(b) parameters for a turkey depredation hunt must comply with the provisions established in the current Wild Turkey Management Plan approved by the Wildlife Board; and

(c) the boundaries of the hunts, specific season dates, bag limits, sex of birds that may be taken, and allowable weapon types will be further defined in a depredation hunt plan by the division Regional Supervisor.

(3) Hunters will be selected to receive a depredation permit in the following order, based on permit availability:

(a) randomly selected individuals in the depredation hunter pool; and

(b) individuals on the alternate limited entry drawing list, in chronological order.

(4)(a) The turkey hunter depredation pool provides hunters an opportunity to be placed on a wait-list and become eligible to receive a depredation permit as the availability for depredation permits allows.

(b) Applications for the turkey hunter depredation pool must be submitted pursuant to instructions in the current year's Upland Game and Turkey Guidebook of the Wildlife Board for wild turkey.

(c) Applications must be received by the date published in the Upland Game and Turkey Guidebook of the Wildlife Board for wild turkey.

(d) Applications received after the date published in the proclamation Upland Game and Turkey Guidebook of the Wildlife Board for wild turkey may be used after the list of individuals within the depredation hunter pool and the alternate limited entry drawing list has been exhausted.

(5) If a hunter is successful in the depredation permit drawing and possesses a valid unfilled turkey permit for a hunt in the same calendar year as the depredation hunt, that hunter may receive a depredation permit at no cost.

(6) Hunters selected to receive a depredation permit who do not possess a valid unfilled turkey permit must purchase the appropriate permit prior to participating in the depredation hunt.

(7) Hunters selected to receive a depredation permit will not lose bonus points associated with the limited entry application process.

(8) Wild turkey depredation permits qualify towards permit possession limits identified in R657-54.

(9) Depredation permits may be withheld from persons who have violated this rule, any other wildlife rule, the Wildlife Resources Code, or who are otherwise ineligible to receive a permit.

R657-69-6. Control Permits for Turkey.

(1)(a) As part of a damage mitigation and prevention plan, the division may issue a turkey control permit at no cost directly to the affected landowner or lessee, or to their immediate family member or employee.

(b) No more than two control permits may collectively be issued per calendar year under each damage prevention and mitigation plan.

(2) A control permit allows the permit holder to take a single turkey of either sex within the boundaries designated in the damage mitigation and prevention plan.

(3) Control permit turkey hunts may be held August 1 through March 14.

(4)(a) In the event that the landowner or lessee, or the landowner or lessee's immediate family member or employee, who receives the control permit does not possess a valid hunting or combination license, the division may issue a special turkey control license at no cost to the designated permit holder for the purposes of obtaining a control permit.

(b) A special turkey control license does not authorize the license holder to take any other protected wildlife or to obtain any other permit other than a turkey control permit.

(5) Hunters who receive a control permit will not lose any bonus points accrued as part of the limited entry turkey application process.

(6) Control permits may be withheld from persons who have violated this rule, any other wildlife rule, the Wildlife Resources Code, or who are otherwise ineligible to receive a permit.

(7) Control permits issued under this section do not count towards permit possession limits identified in R657-54.

(8) Rimfire firearms may be used as a legal weapon for wild turkey permits issued pursuant to this section.

R657-69-7. Control Permit Vouchers for Turkey.

(1)(a) As part of the damage mitigation and prevention plan, the division may issue turkey control permit vouchers to the landowner or lessee.

(b) The number of control permit vouchers shall not exceed 10% of the documented turkeys on the private property or fifteen vouchers per calendar year, whichever is less.

(2)(a) Control permit vouchers do not allow turkey hunting and must be redeemed for a control permit prior to going afield.

(b) Control permit vouchers may be redeemed for a turkey control permit at a division office prior to the closing date of the control permit turkey hunt for which the voucher was issued.

(c) Individuals shall pay the required fee in order to redeem a control permit voucher for a turkey control permit.

(3)(a) A landowner or lessee transferring control permit vouchers to another individual may not receive any form of compensation or remuneration for the transfer or for allowing access to the private land for turkey hunting under a control permit on the landowner or lessee's private property.

(b) Turkey control permit vouchers are only transferable between the landowner or lessee and an individual redeeming that voucher for a turkey control permit.

(c) Redeemed turkey control permit vouchers qualify towards permit possession limits identified in R657-54.

(4) Individuals redeeming a control permit voucher for a control permit will not lose accrued bonus points for limited entry turkey hunting as a result of redeeming the voucher.

R657-69-8. Hunt Areas for Depredation and Control Permit Hunts.

(1) The hunt area for depredation hunts and control permit hunts may include a buffer zone of up to 2 miles around the parcels of private property experiencing material damage.

(2) Buffer zones, if any, will be defined in the damage mitigation and prevention plan.

(3) Buffer zones may partially encompass or be adjacent to lands experiencing material damage.

(4) If a buffer zone includes the private land of multiple landowners, each affected landowner must be a signatory to the damage mitigation and prevention plan.

R657-69-9. Appeal Procedures.

(1) Upon the petition of an aggrieved party to a final division action relative to material damage caused by turkeys and this rule, a qualified hearing examiner shall take evidence and make recommendations to the Wildlife Board, who shall resolve the grievance in accordance with Rule R657-2.

R657-69-10. Hunting or Combination License Required.

(1)(a) A person must possess or obtain a valid Utah hunting or combination license, or a special turkey control license, to receive a turkey control permit pursuant to R657-69-6.

(b) A person must possess or obtain a valid Utah hunting or combination license to:

(i) receive a turkey depredation permit; or

(ii) or redeem a control permit voucher for the corresponding permit.

(2)(a) Special turkey control licenses are only issued to landowners or lessees, immediate family members, and employees that are designated to receive a turkey control permit under R657-69-6 and do not possess a valid Utah hunting or combination license.

(b) Special turkey control licenses may not be used in lieu of a hunting or combination license to obtain a depredation permit or a control permit under a control permit voucher.

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R722. Public Safety, Criminal Investigations and Technical Services, Criminal Identification.
R722-310. Regulation of Bail Bond Recovery and Enforcement Agents.
R722-310-1. Purpose.

The purpose of the rule is to establish procedures for the licensing of bail enforcement agents, bail recovery agents, and bail recovery apprentices.

R722-310-2. Authority.

This rule is authorized by Subsection 53-11-103(5).

R722-310-3. Definitions.

(1) Terms used in this rule are defined in Section 53-11-102.

(2) In addition:

(a) "act involving moral turpitude" means conduct which:

(i) is done knowingly contrary to justice, honesty, or good morals;

(ii) has an element of falsification or fraud; or

(iii) contains an element of harm or injury directed to another person or another's property;

(b) "bureau" means the Bureau of Criminal Identification within the Department of Public Safety established by Section 53-10-201;

(c) "felony" means a crime under the laws of this state, any other state, the United States, or any district, possession, or territory of the United States for which the penalty is a term of imprisonment in excess of one year;

(d) "licensee" means an individual who has received a bail enforcement agent license, bail recovery agent license or bail recovery apprentice license;

(e) "revocation" means the permanent deprivation of a bail bond recovery license, however revocation does not preclude an individual from applying for a new bail bond recovery license if the reason for revocation no longer exists; and

(f) "suspension" means the temporary deprivation, for a specified period of time, of a bail bond recovery license.

R722-310-4. Application for Licensure.

(1)(a) An applicant seeking to obtain a license as a bail enforcement agent, bail recovery agent, or a bail recovery apprentice shall submit a completed application packet to the bureau.

(b) The application packet shall include:

(i) a written application form provided by the bureau with the applicant's residential or physical address and mailing or business address;

(ii) one recent color photograph of passport quality which contains the applicant's name written on the back of the photograph, unless the applicant submitted a photo which meets these requirements to the bureau within the previous three years;

(iii) a photocopy of a state-issued driver license or identification card;

(iv) one completed FBI applicant fingerprint card (Form FD-258) with the applicant's legible fingerprints;

(v) a non-refundable processing fee in the form of cash, check, money order, or credit card in the amount required by Section 53-11-115;

(vi) documentation from an approved provider indicating that the applicant has completed the 16-hour training program, described in Subsection 53-11-108(4); and

(vii) documentation showing the licensee has a surety bond in amount of $10,000 which meets the requirements described in Subsection 53-11-113(3).

(2) If the applicant is applying for license as a bail enforcement agent, the applicant must also provide documentation indicating that the applicant has 2,000 hours of experience related to bail bond recovery and enforcement.

(3) If an applicant for license as a bail enforcement agent wishes to operate a bail bond recovery agency, the applicant shall also provide:

(a) the name under which the bail bond recovery agency will operate; and

(b) a certificate of workers' compensation insurance, if applicable.

(4) If the applicant is applying for license as a bail recovery agent, the applicant shall also provide:

(a) documentation indicating that the applicant has 1,000 hours of experience related to bail bond recovery and enforcement; and

(b) verification from a bail bond recovery agency indicating that the agency will employ or contract with the applicant.

(5) If the applicant is applying for license as a bail recovery apprentice, the applicant shall also provide verification from a bail bond recovery agency indicating that the agency will employ or contract with the applicant.

(6) If the applicant is seeking to carry a firearm as a licensee, the applicant shall comply with all of the requirements found in R722-300 and provide documentation from an approved bail enforcement firearms instructor indicating that the applicant has completed the 16-hour firearms training course required in Subsection 53-11-108(5).

(7) Once the application packet is complete, the bureau shall submit it to the board for their review at the next regularly scheduled meeting.

R722-310-5. Training Program Requirements.

(1) The 16-hour training program described in Subsection 53-11-108(4), which is required for licensure, shall be provided by a training program provider approved by the board.

(2) Training program providers seeking to become approved by the board shall provide a detailed course curriculum for the board's review.

(3)(a) Training programs which are approved by the board shall be open to anyone who wishes to attend.

(b) If a training provider charges a fee for the training program, the same fee shall apply to all participants in the training program.

(4) Training program providers shall notify the bureau, at least five days in advance, of the dates, times, and location of all courses provided.

(5)(a) Bureau investigators shall periodically monitor approved training programs to ensure that the training program is providing instruction as required by Subsection 53-11-108(4).

(b) The training program may not charge an investigator a fee for monitoring the program.

(6) If the board receives information that a training program is not providing instruction as required by Subsection 53-11-108(4), the board may terminate its approval of the training program after notice and an opportunity for a hearing before the board.

R722-310-6. Verification of Experience.

(1) When verifying the experience necessary for licensure as a bail enforcement agent or a bail recovery agent, an applicant shall provide a written statement which lists, in detail, the number of hours and the type of bail bond recovery work performed by the applicant.

(2) The verification of experience shall be signed and notarized by the applicant's employer or by an individual who has personal knowledge of the bail bond recovery work performed.

(3) The bail bond recovery work shall have been performed within ten years from the date of the application.

R722-310-7. Credit for Specified Training.

(1) An applicant who wishes to receive credit towards the experience requirement for licensure, shall provide documentation indicating that the applicant has a criminal justice bachelor's degree or has successfully completed a basic training course described in Subsections 53-11-114(1)(b) or 53-11-114(1)(c).

(2) An applicant may receive up to 1,000 hours of credit towards the experience requirement for licensure under Section 53-11-114.

(3) An applicant seeking credit under Section 53-11-114, is not exempt from completing the 16-hour training course required by Subsection 53-11-108(4).

R722-310-8. Renewal of a License.

(1)(a) A licensee seeking to renew a license as a bail enforcement agent, bail recovery agent, or a bail recovery apprentice shall submit a completed renewal packet to the bureau.

(b) The renewal packet shall include:

(i) a written renewal form provided by the bureau with the licensee's residential or physical address and mailing or business address;

(ii) one recent color photograph of passport quality which contains the licensee's name written on the back of the photograph, unless the licensee submitted a photo which meets these requirements to the bureau within the previous three years;

(iii) a non-refundable processing fee in the form of cash, check, money order, or credit card in the amount required by Section 53-11-115;

(iv) evidence that the licensee has completed eight hours of continuing classroom instruction required by Subsection 53-11-111(2); and

(v) documentation showing the licensee has a $10,000 surety bond which meets the requirements described in Subsection 53-11-113(3).

(2)(a) Once the renewal packet is complete, the bureau shall review it to determine if the licensee meets the requirements for renewal.

(b) If the bureau determines the licensee does not meet the requirements for renewal, the bureau shall submit the renewal packet to the board for their review at the next regularly scheduled meeting.

(3) A licensee whose license has been expired for more than 90 days, shall reapply and meet all requirements found in R722-310-4.

R722-310-9. Requirements for Continuing Classroom Instruction.

(1) A licensee who renews his or her license shall attend eight hours of continuing classroom instruction required by Subsections 53-11-111(2) and 53-11-109(2).

R722-310-10. Criteria for Certified Bail Enforcement Firearms Instructor.

(1) The 16-hour firearms training program described in Subsection 53-11-108(5), shall be provided by a bail enforcement firearms instructor approved by the bureau.

(2) A bail enforcement firearms instructor approved by the bureau shall be a certified Utah concealed firearm permit instructor under Subsection 53-5-704(9) and be in good standing with the bureau.

(3)(a) Each approved bail enforcement firearms instructor shall adhere to the curriculum adopted by the bureau.

(b) An instructor may supplement, but may not detract from the set curriculum.

R722-310-11. Notice to Commissioner.

A bail bond recovery agency may provide notice of a change in the name or address of a bail bond agency, or any change of employees or contract employees, to the commissioner as required by Subsection 53-11-116(5) by sending a written notice to the bureau that is signed by the licensee.

R722-310-12. Adjudicative Proceedings.

(1) All adjudicative proceedings shall be informal according to the provisions in Sections 63G-4-202 through 63G-4-203.

(2)(a) The board may deny a license application or renewal for failure to comply with the requirements in Sections 53-11-108 through 53-11-115, or for any of the reasons set forth in Section 53-11-118.

(b) The bureau may deny a license renewal for failure to comply with the requirements in Sections 53-11-108 through 53-11-115, or for any of the reasons set forth in Section 53-11-118.

(3) The board shall review all investigations presented by the bureau and may take disciplinary action against a licensee based on a violation of Section 53-11-119.

(4)(a) The board shall issue a written decision within ten days after the board meets to decide the matter.

(b) The board's written decision shall indicate that the applicant or licensee may appeal to the commissioner within 30 days from the date that the written decision is issued.

(5)(a) If an applicant or licensee appeals the board's decision, the commissioner, or his designee, shall review the materials in the bureau's file, the findings of the board along with any materials submitted by the applicant or licensee, and may affirm, adopt, modify, supplement, reverse, or reject the board's findings, or return the matter to the board for reconsideration.

(b) If the applicant or licensee requests a hearing, the commissioner, or his designee, shall schedule a hearing within 60 days from the receipt of the request for review.

R722-310-13. Identification of Licensees.

(1)(a) A licensee shall be issued an identification card by the bureau which identifies the licensee as a bail enforcement agent, bail recovery agent or bail recovery apprentice.

(b) The identification card shall indicate on its face if the licensee is authorized to carry a loaded and concealed firearm as provided in Subsection 53-11-108(5).

(2)(a) A bail enforcement agent or bail recovery agent may possess and display a badge that is identical to the badge depicted on the bureau's website in accordance with Section 53-11-121.

(b) A bail enforcement agent or bail recovery agent may obtain a badge from any source, so long as it complies with the following specifications:

(i) the badge shall be 2.55 inches high and 2.66 inches wide;

(ii) the badge shall be in the shape of a five-point star on a circle;

(iii) the star shall be gold in color and the circle must be silver in color;

(iv) the center of the star shall be black in color and contain a seal with the phrase "Liberty and Justice For All";

(v) the text of the badge shall be written in block lettering and must be black;

(vi) the silver circle shall contain two panels with writing to indicate whether the agent is a bail enforcement or bail recovery agent; and

(vii) the badge shall contain two gold panels with writing to indicate the word "Utah" on the top panel and the agent's license number on the bottom panel.

(3) The design approved by the board under Subsection 53-11-121(5) shall contain the words "bail enforcement agent" or "bail recovery agent" written on both the chest and back in

writing which is:

(a) at least two inches in height on the back;

(b) at least one half of an inch in height on the front; and

(c) in a color that contrasts with the color of the item of clothing.

KEY: bail bond enforcement agents, bail bond recovery agents, bail bond recovery apprentices, licenses
July 11, 2018 53-11-103(5)
Notice of Continuation October 30, 2019

R722. Public Safety, Criminal Investigations and Technical Services, Criminal Identification.
R722-330. Licensing of Private Investigators.
R722-330-1. Purpose.

The purpose of this rule is to establish procedures for the licensing of private investigator agencies, registrants, and apprentices.

R722-330-2. Authority.

This rule is authorized by Subsections 53-9-103(2)(c) and 53-9-103(6).

R722-330-3. Definitions.

(1) Terms used in this rule are defined in Section 53-9-102.

(2) In addition:

(a) "act involving moral turpitude" means conduct which:

(i) is done knowingly contrary to justice, honesty, or good morals;

(ii) has an element of falsification or fraud; or

(iii) contains an element of harm or injury directed to another person or another's property;

(b) "FBI" means the Federal Bureau of Investigation;

(c) "felony" means a crime under the laws of this state, any other state, the United States, or any district, possession, or territory of the United States for which the penalty is a term of imprisonment in excess of one year;

(d) "legal resident of this state" means a person who has established a domicile in Utah, as that term is defined in Section 41-1a-202;

(e) "license" means a license for a private investigator agency, registrant, or apprentice;

(f) "revocation" means the permanent deprivation of a private investigator license, however revocation of a private investigator license does not preclude an individual from applying for a new private investigator license if the reason for revocation no longer exists; and

(g) "suspension" means the temporary deprivation, for a specified period of time, of a private investigator license.

R722-330-4. Application for Licensure.

(1)(a) An applicant seeking to obtain a license shall submit a completed application packet to the bureau.

(b) The application packet shall include:

(i) a written application form provided by the bureau with the applicant's residential or physical address and mailing or business address;

(ii) one recent color photograph of passport quality which contains the applicant's name written on the back of the photograph, unless the applicant submitted a photo which meets these requirements to the bureau within the previous three years;

(iii) a photocopy of a driver license or identification card issued by the state of Utah;

(iv) one completed FBI applicant fingerprint card (Form FD-258) with the applicant's legible fingerprints; and

(v) the non-refundable license and registration fee in the amount indicated in Section 53-9-111 plus the FBI fingerprint processing fee, in the form of cash, check, money order, or credit card.

(2) If an applicant is applying for an agency license, the applicant shall also provide:

(a) the name under which the applicant intends to do business;

(b) a completed Verification of Investigative Experience Form which documents that the applicant has performed 10,000 hours of investigative experience as provided in Subsection 53-9-108(3);

(c) a certificate of liability insurance for the applicant in an amount of not less than $500,000 as described in Subsection 53-9-109(3); and

(d) a certificate of workers' compensation insurance, if applicable.

(3) If the applicant is applying for a registrant license, the applicant shall also provide:

(a) the name of the licensed agency for which the applicant will be an employee or independent contractor;

(b) authorization from a licensed agency indicating that the agency will employ or contract with the applicant;

(c) a completed Verification of Investigative Experience Form which documents that the applicant has performed 2,000 hours of investigative experience as provided in Subsection 53-9-108(3); and

(d) a surety bond for the applicant in an amount of not less than $10,000 as described in Subsection 53-9-110(3).

(4) If the applicant is applying for an apprentice license, the applicant shall also provide:

(a) the name of the licensed agency for which the applicant will be an employee or independent contractor;

(b) authorization from a licensed agency indicating that the agency will employ or contract with the applicant; and

(c) a surety bond for the applicant in an amount of not less than $10,000 as described in Subsection 53-9-110(3).

R722-330-5. Verification of Investigative Experience.

(1)(a) When completing the Verification of Investigative Experience Form for an agency or registrant license, the applicant shall describe, in detail, the number of hours and the type of investigative work which the applicant performed.

(b) The investigative experience shall have been performed within ten years from the date of the application while the applicant was working as a licensed private investigator or an investigator for a governmental entity.

(c)(i) The Verification of Investigative Experience Form shall be certified by the private investigator or governmental employer for whom the applicant performed the investigative work.

(ii) If the applicant is unable to provide certification from a private investigator or governmental employer, the applicant may provide certification from the individual for whom the applicant performed the investigative work.

(2) An applicant seeking to receive credit towards the investigative experience requirement for licensure under Subsection 53-9-108(5), shall provide written documentation of the degree or certification for which the applicant is seeking credit.

R722-330-6. Issuance of License.

(1)(a) Upon receipt of a completed application packet, the bureau shall conduct a thorough background investigation to determine if the applicant meets the requirements for licensure.

(b) Once the background check is complete, the bureau shall submit the completed application packet to the board for review, unless the application is for an apprentice license.

(c)(i) The bureau shall review all applications for apprentice licenses to determine whether the applicants meet the requirements for licensure.

(ii) If the bureau finds that an applicant for an apprentice license meets the requirements for licensure, the bureau shall issue the apprentice license within five days.

(iii) If the bureau finds that an applicant for an apprentice license does not meet the requirements for licensure, the bureau shall submit the application to the board.

(2)(a) The board shall review all application packets submitted by the bureau to determine whether an applicant meets the requirements for licensure.

(b) If the board determines that an applicant meets the requirements for licensure, the board shall direct the bureau to issue the license.

(3) If the background check indicates that an applicant does not meet the qualifications set forth in Subsection 53-9-108(1)(b), the board shall consider any mitigating circumstances submitted by the applicant.

(4)(a) If the board determines that an applicant does not meet the qualifications for licensure the board shall deny the application.

(b) The board shall issue a written denial which states the reasons why the license was denied and indicates that the applicant may request a hearing before the board by filing a written request within 30 calendar days from the date the board's written denial was issued.

(5)(a) If the applicant requests a hearing, the board shall conduct an informal hearing during which the applicant may present evidence and testimony in response to evidence and testimony presented by the bureau.

(b) The board shall issue a written decision, within ten business days of the hearing, which states the reason for the decision and indicates that the decision may be reviewed by the commissioner if the applicant files a written request for review with the commissioner within 30 calendar days.

(6)(a) If the applicant requests review of the board's decision, the commissioner or his designee shall review the materials in the bureau's file, any materials submitted by the applicant, and the findings of the board.

(b) The commissioner shall issue a written decision, within 30 calendar days from the date of the request for review, which states the reasons for the decision and indicates that the applicant may appeal to the district court by complying with the requirements found in Section 63G-4-402.

R722-330-7. Renewal of a License.

(1)(a) The bureau shall mail a renewal notice to a licensee at the last provided address, approximately 90 days prior to the expiration of the licensee's license.

(2)(a) A licensee seeking to renew a license shall submit a completed renewal packet to the bureau.

(b) The renewal packet shall include:

(i) a written renewal form provided by the bureau with the licensee's residential or physical address and mailing or business address;

(ii) one recent color photograph of passport quality which contains the licensee's name written on the back of the photograph, unless the licensee submitted a photo which meets these requirements to the bureau within the previous three years;

(iii) a photocopy of a driver license or identification card issued by the state of Utah; and

(iv) a non-refundable processing fee in the form of cash, check, money order, or credit card in the amount required by Section 53-9-111.

(3) If the licensee has an agency license, the licensee must also provide evidence that the licensee has a valid certificate of:

(a) liability insurance for the licensee in an amount of not less than $500,000 as described in Subsection 53-9-109(3); and

(b) workers' compensation insurance, if applicable.

(4) If the licensee has a registrant or an apprentice license, the licensee must provide evidence that the licensee has a valid surety bond for the licensee in an amount of not less than $10,000 as described in Subsection 53-9-110(3).

(5) A licensee whose license has been expired for more than 90 days, shall reapply and meet all requirements found in R722-330-4.

(6) If the licensee meets the qualifications for renewal the bureau shall renew the license.

(7)(a) If the bureau determines that the licensee does not meet the qualifications for renewal the bureau shall deny the renewal.

(b) The bureau's written denial shall state the reasons why the renewal was denied and indicate that the licensee may request a hearing before the board by filing a written request within 30 calendar days from the date the bureau's written denial was issued.

(8)(a) If the licensee requests review by the board, the board shall conduct an informal hearing during which the licensee may present evidence and testimony in response to evidence and testimony presented by the bureau.

(b) The board shall issue a written decision, within ten business days of the hearing, which states the reason for the decision, and indicates that the decision may be reviewed by the commissioner if the licensee files a written request for review with the commissioner within 30 calendar days.

(9)(a) If the licensee requests review of the board's decision, the commissioner or his designee shall review the materials in the bureau's file, any materials submitted by the licensee, and the findings of the board.

(b) The commissioner shall issue a written decision, within 30 calendar days from the date of the request for review, which states the reasons for the decision and indicates that the licensee may appeal to the district court by complying with the requirements found in Section 63G-4-402.

R722-330-8. Suspension and Revocation of a License.

(1) The bureau shall conduct an investigation, as provided in Section 53-9-117, if the bureau is made aware of an allegation that a licensee has engaged in conduct in violation of Section 53-9-118.

(2) The bureau shall notify a licensee who is the subject of an investigation of the date and time of the board meeting where the board will consider the bureau's investigative findings.

(3) The board shall conduct an informal hearing during which the licensee may present evidence and testimony in response to the bureau's investigative findings and recommendations.

(4) The board shall issue a written decision, within ten business days after the hearing, which states the reasons for the board's decision, and indicates that the licensee may appeal to the commissioner by filing a written request within 15 calendar days from the date that the board's written decision was issued.

(5)(a) If the licensee requests review of the board's decision, the commissioner or his designee shall review the materials in the bureau's file, any materials submitted by the licensee, and the findings of the board.

(b) The commissioner shall issue a written decision, within 30 calendar days from the date of the request for review, which states the reasons for the decision and indicates that the licensee may appeal to the district court by complying with the requirements found in Section 63G-4-402.

R722-330-9. Records Access.

(1)(a) Information gathered by the division in the course of investigating an application or complaint shall be considered "protected" information in accordance with Subsection 63G-2-305(10).

(b) If such information is used as the basis for the denial, suspension, or revocation of a license, the applicant or licensee shall be entitled to access the information.

KEY: private investigators, license
July 22, 2015 53-9-101 through 53-9-119
Notice of Continuation October 30, 2019

R722. Public Safety, Criminal Investigations and Technical Services, Criminal Identification.
R722-380. Firearm Background Check Information.
R722-380-1. Authority.

This rule is authorized by Subsection 76-10-526(11).

R722-380-2. Definitions.

(1) "Bureau" means the Utah Bureau of Criminal Identification within the Department of Public Safety established by Section 53-10-201.

(2) "Firearm dealer" means any firearm dealer who is licensed as defined in Subsection 76-10-501(7).

(3) "NFA firearm" means a National Firearms Act firearm defined in Title 26 Section 5845 of the United States Code.

R722-380-3. Verification of Identification.

(1) For purposes of a criminal history background check as established in Section 76-10-526, the only form of photo identification the bureau shall accept is a driver license or identification card that may be accessed through the issuing state's database and verified as a valid form of identification.

R722-380-4. Inquiring Into Denial of Firearm Purchase.

(1)(a) An individual who has been denied the purchase of a firearm by the bureau may inquire why he or she was denied such a purchase by submitting a completed Request for Denial/Research Information form.

(b) The individual may have such denial information released to a third party by submitting a completed Third Party Release Form with a completed Request for Denial/Research Information form.

(2)(a) Within a reasonable time after receiving the completed request form, the bureau shall release denial information regarding why the individual has been denied the purchase of a firearm, which shall be mailed, e-mailed, or faxed to the individual at the address, e-mail address, or fax number indicated on the request form.

(3)(a) A denial of the purchase of a firearm by the bureau may not be overturned except if the denial was done in error by the bureau and no longer than 30 days has passed from the date of the initial background check.

R722-380-5. Law Enforcement Evidence Release.

(1)(a) A law enforcement agency seeking to obtain background clearance information from the bureau prior to releasing a firearm from custody must submit a completed Law Enforcement Evidence Release Form by mail or fax.

(b) Upon receipt of a completed Law Enforcement Evidence Release Form, the bureau shall conduct a thorough background investigation to determine whether the individual, to whom the firearm will be released, meets the requirements to possess a firearm established under Section 76-10-503 and Title 18 Section 922 of the United State Code.

(c) Upon completion of the background investigation, the bureau shall notify the law enforcement agency by fax or telephone, at the number indicated on the release form, whether the individual, to whom the firearm will be released, may possess a firearm.

R722-380-6. Procedures on Background Checks for NFA Firearms.

(1)(a) An applicant seeking to transfer or register an NFA firearm according to Title 26 Chapter 53 of the United States Code must complete the Bureau of Alcohol, Tobacco, Firearms, and Explosives Application for Tax Paid Transfer and Registration of Firearm form and submit to a background check by the bureau as provided in Section 76-10-526.

(b) The bureau shall conduct a thorough background investigation as provided in Section 76-10-526 on the individual receiving the NFA firearm upon receipt of a request from a firearm dealer to perform the background check.

(c) Applications initiated prior to July 3, 2016, are not subject to an additional background fee provided under Section 76-10-526 at the time of receiving the NFA firearm from the firearm dealer.

KEY: firearm purchases, firearm releases, firearm denials, firearm background check information

January 10, 2018	**53-10-201**
Notice of Continuation October 30, 2019	**76-10-526**
	76-10-503
	76-10-501

R728. Public Safety, Peace Officer Standards and Training.
R728-506. Canine Body Armor Restricted Account.
R728-506-1. Purpose.

The purpose of this rule is to establish the required documentation a law enforcement agency must provide when applying to the division to receive funds under Section 53-16-301.

R728-506-2. Authority.

This rule is authorized by Section 53-16-302 which provides that the department shall make rules prescribing information that a law enforcement agency shall include with its application to obtain funds from the account.

R728-506-3. Definitions.

(1) The terms used in this rule are defined in Section 53-1-102.

(2) In addition:

(a) "account" means the Canine Body Armor Restricted Account;

(b) "agency" means a law enforcement agency;

(c) "awarded funds" means the funds appropriated by the department from the account;

(d) "department" means the Utah Department of Public Safety;

(e) "POST" means the Division of Peace Officer Standards and Training;

(f) "law enforcement administrator" means a police chief, sheriff, public safety director, or superintendent of a law enforcement agency; and

(g) "law enforcement work" means patrol functions.

R728-506-4. Application Process.

(1) An agency that wishes to receive awarded funds may submit an application.

(2) The application must be addressed to POST and contain the following:

(a) the application form, which is available from POST;

(b) a written cost estimate prepared by the seller;

(c) proof of purchase;

(i) if proof of purchase is not available at the time the agency submits the application, the agency must submit it within 90 days of purchasing the armor;

(d) the signature of the law enforcement administrator certifying the following:

(i) the agency meets the requirements listed in Section 53-16-301(4)(a);

(ii) the police service canine is trained for law enforcement patrol duties; and

(iii) the police service canine is used or will be used in patrol functions.

(3)(a) All applications must be submitted before the first day of November in order to be eligible for awarded funds from the current fiscal year.

(b) If no applications are received before the first day of November, the award funds shall remain in the account until the next fiscal year.

KEY: Canine Body Armor Restricted Account
January 26, 2015 53-16-302
Notice of Continuation October 28, 2019

R765. Regents (Board of), Administration.
R765-800. Free Expression on Campus.
R765-800-1. Purpose.

(1) In accordance with Title 53B, Chapter 27, Part 3, Campus Civil Liberties Protection Act, the rule establishes general rights to expression on campus as established by law and recognizes narrow limits on speech, including time, place, and manner restrictions.

R780-800-2. References.

(1) United States Constitution, Amendment 1, Freedom of Expression and Religion.

(2) Utah Constitution, Article 1, Section 15, Freedom of Speech and of the Press.

(3) Title 53B, Chapter 27, Part 2, Campus Free Expression Act.

(4) Title 53B, Chapter 27, Part 3, Campus Civil Liberties Protection Act.

R780-800-3. Definitions.

(1) Free Expression means all forms of verbal, written, or symbolic communication, including peaceful assembly, protests, speaking verbally, holding signs, circulating petitions, and distributing written materials.

(a) Free expression does not include speech or conduct that is not recognized as protected by the First Amendment to the U.S. Constitution and Article 1, Section 15 of the Utah Constitution, including speech or conduct that is a true threat, fraudulent, harassment, obscene, defamatory, or otherwise unlawful.

R780-800-4. General Rights of Free Expression on Campus.

(1) Institutions uphold and promote free expression on campus. Except as limited by regulations consistent with the law and this rule, (a) all faculty, students, and staff have the right to express views and ideas, and are free to criticize, contest, and condemn views expressed on campus and (b) neither the faculty, staff, nor students may obstruct, disrupt, suppress or otherwise interfere with the freedom of others to express views and ideas.

(3) Institutions' outdoor areas are a public forums.

(4) Subject to R765-800-5, institutions may not prohibit:

(a) a member of the institution's community or the public from spontaneously and contemporaneously assembling in an outdoor area of the institution's campus; or

(b) a person from freely engaging in noncommercial expressive activity in an outdoor area of the institution's campus if the person's conduct is lawful.

R765-800-5. Time, Place and Manner Restrictions.

(1) Institutions may reasonably regulate the time, place, and manner of free expression to ensure that it does not disrupt the institution's ordinary activities. This restriction includes established procedures for engaging in organized speech activities, such as protest marches or invited speakers.

(2) These exceptions to the principle of freedom of expression must be viewpoint neutral, generally content neutral, narrowly tailored, and leave ample opportunity for alternative means for expression. Institutions will not use these exceptions in a manner that is inconsistent with the institutions" commitment to free and open discussion of ideas.

R780-800-6. Incorporations of Institution Policies.

Institutions have adopted the following policies that are incorporated by reference within this rule:

(1) Utah State University.

(a) Student Code Article III (April 10, 2009).

(2) Weber State University.

(a) PPM 6-22, Student Code (September 13, 2018).

(b) PPM 5-37, Campus Facilities Use (December 4, 2012).

(c) PPM 7-10, Posting and Distribution of Written Materials (October 3, 2017).

(3) University of Utah.

(a) Policy 1-007, University Speech Policy (June 12, 2008).

(4) Utah Valley University.

(a) 161 Freedom of Speech (June 22, 2017).

(b) 162 Sexual Misconduct (June 18, 2019).

(c) 165 Discrimination, Harassment, and Affirmative Action (June 18, 2019).

(5) Snow College.

(a) Student Rights and Responsibilities (May 31, 2019).

(b) Snow College Free Speech Policy (December 8, 2017).

(6) Southern Utah University.

(a) Policy 5.1, Free Speech and Advocacy on Campus (May 3, 2018).

(7) Dixie State University.

(a) Policy 110, Free Speech (March 5, 2018).

(b) Policy 552, Student Rights and Responsibilities (April 28, 2017).

KEY: civil liberties, free speech
October 19, 2019 53B-27-302

R765. Regents (Board of), Administration.
R765-801. Student Due Process.
R765-801-1. Purpose.

(1) In accordance with Title 53B, Chapter 27, Part 3, Campus Civil Liberties Protection Act, this rule establishes general elements of due process that institutions must provide to a student prior to being expelled or suspended for 10 days or more for non-academic code of conduct violations.

R765-801-2. References.

(1) United States Constitution, Amendment 14, Due Process.

(2) Utah Constitution, Article 1, Section 7, Due Process of Law.

(3) Title 53B, Chapter 27, Part 3, Campus Civil Liberties Protection Act.

R765-801-3. General Rights of Due Process.

(1) In matters of non-academic conduct that may result in either expulsion or a minimum 10-day suspension, institutions will provide students the following minimum due process:

(a) Notice: Prior to being interviewed about allegations of misconduct, the institution shall provide students with notice of the allegations against them and of their right to have an advisor throughout the process who may, but need not be, an attorney.

(i) During an inquiry, investigation, or other informal process, an advisor may only advise the student and may not actively participate in the investigation or informal process.

(b) Explanation of the evidence: Prior to a formal hearing, unless prohibited by reasonable circumstances, each party shall provide to the hearing committee chair (or hearing officer) copies of the documents they intend to submit as evidence and a list of witnesses they intend to call during the formal hearing. This information will be shared with both parties. In all circumstances, including informal processes, institutions will provide students an explanation of the evidence against them.

(c) Opportunity to respond: Institutions will provide students an opportunity for a full hearing at which they can respond to the allegations and evidence against them. With the agreement of all parties, institutions may also provide an informal hearing or opportunity to respond or an agreed upon informal resolution.

(i) At formal adjudicatory hearings, students may have an advisor advocate for them. The student's advisor may be an attorney. The student's advisor may actively participate in the hearing in accordance with the institution's policies regarding active participation.

R765-801-4. Standard of Proof.

Students are presumed not to have engaged in a Code of Conduct violation until an institution has established a violation by a preponderance of the evidence.

R765-801-5. Incorporations of Institutions' Policies.

Institutions have adopted the following policies that are incorporated by reference within this rule:

(1) Utah State University.

(a) Policy 305, Discrimination Complaints (May 6, 2016).

(b) Student Code Article VIII (April 10, 2009).

(2) Weber State University.

(a) PPM 6-22, Student Code (September 13, 2018).

(3) University of Utah.

(a) Policy 6-400, Code of Student Rights and Responsibilities, Sections III(C), VI (C) (July 9, 2009).

(b) Rule 1-012A, Discrimination Complaint Process Rule (February 14, 2017).

(c) Rule 1-012B(III)(E-K), Sexual Misconduct Complaint Process Rule (February 14, 2017).

(d) Procedure 1-012, Discrimination Hearing Procedure (February 14, 2017).

(4) Utah Valley University.

(a) 162 Sexual Misconduct (June 18, 2019).

(b) 165 Discrimination, Harassment, and Affirmative Action (June 18, 2019).

(c) 502 Determination of Utah Resident Status for Tuition Purposes (December 4, 2014).

(d) 541 Student Code of Conduct (November 29, 2018).

(5) Snow College.

(a) Student Rights and Responsibilities (May 31, 2019).

(6) Southern Utah University.

(a) Policy 11.2, Student Code of Conduct (April 29, 2016).

(7) Dixie State University.

(a) 154, Title IX, Harassment and Nondiscrimination (September 1, 2016).

(b) 552, Student Rights and Responsibilities (April 28, 2017).

KEY: civil liberties, due process
October 19, 2019 53B-27-302

R765. Regents (Board of), Administration.
R765-802. Weapons on Campus.
R765-802-1. Purpose.

(1) In accordance with Title 53B, Chapter 27, Part 3, Campus Civil Liberties Protection Act, this rule establishes general rights and restrictions on possessing weapons on campus.

R765-802-2. References.

(1) Title 76, Chapter 10, Part 500 Uniform Law (Right to bear arms in Utah).

(2) Title 76, Chapter 10, Part 501 Definitions.

(3) Title 76, Chapter 10, Part 505.5 Possession of a dangerous weapon, firearm, or sawed off shotgun on or about school premises - Penalties.

(4) Title 76, Chapter 3, Part 203.2 Definitions - Use of dangerous weapon in offenses committed on or about school premises - Enhanced penalties. Exceptions.

(5) Title 53, Chapter 5, Section 704 Bureau duties -- Permit to carry concealed firearm -- Certification for concealed firearms instructor -- Requirements for issuance -- Violation -- Denial, suspension, or revocation -- Appeal Procedure.

(6) Title 53, Chapter 5, Section Temporary permit to carry concealed firearm - Denial, suspension, or revocation - Appeal.

(7) Title 76, Chapter 10, Possession of firearm at residence or on real property authorized.

(8) Title 76, Chapter 10, Persons exempt from weapons laws.

(9) Title 53B, Chapter 27, Part 3, Campus Civil Liberties Protection Act.

R765-802-3. Possession of Weapons on Campus.

(1) Institutions comply with and enforce the state laws referenced in section 2 governing firearms on campus.

R765-802-4. Incorporations of Institution Policies.

Institutions have adopted the following policies that are incorporated by reference within this rule:

(1) Weber State University.

(a) PPM 5-35a, Firearms on Campus, August 10, 2010.

(2) University of Utah.

(a) Policy 1-003, Firearms on Campus September 24, 2007.

(3) Utah Valley University.

(a) 541 Student Code of Conduct November 29, 2018.

KEY: civil liberties, due process, weapons
October 19, 2019 53B-27-302

R765. Regents (Board of), Administration.
R765-803. Institutional Policy Review.
R765-803-1. Purpose.

(1) This rule establishes a procedure whereby a student enrolled in a public institution of higher education may petition the Board of Regents to review a policy that directly affects the student's enumerated civil liberties, which the student believes the institution adopted without first establishing an administrative rule governing the enumerated civil liberty.

R765-803-2. References.

(1) Title 53B, Chapter 27, Part 3

R765-803-3. Review Process.

(1) Students enrolled at a public institution of higher education who believe the institution has adopted a policy that directly impacts one of the their enumerated civil liberties but which is not governed by an existing administrative rule may petition the Board of Regents for a review.

(2) To file a petition for review, a student will send a written request that identifies the policy for which a review is requested to review@ushe.edu. Within 30 days of receiving the complaint, the Commissioner of Higher Education's office, on behalf of the Board of Regents, will:

(a) Review the petition to determine if it is made in good faith;

(i) Bad faith petitions shall be dismissed.

(b) Determine if the institution has established an administrative rule that adopts or governs the policy; and

(c) If the institution lacks a governing administrative rule, direct the institution to initiate rulemaking within 60 days of the decision.

KEY: civil liberties, Board of Regents review
October 19, 2019 53B-27-302

R784. Regents (Board of), Salt Lake Community College.
R784-2. Free Expression on Campus.
R784-2-1. Purpose.

(1) In accordance with Title 53B, Chapter 27, Part 3, Campus Civil Liberties Protection Act, the rule establishes general rights to expression on campus as established by law and recognizes narrow limits on speech, including time, place, and manner restrictions.

R784-2-2. References.

(1) United States Constitution, Amendment 1, Freedom of Expression and Religion.

(2) Utah Constitution, Article 1, Section 15, Freedom of Speech and of the Press.

(3) Title 53B, Chapter 27, Part 2, Campus Free Expression Act.

(4) Title 53B, Chapter 27, Part 3, Campus Civil Liberties Protection Act.

R784-2-3. Definitions.

(1) Free Expression means all forms of verbal, written, or symbolic communication, including peaceful assembly, protests, speaking verbally, holding signs, circulating petitions, and distributing written materials.

(a) Free expression does not include speech or conduct that is not recognized as protected by the First Amendment to the U.S. Constitution and Article 1, Section 15 of the Utah Constitution, including speech or conduct that is a true threat, fraudulent, harassment, obscene, defamatory, or otherwise unlawful.

R784-2-4. General Rights of Free Expression on Campus.

(1) The college upholds and promotes free expression on campus. Except as limited by regulations consistent with the law and this rule, (a) all faculty, students, and staff have the right to express views and ideas, and are free to criticize, contest, and condemn views expressed on campus and (b) neither the faculty, staff, nor students may obstruct, disrupt, suppress or otherwise interfere with the freedom of others to express views.

(2) The college's outdoor areas are a public forum.

(3) Subject to R765-800-5, the college may not prohibit:

(a) a member of the college's community or the public from spontaneously and contemporaneously assembling in an outdoor area of the college's campus; or

(b) a person from freely engaging in noncommercial expressive activity in an outdoor area of the college's campus if the person's conduct is lawful.

R784-2-5. Time, Place and Manner Restrictions.

(1) The college may reasonably regulate the time, place, and manner of free expression to ensure that it does not disrupt the ordinary activities of the college. This restriction includes established procedures for engaging in organized speech activities, such as protest marches or invited speakers.

(2) These exceptions to the principle of freedom of expression must be viewpoint neutral, generally content neutral, narrowly tailored, and leave ample opportunity for alternative means for expression. The college will not use these exceptions in a manner that is inconsistent with the college's commitment to free and open discussion of ideas.

R784-2-6. Incorporations of College Policies.

(1) The college has adopted the following policies that are incorporated by reference within this rule:

(a) Campus Speech 3-2.03. (08/01/2018)

KEY: campus speech, free expression
October 17, 2019 53B-27-3

R784. Salt Lake Community College.
R784-3. Weapons on Campus.
R784-3-1. Purpose.

(1) In accordance with Title 53B, Chapter 27, Part 3, Campus Civil Liberties Protection Act, this rule establishes general rights and restrictions on possessing weapons on campus.

R784-3-2. References.

(1) Title 76, Chapter 10, Part 500 Uniform Law (Right to bear arms in Utah)

(2) Title 76, Chapter 10, Part 501 Definitions.

(3) Title 76, Chapter 10, Part 505.5 Possession of a dangerous weapon, firearm, or sawed off shotgun on or about school premises - Penalties.

(4) Title 76, Chapter 3, Part 203.2 Definitions - Use of dangerous weapon in offenses committed on or about school premises - Enhanced penalties. Exceptions.

(5) Title 53, Chapter 5, Section 704 Bureau duties -- Permit to carry concealed firearm -- Certification for concealed firearms instructor -- Requirements for issuance -- Violation -- Denial, suspension, or revocation -- Appeal Procedure.

(6) Title 53, Chapter 5, Section Temporary permit to carry concealed firearm - Denial, suspension, or revocation - Appeal.

(7) Title 76, Chapter 10, Possession of firearm at residence or on real property authorized.

(8) Title 76, Chapter 10, Persons exempt from weapons laws.

(9) Title 53B, Chapter 27, Part 3, Campus Civil Liberties Protection Act

R784-3-3. Possession of Weapons on Campus.

(1) The college complies with and enforces the state laws referenced in section 2 governing firearms on campus.

R784-3-4. Incorporations of College Policies.

(1) The college has adopted the following policies that are incorporated by reference within this rule:

(a) Policy - Weapons 2-3.14, 10/02/2018.

KEY: weapons
October 17, 2019 **53B-27-3**

R784. Salt Lake Community College.
R784-4. Student Due Process.
R784-4-1. Purpose.

(1) In accordance with Title 53B, Chapter 27, Part 3, Campus Civil Liberties Protection Act, this rule establishes general elements of due process that must be provided to a student prior to being expelled or suspended for 10 days or more for non-academic code of conduct violations.

R784-4-2. References.

(1) United States Constitution, Amendment 14, Due Process.

(2) Utah Constitution, Article 1, Section 7, Due Process of Law.

(3) Title 53B, Chapter 27, Part 3, Campus Civil Liberties Protection Act.

(4) Policy - Code of Student Rights and Responsibilities 9.0.020.

(5) Policy - Student Sexual Misconduct 9.0.060.

R784-4-3. General Rights of Due Process.

(1) In matters of non-academic conduct that may result in either expulsion or a minimum 10-day suspension, the college will provide students the following minimum due process:

(a) Notice: Prior to being interviewed about allegations of misconduct, the college shall provide students with notice of the allegations against them and of their right to have an advisor throughout the process who may, but need not be, an attorney.

(i) During an inquiry, investigation, or other informal process, an advisor may only advise the student and may not actively participate in the investigation or informal process.

(b) Explanation of the evidence: Prior to a formal hearing, unless prohibited by reasonable circumstances, each party shall provide to the hearing committee chair (or hearing officer) copies of the documents they intend to submit as evidence and a list of witnesses they intend to call during the formal hearing. This information will be shared with both parties. In all circumstances, including informal processes, the college will provide students an explanation of the evidence against them.

(c) Opportunity to respond: The college will provide students an opportunity for a full hearing at which they can respond to the allegations and evidence against them. With the agreement of all parties, the college may also provide an informal hearing or opportunity to respond or an agreed upon informal resolution.

(i) At formal adjudicatory hearings, students may have an advisor advocate for them. The student's advisor may be an attorney. The student's advisor may actively participate in the hearing in accordance with the college's policies regarding active participation.

R784-4-4. Standard of Proof.

(1) Students are presumed not to have engaged in a Code of Conduct violation until the college has established a violation by a preponderance of the evidence.

R784-4-5. Incorporations of Colleges' Policies.

(1) The college has adopted the following policies that are incorporated by reference within this rule.

(a) Policy - Code of Student Rights and Responsibilities 3-2.01, 10/16/2018.

(b) Policy - Student Sexual Misconduct 3-2.02, 01/17/2017.

KEY: due process
October 17, 2019 **53B-27-3**

R805. Regents (Board of), University of Utah, Administration.
R805-4. Illegal, Harmful, and Disruptive Behavior on University of Utah Property.
R805-4-1. Purpose.

1. To identify activities and behaviors that are prohibited on the University of Utah campus and its properties.

2. To identify possible sanctions for persons who engage in such behaviors and the process for enforcement and discipline.

R805-4-2. Definitions.

1. "University of Utah Community Member" means a University of Utah faculty member, staff member, student or any other person who is invited to participate in University of Utah events and activities.

2. "University property" means the university campus and any other property owned, operated or controlled by the University of Utah and specifically includes the University's grounds, buildings and roadways.

R805-4-3. Prohibited Activities.

A. No person may enter upon or remain upon University property for the purpose of, or in the actual commission of, activities that violate state or federal criminal laws.

B. No person may enter upon or remain upon University property for the purpose of, or in the actual commission of, activities that violate the policies, procedures, regulations and rules of the University of Utah.

C. No person may enter upon or remain upon University property for the purpose of, or in the actual commission of, activities that are violent, obscene or disorderly.

D. No person may enter upon or remain upon University property for the purpose of, or in the actual commission of, activities that obstruct, disrupt or otherwise interfere with the University's educational process, including but not limited to its academic, business, administrative and recreational meetings and processes.

E. No person may enter onto, or remain upon, University property that is not open to the general public absent a specific authorization or invitation by a University of Utah Community Member authorized to allow such entry.

F. No person may enter upon or remain upon University property for the purpose of, or in the actual commission of, stealing or using without authorization any real or personal property owned by the University of Utah or owned by a University of Utah Community Member.

G. No person may enter upon or remain upon University property for the purpose of, or in the actual commission of, activities that injure, deface, damage or destroy any real or personal property owned by the University of Utah or owned by a University of Utah Community Member.

H. No person may enter upon or remain upon University property for the purpose of, or in the actual commission of, activities that cause injury to a University of Utah Community Member.

I. No person may enter upon or remain upon University property for the purpose of, or in the actual commission of, verbal or physical conduct of a sexual nature toward a University of Utah Community Member that has the purpose or effect of unreasonably interfering with the individual's employment or education performance or creates an intimidating, hostile, or offensive environment for that individual's employment, education, living environment, or participation in a university activity.

J. No person may enter upon or remain upon University property, for the purpose of, or in the actual commission of, activities that interfere with another person's lawful and authorized access, ingress and egress to University property, including its grounds, buildings and roadways.

K. No person may enter upon or remain upon University property for the purpose of, or in the actual commission of, activities that incite, support, encourage, aid or abet others to commit one or more of the activities listed in the paragraphs A-J above.

R805-4-4. Sanctions.

1. University students, university staff and university faculty who violate this rule may be subject to disciplinary action pursuant to the applicable policies and procedures of the University of Utah Regulations Library.

2. Members of the public who violate this rule may be subject to one or more of the following sanctions:

a. Issuance of a citation for criminal trespass pursuant to Section 76-6-206;

b. Issuance of citation and temporary eviction from, and denial of access to, University property pursuant to Sections 76-8-701 through 76-8-718; and

c. Eviction from, and denial of access to, University property after an informal adjudicative proceeding pursuant to Rule R765-134.

KEY: illegal behavior, disruptive behavior, harmful behavior, trespassing

January 7, 2010	**53B-2-106**
Notice of Continuation October 10, 2019	**63G-4-102**
	76-8-701 et seq.

R873. Tax Commission, Motor Vehicle.
R873-22M. Motor Vehicle.
R873-22M-2. Documentation Required and Procedures to Follow to Register or Title Certain Vehicles Pursuant to Utah Code Ann. Sections 41-1a-104 and 41-1a-108.

(1) To title or register a vehicle previously registered in a nontitle state, an applicant must submit both of the following:

(a) the last registration certificate; and

(b) a lien search from the recording jurisdiction or form TC- 569A, Ownership Statement, in lieu of the lien search.

(2) To title or register a repossessed vehicle, an applicant must submit both of the following:

(a) the outstanding certificate of title, with the lien recorded in favor of the repossessor; and

(b) form TC-569B, Repossession Statement, signed by the lien holder recorded on the certificate of title or a similar statement or form.

(3) To title or register a vehicle previously owned by the U.S. government, an applicant must submit U.S. government Standard Form No. 97.

(4) To title or register a vehicle foreclosed by advertisement, an applicant must submit each of the following:

(a) a certificate of sale bearing the signature of the person who conducted the sale. The certificate must contain the following information:

(i) date of sale;

(ii) name of person to whom the vehicle was sold;

(iii) complete description of the vehicle;

(iv) amount due on the contract;

(v) date that the amount due became delinquent; and

(vi) amount received from the sale of the vehicle;

(b) a copy of the notice sent to the owner and lien holder of record; and

(c) proof that notice was published in accordance with Sections 38-2-4 or 38-8-3, as applicable.

(5) To title or register a vehicle transferred by divorce decree an applicant must submit each of the following:

(a) a certified copy of the divorce decree;

(b) the outstanding certificate of title; and

(c) the last registration certificate for a nontitle state.

(6) To title or register a vehicle when the current owner is declared incompetent, an applicant must submit each of the following:

(a) the outstanding certificate of title, endorsed for transfer by the guardian;

(b) the last registration certificate for a nontitle state; and

(c) a certified copy of the court order appointing the guardian.

(7) To title or register a vehicle purchased at impound auction, an applicant must submit a certificate of sale that contains the following information:

(a) a complete description of the vehicle;

(b) name of the purchaser; and

(c) the signature of the state, city, or county official who conducted the sale.

(8) To title or register a vehicle transferred pursuant to a power of attorney, an applicant must submit the power of attorney to the Tax Commission.

(9) To title or register a vehicle transferred from a deceased owner when form TC-569C, Survivorship Affidavit, does not apply, the applicant must submit the outstanding certificate of title or the last registration certificate for a nontitle state. In addition, the applicant must submit one of the following:

(a) a certified copy of the final decree of distribution;

(b) an order from the court confirming sale; or

(c)(i) an endorsement on the title by the administrator, executor, or personal representative with a certified copy of letters of administration, letters testamentary, or letters appointing a personal representative attached.

(ii) When the title is issued in joint ownership where the owners names are connected with "and" or "/", the survivor may transfer ownership by endorsement only and by furnishing proof of death of the other joint owner.

(10)(a) When satisfactory documentary evidence of ownership is lacking and the applicant has exhausted all normal means of obtaining evidence of ownership, the Tax Commission may issue a title or a dismantle permit upon receipt of:

(i) a court order; or

(ii) subject to Subsections (10)(b)(ii) and (iii), form TC-569A, Ownership Statement.

(b)(i) The form required under Subsection (10)(a)(ii) must contain each of the following:

(A) a complete recital of facts explaining the absence of a negotiable title or current registration for nontitle states;

(B) an explanation of how the vehicle was obtained and from whom;

(C) a statement indicating any outstanding liens or encumbrances on the vehicle;

(D) a statement indicating where the vehicle was last titled or registered;

(E) a description of the vehicle;

(F) any other items pertinent to the acquisition or possession of the vehicle; and

(G) an indemnification agreement holding the Tax Commission and its employees harmless from any and all liability resulting from the issuance of the title or dismantle permit.

(ii) If the vehicle has a value of $1,000 or less at the time of application, and the vehicle is less than six model years old, or the vehicle is a motorcycle, the vehicle may be subject to a physical examination by an employee appointed by the Tax Commission prior to issuance of a title or dismantle permit.

(iii) If the vehicle has a value in excess of $1,000, the Tax Commission may require a surety bond in addition to the form described in Subsection (10)(a)(ii). The amount of the surety bond may not exceed twice the fair market value of the vehicle as determined by the Tax Commission.

(11) To title or register a specially constructed or rebuilt vehicle, an applicant shall furnish form TC-569D, Statement of Facts, explaining the acquisition of essential parts and the date construction was completed. The form must be supported by bills of sale or invoices for the parts.

(a) An application for an identification number must be completed. The assigned number shall be affixed to the vehicle and inspected by a peace officer or an authorized agent of the Tax Commission.

(b) The vehicle make shall be designated as "SPCN" (specially constructed), and the year model shall be determined according to the date the construction was completed.

(c) If satisfactory evidence of ownership is lacking, the procedure outlined in Subsection (10) must be followed.

(d) In the case of a dune buggy or similar type vehicle where the complete running gear and chassis of another vehicle is used, the identification number of the vehicle used as the primary base of the rebuilt vehicle shall be used for identification and must correspond to the identification number on the surrendered certificate of title.

(e) The rebuilt vehicle shall retain the manufacturer's name as it appeared on the surrendered title. However, the word "rebuilt" shall be placed on the application and on the face of the title issued by the Tax Commission. The type of body and vehicle model may be changed to more accurately describe the vehicle. If a new body is used, the year model shall be determined by the date the rebuilding is complete. If only the body style has been altered or changed, the vehicle shall retain the year model stated on the surrendered title.

R873-22M-7. Transfer of License Plates and Registration for an Increase of Gross Laden Weight Pursuant to Utah Code Ann. Section 41-1a-701.

A. License plates and registration may not be transferred under any of the following conditions:

1. The license plates are lifetime trailer plates issued pursuant to Section 41-1a-228.

2. The newly acquired vehicle requires a different registration period from that of the vehicle previously owned.

B. License plates may be transferred only if the application for transfer is made in the name of the original registered owner, unless the owner's name has been changed by marriage, divorce, or court order.

C. Transferred license plates may not be displayed upon the newly acquired vehicle until the registration has been completed and a new registration card has been issued.

D. The expiration date on the new registration card shall be the same as that appearing on the original registration.

E. If registration is based on gross laden weight and the gross laden weight of a vehicle is increased during the registration year, additional registration fees shall be collected based on the following computations:

1. Subtract the registration fee for the current year from the registration fee for the increased weight.

2. Multiply that difference by the percentage of the year for which the vehicle will be registered at the increased weight.

F. The holder of a three-month registration who seeks to increase the gross laden weight of a vehicle shall pay the full three-month registration fee for the increased weight.

R873-22M-8. Expiration of Registration Pursuant to Utah Code Ann. Sections 41-1a-211 and 41-1a-215.

A. Registration issued for a period of three calendar months, six calendar months, or nine calendar months, shall expire at midnight on the last day of the third, sixth, or ninth calendar month from the date issued.

B. If an unexpired registration issued for three calendar months, six calendar months, or nine calendar months is being renewed, the expiration date shall be three calendar months, six calendar months or nine calendar months from the month the previous registration would have expired.

C. When a temporary permit is issued as authorized under Section 41-1a-211, the registration period shall begin on the first day of the calendar month in which the first temporary permit was issued.

R873-22M-11. Copies of Registration Cards Pursuant to Utah Code Ann. Section 41-1a- 214.

A. In lieu of an original registration card, a copy of a registration card may be carried in an intrastate commercial vehicle or a vehicle owned or leased by this state or any of its political subdivisions. Both the front and back of the registration card must be copied.

R873-22M-14. License Plates and Decals Pursuant to Utah Code Ann. Sections 41-1a-215, 41-1a-401, and 41-1a-402.

A. Except as provided under Section 41-1a-215(1), license plates shall be renewed on a yearly basis until new license plates are issued.

B. For all license plates, except vintage vehicle license plates, a month decal and year decal shall be issued upon the first registration of the vehicle. Upon each subsequent registration, the vehicle owner shall receive only a year decal to validate renewal. The registration decals shall be applied as follows:

1. Decals displayed on license plates with black lettering on a white background shall be applied to the lower left hand corner of the rear license plate.

2. Decals displayed on centennial license plates and regular issue license plates with blue lettering on a white background shall be applied to the upper left hand corner of the rear license plate.

3. Decals displayed on special group license plates shall be applied to the upper right hand corner of the rear license plate unless there is a plate indentation on the upper left hand corner of the license plate.

4. All registration decals issued for truck tractors shall be applied to the front license plate in the position described in either Subsection B.1. or B.2.

5. All registration decals issued for motorcycles shall be applied to the upper corner of the license plate opposite the word "Utah".

C. The month decal shall be displayed on the license plate in the left position, and the year decal in the right position.

D. The current year decal shall be placed over the previous year decal.

E. Whenever any license plate, month decal, or year decal is lost or destroyed, a replacement shall be issued upon application and payment of the established fees.

R873-22M-15. Assigned and Replacement Vehicle Identification Number System Pursuant to Utah Code Ann. Section 41-1a-801.

A. The Tax Commission provides a standard Vehicle Identification Number (VIN) plate for vehicles, snowmobiles, trailers, and outboard boat motors that have never had a distinguishing number or if the original VIN has been altered, removed, or defaced.

B. The owner of the unit will make application to the Tax Commission on form TC-162 for an assigned or replacement VIN. In the event the applicant has no title to the unit, the Motor Vehicle Division follows the procedure in Rule R873-22M-2, to determine ownership.

C. The vehicle may be subject to inspection and investigation. Upon determination of the validity of the application, a vehicle identification plate is issued.

1. In cases involving vehicles where the original plate has been removed or obliterated but the original factory number can be verified, a VIN plate is issued with the original VIN entered by means of an approved procedure.

2. In all other instances a prestamped VIN plate is issued bearing an official Utah assigned VIN.

3. The VIN plate must, under the supervision of the Tax Commission, be attached to the unit as follows:

a) passenger and commercial vehicles:

(1) primary location is on a portion of the left front door lock post;

(2) secondary location is on a portion of the firewall, either left or right side, whichever is most advantageous; (This location is to be selected only when the VIN plate cannot be attached to the lock posts.)

b) motorcycles, snowmobiles, and outboard motors:

(1) as near as possible to the original number location; (If an original number, the VIN plate shall be affixed to the headstock.)

c) trailers:

(1) primary location is on a portion of the right side of the tongue or drawbar near the body;

(2) secondary location is on a portion of the metal frame near the front right corner;

d) on units where it is not practical to install rivets, the VIN plate may be attached by adhesive only.

D. The Motor Vehicle Division is responsible for the control, security, and distribution of the VIN plates and will keep the necessary records and require regular reports from designated branch offices.

E. Following are the specifications of the official Utah assigned identification plate and attachment accessories.

1. Size will be 1 inch x 3 inches x .003 inch deep etched to .002 inch with 1/8 inch radius corners.

2. Material will be color anodized aluminum foil.

3. Color will be blue background with silver lettering.

4. Backing will be laminated with permanent pressure sensitive adhesive.

5. Control numbers will be serialized with 1/8 inch permanent embossed or anodized numbers.

6. The state seal will be in the left center, with appropriate rivet areas designated.

7. The assigned number will be prestamped using the prefix of "UT." The number series to include one letter and five digits with the letter to identify the unit type as follows:

TABLE

a)	Passenger and Commercial	P00001
b)	Motorcycles	M00001
c)	Trailers	T00001
d)	Reconstructed vehicle	R00001
e)	Outboard Motors	E00001
f)	Snowmobiles	S00001

R873-22M-16. Authorization to Issue a Certificate of Title Pursuant to Utah Code Ann. Section 41-1a-104.

(1) If the purpose of the certificate of title is to record a new lien, or to rerecord a lien, and there is no change in the registered owner, all of the following are required:

(a) the outstanding Utah certificate of title showing a release of the prior lien;

(b) an application or title, properly signed; and

(c) the title fee.

(2) In order to issue a new certificate of title showing the assignee as the lienholder, an applicant shall submit all of the following:

(a) the outstanding Utah certificate of title showing a release of the prior lien;

(b) an application or title showing the registered owner and the new lienholder, and signed by the assigning lienholder; and

(c) the title fee.

R873-22M-17. Standards for State Impound Lots Pursuant to Utah Code Ann. Section 41-1a-1101.

(1) An impound yard may be used by the Motor Vehicle Division and peace officers only if all of the following requirements are satisfied:

(a) The yard must be identified by a conspicuously placed, well-maintained sign that:

(i) is at least 24 square feet in size;

(ii) includes the business name, address, phone number, and hours of business; and

(iii) displays the impound yard identification number issued by the Motor Vehicle Division in characters at least four inches high.

(b) The yard shall maintain a hard-surfaced storage area of concrete, black top, gravel, road base, or other similar material.

(c) The yard must have adequate lighting.

(d) A six-foot chain link or other similar fence that is topped with three strands of barbed wire or razor security wire must surround the yard.

(e) The yard must have opaque fencing, which may be opaque chain link fencing, on any side that has frontage with a highway.

(f) Spacing between vehicles must be adequate to allow opening of vehicle doors without interfering with other vehicles or objects.

(g) An office shall be located on the premises of the yard.

(i) The yard office shall be staffed and open for public business during normal business hours, Monday through Friday, except for designated state and federal holidays.

(ii) If the yard maintains multiple storage areas, authorization may be requested from the Motor Vehicle Division to maintain a central office facility in a location not to exceed a 10 mile radius from any of its storage areas.

(iii) If a central office facility is authorized under Subsection (1)(g)(ii), the signs of all storage areas must provide the location of the office.

(h) The yard shall provide compressed air and battery boosting capabilities at no additional cost.

(2) Persons who can demonstrate an ownership interest in a car held at a state impound yard are allowed to enter the vehicle during normal business hours and remove personal property not attached to the vehicle upon signing a receipt for the property with the yard.

(a) An individual has ownership interest in the vehicle if he:

(i) is listed as a registered owner or lessee of the vehicle; or

(ii) has possession of the vehicle title.

(b) An individual must show picture identification as evidence of his ownership interest.

(c) The storage yard shall maintain a log of individuals who have been given access to vehicles for the purpose of removing personal property.

(3) Impound yards holding five or less vehicles in a month may be required to tow those vehicles to another yard for the purpose of centralizing sales of vehicles or, at the discretion of the Motor Vehicle Division, be required to hold the vehicles until additional impounded vehicles may be included.

(4) Operators of impound yards shall remove license plates from impounded vehicles prior to the time of sale and turn them over to the commission at the time the vehicles are sold.

(5) The Motor Vehicle Division has the authority to review the qualifications of state impound yards to assure compliance with the requirements set forth in this rule. Any yard not in compliance shall be notified in writing and given 30 days from that notice to rectify any noncompliance. If no action or insufficient action is taken by the impound yard, the Motor Vehicle Division may order it to be suspended as a state impound yard. Any yard contesting suspension, or any yard directly and adversely affected by the Motor Vehicle Division's refusal to designate it a state impound yard, has the right to appeal that suspension to the commission.

R873-22M-20. Aircraft Registration Pursuant to Utah Code Ann. Sections 72-10-102, 72-10-109 through 72-10-112.

(1) The registration period for aircraft is from January 1 through December 31.

(2) The average wholesale value of an aircraft is obtained from the "average wholesale" column listed in the fall edition of the Aircraft Bluebook Price Digest in the year preceding the year of registration for all aircraft listed in that publication.

(3) The database maintained by the Division of Aeronautics shall include the following information for each aircraft:

(a) the name and address of the owner of the aircraft;

(b) the airport where the aircraft is hangered;

(c) the FAA number of the aircraft;

(d) the aircraft manufacturer or builder;

(e) the year of manufacture or the year the aircraft was completed and certified for air worthiness by the FAA;

(f) the aircraft model as identified by the manufacturer or builder; and

(g) the aircraft serial number.

(4) Aircraft not legally registered are subject to seizure and impound under the provisions of Section 72-10-112.

(5) The registration certificate shall be surrendered upon the sale of an aircraft or at the time of registration renewal. A

duplicate certificate may be obtained for a fee.

(6) The Utah decal shall be displayed on the registered aircraft in accordance with instructions given with the decal. Decals must be applied and maintained in a manner that permits identification of the calendar-year expiration date and the registration number. In the event of loss or damage, a decal replacement shall be obtained for a fee.

R873-22M-22. Salvage Certificate and Branded Title Pursuant to Utah Code Ann. Sections 41-1a-522, 41-1a-1001, 41-1a-1004, and 41-1a-1009 through 41-1a-1011.

A. If a vehicle with an out-of-state branded title is roadworthy, a comparably branded Utah certificate of title may be issued upon proper application and payment of applicable fees.

B. The Utah registration of a vehicle qualifying for any of the following designations expires effective with that qualification or declaration and the title to that vehicle is restricted from that time:

1. salvage vehicle,

2. dismantled vehicle,

3. any vehicle for which a dismantling permit has been issued in accordance with Section 41-1a-1010;

4. any vehicle for which a certificate of abandoned and inoperable vehicle has been issued in accordance with Section 41-1a-1009; and

5. manufacturer buyback nonconforming vehicle.

C. For purposes of Section 41-1a-1001, the cost to repair or restore a vehicle for safe operation is the total cost shown on a certified and notarized repair order or estimate from an authorized representative of an insurance adjusting firm, or a bonded Utah automobile dealer or body shop. The repair order or estimate must be current at the time of application and must show all costs, including a detailed list of all parts, materials, and labor, required to repair the vehicle.

R873-22M-25. Written Notification of a Salvage Certificate or Branded Title Pursuant to Utah Code Ann. Section 41-1a-1004.

A. The Motor Vehicle Division shall brand a vehicle's title if, at the time of initial registration or transfer of ownership, evidence exists that the vehicle is a salvage vehicle.

B. Written notification that a vehicle has been issued a salvage certificate or branded title shall be made to a prospective purchaser on a form approved by the Administrator of the Motor Vehicle Enforcement Division.

C. The form must clearly and conspicuously disclose that the vehicle has been issued a salvage certificate or branded title.

D. The form must be presented to and signed by the prospective purchaser and the prospective lienholder, if any, prior to the sale of the vehicle.

E. If the seller of the vehicle is a dealer, the form must be prominently displayed in the lower passenger-side corner of the windshield for the period of time the vehicle is on display for sale.

F. The original disclosure form shall be given to the purchaser and a copy shall be given to the new lienholder, if any. A copy shall be kept on file by the seller for a period of three years from the date of sale if the seller is a dealer.

R873-22M-27. Issuance of Special Group License Plates Pursuant to Utah Code Ann. Sections 41-1a-418, 41-1a-419, 41-1a-420, and 41-1a-421.

(1) Except as otherwise provided, a special group license plate shall consist of a symbol affixed to the left-hand side of the plate, followed by a total of five characters and numerals.

(2)(a) Legislature special group license plates shall carry the letter combination SEN or REP with the number of the district from which the legislator was elected or appointed.

(b) A state legislator may register a maximum of two vehicles with Legislature special group license plates.

(c) Upon leaving office, a legislator may not display the Legislature special group license plates on any motor vehicle. Legislators not reelected to office may not display the Legislature special group license plates after December 31 of the election year.

(3)(a) United States Congress special group license plates shall carry, in the case of representatives, the letter combination HR, followed by the number of the district from which the representative was elected or appointed, or, in the case of senators, USS 1 or USS 2, signifying the senior and junior senators.

(b) Upon leaving office, a member of Congress may not display United States Congress special group license plates on any motor vehicle. A member of Congress not reelected to office may not display United States Congress special group license plates after December 31 of the election year.

(4) Survivor of the Japanese attack on Pearl Harbor special group license plates may be issued to qualified U.S. military veterans who:

(a) provide a copy of their discharge papers, notice of separation, or other government issued document acceptable to the division verifying dates and locations of active service; or

(b) present evidence of membership in the Pearl Harbor Survivors Association.

(5) Former prisoner of war special group license plates shall be issued to qualified U.S. military veterans who provide a copy of their discharge papers, notice of separation, or other government issued document acceptable to the division indicating that the veteran was classified as a prisoner of war.

(6) Recipient of a purple heart special group license plates shall be issued to qualified U.S. military veterans who:

(a) provide a copy of their discharge papers, notice of separation, or other government issued document acceptable to the division indicating the veteran was awarded the purple heart; or

(b) present evidence of current membership in the Military Order of the Purple Heart.

(7) An applicant for a National Guard special group license plate must present a current military identification card that shows active membership in the Utah National Guard.

(8) The issuance, renewal, surrender, and design of disability special group license plates and windshield placards shall be subject to the provisions of the federal Uniform System for Parking for Persons with Disabilities, 23 C.F.R. Ch. 11, Subch. B, Pt. 1235.2 (1991), which is adopted and incorporated by reference.

(9)(a) An applicant for a licensed amateur radio operator special group license plate shall present a current Federal Communication Commission (FCC) license.

(b) The license plate number for a licensed amateur radio operator special group license plate shall be the same combination of alpha and numeric characters that comprise the FCC assigned radio call letters of the licensed operator.

(c) Only one set of licensed amateur radio operator special group license plates may be issued per FCC license.

(10) A farm truck special group license plate may be issued for a vehicle that is qualified to register as a farm truck under Section 41-1a-1206.

(11)(a) To qualify for a firefighter special group license plate, an applicant must present one of the following:

(i) evidence indicating the applicant has a current membership in the Utah Firefighters' Association;

(ii) an official identification card issued by the firefighting entity identifying the applicant as an employee or volunteer of that firefighting entity;

(iii) a letter on letterhead of the firefighting entity, or the municipality or county in which the firefighting entity is

located, identifying the applicant as an employee or volunteer of that firefighting entity; or

(iv) a letter on letterhead from a firefighting entity, or the municipality or county in which the firefighting entity is located, identifying the applicant as a retired firefighter, whether employed or volunteer, of that firefighting entity.

(b) The division shall revoke a firefighter special group license plate issued under Section 41-1a-418 upon receipt of written notification from the head of a firefighting entity indicating:

(i) the name of the individual whose license plate is revoked;

(ii) the license plate number that is revoked;

(iii) the reason the license plate is revoked; and

(iv) that the firefighting entity has provided the individual described in Subsection (11)(b)(i) at least 30 days notice that the license plate will be revoked.

(12)(a) To qualify for a search and rescue special group license plate, an applicant must present one of the following:

(i) an official identification card issued by a county sheriff's office identifying the applicant as an employee or volunteer of that county's search and rescue team; or

(ii) a letter on letterhead of the county sheriff's office of the county in which the search and rescue team is located, identifying the applicant as an employee or volunteer of that county's search and rescue team.

(b) The division shall revoke a search and rescue special group license plate issued under Section 41-1a-418 upon receipt of written notification from the county sheriff's office of the county in which the search and rescue team is located, indicating:

(i) the name of the individual whose license plate is revoked;

(ii) the license plate number that is revoked;

(iii) the reason the license plate is revoked; and

(iv) that the search and rescue team has provided the individual described in Subsection (12)(b)(i) at least 30 days notice that the license plate will be revoked.

(13) An individual who no longer qualifies for the particular special group license plate may not display that special group license plate on any motor vehicle and must reregister the vehicle and obtain new license plates.

R873-22M-28. Option to Exchange Horseless Carriage License Plates Issued Prior to July 1, 1992, Pursuant to Utah Code Ann. Section 41-1a-419.

The registered owner of a vehicle that is forty years old or older and for which a horseless carriage license plate was issued prior to July 1, 1992, may exchange that plate at no charge for a vintage vehicle special group license plate issued after July 1, 1992.

R873-22M-29. Removable Windshield Placards Pursuant to Utah Code Ann. Section 41-1a-420.

(1) A removable windshield placard is a two-sided placard, renewable on an annual basis, which includes on each side:

(a) the International Symbol of Access, the wheelchair symbol adopted by Rehabilitation International in 1969, which is at least three inches in height, is centered on the placard, and is white on a blue background;

(b) an identification number;

(c) a date of expiration which is one year from the later of the initial issuance of the placard or the most recent renewal of the placard; and

(d) a facsimile of the Great Seal of the State of Utah.

(2) Upon application, a removable windshield placard shall be issued to a person with a disability which limits or impairs ability to walk or for a vehicle that is used by an organization primarily to transport persons with disabilities that limit or impair their ability to walk.

(a) The definition of the phrase "persons with disabilities which limit or impair the ability to walk" shall be identical to the definition of that phrase in Uniform System for Handicapped Parking, 58 Fed. Reg. 10328, 10329 (1991).

(b) An applicant for a removable windshield placard shall present a licensed physician's certification upon initial application, stating that the applicant has a permanent disability which limits or impairs ability to walk, or sign an affidavit attesting that the vehicle is used by an organization primarily for the transportation of persons with disabilities that limit or impair their ability to walk.

(c) A physician's certification is not required for renewal of a removable windshield placard.

(d) The Tax Commission may, on a case by case basis, issue a removable windshield placard to persons with disabilities other than disabilities which limit or impair the ability to walk.

(e) The original and one additional removable windshield placard shall be issued free of charge. Replacement placards, for placards that are lost or destroyed, shall be issued for a fee.

(3) A temporary removable windshield placard is a two-sided placard, issued on a temporary basis, which includes on each side:

(a) the International Symbol of Access, the wheelchair symbol adopted by Rehabilitation International in 1969, which is at least three inches in height, is centered on the placard, and is white on a red background;

(b) an identification number;

(c) a date of expiration not to exceed six months from the date of issuance; and

(d) a facsimile of the Great Seal of the State of Utah.

(4) Upon application, a temporary removable windshield placard shall be issued.

(a) The application must be accompanied by the certification of a licensed physician that the applicant meets the definition of a person with a disability which limits or impairs ability to walk. The certification shall include the period of time that the physician determines the applicant will have the disability, not to exceed six months.

(b) Applications for renewal of a temporary removable windshield placard shall be supported by a licensed physician's certification of the applicant's disability dated within the previous three months.

(c) The Tax Commission may, on a case by case basis, issue a temporary removable windshield placard to persons with disabilities other than disabilities which limit or impair the ability to walk.

(d) The original and one additional temporary removable windshield placard shall be issued free of charge. Replacement placards, for placards that are lost or destroyed, shall be issued for a fee.

(5) Any placard, whether permanent or temporary, shall be hung from the rearview mirror so that it may be viewed from the front and rear of any vehicle utilizing a parking space reserved for persons with disabilities. If there is no rearview mirror, the placard shall be clearly displayed on the dashboard of the vehicle. The placard shall not be displayed when the vehicle is moving.

R873-22M-30. Standards for Issuance of Original Issue License Plates Pursuant to Utah Code Ann. Section 41-1a-416.

A. "Series" means the general alpha-numeric sequence from which plate numbers are assigned.

B. An original issue license plate is unique and does not conflict with existing plate series in the state if the particular plate number is not currently registered or displayed on the motor vehicle master file record.

R873-22M-32. Rescinding Dismantling Permit Pursuant to Utah Code Ann. Section 41-1a-1010.

A. For purposes of Section 41-1a-1010, a Utah certificate of title does not include a salvage certificate, an Affidavit of Facts, or Tax Commission form TC-839, Certificate of Sale.

B. An applicant with a vehicle eligible for retitling under Section 41-1a-1010 shall receive a title consistent with the title of the vehicle at the time of application for a permit to dismantle.

R873-22M-33. Private Institution of Higher Education Pursuant to Utah Code Ann. Section 41-1a-422.

(1) "Private institution of higher education" means a private institution that is accredited pursuant to Section 41-1a-422 and that issues a standard collegiate degree.

(2) "Standard collegiate degree" means an associate, bachelor's, master's, or doctorate degree.

R873-22M-34. Rule for Denial of Personalized Plate Requests Pursuant to Utah Code Ann. Sections 41-1a-104 and 41-1a-411.

(1) The personalized plate is a non-public forum. Nothing in the issuance of a personalized plate creates a designated or limited public forum. The presence of a personalized plate on a vehicle does not make the plate a traditional public forum.

(2) Pursuant to Subsection 41-1a-411(2), the division may not issue personalized license plates in the following formats:

(a) Combination of letters, words, or numbers with any connotation that is vulgar, derogatory, profane, or obscene.

(b) Combinations of letters, words, or numbers that connote breasts, genitalia, pubic area, buttocks, or relate to sexual and eliminatory functions. Additionally, except as provided in Subsection 41-1a-411(3), "69" formats are prohibited unless used in a combination with the vehicle make, model, style, type, or commonly used or readily understood abbreviations of those terms, for example, "69 CHEV."

(c) Combinations of letters, words, or numbers that connote:

(i) any intoxicant or any illicit narcotic or drug;

(ii) the sale, use, seller, purveyor, or user of any intoxicant or any illicit narcotic or drug; or

(iii) the physiological or mental state produced by any intoxicant or any illicit narcotic or drug.

(d) Combinations of letters, words, or numbers that express contempt, ridicule, or superiority of a race, religion, deity, ethnic heritage, gender, or political affiliation.

(e)(i) Combinations of letters, words, or numbers that express affiliations or actions that may be construed to suggest endangerment to the public welfare.

(ii) Examples of letters, words, or numbers described in Subsection (2)(e)(i) include words, signs, or symbols that represent:

(A) illegal activity;

(B) organized crime associations; or

(C) gang or gang terminology.

(iii) The division shall consult with local, state, and national law enforcement agencies to establish criteria to determine whether a combination of letters, words, or numbers express affiliations or actions that may be construed to suggest endangerment to the public welfare.

(3) If the division denies a requested combination, the applicant may request a review of the denial, in writing, within 15 days from the date of notification. The request must be directed to the Director of the Motor Vehicle Division and should include a detailed statement of the reasons why the applicant believes the requested license plates are not offensive or misleading.

(4) The director shall review the format for connotations that may reasonably be detected through linguistic, numerical, or phonetic modes of communication. The review may include:

(a) translation from foreign languages;

(b) an upside down or reverse reading of the requested format; and

(c) the use of references such as dictionaries or glossaries of slang, foreign language, or drug terms.

(5) The director shall consider the applicant's declared definition of the format, if provided.

(6) If the requested format is rejected by the director, the division shall notify the applicant in writing of the right to appeal the decision through the appeals process outlined in Tax Commission rule R861-1A-22.

(7) If, after issuance of a personalized license plate, the commission becomes aware through written complaint that the format may be prohibited under Subsection (2), the division shall again review the format.

(8) If the division determines pursuant to Subsection (2) that the issued format is prohibited, the holder of the plates shall be notified in writing and directed to surrender the plates. This determination is subject to the review and appeal procedures outlined in Subsections (3) through (7).

(9) A holder required to surrender license plates shall be issued a refund for the amount of the personalized license plate application fee and for the prorated amount of the personalized license plate annual renewal fee, or shall be allowed to apply for replacement personalized license plates at no additional cost.

(10) If the holder of plates found to be prohibited fails to voluntarily surrender the plates within 30 days after the mailing of the notice of the division's final decision that the format is prohibited, the division shall cancel the personalized license plates and suspend the vehicle registration.

R873-22M-35. Reissuance of Personalized License Plates Pursuant to Utah Code Ann. Sections 41-1a-413 and 41-1a-1211.

A. If a person who has been issued personalized license plates fails to renew the personalized license plates within six months of the plates' expiration, the license plates shall be deemed to be surrendered to the division and the division may reissue the personalized license plates to a new requestor.

R873-22M-36. Access to Protected Motor Vehicle Records Pursuant to Utah Code Ann. Section 41-1a-116.

A. "Advisory notice" means:

1. notices from vehicle manufacturers, the manufacturers' authorized representative, or government entities regarding information that is pertinent to the safety of vehicle owners or occupants; and

2. statutory notices required by Sections 38-2-4 and 72-9-603 or by other state or federal law directing a party to mail a notice to a vehicle owner at the owner's last known address as shown on Motor Vehicle Division records.

B. Telephone accounts.

1. Public records may be released by phone to any person who has established a telephone account pursuant to Section 41-1a-116 (7).

2. A person who is authorized to access protected records must submit a written request in person, by mail, or by facsimile to the Motor Vehicle Division. Protected records may be released by phone to a person who has established a telephone account only under the following conditions:

a) The applicant for a telephone account must complete an application form prescribed by the Commission annually.

b) Protected records may be released by phone to private investigators, tow truck operators or vehicle mechanics who are licensed to conduct business in that capacity by the appropriate state or local authority.

c) Towers and mechanics are entitled to access protected records only for the purpose of making statutory notification of

the owner at the last known address according to motor vehicle records. Prior to release of the information, the tower or mechanic must deliver or fax to the Motor Vehicle Division a copy of the work order or other evidence of a possessory lien on the vehicle. The lien claim must arise under a statute that requires notification of the vehicle owner at the owner's last known address according to state motor vehicle records.

C. An authorized agent of an individual allowed access to protected records under Section 41-1a-116 must evidence a signed statement indicating that he is acting as an authorized representative and the extent of that representative authority.

D. Utah law governs only the release of Utah motor vehicle records. The Motor Vehicle Division shall not release out-of-state motor vehicle registration information.

R873-22M-40. Age of Vehicle for Purposes of Safety Inspection Pursuant to Utah Code Ann. Section 53-8-205.

A. The age of a vehicle, for purposes of determining the frequency of the safety inspection required under Section 53-8-205, shall be determined by subtracting the vehicle model year from the current calendar year.

R873-22M-41. Issuance of Salvage Certificate in Certain Circumstances Pursuant to Utah Code Ann. Section 41-1a-1005.

(1) Subject to Subsection (3), an insurance company shall receive a salvage certificate in the insurance company's name if the insurance company provides the commission:

(a) evidence that the insurance company has declared a particular vehicle a salvage vehicle;

(b) a copy of the check issued to the registered owner of the vehicle; and

(c) a copy of at least two letters the insurance company has mailed to the registered owner of the vehicle and any lien holder of that vehicle requesting:

(i) in the case of an insurance company that has not received a certificate of title from the registered owner of the vehicle, a copy of the certificate of title or other evidence of ownership; or

(ii) in the case of an insurance company that has received an improperly endorsed certificate of title from the registered owner of the vehicle, correction of the improperly endorsed certificate of title.

(2) The information described in Subsection (1) shall accompany the Application for Utah Title.

(3) If the requirements of Subsections (1) and (2) are satisfied, the Motor Vehicle Division shall issue a salvage certificate to an insurance company:

(a) in the case of an insurance company that has not received a certificate of title from the registered owner of the vehicle, no sooner than 30 days from the settlement of the loss; or

(b) in the case of an insurance company that has received an improperly endorsed certificate of title from the registered owner of the vehicle, no sooner than 30 days from the insurance company's receipt of an improperly endorsed certificate of title.

R873-22M-42. Issuance of Nonrepairable Certificate in Certain Circumstances Pursuant to Utah Code Ann. Section 41-1a-1005.5.

(1) Subject to Subsection (3), an insurance company shall receive a nonrepairable certificate in the insurance company's name if the insurance company provides the commission:

(a) evidence that the insurance company has declared a particular vehicle a nonrepairable vehicle; and

(b) a copy of the check issued to the registered owner of the vehicle; and

(c)(i) the properly endorsed certificate of title, or other evidence of ownership acceptable to the Motor Vehicle Division; or

(ii) a copy of at least two letters the insurance company has mailed to the registered owner of the vehicle and any lien holder of that vehicle requesting:

(A) in the case of an insurance company that has not received a certificate of title from the registered owner of the vehicle, a copy of the certificate of title or other evidence of ownership; or

(B) in the case of an insurance company that has received an improperly endorsed certificate of title from the registered owner of the vehicle, correction of the improperly endorsed certificate of title.

(2) The information described in Subsection (1) shall accompany the Application for Utah Title.

(3) If the requirements of Subsections (1) and (2) are satisfied, the Motor Vehicle Division shall issue a nonrepairable certificate to an insurance company:

(a) in the case of an insurance company that has not received a certificate of title from the registered owner of the vehicle, no sooner than 30 days from the settlement of the loss; or

(b) in the case of an insurance company that has received an improperly endorsed certificate of title from the registered owner of the vehicle, no sooner than 30 days from the insurance company's receipt of an improperly endorsed certificate of title.

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41-1a-102
41-1a-104
41-1a-108
41-1a-116
41-1a-211
41-1a-215
41-1a-214
41-1a-401
41-1a-402
41-1a-411
41-1a-413
41-1a-414
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41-1a-522
41-1a-701
41-1a-1001
41-1a-1002
41-1a-1004
41-1a-1005
41-1a-1009 through 41-1a-1011
41-1a-1101
41-1a-1209
41-1a-1211
41-1a-1220
41-6-44
53-8-205
59-12-104
59-2-103
72-10-109 through 72-10-112
72-10-102

R884. Tax Commission, Property Tax.
R884-24P. Property Tax.
R884-24P-5. Abatement or Deferral of Property Taxes of Indigent Persons Pursuant to Utah Code Ann. Sections 59-2-1107 through 59-2-1109 and 59-2-1202(5).

A. "Household income" includes net rents, interest, retirement income, welfare, social security, and all other sources of cash income.

B. Absence from the residence due to vacation, confinement to hospital, or other similar temporary situation shall not be deducted from the ten-month residency requirement of Section 59-2-1109(4)(a)(ii).

C. Written notification shall be given to any applicant whose application for abatement or deferral is denied.

R884-24P-7. Assessment of Mining Properties Pursuant to Utah Code Ann. Section 59-2-201.

A. Definitions.

1. "Allowable costs" means those costs reasonably and necessarily incurred to own and operate a productive mining property and bring the minerals or finished product to the customary or implied point of sale.

a) Allowable costs include: salaries and wages, payroll taxes, employee benefits, workers compensation insurance, parts and supplies, maintenance and repairs, equipment rental, tools, power, fuels, utilities, water, freight, engineering, drilling, sampling and assaying, accounting and legal, management, insurance, taxes (including severance, property, sales/use, and federal and state income taxes), exempt royalties, waste disposal, actual or accrued environmental cleanup, reclamation and remediation, changes in working capital (other than those caused by increases or decreases in product inventory or other nontaxable items), and other miscellaneous costs.

b) For purposes of the discounted cash flow method, allowable costs shall include expected future capital expenditures in addition to those items outlined in A.1.a).

c) For purposes of the capitalized net revenue method, allowable costs shall include straight- line depreciation of capital expenditures in addition to those items outlined in A.1.a).

d) Allowable costs does not include interest, depletion, depreciation other than allowed in A.1.c), amortization, corporate overhead other than allowed in A.1.a), or any expenses not related to the ownership or operation of the mining property being valued.

e) To determine applicable federal and state income taxes, straight line depreciation, cost depletion, and amortization shall be used.

2. "Asset value" means the value arrived at using generally accepted cost approaches to value.

3. "Capital expenditure" means the cost of acquiring property, plant, and equipment used in the productive mining property operation and includes:

a) purchase price of an asset and its components;
b) transportation costs;
c) installation charges and construction costs; and
d) sales tax.

4. "Constant or real dollar basis" means cash flows or net revenues used in the discounted cash flow or capitalized net revenue methods, respectively, prepared on a basis where inflation or deflation are adjusted back to the lien date. For this purpose, inflation or deflation shall be determined using the gross domestic product deflator produced by the Congressional Budget Office, or long-term inflation forecasts produced by reputable analysts, other similar sources, or any combination thereof.

5. "Discount rate" means the rate that reflects the current yield requirements of investors purchasing comparable properties in the mining industry, taking into account the industry's current and projected market, financial, and economic conditions.

6. "Economic production" means the ability of the mining property to profitably produce and sell product, even if that ability is not being utilized.

7. "Exempt royalties" means royalties paid to this state or its political subdivisions, an agency of the federal government, or an Indian tribe.

8. "Expected annual production" means the economic production from a mine for each future year as estimated by an analysis of the life-of-mine mining plan for the property.

9. "Fair market value" is as defined in Section 59-2-102.

10. "Federal and state income taxes" mean regular taxes based on income computed using the marginal federal and state income tax rates for each applicable year.

11. "Implied point of sale" means the point where the minerals or finished product change hands in the normal course of business.

12. "Net cash flow" for the discounted cash flow method means, for each future year, the expected product price multiplied by the expected annual production that is anticipated to be sold or self-consumed, plus related revenue cash flows, minus allowable costs.

13. "Net revenue" for the capitalized net revenue method means, for any of the immediately preceding five years, the actual receipts from the sale of minerals (or if self - consumed, the value of the self-consumed minerals), plus actual related revenue cash flows, minus allowable costs.

14. "Non-operating mining property" means a mine that has not produced in the previous calendar year and is not currently capable of economic production, or land held under a mineral lease not reasonably necessary in the actual mining and extraction process in the current mine plan.

15. "Productive mining property" means the property of a mine that is either actively producing or currently capable of having economic production. Productive mining property includes all taxable interests in real property, improvements and tangible personal property upon or appurtenant to a mine that are used for that mine in exploration, development, engineering, mining, crushing or concentrating, processing, smelting, refining, reducing, leaching, roasting, other processes used in the separation or extraction of the product from the ore or minerals and the processing thereof, loading for shipment, marketing and sales, environmental clean-up, reclamation and remediation, general and administrative operations, or transporting the finished product or minerals to the customary point of sale or to the implied point of sale in the case of self-consumed minerals.

16. "Product price" for each mineral means the price that is most representative of the price expected to be received for the mineral in future periods.

a) Product price is determined using one or more of the following approaches:

(1) an analysis of average actual sales prices per unit of production for the minerals sold by the taxpayer for up to five years preceding the lien date; or,

(2) an analysis of the average posted prices for the minerals, if valid posted prices exist, for up to five calendar years preceding the lien date; or,

(3) the average annual forecast prices for each of up to five years succeeding the lien date for the minerals sold by the taxpayer and one average forecast price for all years thereafter for those same minerals, obtained from reputable forecasters, mutually agreed upon between the Property Tax Division and the taxpayer.

b) If self-consumed, the product price will be determined by one of the following two methods:

(1) Representative unit sales price of like minerals. The representative unit sales price is determined from:

(a) actual sales of like mineral by the taxpayer;
(b) actual sales of like mineral by other taxpayers; or
(c) posted prices of like mineral; or
(2) If a representative unit sales price of like minerals is unavailable, an imputed product price for the self-consumed minerals may be developed by dividing the total allowable costs by one minus the taxpayer's discount rate to adjust to a cost that includes profit, and dividing the resulting figure by the number of units mined.

17. "Related revenue cash flows" mean non-product related cash flows related to the ownership or operation of the mining property being valued. Examples of related revenue cash flows include royalties and proceeds from the sale of mining equipment.

18. "Self consumed minerals" means the minerals produced from the mining property that the mining entity consumes or utilizes for the manufacture or construction of other goods and services.

19. "Straight line depreciation" means depreciation computed using the straight line method applicable in calculating the regular federal tax. For this purpose, the applicable recovery period shall be seven years for depreciable tangible personal mining property and depreciable tangible personal property appurtenant to a mine, and 39 years for depreciable real mining property and depreciable real property appurtenant to a mine.

B. Valuation.

1. The discounted cash flow method is the preferred method of valuing productive mining properties. Under this method the taxable value of the mine shall be determined by:

a) discounting the future net cash flows for the remaining life of the mine to their present value as of the lien date; and

b) subtracting from that present value the fair market value, as of the lien date, of licensed vehicles and nontaxable items.

2. The mining company shall provide to the Property Tax Division an estimate of future cash flows for the remaining life of the mine. These future cash flows shall be prepared on a constant or real dollar basis and shall be based on factors including the life-of-mine mining plan for proven and probable reserves, existing plant in place, capital projects underway, capital projects approved by the mining company board of directors, and capital necessary for sustaining operations. All factors included in the future cash flows, or which should be included in the future cash flows, shall be subject to verification and review for reasonableness by the Property Tax Division.

3. If the taxpayer does not furnish the information necessary to determine a value using the discounted cash flow method, the Property Tax Division may use the capitalized net revenue method. This method is outlined as follows:

a) Determine annual net revenue, both net losses and net gains, from the productive mining property for each of the immediate past five years, or years in operation, if less than five years. Each year's net revenue shall be adjusted to a constant or real dollar basis.

b) Determine the average annual net revenue by summing the values obtained in B.3.a) and dividing by the number of operative years, five or less.

c) Divide the average annual net revenue by the discount rate to determine the fair market value of the entire productive mining property.

d) Subtract from the fair market value of the entire productive mining property the fair market value, as of the lien date, of licensed vehicles and nontaxable items, to determine the taxable value of the productive mining property.

4. The discount rate shall be determined by the Property Tax Division.

a) The discount rate shall be determined using the weighted average cost of capital method, a survey of reputable mining industry analysts, any other accepted methodology, or any combination thereof.

b) If using the weighted average cost of capital method, the Property Tax Division shall include an after-tax cost of debt and of equity. The cost of debt will consider market yields. The cost of equity shall be determined by the capital asset pricing model, arbitrage pricing model, risk premium model, discounted cash flow model, a survey of reputable mining industry analysts, any other accepted methodology, or a combination thereof.

5. Where the discount rate is derived through the use of publicly available information of other companies, the Property Tax Division shall select companies that are comparable to the productive mining property. In making this selection and in determining the discount rate, the Property Tax Division shall consider criteria that includes size, profitability, risk, diversification, or growth opportunities.

6. A non-operating mine will be valued at fair market value consistent with other taxable property.

7. If, in the opinion of the Property Tax Division, these methods are not reasonable to determine the fair market value, the Property Tax Division may use other valuation methods to estimate the fair market value of a mining property.

8. The fair market value of a productive mining property may not be less than the fair market value of the land, improvements, and tangible personal property upon or appurtenant to the mining property. The mine value shall include all equipment, improvements and real estate upon or appurtenant to the mine. All other tangible property not appurtenant to the mining property will be separately valued at fair market value.

9. Where the fair market value of assets upon or appurtenant to the mining property is determined under the cost method, the Property Tax Division shall use the replacement cost new less depreciation approach. This approach shall consider the cost to acquire or build an asset with like utility at current prices using modern design and materials, adjusted for loss in value due to physical deterioration or obsolescence for technical, functional and economic factors.

C. When the fair market value of a productive mining property in more than one tax area exceeds the asset value, the fair market value will be divided into two components and apportioned as follows:

1. Asset value that includes machinery and equipment, improvements, and land surface values will be apportioned to the tax areas where the assets are located.

2. The fair market value less the asset value will give an income increment of value. The income increment will be apportioned as follows:

a) Divide the asset value by the fair market value to determine a quotient. Multiply the quotient by the income increment of value. This value will be apportioned to each tax area based on the percentage of the total asset value in that tax area.

b) The remainder of the income increment will be apportioned to the tax areas based on the percentage of the known mineral reserves according to the mine plan.

D. The provisions of this rule shall be implemented and become binding on taxpayers beginning January 1, 1998.

R884-24P-10. Taxation of Underground Rights in Land That Contains Deposits of Oil or Gas Pursuant to Utah Code Ann. Sections 59-2-201 and 59-2-210.

(1) Definitions.

(a) "Person" is as defined in Section 68-3-12.

(b) "Working interest owner" means the owner of an interest in oil, gas, or other hydrocarbon substances burdened with a share of the expenses of developing and operating the property.

(c) "Unit operator" means a person who operates all producing wells in a unit.

(d) "Independent operator" means a person operating an oil or gas producing property not in a unit.

(e) One person can, at the same time, be a unit operator, a working interest owner, and an independent operator and must comply with all requirements of this rule based upon the person's status in the respective situations.

(f) "Expected annual production" means the future economic production of an oil and gas property as estimated by the Property Tax Division using decline curve analysis. Expected annual production does not include production used on the same well, lease, or unit for the purpose of repressuring or pressure maintenance.

(g) "Product price" means:

(i) Oil: The weighted average posted price for the calendar year preceding January 1, specific for the field in which the well is operating as designated by the Division of Oil, Gas, and Mining. The weighted average posted price is determined by weighing each individual posted price based on the number of days it was posted during the year, adjusting for gravity, transportation, escalation, or deescalation.

(ii) Gas:

(A) If sold under contract, the price shall be the stated price as of January 1, adjusted for escalation and deescalation.

(B) If sold on the spot market or to a direct end-user, the price shall be the average price received for the 12-month period immediately preceding January 1, adjusted for escalation and deescalation.

(h) "Future net revenue" means annual revenues less costs of the working interests and royalty interest.

(i) "Revenue" means expected annual gross revenue, calculated by multiplying the product price by expected annual production for the remaining economic life of the property.

(j) "Costs" means expected annual allowable costs applied against revenue of cost-bearing interests:

(i) Examples of allowable costs include management salaries; labor; payroll taxes and benefits; workers' compensation insurance; general insurance; taxes (excluding income and property taxes); supplies and tools; power; maintenance and repairs; office; accounting; engineering; treatment; legal fees; transportation; miscellaneous; capital expenditures; and the imputed cost of self consumed product.

(ii) Interest, depreciation, or any expense not directly related to the unit may not be included as allowable costs.

(k) "Production asset" means any asset located at the well site that is used to bring oil or gas products to a point of sale or transfer of ownership.

(2) The discount rate shall be determined by the Property Tax Division using methods such as the weighted cost of capital method.

(a) The cost of debt shall consider market yields. The cost of equity shall be determined by the capital asset pricing model, risk premium model, discounted cash flow model, a combination thereof, or any other accepted methodology.

(b) The discount rate shall reflect the current yield requirements of investors purchasing similar properties, taking into consideration income, income taxes, risk, expenses, inflation, and physical and locational characteristics.

(c) The discount rate shall contain the same elements as the expected income stream.

(3) Assessment Procedures.

(a) Underground rights in lands containing deposits of oil or gas and the related tangible property shall be assessed by the Property Tax Division in the name of the unit operator, the independent operator, or other person as the facts may warrant.

(b) The taxable value of underground oil and gas rights shall be determined by discounting future net revenues to their present value as of the lien date of the assessment year and then subtracting the value of applicable exempt federal, state, and Indian royalty interests.

(c) The reasonable taxable value of productive underground oil and gas rights shall be determined by the methods described in Subsection (3)(b) or such other valuation method that the Tax Commission believes to be reasonably determinative of the property's fair market value.

(d) The value of the production assets shall be considered in the value of the oil and gas reserves as determined in Subsection (3)(b). Any other tangible property shall be separately valued at fair market value by the Property Tax Division.

(e) The minimum value of the property shall be the value of the production assets.

(4) Collection by Operator.

(a) The unit operator may request the Property Tax Division to separately list the value of the working interest, and the value of the royalty interest on the Assessment Record. When such a request is made, the unit operator is responsible to provide the Property Tax Division with the necessary information needed to compile this list. The unit operator may make a reasonable estimate of the ad valorem tax liability for a given period and may withhold funds from amounts due to royalty. Withheld funds shall be sufficient to ensure payment of the ad valorem tax on each fractional interest according to the estimate made.

(i) If a unit operating agreement exists between the unit operator and the fractional working interest owners, the unit operator may withhold or collect the tax according to the terms of that agreement.

(ii) In any case, the unit operator and the fractional interest owner may make agreements or arrangements for withholding or otherwise collecting this tax. This may be done whether or not that practice is consistent with the preceding paragraphs so long as all requirements of the law are met. When a fractional interest owner has had funds withheld to cover the estimated ad valorem tax liability and the operator fails to remit such taxes to the county when due, the fractional interest owner shall be indemnified from any further ad valorem tax liability to the extent of the withholding.

(iii) The unit operator shall compare the amount withheld to the taxes actually due, and return any excess amount to the fractional interest owner within 60 days after the delinquent date of the tax. At the request of the fractional interest owner the excess may be retained by the unit operator and applied toward the fractional interest owner's tax liability for the subsequent year.

(b) The penalty provided for in Section 59-2-210 is intended to ensure collection by the county of the entire tax due. Any unit operator who has paid this county imposed penalty, and thereafter collects from the fractional interest holders any part of their tax due, may retain those funds as reimbursement against the penalty paid.

(c) Interest on delinquent taxes shall be assessed as set forth in Section 59-2-1331.

(d) Each unit operator may be required to submit to the Property Tax Division a listing of all fractional interest owners and their interests upon specific request of the Property Tax Division. Working interest owners, upon request, shall be required to submit similar information to unit operators.

R884-24P-14. Valuation of Real Property Encumbered by Preservation Easements Pursuant to Utah Code Ann. Section 59-2-303.

(1) The assessor shall take into consideration any preservation easements attached to historically significant real property and structures when determining the property's value.

(2) After the preservation easement has been recorded with the county recorder, the property owner of record shall submit to the county assessor a notice of the preservation easement containing the following information:

(a) the property owner's name;
(b) the address of the property; and
(c) the serial number of the property.
(3) The county assessor shall review the property and incorporate any value change due to the preservation easement in the following year's assessment roll.

R884-24P-16. Assessment of Interlocal Cooperation Act Project Entity Properties Pursuant to Utah Code Ann. Section 11-13-302.

(1) Definitions:
(a) "Utah fair market value" means the fair market value of that portion of the property of a project entity located within Utah upon which the fee in lieu of ad valorem property tax may be calculated.
(b) "Fee" means the annual fee in lieu of ad valorem property tax payable by a project entity pursuant to Section 11-13-302.
(c) "Energy supplier" means an entity that purchases any capacity, service or other benefit of a project to provide electrical service.
(d) "Exempt energy supplier" means an energy supplier whose tangible property is exempted by Article XIII, Sec. 3 of the Constitution of Utah from the payment of ad valorem property tax.
(e) "Optimum operating capacity" means the capacity at which a project is capable of operating on a sustained basis taking into account its design, actual operating history, maintenance requirements, and similar information from comparable projects, if any. The determination of the projected and actual optimum operating capacities of a project shall recognize that projects are not normally operated on a sustained basis at 100 percent of their designed or actual capacities and that the optimum level for operating a project on a sustained basis may vary from project to project.
(f) "Property" means any electric generating facilities, transmission facilities, distribution facilities, fuel facilities, fuel transportation facilities, water facilities, land, water or other existing facilities or tangible property owned by a project entity and required for the project which, if owned by an entity required to pay ad valorem property taxes, would be subject to assessment for ad valorem tax purposes.
(g) "Sold," for the purpose of interpreting Subsection (4), means the first sale of the capacity, service, or other benefit produced by the project without regard to any subsequent sale, resale, or lay-off of that capacity, service, or other benefit.
(h) "Taxing jurisdiction" means a political subdivision of this state in which any portion of the project is located.
(i) All definitions contained in Section 11-13-103 apply to this rule.
(2) The Tax Commission shall determine the fair market value of the property of each project entity. Fair market value shall be based upon standard appraisal theory and shall be determined by correlating estimates derived from the income and cost approaches to value described below.
(a) The income approach to value requires the imputation of an income stream and a capitalization rate. The income stream may be based on recognized indicators such as average income, weighted income, trended income, present value of future income streams, performance ratios, and discounted cash flows. The imputation of income stream and capitalization rate shall be derived from the data of other similarly situated companies. Similarity shall be based on factors such as location, fuel mix, customer mix, size and bond ratings. Estimates may also be imputed from industry data generally. Income data from similarly situated companies will be adjusted to reflect differences in governmental regulatory and tax policies.
(b) The cost approach to value shall consist of the total of the property's net book value of the project's property. This total shall then be adjusted for obsolescence if any.
(c) In addition to, and not in lieu of, any adjustments for obsolescence made pursuant to Subsection (2)(b), a phase-in adjustment shall be made to the assessed valuation of any new project or expansion of an existing project on which construction commenced by a project entity after January 1, 1989 as follows:
(i) During the period the new project or expansion is valued as construction work in process, its assessed valuation shall be multiplied by the percentage calculated by dividing its projected production as of the projected date of completion of construction by its projected optimum operating capacity as of that date.
(ii) Once the new project or expansion ceases to be valued as construction work in progress, its assessed valuation shall be multiplied by the percentage calculated by dividing its actual production by its actual optimum operating capacity. After the new project or expansion has sustained actual production at its optimum operating capacity during any tax year, this percentage shall be deemed to be 100 percent for the remainder of its useful life.
(3) If portions of the property of the project entity are located in states in addition to Utah and those states do not apply a unit valuation approach to that property, the fair market value of the property allocable to Utah shall be determined by computing the cost approach to value on the basis of the net book value of the property located in Utah and imputing an estimated income stream based solely on the value of the Utah property as computed under the cost approach. The correlated value so determined shall be the Utah fair market value of the property.
(4) Before fixing and apportioning the Utah fair market value of the property to the respective taxing jurisdictions in which the property, or a portion thereof is located, the Utah fair market value of the property shall be reduced by the percentage of the capacity, service, or other benefit sold by the project entity to exempt energy suppliers.
(5) For purposes of calculating the amount of the fee payable under Section 11-13-302(3), the percentage of the project that is used to produce the capacity, service or other benefit sold shall be deemed to be 100 percent, subject to adjustments provided by this rule, from the date the project is determined to be commercially operational.
(6) In computing its tax rate pursuant to the formula specified in Section 59-2-924(2), each taxing jurisdiction in which the project property is located shall add to the amount of its budgeted property tax revenues the amount of any credit due to the project entity that year under Section 11-13-302(3), and shall divide the result by the sum of the taxable value of all property taxed, including the value of the project property apportioned to the jurisdiction, and further adjusted pursuant to the requirements of Section 59-2-924.
(7) Subsections (2)(a) and (2)(b) are retroactive to the lien date of January 1, 1984. Subsection (2)(c) is effective as of the lien date of January 1, 1989. The remainder of this rule is retroactive to the lien date of January 1, 1988.

R884-24P-19. Appraiser Designation Program Pursuant to Utah Code Ann. Sections 59-2-701 and 59-2-702.

(1) "State certified general appraiser," "state certified residential appraiser," "state licensed appraiser," and trainee are as defined in Section 61-2b-2.
(2) The ad valorem training and designation program consists of several courses and practica.
(a) Certain courses must be sanctioned by either the Appraiser Qualification Board of the Appraisal Foundation (AQB) or the Western States Association of Tax Administrators (WSATA).

(b) The courses comprising the basic designation program are:

(i) Course 101 - Basic Appraisal Principles;

(ii) Course 103 - Uniform Standards of Professional Appraisal Practice (AQB);

(iii) Course 501 - Assessment Practice in Utah;

(iv) Course 502 - Mass Appraisal of Land;

(v) Course 503 - Development and Use of Personal Property Schedules;

(vi) Course 504 - Appraisal of Public Utilities and Railroads (WSATA); and

(vii) Course 505 - Income Approach Application.

(3) Candidates must attend 90 percent of the classes in each course and pass the final examination for each course with a grade of 70 percent or more to be successful.

(4) There are four recognized ad valorem designations: ad valorem residential appraiser, ad valorem general real property appraiser, ad valorem personal property auditor/appraiser, and ad valorem centrally assessed valuation analyst.

(a) These designations are granted only to individuals employed in a county assessor office or the Property Tax Division, working as appraisers, review appraisers, valuation auditors, or analysts/administrators providing oversight and direction to appraisers and auditors.

(b) An assessor, county employee, or state employee must hold the appropriate designation to value property for ad valorem taxation purposes.

(5) Ad valorem residential appraiser.

(a) To qualify for this designation, an individual must:

(i) successfully complete courses 501 and 502;

(ii) successfully complete a comprehensive residential field practicum; and

(iii) attain and maintain state licensed or state certified appraiser status.

(b) Upon designation, the appraiser may value residential, vacant, and agricultural property for ad valorem taxation purposes.

(6) Ad valorem general real property appraiser.

(a) In order to qualify for this designation, an individual must:

(i) successfully complete courses 501, 502, and 505;

(ii) successfully complete a comprehensive field practicum including residential and commercial properties; and

(iii) attain and maintain state certified appraiser status.

(b) Upon designation, the appraiser may value all types of locally assessed real property for ad valorem taxation purposes.

(7) Ad valorem personal property auditor/appraiser.

(a) For an individual commencing employment as an ad valorem personal property auditor/appraiser before April 15, 2019 to qualify for this designation, an individual must, by April 15, 2021:

(i) successfully complete courses 101, 103, 501, and 503; and

(ii) successfully complete a comprehensive auditing practicum.

(b) For an individual commencing employment as an ad valorem personal property auditor/appraiser on or after April 15, 2019 to qualify for this designation, an individual must within 24 months of commencing that employment:

(i) successfully complete courses 101, 103, 501, and 503; and

(ii) successfully complete a comprehensive auditing practicum.

(c) Upon designation, the auditor/appraiser may value locally assessed personal property for ad valorem taxation purposes.

(8) Ad valorem centrally assessed valuation analyst.

(a) In order to qualify for this designation, an individual must:

(i) successfully complete courses 501 and 504;

(ii) successfully complete a comprehensive valuation practicum; and

(iii) attain and maintain state licensed or state certified appraiser status.

(b) Upon designation, the analyst may value centrally assessed property for ad valorem taxation purposes.

(9) If a candidate fails to receive a passing grade on a final examination, two re-examinations are allowed. If the re-examinations are not successful, the individual must retake the failed course. The cost to retake the failed course will not be borne by the Tax Commission.

(10) A practicum involves the appraisal or audit of selected properties. The candidate's supervisor must formally request that the Property Tax Division administer a practicum.

(a) Emphasis is placed on those types of properties the candidate will most likely encounter on the job.

(b) The practicum will be administered by a designated appraiser assigned from the Property Tax Division.

(11) An appraiser trainee referred to in Section 59-2-701 shall be designated an ad valorem associate if the appraiser trainee:

(a) has completed all education and practicum requirements for designation under Subsections (5), (6), or (8); and

(b) has not completed the non-education requirements for licensure or certification under Title 61, Chapter 2b, Real Estate Appraiser Licensing and Certification.

(12) An individual holding a specified designation can qualify for other designations by meeting the additional requirements under Subsections (5), (6), (7), or (8).

(13)(a) Maintaining designated status for individuals designated under Subsection (7) requires completion of 6 hours of Tax Commission approved classroom work every two years.

(b) Maintaining designated status for individuals designated under Subsections (5), (6), and (8) requires maintaining their appraisal license or certification under Title 61, Chapter 2b, Real Estate Appraiser Licensing and Certification.

(14) Upon termination of employment from any Utah assessment jurisdiction, or if the individual no longer works primarily as an appraiser, review appraiser, valuation auditor, or analyst/administrator in appraisal matters, designation is automatically revoked.

(a) Ad valorem designation status may be reinstated if the individual secures employment in any Utah assessment jurisdiction within four years from the prior termination.

(b) If more than four years elapse between termination and rehire, and:

(i) the individual has been employed in a closely allied field, then the individual may challenge the course examinations. Upon successfully challenging all required course examinations, the prior designation status will be reinstated; or

(ii) if the individual has not been employed in real estate valuation or a closely allied field, the individual must retake all required courses and pass the final examinations with a score of 70 percent or more.

(15) All appraisal work performed by Tax Commission designated appraisers shall meet the standards set forth in section 61-2b-27.

(16) If appropriate Tax Commission designations are not held by assessor's office personnel, the appraisal work must be contracted out to qualified private appraisers. An assessor's office may elect to contract out appraisal work to qualified private appraisers even if personnel with the appropriate designation are available in the office. If appraisal work is contracted out, the following requirements must be met:

(a) The private sector appraisers performing the contracted work must hold the state certified residential appraiser or state

certified general appraiser license issued by the Division of Real Estate of the Utah Department of Commerce. Only state certified general appraisers may appraise nonresidential properties.

(b) All appraisal work shall meet the standards set forth in Section 61-2b-27.

(17) The completion and delivery of the assessment roll required under Section 59-2-311 is an administrative function of the elected assessor.

(a) There are no specific licensure, certification, or educational requirements related to this function.

(b) An elected assessor may complete and deliver the assessment roll as long as the valuations and appraisals included in the assessment roll were completed by persons having the required designations.

R884-24P-20. Construction Work in Progress Pursuant to Utah Constitution Art. XIII, Section 2 and Utah Code Ann. Sections 59-2-201 and 59-2-301.

A. For purposes of this rule:

1. Construction work in progress means improvements as defined in Section 59-2-102, and personal property as defined in Section 59-2-102, not functionally complete as defined in A.6.

2. Project means any undertaking involving construction, expansion or modernization.

3. "Construction" means:

a) creation of a new facility;

b) acquisition of personal property; or

c) any alteration to the real property of an existing facility other than normal repairs or maintenance.

4. Expansion means an increase in production or capacity as a result of the project.

5. Modernization means a change or contrast in character or quality resulting from the introduction of improved techniques, methods or products.

6. Functionally complete means capable of providing economic benefit to the owner through fulfillment of the purpose for which it was constructed. In the case of a cost-regulated utility, a project shall be deemed to be functionally complete when the operating property associated with the project has been capitalized on the books and is part of the rate base of that utility.

7. Allocable preconstruction costs means expenditures associated with the planning and preparation for the construction of a project. To be classified as an allocable preconstruction cost, an expenditure must be capitalized.

8. Cost regulated utility means a power company, oil and gas pipeline company, gas distribution company or telecommunication company whose earnings are determined by a rate of return applied to rate base. Rate of return and rate base are set and approved by a state or federal regulatory commission.

9. Residential means single-family residences and duplex apartments.

10. Unit method of appraisal means valuation of the various physical components of an integrated enterprise as a single going concern. The unit method may employ one or more of the following approaches to value: the income approach, the cost approach, and the stock and debt approach.

B. All construction work in progress shall be valued at "full cash value" as described in this rule.

C. Discount Rates

For purposes of this rule, discount rates used in valuing all projects shall be determined by the Tax Commission, and shall be consistent with market, financial and economic conditions.

D. Appraisal of Allocable Preconstruction Costs.

1. If requested by the taxpayer, preconstruction costs associated with properties, other than residential properties, may be allocated to the value of the project in relation to the relative amount of total expenditures made on the project by the lien date. Allocation will be allowed only if the following conditions are satisfied by January 30 of the tax year for which the request is sought:

a) a detailed list of preconstruction cost data is supplied to the responsible agency;

b) the percent of completion of the project and the preconstruction cost data are certified by the taxpayer as to their accuracy.

2. The preconstruction costs allocated pursuant to D.1. of this rule shall be discounted using the appropriate rate determined in C. The discounted allocated value shall either be added to the values of properties other than residential properties determined under E.1. or shall be added to the values determined under the various approaches used in the unit method of valuation determined under F.

3. The preconstruction costs allocated under D. are subject to audit for four years. If adjustments are necessary after examination of the records, those adjustments will be classified as property escaping assessment.

E. Appraisal of Properties not Valued under the Unit Method.

1. The full cash value, projected upon completion, of all properties valued under this section, with the exception of residential properties, shall be reduced by the value of the allocable preconstruction costs determined D. This reduced full cash value shall be referred to as the "adjusted full cash value."

2. On or before January 1 of each tax year, each county assessor and the Tax Commission shall determine, for projects not valued by the unit method and which fall under their respective areas of appraisal responsibility, the following:

a) The full cash value of the project expected upon completion.

b) The expected date of functional completion of the project currently under construction.

(1) The expected date of functional completion shall be determined by the county assessor for locally assessed properties and by the Tax Commission for centrally-assessed properties.

c) The percent of the project completed as of the lien date.

(1) Determination of percent of completion for residential properties shall be based on the following percentage of completion:

(a) 10 - Excavation-foundation

(b) 30 - Rough lumber, rough labor

(c) 50 - Roofing, rough plumbing, rough electrical, heating

(d) 65 - Insulation, drywall, exterior finish

(e) 75 - Finish lumber, finish labor, painting

(f) 90 - Cabinets, cabinet tops, tile, finish plumbing, finish electrical

(g) 100 - Floor covering, appliances, exterior concrete, misc.

(2) In the case of all other projects under construction and valued under this section the percent of completion shall be determined by the county assessor for locally assessed properties and by the Tax Commission for centrally-assessed properties.

3. Upon determination of the adjusted full cash value for nonresidential projects under construction or the full cash value expected upon completion of residential projects under construction, the expected date of completion, and the percent of the project completed, the assessor shall do the following:

a) multiply the percent of the residential project completed by the total full cash value of the residential project expected upon completion; or in the case of nonresidential projects,

b) multiply the percent of the nonresidential project completed by the adjusted full cash value of the nonresidential project;

c) adjust the resulting product of E.3.a) or E.3.b) for the

expected time of completion using the discount rate determined under C.

F. Appraisal of Properties Valued Under the Unit Method of Appraisal.

1. No adjustments under this rule shall be made to the income indicator of value for a project under construction that is owned by a cost-regulated utility when the project is allowed in rate base.

2. The full cash value of a project under construction as of January 1 of the tax year, shall be determined by adjusting the cost and income approaches as follows:

a) Adjustments to reflect the time value of money in appraising construction work in progress valued under the cost and income approaches shall be made for each approach as follows:

(1) Each company shall report the expected completion dates and costs of the projects. A project expected to be completed during the tax year for which the valuation is being determined shall be considered completed on January 1 or July 1, whichever is closest to the expected completion date. The Tax Commission shall determine the expected completion date for any project whose completion is scheduled during a tax year subsequent to the tax year for which the valuation is being made.

(2) If requested by the company, the value of allocable preconstruction costs determined in D. shall then be subtracted from the total cost of each project. The resulting sum shall be referred to as the adjusted cost value of the project.

(3) The adjusted cost value for each of the future years prior to functional completion shall be discounted to reflect the present value of the project under construction. The discount rate shall be determined under C.

(4) The discounted adjusted cost value shall then be added to the values determined under the income approach and cost approach.

b) No adjustment will be made to reflect the time value of money for a project valued under the stock and debt approach to value.

G. This rule shall take effect for the tax year 1985.

R884-24P-24. Form for Notice of Property Valuation and Tax Changes Pursuant to Utah Code Ann. Sections 59-2-918.5 through 59-2-924.

(1) The county auditor must notify all real property owners of property valuation and tax changes on the Notice of Property Valuation and Tax Changes form.

(a) If a county desires to use a modified version of the Notice of Property Valuation and Tax Changes, a copy of the proposed modification must be submitted for approval to the Property Tax Division of the Tax Commission no later than March 1.

(i) Within 15 days of receipt, the Property Tax Division will issue a written decision, including justifications, on the use of the modified Notice of Property Valuation and Tax Changes.

(ii) If a county is not satisfied with the decision, it may petition for a hearing before the Tax Commission as provided in R861-1A-22.

(b) The Notice of Property Valuation and Tax Changes, however modified, must contain the same information as the unmodified version. A property description may be included at the option of the county.

(2) The Notice of Property Valuation and Tax Changes must be completed by the county auditor in its entirety, except in the following circumstances:

(a) New property is created by a new legal description; or

(b) The status of the improvements on the property has changed.

(c) In instances where partial completion is allowed, the term nonapplicable will be entered in the appropriate sections of the Notice of Property Valuation and Tax Changes.

(d) If the county auditor determines that conditions other than those outlined in this section merit deletion, the auditor may enter the term "nonapplicable" in appropriate sections of the Notice of Property Valuation and Tax Changes only after receiving approval from the Property Tax Division in the manner described in Subsection (1).

(3) Real estate assessed under the Farmland Assessment Act of 1969 must be reported at full market value, with the value based upon Farmland Assessment Act rates shown parenthetically.

(4)(a) All completion dates specified for the disclosure of property tax information must be strictly observed.

(b) Requests for deviation from the statutory completion dates must be submitted in writing on or before June 1, and receive the approval of the Property Tax Division in the manner described in Subsection (1).

(5) If the cost of public notice required under Section 59-2-919 is greater than one percent of the property tax revenues to be received, an entity may combine its advertisement with other entities, or use direct mail notification.

(6) Calculation of the amount and percentage increase in property tax revenues required by Section 59-2-919 shall be computed by comparing property taxes levied for the current year with property taxes budgeted the prior year, without adjusting for revenues attributable to new growth.

(7) If a taxing entity has not completed the tax rate setting process as prescribed in Sections 59-2-919 and 59-2-920 before September 1, the county auditor must seek approval from the Tax Commission to use the certified rate in calculating taxes levied.

(8) The value of property subject to the uniform fee under Sections 59-2-405 through 59-2-405.3 is excluded from taxable value for purposes of calculating new growth, the certified tax rate, and the proposed tax rate.

(9) The value and taxes of property subject to the uniform fee under Sections 59-2-405 through 59-2-405.3 are excluded when calculating the percentage of property taxes collected as provided in Section 59-2-924.

(10) Entities required to set levies for more than one fund must compute an aggregate certified rate. The aggregate certified rate is the sum of the certified rates for individual funds for which separate levies are required by law. The aggregate certified rate computation applies where:

(a) the valuation bases for the funds are contained within identical geographic boundaries; and

(b) the funds are under the levy and budget setting authority of the same governmental entity.

(11) For purposes of determining the certified tax rate of a municipality incorporated on or after July 1, 1996, the levy imposed for municipal-type services or general county purposes shall be the certified tax rate for municipal-type services or general county purposes, as applicable.

(12) No new entity, including a new city, may have a certified tax rate or levy a tax for any particular year unless that entity existed on the first day of that calendar year.

R884-24P-27. Standards for Assessment Level and Uniformity of Performance Pursuant to Utah Code Ann. Sections 59-2-704 and 59-2-704.5.

(1) Definitions.

(a) "Coefficient of dispersion (COD)" means the average deviation of a group of assessment ratios taken around the median and expressed as a percent of that measure.

(b) "Coefficient of variation (COV)" means the standard deviation expressed as a percentage of the mean.

(c) "Division" means the Property Tax Division of the commission.

(d) "Nonparametric" means data samples that are not

normally distributed.

(e) "Parametric" means data samples that are normally distributed.

(f) "Urban counties" means counties classified as first or second class counties pursuant to Section 17-50-501.

(2) The commission adopts the following standards of assessment performance.

(a) For assessment level in each property class, subclass, and geographical area in each county, the measure of central tendency shall meet one of the following measures;

(i) For a county of the first, second, third or fourth class, the measure of central tendency shall be within:

(A) 5 percent of the legal level of assessment for county-wide residential property; or

(B) 10 percent of the legal level of assessment for all other classes of property.

(ii) For a county of the fifth or sixth class, the measure of central tendency shall be within 10 percent of the legal level of assessment for all property.

(iii) The 95 percent confidence interval of the measure of central tendency shall contain the legal level of assessment.

(b) For uniformity of the property assessments in each class of property for which a detailed review is conducted during the current year, the measure of dispersion shall be within the following limits.

(i) In urban counties:

(A) a COD of 15 percent or less for primary residential property, and 20 percent or less for commercial property, vacant land, and secondary residential property; and

(B) a COV of 19 percent or less for primary residential property, and 25 percent or less for commercial property, vacant land, and secondary residential property.

(ii) In rural counties:

(A) a COD of 20 percent or less for primary residential property, and 25 percent or less for commercial property, vacant land, and secondary residential property; and

(B) a COV of 25 percent or less for primary residential property, and 31 percent or less for commercial property, vacant land, and secondary residential property.

(iii) For a rural or small jurisdiction with limited development, or for a jurisdiction with a depressed market, the county assessor may petition the division for a five percentage point increase in the COD or COV for one year only. After sufficient examination, the division may determine that a one-year expansion of the COD or COV is appropriate.

(c) Statistical measures.

(i) The measure of central tendency shall be the mean for parametric samples and the median for nonparametric samples.

(ii) The measure of dispersion shall be the COV for parametric samples and the COD for nonparametric samples.

(iii) To achieve statistical accuracy in determining assessment level under Subsection (2)(a) and uniformity under Subsection (2)(b) for any property class, subclass, or geographical area, the minimum sample size shall consist of 10 or more ratios.

(3) Each year the division shall conduct and publish an assessment-to-sale ratio study to determine if each county complies with the standards in Subsection (2).

(a) To meet the minimum sample size, the study period may be extended.

(b) A smaller sample size may be used if:

(i) that sample size is at least 10 percent of the class or subclass population; or

(ii) both the division and the county agree that the sample may produce statistics that imply corrective action appropriate to the class or subclass of property.

(c) If the division, after consultation with the counties, determines that the sample size does not produce reliable statistical data, an alternate performance evaluation may be conducted, which may result in corrective action. The alternate performance evaluation shall include review and analysis of the following:

(i) the county's procedures for collection and use of market data, including sales, income, rental, expense, vacancy rates, and capitalization rates;

(ii) the county-wide land, residential, and commercial valuation guidelines and their associated procedures for maintaining current market values;

(iii) the accuracy and uniformity of the county's individual property data through a field audit of randomly selected properties; and

(iv) the county's level of personnel training, ratio of appraisers to parcels, level of funding, and other workload and resource considerations.

(d) All input to the sample used to measure performance shall be completed by March 31 of each study year.

(e)(i) Except as provided in Subsection (3)(e)(ii), the division shall conduct a preliminary annual assessment-to-sale ratio study by April 30 of the study year, allowing counties to apply adjustments to their tax roll prior to the May 22 deadline.

(ii) The division may exempt a county from the study described in Subsection (3)(e)(i) if the county demonstrates to the satisfaction of the division that the county employs methods and measures adequate to ensure assessment compliance with applicable law.

(f) The division shall complete the final study immediately following the closing of the tax roll on May 22.

(4) The division shall order corrective action if the results of the final study do not meet the standards set forth in Subsection (2).

(a) Assessment level adjustments, or factor orders, shall be calculated by dividing the legal level of assessment by one of the following:

(i) the measure of central tendency, if the uniformity of the ratios meets the standards outlined in Subsection (2)(b); or

(ii) the 95 percent confidence interval limit nearest the legal level of assessment, if the uniformity of the ratios does not meet the standards outlined in Subsection (2)(b).

(b) Uniformity adjustments or other corrective action shall be ordered if the property fails to meet the standards outlined in Subsections (2)(b) and (c). A corrective action order may contain language requiring a county to create, modify, or follow its five-year plan for a detailed review of property characteristics.

(d) All corrective action orders shall be issued by June 10 of the study year, or within five working days after the completion of the final study, whichever is later.

(5) The commission adopts the following procedures to insure compliance and facilitate implementation of ordered corrective action.

(a) Prior to the filing of an appeal, the division shall retain authority to correct errors and, with agreement of the affected county, issue amended orders or stipulate with the affected county to any appropriate alternative action without commission approval. Any stipulation by the division subsequent to an appeal is subject to commission approval.

(b) A county receiving a corrective action order resulting from this rule may file and appeal with the commission pursuant to rule R861-1A-11.

(c) A corrective action order will become the final commission order if the county does not appeal in a timely manner, or does not prevail in the appeals process.

(d) The division may assist local jurisdictions to ensure implementation of any corrective action orders by the following deadlines.

(i) Factor orders shall be implemented in the current study year prior to the mailing of valuation notices.

(ii) Other corrective action shall be implemented prior to

May 22 of the year following the study year.

(e) The division shall complete audits to determine compliance with corrective action orders as soon after the deadlines set forth in Subsection (5)(d) as practical. The division shall review the results of the compliance audit with the county and make any necessary adjustments to the compliance audit within 15 days of initiating the audit. These adjustments shall be limited to the analysis performed during the compliance audit and may not include review of the data used to arrive at the underlying factor order. After any adjustments, the compliance audit will then be given to the commission for any necessary action.

(f) The county shall be informed of any adjustment required as a result of the compliance audit.

R884-24P-28. Reporting Requirements For Leased or Rented Personal Property Pursuant to Utah Code Ann. Section 59-2-306.

(1) The procedure set forth herein is required in reporting heavy equipment leased or rented during the tax year.

(2) The owner of leased or rented heavy equipment shall file annual reports with the commission, either on forms provided by the commission or electronically, for the periods January 1 through June 30, and July 1 through December 31 of each year. The reports shall contain the following information:

(a) a description of the leased or rented equipment;

(b) the year of manufacture and acquisition cost;

(c) a listing, by month, of the counties where the equipment has situs; and

(d) any other information required.

(3) For purposes of this rule, situs is established when leased or rented equipment is kept in an area for thirty days. Once situs is established, any portion of thirty days during which that equipment stays in that area shall be counted as a full month of situs. In no case may situs exceed twelve months for any year.

(4)(a) The completed report shall be submitted to the Property Tax Division of the commission within thirty days after each reporting period.

(b) Noncompliance will require accelerated reporting.

R884-24P-29. Taxable Household Furnishings Pursuant to Utah Code Ann. Section 59-2-1113.

(1) Except as provided in Section 59-2-1115, household furnishings, furniture, and equipment are subject to property taxation if:

(a) the owner of the dwelling unit commonly receives legal consideration for its use, whether in the form of rent, exchange, or lease payments; or

(b) the dwelling unit is held out as available for the rent, lease, or use by others.

(2) Household furnishings, furniture, and equipment that meet the definition of qualifying exempt primary residential rental personal property in Section 59-2-102:

(a) qualify for the primary residential exemption under Section 59-2-103; and

(b) are valued for tax under this chapter by:

(i) calculating the value of the personal property using the tables in Tax Commission rule R884-24P-33; and

(ii) multiplying the value calculated under Subsection (2)(b)(i) by 0.55.

R884-24P-32. Leasehold Improvements Pursuant to Utah Code Ann. Section 59-2-303.

A. The value of leasehold improvements shall be included in the value of the underlying real property and assessed to the owner of the underlying real property.

B. The combined valuation of leasehold improvements and underlying real property required in A. shall satisfy the requirements of Section 59-2-103(1).

C. The provisions of this rule shall not apply if the underlying real property is owned by an entity exempt from tax under Section 59-2-1101.

D. The provisions of this rule shall be implemented and become binding on taxpayers beginning January 1, 2000.

R884-24P-33. 2020 Personal Property Valuation Guides and Schedules Pursuant to Utah Code Ann. Section 59-2-107.

(1) Definitions.

(a)(i) "Acquisition cost" does not include indirect costs such as debugging, licensing fees and permits, insurance, or security.

(ii) Acquisition cost may correspond to the cost new for new property, or cost used for used property.

(b)(i) "Actual cost" includes the value of components necessary to complete the vehicle, such as tanks, mixers, special containers, passenger compartments, special axles, installation, engineering, erection, or assembly costs.

(ii) Actual cost does not include sales or excise taxes, maintenance contracts, registration and license fees, dealer charges, tire tax, freight, or shipping costs.

(c) "Cost new" means the actual cost of the property when purchased new.

(i) Except as otherwise provided in this rule, the Tax Commission and assessors shall rely on the following sources to determine cost new:

(A) documented actual cost of the new or used vehicle; or

(B) recognized publications that provide a method for approximating cost new for new or used vehicles.

(ii) For the following property purchased used, the taxing authority may determine cost new by dividing the property's actual cost by the percent good factor for that class:

(A) class 6 heavy and medium duty trucks;

(B) class 13 heavy equipment;

(C) class 14 motor homes;

(D) class 17 vessels equal to or greater than 31 feet in length; and

(E) class 21 commercial trailers.

(d) For purposes of Sections 59-2-108 and 59-2-1115, "item of taxable tangible personal property" means a piece of equipment, machinery, furniture, or other piece of tangible personal property that is functioning at its highest and best use for the purpose it was designed and constructed and is generally capable of performing that function without being combined with other items of personal property. An item of taxable tangible personal property is not an individual component part of a piece of machinery or equipment, but the piece of machinery or equipment. For example, a fully functioning computer is an item of taxable tangible personal property, but the motherboard, hard drive, tower, or sound card are not.

(e) "Percent good" means an estimate of value, expressed as a percentage, based on a property's acquisition cost or cost new, adjusted for depreciation and appreciation of all kinds.

(i) The percent good factor is applied against the acquisition cost or the cost new to derive taxable value for the property.

(ii) Percent good schedules are derived from an analysis of the Internal Revenue Service Class Life, the Marshall and Swift Cost index, other data sources or research, and vehicle valuation guides such as Penton Price Digests.

(2) Each year the Property Tax Division shall update and publish percent good schedules for use in computing personal property valuation.

(a) Proposed schedules shall be transmitted to county assessors and interested parties for comment before adoption.

(b) A public comment period will be scheduled each year and a public hearing will be scheduled if requested by ten or more interested parties or at the discretion of the Commission.

(c) County assessors may deviate from the schedules when warranted by specific conditions affecting an item of personal property. When a deviation will affect an entire class or type of personal property, a written report, substantiating the changes with verifiable data, must be presented to the Commission. Alternative schedules may not be used without prior written approval of the Commission.

(d) A party may request a deviation from the value established by the schedule for a specific item of property if the use of the schedule does not result in the fair market value for the property at the retail level of trade on the lien date, including any relevant installation and assemblage value.

(3) The provisions of this rule do not apply to:

(a) a vehicle subject to the age-based uniform fee under Section 59-2-405.1;

(b) the following personal property subject to the age-based uniform fee under Section 59-2-405.2:

(i) an all-terrain vehicle;

(ii) a camper;

(iii) an other motorcycle;

(iv) an other trailer;

(v) a personal watercraft;

(vi) a small motor vehicle;

(vii) a snowmobile;

(viii) a street motorcycle;

(ix) a tent trailer;

(x) a travel trailer; and

(xi) a vessel, including an outboard motor of the vessel, that is less than 31 feet in length;

(c) a motorhome subject to the uniform statewide fee under Section 59-2-405.3; and

(d) an aircraft subject to the uniform statewide fee under Section 72-10-110.5.

(4) Other taxable personal property that is not included in the listed classes includes:

(a) Supplies on hand as of January 1 at 12:00 noon, including office supplies, shipping supplies, maintenance supplies, replacement parts, lubricating oils, fuel and consumable items not held for sale in the ordinary course of business. Supplies are assessed at total cost, including freight-in.

(b) Equipment leased or rented from inventory is subject to ad valorem tax. Refer to the appropriate property class schedule to determine taxable value.

(c) Property held for rent or lease is taxable, and is not exempt as inventory. For entities primarily engaged in rent-to-own, inventory on hand at January 1 is exempt and property out on rent-to-own contracts is taxable.

(5) Personal property valuation schedules may not be appealed to, or amended by, county boards of equalization.

(6) All taxable personal property, other than personal property subject to an age-based uniform fee under Section 59-2-405.1 or 59-2-405.2, or a uniform statewide fee under Section 59-2-404, is classified by expected economic life as follows:

(a) Class 1 - Short Life Property. Property in this class has a typical life of more than one year and less than four years. It is fungible in that it is difficult to determine the age of an item retired from service.

(i) Examples of property in the class include:

(A) barricades/warning signs;

(B) library materials;

(C) patterns, jigs and dies;

(D) pots, pans, and utensils;

(E) canned computer software;

(F) hotel linen;

(G) wood and pallets;

(H) video tapes, compact discs, and DVDs; and

(I) uniforms.

(ii) With the exception of video tapes, compact discs, and DVDs, taxable value is calculated by applying the percent good factor against the acquisition cost of the property.

(iii) A licensee of canned computer software shall use one of the following substitutes for acquisition cost of canned computer software if no acquisition cost for the canned computer software is stated:

(A) retail price of the canned computer software;

(B) if a retail price is unavailable, and the license is a nonrenewable single year license agreement, the total sum of expected payments during that 12-month period; or

(C) if the licensing agreement is a renewable agreement or is a multiple year agreement, the present value of all expected licensing fees paid pursuant to the agreement.

(iv) Video tapes, compact discs, and DVDs are valued at $15.00 per tape or disc for the first year and $3.00 per tape or disc thereafter.

TABLE 1

Year of Acquisition	Percent Good of Acquisition Cost
19	75%
18	44%
17 and prior	11%

(b) Class 2 - Computer Integrated Machinery.

(i) Machinery shall be classified as computer integrated machinery if all of the following conditions are met:

(A) The equipment is sold as a single unit. If the invoice breaks out the computer separately from the machine, the computer must be valued as Class 12 property and the machine as Class 8 property.

(B) The machine cannot operate without the computer and the computer cannot perform functions outside the machine.

(C) The machine can perform multiple functions and is controlled by a programmable central processing unit.

(D) The total cost of the machine and computer combined is depreciated as a unit for income tax purposes.

(E) The capabilities of the machine cannot be expanded by substituting a more complex computer for the original.

(ii) Examples of property in this class include:

(A) CNC mills;

(B) CNC lathes;

(C) high-tech medical and dental equipment such as MRI equipment, CAT scanners, and mammography units.

(iii) Taxable value is calculated by applying the percent good factor against the acquisition cost of the property.

TABLE 2

Year of Acquisition	Percent Good of Acquisition Cost
19	95%
18	85%
17	73%
16	61%
15	50%
14	39%
13	26%
12 and prior	13%

(c) Class 3 - Short Life Trade Fixtures. Property in this class generally consists of electronic types of equipment and includes property subject to rapid functional and economic obsolescence or severe wear and tear.

(i) Examples of property in this class include:

(A) office machines;

(B) alarm systems;

(C) shopping carts;

(D) ATM machines;

(E) small equipment rentals;

(F) rent-to-own merchandise;

(G) telephone equipment and systems;
(H) music systems;
(I) vending machines;
(J) video game machines; and
(K) cash registers.
(ii) Taxable value is calculated by applying the percent good factor against the acquisition cost of the property.

TABLE 3

Year of Acquisition	Percent Good of Acquisition Cost
19	89%
18	73%
17	55%
16	37%
15 and prior	18%

(d) Class 5 - Long Life Trade Fixtures. Class 5 property is subject to functional obsolescence in the form of style changes.
(i) Examples of property in this class include:
(A) furniture;
(B) bars and sinks:
(C) booths, tables and chairs;
(D) beauty and barber shop fixtures;
(E) cabinets and shelves;
(F) displays, cases and racks;
(G) office furniture;
(H) theater seats;
(I) water slides;
(J) signs, mechanical and electrical; and
(K) LED component of a billboard.
(ii) Taxable value is calculated by applying the percent good factor against the acquisition cost of the property.

TABLE 5

Year of Acquisition	Percent Good of Acquisition Cost
19	96%
18	87%
17	77%
16	66%
15	57%
14	47%
13	35%
12	24%
11 and prior	12%

(e) Class 6 - Heavy and Medium Duty Trucks.
(i) Examples of property in this class include:
(A) heavy duty trucks;
(B) medium duty trucks;
(C) crane trucks;
(D) concrete pump trucks; and
(E) trucks with well-boring rigs.
(ii) Taxable value is calculated by applying the percent good factor against the cost new.
(iii) Cost new of vehicles in this class is defined as follows:
(A) the documented actual cost of the vehicle for new vehicles; or
(B) 75 percent of the manufacturer's suggested retail price.
(iv) For state assessed vehicles, cost new shall include the value of attached equipment.
(v) The 2020 percent good applies to 2020 models purchased in 2019.
(vi) Trucks weighing two tons or more have a residual taxable value of $1,750.

TABLE 6

Model Year	Percent Good of Cost New
20	90%
19	73%
18	68%
17	63%
16	59%
15	54%
14	49%
13	44%
12	40%
11	35%
10	20%
09	15%
08	10%
07 and prior	4%

(f) Class 7 - Medical and Dental Equipment. Class 7 has been merged into Class 8.
(g) Class 8 - Machinery and Equipment and Medical and Dental Equipment.
(i) Machinery and equipment is subject to considerable functional and economic obsolescence created by competition as technologically advanced and more efficient equipment becomes available. Examples of machinery and equipment include:
(A) manufacturing machinery;
(B) amusement rides;
(C) bakery equipment;
(D) distillery equipment;
(E) refrigeration equipment;
(F) laundry and dry cleaning equipment;
(G) machine shop equipment;
(H) processing equipment;
(I) auto service and repair equipment;
(J) mining equipment;
(K) ski lift machinery;
(L) printing equipment;
(M) bottling or cannery equipment;
(N) packaging equipment; and
(O) pollution control equipment.
(ii) Medical and dental equipment is subject to a high degree of technological development by the health industry. Examples of medical and dental equipment include:
(A) medical and dental equipment and instruments;
(B) exam tables and chairs;
(C) microscopes; and
(D) optical equipment.
(iii) Except as provided in Subsection (6)(g)(iv), taxable value is calculated by applying the percent good factor against the acquisition cost of the property.
(iv)(A) Notwithstanding Subsection (6)(g)(iii), the taxable value of the following oil refinery pollution control equipment required by the federal Clean Air Act shall be calculated pursuant to Subsection (6)(g)(iv)(B):
(I) VGO (Vacuum Gas Oil) reactor;
(II) HDS (Diesel Hydrotreater) reactor;
(III) VGO compressor;
(IV) VGO furnace;
(V) VGO and HDS high pressure exchangers;
(VI) VGO, SRU (Sulfur Recovery Unit), SWS (Sour Water Stripper), and TGU; (Tail Gas Unit) low pressure exchangers;
(VII) VGO, amine, SWS, and HDS separators and drums;
(VIII) VGO and tank pumps;
(IX) TGU modules; and
(X) VGO tank and VGO tank air coolers.
(B) The taxable value of the oil refinery pollution control equipment described in Subsection (6)(g)(iv)(A) shall be calculated by:
(I) applying the percent good factor in Table 8 against the acquisition cost of the property; and
(II) multiplying the product described in Subsection

(6)(g)(iv)(B)(I) by 50%.

TABLE 8

Year of Acquisition	Percent Good of Acquisition Cost
19	97%
18	91%
17	82%
16	74%
15	66%
14	59%
13	48%
12	40%
11	31%
10	22%
09 and prior	11%

(h) Class 9 - Off-Highway Vehicles. Because Section 59-2-405.2 subjects off-highway vehicles to an age-based uniform fee, a percent good schedule is not necessary.

(i) Class 10 - Railroad Cars. The Class 10 schedule was developed to value the property of railroad car companies. Functional and economic obsolescence is recognized in the developing technology of the shipping industry. Heavy wear and tear is also a factor in valuing this class of property. Taxable value is calculated by applying the percent good factor against the acquisition cost of the property.

TABLE 10

Year of Acquisition	Percent Good of Acquisition Cost
19	97%
18	94%
17	88%
16	81%
15	76%
14	70%
13	62%
12	56%
11	50%
10	44%
09	37%
08	29%
07	20%
06 and prior	9%

(j) Class 11 - Street Motorcycles. Because Section 59-2-405.2 subjects street motorcycles to an age-based uniform fee, a percent good schedule is not necessary.

(k) Class 12 - Computer Hardware.

(i) Examples of property in this class include:

(A) data processing equipment;

(B) personal computers;

(C) main frame computers;

(D) computer equipment peripherals;

(E) cad/cam systems; and

(F) copiers.

(ii) Taxable value is calculated by applying the percent good factor against the acquisition cost of the property.

TABLE 12

Year of Acquisition	Percent Good of Acquisition Cost
19	62%
18	46%
17	21%
16	9%
15 and prior	7%

(l) Class 13 - Heavy Equipment.

(i) Examples of property in this class include:

(A) construction equipment;

(B) excavation equipment;

(C) loaders;

(D) batch plants;

(E) snow cats; and

(F) pavement sweepers.

(ii) Taxable value is calculated by applying the percent good factor against the acquisition cost of the property.

(iii) 2020 model equipment purchased in 2019 is valued at 100 percent of acquisition cost.

TABLE 13

Year of Acquisition	Percent Good of Acquisition Cost
19	51%
18	49%
17	47%
16	45%
15	41%
14	39%
13	37%
12	35%
11	33%
10	31%
09	29%
08	25%
07	23%
06 and prior	15%

(m) Class 14 - Motor Homes. Because Section 59-2-405.3 subjects motor homes to an age-based uniform fee, a percent good schedule is not necessary.

(n) Class 15 - Semiconductor Manufacturing Equipment. Class 15 applies only to equipment used in the production of semiconductor products. Equipment used in the semiconductor manufacturing industry is subject to significant economic and functional obsolescence due to rapidly changing technology and economic conditions.

(i) Examples of property in this class include:

(A) crystal growing equipment;

(B) die assembly equipment;

(C) wire bonding equipment;

(D) encapsulation equipment;

(E) semiconductor test equipment;

(F) clean room equipment;

(G) chemical and gas systems related to semiconductor manufacturing;

(H) deionized water systems;

(I) electrical systems; and

(J) photo mask and wafer manufacturing dedicated to semiconductor production.

(ii) Taxable value is calculated by applying the percent good factor against the acquisition cost of the property.

TABLE 15

Year of Acquisition	Percent Good of Acquisition Cost
19	47%
18	34%
17	24%
16	15%
15 and prior	6%

(o) Class 16 - Long-Life Property. Class 16 property has a long physical life with little obsolescence.

(i) Examples of property in this class include:

(A) billboard (excluding LED component);

(B) sign towers;

(C) radio towers;

(D) ski lift and tram towers;

(E) non-farm grain elevators;

(F) bulk storage tanks;

(G) underground fiber optic cable;

(H) solar panels and supporting equipment; and

(I) pipe laid in or affixed to land.

(ii) Taxable value is calculated by applying the percent good factor against the acquisition cost of the property.

TABLE 16

Year of Acquisition	Percent Good of Acquisition Cost
19	97%
18	96%
17	93%
16	88%
15	85%
14	82%
13	76%
12	72%
11	65%
10	64%
09	59%
08	58%
07	53%
06	47%
05	39%
04	31%
03	24%
02	16%
01 and prior	8%

(p) Class 17 - Vessels Equal to or Greater Than 31 Feet in Length.

(i) Examples of property in this class include:

(A) houseboats equal to or greater than 31 feet in length;

(B) sailboats equal to or greater than 31 feet in length; and

(C) yachts equal to or greater than 31 feet in length.

(ii) A vessel, including an outboard motor of the vessel, under 31 feet in length:

(A) is not included in Class 17;

(B) may not be valued using Table 17; and

(C) is subject to an age-based uniform fee under Section 59-2-405.2.

(iii) Taxable value is calculated by applying the percent good factor against the cost new of the property.

(iv) The Tax Commission and assessors shall rely on the following sources to determine cost new for property in this class:

(A) the following publications or valuation methods:

(I) the manufacturer's suggested retail price listed in the ABOS Marine Blue Book;

(II) for property not listed in the ABOS Marine Blue Book but listed in the NADA Marine Appraisal Guide, the NADA average value for the property divided by the percent good factor; or

(III) for property not listed in the ABOS Marine Blue Book or the NADA Appraisal Guide:

(aa) the manufacturer's suggested retail price for comparable property; or

(bb) the cost new established for that property by a documented valuation source; or

(B) the documented actual cost of new or used property in this class.

(v) The 2020 percent good applies to 2020 models purchased in 2019.

(vi) Property in this class has a residual taxable value of $1,000.

TABLE 17

Model Year	Percent Good of Cost New
20	90%
19	70%
18	68%
17	66%
16	63%
15	61%
14	59%
13	57%
12	54%
11	52%
10	50%
09	47%
08	45%
07	43%
06	41%
05	38%
04	36%
03	34%
02	32%
01	29%
00	27%
99 and prior	22%

(q) Class 17a - Vessels Less Than 31 Feet in Length. Because Section 59-2-405.2 subjects vessels less than 31 feet in length to an age-based uniform fee, a percent good schedule is not necessary.

(r) Class 18 - Travel Trailers and Class 18a - Tent Trailers/Truck Campers. Because Section 59-2-405.2 subjects travel trailers and tent trailers/truck campers to an age-based uniform fee, a percent good schedule is not necessary.

(s) Class 20 - Petroleum and Natural Gas Exploration and Production Equipment. Class 20 property is subject to significant functional and economic obsolescence due to the volatile nature of the petroleum industry.

(i) Examples of property in this class include:

(A) oil and gas exploration equipment;

(B) distillation equipment;

(C) wellhead assemblies;

(D) holding and storage facilities;

(E) drill rigs;

(F) reinjection equipment;

(G) metering devices;

(H) cracking equipment;

(I) well-site generators, transformers, and power lines;

(J) equipment sheds;

(K) pumps;

(L) radio telemetry units; and

(M) support and control equipment.

(ii) Taxable value is calculated by applying the percent good factor against the acquisition cost of the property.

TABLE 20

Year of Acquisition	Percent Good of Acquisition Cost
19	97%
18	90%
17	84%
16	76%
15	69%
14	63%
13	57%
12	48%
11	42%
10	35%
09	28%
08	20%
07 and prior	11%

(t) Class 21 - Commercial Trailers.

(i) Examples of property in this class include:

(A) dry freight van trailers;

(B) refrigerated van trailers;

(C) flat bed trailers;

(D) dump trailers;

(E) livestock trailers; and

(F) tank trailers.

(ii) Taxable value is calculated by applying the percent good factor against the cost new of the property. For state assessed vehicles, cost new shall include the value of attached equipment.

(iii) The 2020 percent good applies to 2020 models purchased in 2019.

(iv) Commercial trailers have a residual taxable value of $1,000.

TABLE 21

Model Year	Percent Good of Cost New
20	95%
19	86%
18	82%
17	78%
16	74%
15	68%
14	66%
13	62%
12	58%
11	54%
10	51%
09	47%
08	42%
07	37%
06	34%
05	30%
04 and prior	20%

(u) Class 21a - Other Trailers (Non-Commercial). Because Section 59-2-405.2 subjects this class of trailers to an age-based uniform fee, a percent good schedule is not necessary.

(v) Class 22 - Passenger Cars, Light Trucks/Utility Vehicles, and Vans.

(i) Class 22 vehicles fall within four subcategories: domestic passenger cars, foreign passenger cars, light trucks, including utility vehicles, and vans.

(ii) Because Section 59-2-405.1 subjects Class 22 property to an age-based uniform fee, a percent good schedule is not necessary.

(w) Class 22a - Small Motor Vehicles. Because Section 59-2-405.2 subjects small motor vehicles to an age-based uniform fee, a percent good schedule is not necessary.

(x) Class 23 - Aircraft Required to be Registered With the State. Because Section 59-2-404 subjects aircraft required to be registered with the state to a statewide uniform fee, a percent good schedule is not necessary.

(y) Class 24 - Leasehold Improvements on Exempt Real Property.

(i) The Class 24 schedule is to be used only for those leasehold improvements where the underlying real property is owned by an entity exempt from property tax under Section 59-2-1101. See Tax Commission rule R884-24P-32. Leasehold improvements include:

(A) walls and partitions;
(B) plumbing and roughed-in fixtures;
(C) floor coverings other than carpet;
(D) store fronts;
(E) decoration;
(F) wiring;
(G) suspended or acoustical ceilings;
(H) heating and cooling systems; and
(I) iron or millwork trim.

(ii) Taxable value is calculated by applying the percent good factor against the cost of acquisition, including installation.

(iii) The Class 3 schedule is used to value short life leasehold improvements.

TABLE 24

Year of Installation	Percent of Installation Cost
19	94%
18	88%
17	82%
16	77%
15	71%
14	65%
13	59%
12	54%
11	48%
10	42%
09	36%
08 and prior	30%

(z) Class 25 - Aircraft Parts Manufacturing Tools and Dies. Property in this class is generally subject to rapid physical, functional, and economic obsolescence due to rapid technological and economic shifts in the airline parts manufacturing industry. Heavy wear and tear is also a factor in valuing this class of property.

(i) Examples of property in this class include:

(A) aircraft parts manufacturing jigs and dies;
(B) aircraft parts manufacturing molds;
(C) aircraft parts manufacturing patterns;
(D) aircraft parts manufacturing taps and gauges; and
(E) aircraft parts manufacturing test equipment.

(ii) Taxable value is calculated by applying the percent good factor against the acquisition cost of the property.

TABLE 25

Year of Acquisition	Percent Good of Acquisition Cost
19	89%
18	73%
17	56%
16	38%
15	20%
14 and prior	4%

(aa) Class 26 - Personal Watercraft. Because Section 59-2-405.2 subjects personal watercraft to an age-based uniform fee, a percent good schedule is not necessary.

(bb) Class 27 - Electrical Power Generating Equipment and Fixtures

(i) Examples of property in this class include:

(A) electrical power generators; and
(B) control equipment.

(ii) Taxable value is calculated by applying the percent good factor against the acquisition cost of the property.

TABLE 27

Year of Acquisition	Percent Good of Acquisition Cost
19	97%
18	95%
17	92%
16	90%
15	87%
14	84%
13	82%
12	79%
11	77%
10	74%
09	71%
08	69%
07	66%
06	64%
05	61%
04	58%
03	56%
02	53%
01	51%
00	48%
99	45%
98	43%
97	40%
96	38%
95	35%
94	32%
93	30%
92	27%
91	25%
90	22%
89	19%
88	17%

87	14%
86	12%
85 and prior	9%

(cc) Class 28 - Noncapitalized Personal Property. Property shall be classified as noncapitalized personal property if the following conditions are met:

(i) the property is an item of taxable tangible personal property with an acquisition cost of $1,000 or less; and

(ii) the property is eligible as a deductible expense under Section 162 or Section 179, Internal Revenue Code, in the year of acquisition, regardless of whether the deduction is actually claimed.

TABLE 28

Year of Acquisition	Percent Good of Acquisition Cost
19	75%
18	50%
17	25%
16 and prior	0%

The provisions of this rule shall be implemented and become binding on taxpayers beginning January 1, 2020.

R884-24P-35. Annual Statement for Certain Exempt Uses of Property Pursuant to Utah Code Ann. Section 59-2-1102.

(1) The purpose of this rule is to provide guidance to property owners required to file an annual statement under Section 59-2-1102 in order to claim a property tax exemption under Subsection 59-2-1101(3)(a)(iv) or (v).

(2) The annual statement filed pursuant to Section 59-2-1102 shall contain the following information for the specific property for which an exemption is sought:

(a) the owner of record of the property;

(b) the property parcel, account, or serial number;

(c) the location of the property;

(d) the tax year in which the exemption was originally granted;

(e) a description of any change in the use of the real or personal property since January 1 of the prior year;

(f) the name and address of any person or organization conducting a business for profit on the property;

(g) the name and address of any organization that uses the real or personal property and pays a fee for that use that is greater than the cost of maintenance and utilities associated with the property;

(h) a description of any personal property leased by the owner of record for which an exemption is claimed;

(i) the name and address of the lessor of property described in Subsection (2)(h);

(j) the signature of the owner of record or the owner's authorized representative; and

(k) any other information the county may require.

(3) The annual statement shall be filed:

(a) with the county legislative body in the county in which the property is located;

(b) on or before March 1; and

(c) using:

(i) Tax Commission form PT-21, Annual Statement for Continued Property Tax Exemption; or

(ii) a form that contains the information required under Subsection (2).

R884-24P-36. Contents of Real Property Tax Notice Pursuant to Utah Code Ann. Section 59-2-1317.

A. In addition to the information required by Section 59-2-1317, the tax notice for real property shall specify the following:

1. the property identification number;

2. the appraised value of the property and, if applicable, any adjustment for residential exemptions expressed in terms of taxable value;

3. if applicable, tax relief for taxpayers eligible for blind, veteran, or poor abatement or the circuit breaker, which shall be shown as credits to total taxes levied; and

4. itemized tax rate information for each taxing entity and total tax rate.

R884-24P-37. Separate Values of Land and Improvements Pursuant to Utah Code Ann. Sections 59-2-301 and 59-2-305.

A. The county assessor shall maintain an appraisal record of all real property subject to assessment by the county. The record shall include the following information:

1. owner of the property;

2. property identification number;

3. description and location of the property; and

4. full market value of the property.

B. Real property appraisal records shall show separately the value of the land and the value of any improvements.

R884-24P-38. Nonoperating Railroad Properties Pursuant to Utah Code Ann. Section 59-2-201.

(1)(a) "Railroad right of way" (RR-ROW) means a strip of land upon which a railroad company constructs the road bed.

(b) RR-ROW within incorporated towns and cities shall consist of 50 feet on each side of the main line main track, branch line main track or main spur track. Variations to the 50-foot standard shall be approved on an individual basis.

(c) RR-ROW outside incorporated towns and cities shall consist of the actual right-of-way owned if not in excess of 100 feet on each side of the center line of the main line main track, branch line main track, or main spur track. In cases where unusual conditions exist, such as mountain cuts, fills, etc., and more than 100 feet on either side of the main track is required for ROW and where small parcels of land are otherwise required for ROW purposes, the necessary additional area shall be reported as RR-ROW.

(2) Assessment of nonoperating railroad properties. Railroad property formerly assessed by the unitary method that has been determined to be nonoperating, and that is not necessary to the conduct of the business, shall be assessed separately by the local county assessor.

(3) Assessment procedures.

(a) Properties charged to nonoperating accounts are reviewed by the Property Tax Division, and if taxable, are assessed and placed on the local county assessment rolls separately from the operating properties.

(b) RR-ROW is considered operating and necessary to the conduct and contributing to the income of the business. Any revenue derived from leasing of property within the RR-ROW is considered railroad operating revenues.

(c) Real property outside of the RR-ROW that is necessary to the conduct of the railroad operation is considered part of the unitary value. Some examples are:

(i) company homes occupied by superintendents and other employees on 24-hour call;

(ii) storage facilities for railroad operations;

(iii) communication facilities; and

(iv) spur tracks outside of RR-ROW.

(d) Abandoned RR-ROW is considered nonoperating and shall be reported as such by the railroad companies.

(e) Real property outside of the RR-ROW that is not necessary to the conduct of the railroad operations is classified as nonoperating and therefore assessed by the local county assessor. Some examples are:

(i) land leased to service station operations;

(ii) grocery stores;

(iii) apartments;

(iv) residences; and

(v) agricultural uses.

(f) RR-ROW obtained by government grant or act of Congress is deemed operating property.

(4) Notice of Determination. It is the responsibility of the Property Tax Division to provide a notice of determination to the owner of the railroad property and the assessor of the county where the railroad property is located immediately after such determination of operating or nonoperating status has been made. If there is no appeal to the notice of determination, the Property Tax Division shall notify the assessor of the county where the property is located so that the property may be placed on the roll for local assessment.

(5) Appeals. Any interested party who wishes to contest the determination of operating or nonoperating property may do so by filing a request for agency action within ten days of the notice of determination of operating or nonoperating properties. Request for agency action may be made pursuant to Title 63G, Chapter 4.

R884-24P-40. Exemption of Parsonages, Rectories, Monasteries, Homes and Residences Pursuant to Utah Code Annotated 59-2-1101(d) and Article XIII, Section 2 of the Utah Constitution.

A. Parsonages, rectories, monasteries, homes and residences if used exclusively for religious purposes, are exempt from property taxes if they meet all of the following requirements:

1. The land and building are owned by a religious organization which has qualified with the Internal Revenue Service as a Section 501(c)(3) organization and which organization continues to meet the requirements of that section.

2. The building is occupied only by persons whose full time efforts are devoted to the religious organization and the immediate families of such persons.

3. The religious organization, and not the individuals who occupy the premises, pay all payments, utilities, insurance, repairs, and all other costs and expenses related to the care and maintenance of the premises and facilities.

B. The exemption for one person and the family of such person is limited to the real estate that is reasonable for the residence of the family and which remains actively devoted exclusively to the religious purposes. The exemption for more than one person, such as a monastery, is limited to that amount of real estate actually devoted exclusively to religious purposes.

C. Vacant land which is not actively used by the religious organization, is not deemed to be devoted exclusively to religious purposes, and is therefore not exempt from property taxes.

1. Vacant land which is held for future development or utilization by the religious organization is not deemed to be devoted exclusively to religious purposes and therefore not tax exempt.

2. Vacant land is tax exempt after construction commences or a building permit is issued for construction of a structure or other improvements used exclusively for religious purposes.

R884-24P-42. Farmland Assessment Audits and Personal Property Audits Pursuant to Utah Code Ann. Subsection 59-2-508, and Section 59-2-705.

(1) Upon completion of commission audits of personal property accounts or land subject to the Farmland Assessment Act, the following procedures shall be implemented:

(a) If an audit reveals an incorrect assignment of property, or an increase or decrease in value, the county assessor shall correct the assessment on the assessment roll and the tax roll.

(b) A revised Notice of Property Valuation and Tax Changes or tax notice or both shall be mailed to the taxpayer for the current year and any previous years affected.

(c) The appropriate tax rate for each year shall be applied when computing taxes due for previous years.

(2) Assessors shall not alter results of an audit without first submitting the changes to the commission for review and approval.

(3) The commission shall review assessor compliance with this rule. Noncompliance may result in an order for corrective action.

R884-24P-44. Farm Machinery and Equipment Exemption Pursuant to Utah Code Ann. Sections 59-2-102 and 59-2-1101.

A. The use of the machinery and equipment, whether by the claimant or a lessee, shall determine the exemption.

1. For purposes of this rule, the term owner includes a purchaser under an installment purchase contract or capitalized lease where ownership passes to the purchaser at the end of the contract without the exercise of an option on behalf of the purchaser or seller.

B. Farm machinery and equipment is used primarily for agricultural purposes if it is used primarily for the production or harvesting of agricultural products.

C. The following machinery and equipment is used primarily for the production or harvesting of agricultural products:

1. Machinery and equipment used on the farm for storage, cooling, or freezing of fruits or vegetables;

2. Except as provided in C.3., machinery and equipment used in fruit or vegetable growing operations if the machinery and equipment does not physically alter the fruit or vegetables; and

3. Machinery and equipment that physically alters the form of fruits or vegetables if the operations performed by the machinery or equipment are reasonable and necessary in the preparation of the fruit or vegetables for wholesale marketing.

D. Machinery and equipment used for processing of agricultural products are not exempt.

R884-24P-49. Calculating the Utah Apportioned Value of a Rail Car Fleet Pursuant to Utah Code Ann. Section 59-2-201.

A. Definitions.

1. "Average market value per rail car" means the fleet rail car market value divided by the number of rail cars in the fleet.

2. "Fleet rail car market value" means the sum of:

a)(1) the yearly acquisition costs of the fleet's rail cars;

(2) multiplied by the appropriate percent good factors contained in Class 10 of R884-24P- 33, Personal Property Valuation Guides and Schedules; and

b) the sum of betterments by year.

(1) Except as provided in A.2.b)(2), the sum of betterments by year shall be depreciated on a 14-year straight line method.

(2) Notwithstanding the provisions of A.2.b)(1), betterments shall have a residual value of two percent.

3. "In-service rail cars" means the number of rail cars in the fleet, adjusted for out-of- service rail cars.

4. a) "Out-of-service rail cars" means rail cars:

(1) out-of-service for a period of more than ten consecutive hours; or

(2) in storage.

b) Rail cars cease to be out-of-service once repaired or removed from storage.

c) Out-of-service rail cars do not include rail cars idled for less than ten consecutive hours due to light repairs or routine maintenance.

5. "System car miles" means both loaded and empty miles accumulated in the U.S., Canada, and Mexico during the prior calendar year by all rail cars in the fleet.

6. "Utah car miles" mean both loaded and empty miles

accumulated within Utah during the prior calendar year by all rail cars in the fleet.

7. "Utah percent of system factor" means the Utah car miles divided by the system car miles.

B. The provisions of this rule apply only to private rail car companies.

C. To receive an adjustment for out-of-service rail cars, the rail car company must report the number of out-of-service days to the commission for each of the company's rail car fleets.

D. The out-of-service adjustment is calculated as follows.

1. Divide the out-of-service days by 365 to obtain the out-of-service rail car equivalent.

2. Subtract the out-of-service rail car equivalent calculated in D.1. from the number of rail cars in the fleet.

E. The taxable value for each rail car fleet apportioned to Utah, for which the Utah percent of system factor is more than 50 percent, shall be determined by multiplying the Utah percent of system factor by the fleet rail car market value.

F. The taxable value for each rail car company apportioned to Utah, for which the Utah percent of system factor is less than or equal to 50 percent, shall be determined in the following manner.

1. Calculate the number of fleet rail cars allocated to Utah under the Utah percent of system factor. The steps for this calculation are as follows.

a) Multiply the Utah percent of system factor by the in-service rail cars in the fleet.

b) Multiply the product obtained in F.1.a) by 50 percent.

2. Calculate the number of fleet rail cars allocated to Utah under the time speed factor. The steps for this calculation are as follows.

a) Divide the fleet's Utah car miles by the average rail car miles traveled in Utah per year. The Commission has determined that the average rail car miles traveled in Utah per year shall equal 200,000 miles.

b) Multiply the quotient obtained in F.2.a) by the percent of in-service rail cars in the fleet.

c) Multiply the product obtained in F.2.b) by 50 percent.

3. Add the number of fleet rail cars allocated to Utah under the Utah percent of system factor, calculated in F.1.b), and the number of fleet rail cars allocated to Utah under the time speed factor, calculated in F.2.c), and multiply that sum by the average market value per rail car.

R884-24P-50. Apportioning the Utah Proportion of Commercial Aircraft Valuations Pursuant to Utah Code Ann. Section 59-2-201.

A. Definitions.

1. "Commercial air carrier" means any air charter service, air contract service or airline as defined by Section 59-2-102.

2. "Ground time" means the time period beginning at the time an aircraft lands and ending at the time an aircraft takes off.

B. The commission shall apportion to a tax area the assessment of the mobile flight equipment owned by a commercial air carrier in the proportion that the ground time in the tax area bears to the total ground time in the state.

C. The provisions of this rule shall be implemented and become binding on taxpayers beginning with the 1999 calendar year.

R884-24P-52. Criteria for Determining Primary Residence Pursuant to Utah Code Ann. Sections 59-2-102, 59-2-103, and 59-2-103.5.

(1) "Household" is as defined in Section 59-2-102.

(2) "Primary residence" means the location where domicile has been established.

(3) Except as provided in Subsections (4) and (6)(c) and (f), the residential exemption provided under Section 59-2- 103 is limited to one primary residence per household.

(4) An owner of multiple properties may receive the residential exemption on all properties for which the property is the primary residence of the tenant.

(5) Factors or objective evidence determinative of domicile include:

(a) whether or not the individual voted in the place he claims to be domiciled;

(b) the length of any continuous residency in the location claimed as domicile;

(c) the nature and quality of the living accommodations that an individual has in the location claimed as domicile as opposed to any other location;

(d) the presence of family members in a given location;

(e) the place of residency of the individual's spouse or the state of any divorce of the individual and his spouse;

(f) the physical location of the individual's place of business or sources of income;

(g) the use of local bank facilities or foreign bank institutions;

(h) the location of registration of vehicles, boats, and RVs;

(i) membership in clubs, churches, and other social organizations;

(j) the addresses used by the individual on such things as:

(i) telephone listings;

(ii) mail;

(iii) state and federal tax returns;

(iv) listings in official government publications or other correspondence;

(v) driver's license;

(vi) voter registration; and

(vii) tax rolls;

(k) location of public schools attended by the individual or the individual's dependents;

(l) the nature and payment of taxes in other states;

(m) declarations of the individual:

(i) communicated to third parties;

(ii) contained in deeds;

(iii) contained in insurance policies;

(iv) contained in wills;

(v) contained in letters;

(vi) contained in registers;

(vii) contained in mortgages; and

(viii) contained in leases.

(n) the exercise of civil or political rights in a given location;

(o) any failure to obtain permits and licenses normally required of a resident;

(p) the purchase of a burial plot in a particular location;

(q) the acquisition of a new residence in a different location.

(6) Administration of the Residential Exemption.

(a) Except as provided in Subsections (6)(b), (d), and (e), the first one acre of land per residential unit shall receive the residential exemption.

(b) If a parcel has high density multiple residential units, such as an apartment complex or a mobile home park, the amount of land, up to the first one acre per residential unit, eligible to receive the residential exemption shall be determined by the use of the land. Land actively used for residential purposes qualifies for the exemption.

(c) If the county assessor determines that a property under construction will qualify as a primary residence upon completion, the property shall qualify for the residential exemption while under construction.

(d) A property assessed under the Farmland Assessment Act shall receive the residential exemption only for the homesite.

(e) A property with multiple uses, such as residential and commercial, shall receive the residential exemption only for the

percentage of the property that is used as a primary residence.

(f) If the county assessor determines that an unoccupied property will qualify as a primary residence when it is occupied, the property shall qualify for the residential exemption while unoccupied.

(g)(i) An application for the residential exemption required by an ordinance enacted under Section 59-2-103.5 shall contain the following information for the specific property for which the exemption is requested:

(A) the owner of record of the property;

(B) the property parcel number;

(C) the location of the property;

(D) the basis of the owner's knowledge of the use of the property;

(E) a description of the use of the property;

(F) evidence of the domicile of the inhabitants of the property; and

(G) the signature of all owners of the property certifying that the property is residential property.

(ii) The application under Subsection (6)(g)(i) shall be:

(A) on a form provided by the county; or

(B) in a writing that contains all of the information listed in Subsection (6)(g)(i).

R884-24P-53. 2019 Valuation Guides for Valuation of Land Subject to the Farmland Assessment Act Pursuant to Utah Code Ann. Section 59-2-515.

(1) Each year the Property Tax Division shall update and publish schedules to determine the taxable value for land subject to the Farmland Assessment Act on a per acre basis.

(a) The schedules shall be based on the productivity of the various types of agricultural land as determined through crop budgets and net rents.

(b) Proposed schedules shall be transmitted by the Property Tax Division to county assessors for comment before adoption.

(c) County assessors may not deviate from the schedules.

(d) Not all types of agricultural land exist in every county. If no taxable value is shown for a particular county in one of the tables, that classification of agricultural land does not exist in that county.

(2) All property qualifying for agricultural use assessment pursuant to Section 59-2-503 shall be assessed on a per acre basis as follows:

(a) Irrigated farmland shall be assessed under the following classifications.

(i) Irrigated I. The following counties shall assess Irrigated I property based upon the per acre values listed below:

TABLE 1
Irrigated I

1)	Box Elder	677
2)	Cache	582
3)	Carbon	451
4)	Davis	719
5)	Emery	427
6)	Iron	683
7)	Kane	357
8)	Millard	674
9)	Salt Lake	616
10)	Utah	641
11)	Washington	557
12)	Weber	694

(ii) Irrigated II. The following counties shall assess Irrigated II property based upon the per acre values listed below:

TABLE 2
Irrigated II

1)	Box Elder	595
2)	Cache	497
3)	Carbon	359
4)	Davis	633
5)	Duchesne	417
6)	Emery	344
7)	Grand	332
8)	Iron	599
9)	Juab	380
10)	Kane	275
11)	Millard	592
12)	Salt Lake	529
13)	Sanpete	460
14)	Sevier	484
15)	Summit	393
16)	Tooele	381
17)	Utah	554
18)	Wasatch	416
19)	Washington	475
20)	Weber	608

(iii) Irrigated III. The following counties shall assess Irrigated III property based upon the per acre values listed below:

TABLE 3
Irrigated III

1)	Beaver	514
2)	Box Elder	468
3)	Cache	376
4)	Carbon	239
5)	Davis	509
6)	Duchesne	292
7)	Emery	216
8)	Garfield	181
9)	Grand	210
10)	Iron	475
11)	Juab	256
12)	Kane	152
13)	Millard	468
14)	Morgan	328
15)	Piute	285
16)	Rich	152
17)	Salt Lake	403
18)	San Juan	146
19)	Sanpete	338
20)	Sevier	360
21)	Summit	269
22)	Tooele	255
23)	Uintah	316
24)	Utah	425
25)	Wasatch	289
26)	Washington	349
27)	Wayne	281
28)	Weber	483

(iv) Irrigated IV. The following counties shall assess Irrigated IV property based upon the per acre values listed below:

TABLE 4
Irrigated IV

1)	Beaver	424
2)	Box Elder	387
3)	Cache	292
4)	Carbon	153
5)	Daggett	162
6)	Davis	425
7)	Duchesne	205
8)	Emery	134
9)	Garfield	97
10)	Grand	127
11)	Iron	389
12)	Juab	170
13)	Kane	68
14)	Millard	380
15)	Morgan	243
16)	Piute	199
17)	Rich	70
18)	Salt Lake	312
19)	San Juan	66
20)	Sanpete	254
21)	Sevier	276
22)	Summit	185
23)	Tooele	174
24)	Uintah	234
25)	Utah	341
26)	Wasatch	206

27)	Washington	263
28)	Wayne	198
29)	Weber	395

(b) Fruit orchards shall be assessed per acre based upon the following schedule:

TABLE 5
Fruit Orchards

1)	Beaver	586
2)	Box Elder	634
3)	Cache	586
4)	Carbon	586
5)	Davis	639
6)	Duchesne	586
7)	Emery	586
8)	Garfield	586
9)	Grand	586
10)	Iron	586
11)	Juab	586
12)	Kane	586
13)	Millard	586
14)	Morgan	586
15)	Piute	586
16)	Salt Lake	586
17)	San Juan	586
18)	Sanpete	586
19)	Sevier	586
20)	Summit	586
21)	Tooele	586
22)	Uintah	586
23)	Utah	644
24)	Wasatch	586
25)	Washington	693
26)	Wayne	586
27)	Weber	639

(c) Meadow IV property shall be assessed per acre based upon the following schedule:

TABLE 6
Meadow IV

1)	Beaver	218
2)	Box Elder	216
3)	Cache	223
4)	Carbon	113
5)	Daggett	134
6)	Davis	226
7)	Duchesne	143
8)	Emery	118
9)	Garfield	89
10)	Grand	115
11)	Iron	225
12)	Juab	130
13)	Kane	93
14)	Millard	166
15)	Morgan	168
16)	Piute	163
17)	Rich	90
18)	Salt Lake	198
19)	Sanpete	167
20)	Sevier	172
21)	Summit	173
22)	Tooele	158
23)	Uintah	177
24)	Utah	214
25)	Wasatch	179
26)	Washington	195
27)	Wayne	147
28)	Weber	259

(d) Dry land shall be classified as one of the following two categories and shall be assessed on a per acre basis as follows:

(i) Dry III. The following counties shall assess Dry III property based upon the per acre values listed below:

TABLE 7
Dry III

1)	Beaver	47
2)	Box Elder	79
3)	Cache	100
4)	Carbon	42
5)	Davis	44
6)	Duchesne	47
7)	Garfield	41
8)	Grand	42
9)	Iron	42
10)	Juab	44
11)	Kane	41
12)	Millard	40
13)	Morgan	55
14)	Rich	41
15)	Salt Lake	47
16)	San Juan	45
17)	Sanpete	47
18)	Summit	41
19)	Tooele	45
20)	Uintah	47
21)	Utah	43
22)	Wasatch	41
23)	Washington	41
24)	Weber	68

(ii) Dry IV. The following counties shall assess Dry IV property based upon the per acre values listed below:

TABLE 8
Dry IV

1)	Beaver	14
2)	Box Elder	50
3)	Cache	70
4)	Carbon	13
5)	Davis	13
6)	Duchesne	16
7)	Garfield	13
8)	Grand	13
9)	Iron	13
10)	Juab	13
11)	Kane	13
12)	Millard	12
13)	Morgan	23
14)	Rich	13
15)	Salt Lake	15
16)	San Juan	17
17)	Sanpete	16
18)	Summit	13
19)	Tooele	13
20)	Uintah	16
21)	Utah	13
22)	Wasatch	13
23)	Washington	12
24)	Weber	38

(e) Grazing land shall be classified as one of the following four categories and shall be assessed on a per acre basis as follows:

(i) Graze 1. The following counties shall assess Graze I property based upon the per acre values listed below:

TABLE 9
GR I

1)	Beaver	65
2)	Box Elder	63
3)	Cache	60
4)	Carbon	45
5)	Daggett	45
6)	Davis	52
7)	Duchesne	59
8)	Emery	61
9)	Garfield	66
10)	Grand	67
11)	Iron	64
12)	Juab	56
13)	Kane	65
14)	Millard	65
15)	Morgan	57
16)	Piute	77
17)	Rich	56
18)	Salt Lake	61
19)	San Juan	63
20)	Sanpete	54
21)	Sevier	56
22)	Summit	62
23)	Tooele	61
24)	Uintah	69
25)	Utah	56
26)	Wasatch	45
27)	Washington	56

28)	Wayne	75
29)	Weber	60

(ii) Graze II. The following counties shall assess Graze II property based upon the per acre values listed below:

TABLE 10
GR II

1)	Beaver	20
2)	Box Elder	20
3)	Cache	19
4)	Carbon	13
5)	Daggett	12
6)	Davis	16
7)	Duchesne	16
8)	Emery	18
9)	Garfield	20
10)	Grand	19
11)	Iron	19
12)	Juab	16
13)	Kane	21
14)	Millard	21
15)	Morgan	18
16)	Piute	22
17)	Rich	17
18)	Salt Lake	18
19)	San Juan	21
20)	Sanpete	15
21)	Sevier	15
22)	Summit	17
23)	Tooele	17
24)	Uintah	24
25)	Utah	20
26)	Wasatch	14
27)	Washington	18
28)	Wayne	24
29)	Weber	17

(iii) Graze III. The following counties shall assess Graze III property based upon the per acre values below:

TABLE 11
GR III

1)	Beaver	15
2)	Box Elder	14
3)	Cache	12
4)	Carbon	11
5)	Daggett	10
6)	Davis	11
7)	Duchesne	12
8)	Emery	12
9)	Garfield	13
10)	Grand	13
11)	Iron	13
12)	Juab	12
13)	Kane	13
14)	Millard	13
15)	Morgan	11
16)	Piute	15
17)	Rich	11
18)	Salt Lake	13
19)	San Juan	14
20)	Sanpete	12
21)	Sevier	12
22)	Summit	12
23)	Tooele	12
24)	Uintah	16
25)	Utah	12
26)	Wasatch	11
27)	Washington	11
28)	Wayne	15
29)	Weber	12

(iv) Graze IV. The following counties shall assess Graze IV property based upon the per acre values listed below:

TABLE 12
GR IV

1)	Beaver	5
2)	Box Elder	5
3)	Cache	5
4)	Carbon	5
5)	Daggett	5
6)	Davis	5
7)	Duchesne	5
8)	Emery	5
9)	Garfield	5
10)	Grand	5
11)	Iron	5
12)	Juab	5
13)	Kane	5
14)	Millard	5
15)	Morgan	5
16)	Piute	5
17)	Rich	5
18)	Salt Lake	5
19)	San Juan	5
20)	Sanpete	5
21)	Sevier	5
22)	Summit	5
23)	Tooele	5
24)	Uintah	5
25)	Utah	5
26)	Wasatch	5
27)	Washington	5
28)	Wayne	5
29)	Weber	5

(f) Land classified as nonproductive shall be assessed as follows on a per acre basis:

TABLE 13
Nonproductive Land

Nonproductive Land		
1)	All Counties	5

R884-24P-55. Counties to Establish Ordinance for Tax Sale Procedures Pursuant to Utah Code Ann. Section 59-2-1351.1.

A. "Collusive bidding" means any agreement or understanding reached by two or more parties that in any way alters the bids the parties would otherwise offer absent the agreement or understanding.

B. Each county shall establish a written ordinance for real property tax sale procedures.

C. The written ordinance required under B. shall be displayed in a public place and shall be available to all interested parties.

D. The tax sale ordinance shall address, as a minimum, the following issues:

1. bidder registration procedures;
2. redemption rights and procedures;
3. prohibition of collusive bidding;
4. conflict of interest prohibitions and disclosure requirements;
5. criteria for accepting or rejecting bids;
6. sale ratification procedures;
7. criteria for granting bidder preference;
8. procedures for recording tax deeds;
9. payments methods and procedures;
10. procedures for contesting bids and sales;
11. criteria for striking properties to the county;
12. procedures for disclosing properties withdrawn from the sale for reasons other than redemption; and
13. disclaimers by the county with respect to sale procedures and actions.

R884-24P-56. Assessment, Collection, and Apportionment of Property Tax on Commercial Transportation Property Pursuant to Utah Code Ann. Sections 41-1a-301 and 59-2-801.

A. For purposes of Section 59-2-801, the previous year's statewide rate shall be calculated as follows:

1. Each county's overall tax rate is multiplied by the county's percent of total lane miles of principal routes.

2. The values obtained in A.1. for each county are summed to arrive at the statewide rate.

B. The assessment of vehicles apportioned under Section 41-1a-301 shall be apportioned at the same percentage ratio that

has been filed with the Motor Vehicle Division of the State Tax Commission for determining the proration of registration fees.

C. For purposes of Section 59-2-801(2), principal route means lane miles of interstate highways and clover leafs, U.S. highways, and state highways extending through each county as determined by the Commission from current state Geographic Information System databases.

R884-24P-57. Judgment Levies Pursuant to Utah Code Ann. Sections 59-2-918.5, 59-2-924, 59-2-1328, and 59-2-1330.

(1) Definitions.

(a) "Issued" means the date on which the judgment is signed.

(b) "2.5% of the total ad valorem property taxes collected by the taxing entity in the previous fiscal year" includes any revenues collected by a judgment levy imposed in the prior year.

(2) A taxing entity's share of a judgment or order shall include the taxing entity's share of any interest that must be paid with the judgment or order.

(3) The judgment levy public hearing required by Section 59-2-918.5 shall be held as follows:

(a) For taxing entities operating under a July 1 through June 30 fiscal year, the public hearing shall be held at least 10 days after the Notice of Property Valuation and Tax Changes is mailed.

(b) For taxing entities operating under a January 1 through December 31 fiscal year:

(i) for judgments issued from the prior March 1 through September 15, the public hearing shall be held at the same time as the hearing at which the annual budget is adopted;

(ii) for judgments issued from the prior September 16 through the last day of February, the public hearing shall be held at least 10 days after the Notice of Property Valuation and Tax Changes is mailed.

(c) If the taxing entity is required to hold a hearing under Section 59-2-919, the judgment levy hearing required by Subsections (3)(a) and (3)(b)(ii) shall be held at the same time as the hearing required under Section 59-2-919.

(4) If the Section 59-2-918.5 advertisement is combined with the Section 59-2-919 advertisement, the combined advertisement shall aggregate the general tax increase and judgment levy information.

(5) In the case of taxing entities operating under a January 1 through December 31 fiscal year, the advertisement for judgments issued from the previous December 16 through May 31 shall include any judgments issued from the previous June 1 through December 15 that the taxing entity advertised and budgeted for at its December budget hearing.

(6) All taxing entities imposing a judgment levy shall file with the commission a signed statement certifying that all judgments for which the judgment levy is imposed have met the statutory requirements for imposition of a judgment levy.

(a) The signed statement shall contain the following information for each judgment included in the judgment levy:

(i) the name of the taxpayer awarded the judgment;

(ii) the appeal number of the judgment; and

(iii) the taxing entity's pro rata share of the judgment.

(b) Along with the signed statement, the taxing entity must provide the commission the following:

(i) a copy of all judgment levy newspaper advertisements required;

(ii) the dates all required judgment levy advertisements were published in the newspaper;

(iii) a copy of the final resolution imposing the judgment levy;

(iv) a copy of the Notice of Property Valuation and Tax Changes, if required; and

(v) any other information required by the commission.

(7) The provisions of House Bill 268, Truth in Taxation - Judgment Levy (1999 General Session), do not apply to judgments issued prior to January 1, 1999.

R884-24P-58. One-Time Decrease in Certified Rate Based on Estimated County Option Sales Tax Pursuant to Utah Code Ann. Section 59-2-924.

A. The estimated sales tax revenue to be distributed to a county under Section 59-12-1102 shall be determined based on the following formula:

1. sharedown of the commission's sales tax econometric model based on historic patterns, weighted 40 percent;

2. time series models, weighted 40 percent; and

3. growth rate of actual taxable sales occurring from January 1 through March 31 of the year a tax is initially imposed under Title 59, Chapter 12, Part 11, County Option Sales and Use Tax, weighted 20 percent.

R884-24P-59. One-Time Decrease in Certified Rate Based on Estimated Additional Resort Communities Sales Tax Pursuant to Utah Code Ann. Section 59-2-924.

A. The estimated additional resort communities sales tax revenue to be distributed to a municipality under Section 59-12-402 shall be determined based on the following formula:

1. time series model, econometric model, or simple average, based upon the availability of and variation in the data, weighted 75 percent; and

2. growth rate of actual taxable sales occurring from January 1 through March 31 of the year a tax is initially imposed under Section 59-12-402, weighted 25 percent.

R884-24P-60. Age-Based Uniform Fee on Tangible Personal Property Required to be Registered with the State Pursuant to Utah Code Ann. Section 59-2-405.1.

A. For purposes of Section 59-2-405.1, "motor vehicle" is as defined in Section 41-1a-102, except that motor vehicle does not include motorcycles as defined in Section 41-1a-102.

B. The uniform fee established in Section 59-2-405.1 is levied against motor vehicles and state-assessed commercial vehicles classified under Class 22 - Passenger Cars, Light Trucks/Utility Vehicles, and Vans, in Tax Commission rule R884-24P- 33.

C. Personal property subject to the uniform fee imposed in Section 59-2-405 is not subject to the Section 59-2-405.1 uniform fee.

D. The following classes of personal property are not subject to the Section 59-2-405.1 uniform fee, but remain subject to the ad valorem property tax:

1. vintage vehicles;

2. state-assessed commercial vehicles not classified under Class 22 - Passenger Cars, Light Trucks/Utility Vehicles, and Vans;

3. any personal property that is neither required to be registered nor exempt from the ad valorem property tax;

4. mobile and manufactured homes;

5. machinery or equipment that can function only when attached to or used in conjunction with motor vehicles or state-assessed commercial vehicles.

E. The age of a motor vehicle or state-assessed commercial vehicle, for purposes of Section 59-2-405.1, shall be determined by subtracting the vehicle model year from the current calendar year.

F. The only Section 59-2-405.1 uniform fee due upon registration or renewal of registration is the uniform fee calculated based on the age of the vehicle under E. on the first day of the registration period for which the registrant:

1. in the case of an original registration, registers the vehicle; or

2. in the case of a renewal of registration, renews the registration of the vehicle in accordance with Section 41-1a-

216.

G. Centrally assessed taxpayers shall use the following formula to determine the value of locally assessed motor vehicles that may be deducted from the allocated unit valuation:

1. Divide the system value by the book value to determine the market to book ratio.

2. Multiply the market to book ratio by the book value of motor vehicles registered in Utah and subject to Section 59-2-405.1 to determine the value of motor vehicles that may be subtracted from the allocated unit value.

H. The motor vehicle of a nonresident member of the armed forces stationed in Utah may be registered in Utah without payment of the Section 59-2-405.1 uniform fee.

I. A motor vehicle belonging to a Utah resident member of the armed forces stationed in another state is not subject to the Section 59-2-405.1 uniform fee at the time of registration or renewal of registration as long as the motor vehicle is kept in the other state.

J. The situs of a motor vehicle or state-assessed commercial vehicle subject to the Section 59-2-405.1 uniform fee is determined in accordance with Section 59-2-104. Situs of purchased motor vehicles or state-assessed commercial vehicles shall be the tax area of the purchaser's domicile, unless the motor vehicle or state-assessed commercial vehicle will be kept in a tax area other than the tax area of the purchaser's domicile for more than six months of the year.

1. If an assessor discovers a motor vehicle or state-assessed commercial vehicle that is kept in the assessor's county but registered in another, the assessor may submit an affidavit along with evidence that the vehicle is kept in that county to the assessor of the county in which the vehicle is registered. Upon agreement, the assessor of the county of registration shall forward the fee collected to the county of situs within 30 working days.

2. If the owner of a motor vehicle or state-assessed commercial vehicle registered in Utah is domiciled outside of Utah, the taxable situs of the vehicle is presumed to be the county in which the uniform fee was paid, unless an assessor's affidavit establishes otherwise.

3. The Tax Commission shall, on an annual basis, provide each county assessor information indicating all motor vehicles and state-assessed commercial vehicles subject to state registration and their corresponding taxable situs.

4. Section 59-2-405.1 uniform fees received by a county that require distribution to a purchaser's domicile outside of that county shall be deposited into an account established by the Commission, pursuant to procedures prescribed by the Commission.

5. Section 59-2-405.1 uniform fees received by the Commission pursuant to J.4. shall be distributed to the appropriate county at least monthly.

K. The blind exemption provided in Section 59-2-1106 is applicable to the Section 59-2-405.1 uniform fee.

L. The veteran's exemption provided in Section 59-2-1104 is applicable to the Section 59-2-405.1 uniform fee.

M. The value of motor vehicles and state-assessed commercial vehicles to be considered part of the tax base for purposes of determining debt limitations pursuant to Article XIII, Section 14 of the Utah Constitution, shall be determined by dividing the Section 59-2-405.1 uniform fee collected by .015.

N. The provisions of this rule shall be implemented and become binding on taxpayers beginning January 1, 1999.

R884-24P-61. 1.5 Percent Uniform Fee on Tangible Personal Property Required to be Registered with the State Pursuant to Utah Code Ann. Section 59-2-405.

A. Definitions.

1. For purposes of Section 59-2-405, "motor vehicle" is as defined in Section 41-1a-102, except that motor vehicle does not include motorcycles as defined in Section 41-1a-102.

2. "Recreational vehicle" means a vehicular unit other than a mobile home, primarily designed as a temporary dwelling for travel, recreational, or vacation use, which is either self-propelled or pulled by another vehicle.

a) Recreational vehicle includes a travel trailer, a camping trailer, a motor home, and a fifth wheel trailer.

b) Recreational vehicle does not include a van unless specifically designed or modified for use as a temporary dwelling.

B. The uniform fee established in Section 59-2-405 is levied against the following types of personal property, unless specifically excluded by Section 59-2-405:

1. motor vehicles that are not classified under Class 22 - Passenger Cars, Light Trucks/Utility Vehicles, and Vans, in Tax Commission rule R884-24P-33;

2. watercraft required to be registered with the state;

3. recreational vehicles required to be registered with the state; and

4. all other tangible personal property required to be registered with the state before it is used on a public highway, on a public waterway, on public land, or in the air.

C. The following classes of personal property are not subject to the Section 59-2-405 uniform fee, but remain subject to the ad valorem property tax:

1. vintage vehicles;

2. state-assessed commercial vehicles not classified under Class 22 - Passenger Cars, Light Trucks/Utility Vehicles, and Vans;

3. any personal property that is neither required to be registered nor exempt from the ad valorem property tax;

4. machinery or equipment that can function only when attached to or used in conjunction with motor vehicles.

D. The fair market value of tangible personal property subject to the Section 59-2-405 uniform fee is based on depreciated cost new as established in Tax Commission rule R884-24P-33, "Personal Property Valuation Guides and Schedules," published annually by the Tax Commission.

E. Centrally assessed taxpayers shall use the following formula to determine the value of locally assessed personal property that may be deducted from the allocated unit valuation:

1. Divide the system value by the book value to determine the market to book ratio.

2. Multiply the market to book ratio by the book value of personal property registered in Utah and subject to Section 59-2- 405 to determine the value of personal property that may be subtracted from the allocated unit value.

F. If a property's valuation is appealed to the county board of equalization under Section 59-2-1005, the property shall become subject to a total revaluation. All adjustments are made on the basis of their effect on the property's average retail value as of the January 1 lien date and according to Tax Commission rule R884-24P-33.

G. The county assessor may change the fair market value of any individual item of personal property in his jurisdiction for any of the following reasons:

1. The manufacturer's suggested retail price ("MSRP") or the cost new was not included on the state printout, computer tape, or registration card;

2. The MSRP or cost new listed on the state records was inaccurate; or

3. In the assessor's judgment, an MSRP or cost new adjustment made as a result of a property owner's informal request will continue year to year on a percentage basis.

H. If the personal property is of a type subject to annual registration, the Section 59-2-405 uniform fee is due at the time the registration is due. If the personal property is not registered during the year, the owner remains liable for payment of the

Section 59-2-405 uniform fee to the county assessor.

1. No additional uniform fee may be levied upon personal property transferred during a calendar year if the Section 59-2-405 uniform fee has been paid for that calendar year.

2. If the personal property is of a type registered for periods in excess of one year, the Section 59-2-405 uniform fee shall be due annually.

3. The personal property of a nonresident member of the armed forces stationed in Utah may be registered in Utah without payment of the Section 59-2-405 uniform fee.

4. Personal property belonging to a Utah resident member of the armed forces stationed in another state is not subject to the Section 59-2-405 uniform fee as long as the personal property is kept in another state.

5. Noncommercial trailers weighing 750 pounds or less are not subject to the Section 59-2-405 uniform fee or ad valorem property tax but may be registered at the request of the owner.

I. If the personal property is of a type subject to annual registration, registration of that personal property may not be completed unless the Section 59-2-405 uniform fee has been paid, even if the taxpayer is appealing the uniform fee valuation. Delinquent fees may be assessed in accordance with Sections 59-2- 217 and 59-2-309 as a condition precedent to registration.

J. The situs of personal property subject to the Section 59-2-405 uniform fee is determined in accordance with Section 59-2- 104. Situs of purchased personal property shall be the tax area of the purchaser's domicile, unless the personal property will be kept in a tax area other than the tax area of the purchaser's domicile for more than six months of the year.

1. If an assessor discovers personal property that is kept in the assessor's county but registered in another, the assessor may submit an affidavit along with evidence that the property is kept in that county to the assessor of the county in which the personal property is registered. Upon agreement, the assessor of the county of registration shall forward the fee collected to the county of situs within 30 working days.

2. If the owner of personal property registered in Utah is domiciled outside of Utah, the taxable situs of the property is presumed to be the county in which the uniform fee was paid, unless an assessor's affidavit establishes otherwise.

3. The Tax Commission shall, on an annual basis, provide each county assessor information indicating all personal property subject to state registration and its corresponding taxable situs.

4. Section 59-2-405 uniform fees received by a county that require distribution to a purchaser's domicile outside of that county shall be deposited into an account established by the Commission, pursuant to procedures prescribed by the Commission.

5. Section 59-2-405 uniform fees received by the Commission pursuant to J.4. shall be distributed to the appropriate county at least monthly.

K. The blind exemption provided in Section 59-2-1106 is applicable to the Section 59-2-405 uniform fee.

L. The veteran's exemption provided in Section 59-2-1104 is applicable to the Section 59-2-405 uniform fee.

M. The provisions of this rule shall be implemented and become binding on taxpayers beginning January 1, 1999.

R884-24P-62. Valuation of State Assessed Unitary Properties Pursuant to Utah Code Ann. Section 59-2-201.

(1) Purpose. The purpose of this rule is to:

(a) specify consistent mass appraisal methodologies to be used by the Property Tax Division (Division) in the valuation of tangible property assessable by the Commission; and

(b) identify preferred valuation methodologies to be considered by any party making an appraisal of an individual unitary property.

(2) Definitions:

(a) "Cost regulated utility" means any public utility assessable by the Commission whose allowed revenues are determined by a rate of return applied to a rate base set by a state or federal regulatory commission.

(b) "Fair market value" means the amount at which property would change hands between a willing buyer and a willing seller, neither being under any compulsion to buy or sell and both having reasonable knowledge of the relevant facts. Fair market value reflects the value of property at its highest and best use, subject to regulatory constraints.

(c) "Rate base" means the aggregate account balances reported as such by the cost regulated utility to the applicable state or federal regulatory commission.

(d) "Unitary property" means operating property that is assessed by the Commission pursuant to Section 59-2-201(1)(a)(i) through (iii).

(i) Unitary properties include:

(A) all property that operates as a unit across county lines, if the values must be apportioned among more than one county or state; and

(B) all property of public utilities as defined in Section 59-2-102.

(ii) These properties, some of which may be cost regulated utilities, are defined under one of the following categories.

(A) "Telecommunication properties" include the operating property of local exchange carriers, local access providers, long distance carriers, cellular telephone or personal communication service (PCS) providers and pagers, and other similar properties.

(B) "Energy properties" include the operating property of natural gas pipelines, natural gas distribution companies, liquid petroleum products pipelines, and electric corporations, including electric generation, transmission, and distribution companies, and other similar entities.

(C) "Transportation properties" include the operating property of all airlines, air charter services, air contract services, including major and small passenger carriers and major and small air freighters, long haul and short line railroads, and other similar properties.

(3) All tangible operating property owned, leased, or used by unitary companies is subject to assessment and taxation according to its fair market value as of January 1, and as provided in Utah Constitution Article XIII, Section 2. Intangible property as defined under Section 59-2-102 is not subject to assessment and taxation.

(4) General Valuation Principles. Unitary properties shall be assessed at fair market value based on generally accepted appraisal theory as provided under this rule.

(a) The assemblage or enhanced value attributable to the tangible property should be included in the assessed value. See Beaver County v. WilTel, Inc., 995 P.2d 602 (Utah 2000). The value attributable to intangible property must, when possible, be identified and removed from value when using any valuation method and before that value is used in the reconciliation process.

(b) The preferred methods to determine fair market value are the cost approach and a yield capitalization income indicator as set forth in Subsection (5).

(i) Other generally accepted appraisal methods may also be used when it can be demonstrated that such methods are necessary to more accurately estimate fair market value.

(ii) Direct capitalization and the stock and debt method typically capture the value of intangible property at higher levels than other methods. To the extent intangible property cannot be identified and removed, relatively less weight shall be given to such methods in the reconciliation process, as set forth in Subsection (5)(d).

(iii) Preferred valuation methods as set forth in this rule are, unless otherwise stated, rebuttable presumptions,

established for purposes of consistency in mass appraisal. Any party challenging a preferred valuation method must demonstrate, by a preponderance of evidence, that the proposed alternative establishes a more accurate estimate of fair market value.

(c) Non-operating Property. Property that is not necessary to the operation of unitary properties and is assessed by a local county assessor, and property separately assessed by the Division, such as registered motor vehicles, shall be removed from the correlated unit value or from the state allocated value.

(5) Appraisal Methodologies.

(a) Cost Approach. Cost is relevant to value under the principle of substitution, which states that no prudent investor would pay more for a property than the cost to construct a substitute property of equal desirability and utility without undue delay. A cost indicator may be developed under one or more of the following methods: replacement cost new less depreciation (RCNLD), reproduction cost less depreciation (reproduction cost), and historic cost less depreciation (HCLD).

(i) "Depreciation" is the loss in value from any cause. Different professions recognize two distinct definitions or types of depreciation.

(A) Accounting. Depreciation, often called "book" or "accumulated" depreciation, is calculated according to generally accepted accounting principles or regulatory guidelines. It is the amount of capital investment written off on a firm's accounting records in order to allocate the original or historic cost of an asset over its life. Book depreciation is typically applied to historic cost to derive HCLD.

(B) Appraisal. Depreciation, sometimes referred to as "accrued" depreciation, is the difference between the market value of an improvement and its cost new. Depreciation is typically applied to replacement or reproduction cost, but should be applied to historic cost if market conditions so indicate. There are three types of depreciation:

(I) Physical deterioration results from regular use and normal aging, which includes wear and tear, decay, and the impact of the elements.

(II) Functional obsolescence is caused by internal property characteristics or flaws in the structure, design, or materials that diminish the utility of an improvement.

(III) External, or economic, obsolescence is an impairment of an improvement due to negative influences from outside the boundaries of the property, and is generally incurable. These influences usually cannot be controlled by the property owner or user.

(ii) Replacement cost is the estimated cost to construct, at current prices, a property with utility equivalent to that being appraised, using modern materials, current technology and current standards, design, and layout. The use of replacement cost instead of reproduction cost eliminates the need to estimate some forms of functional obsolescence.

(iii) Reproduction cost is the estimated cost to construct, at current prices, an exact duplicate or replica of the property being assessed, using the same materials, construction standards, design, layout and quality of workmanship, and embodying any functional obsolescence.

(iv) Historic cost is the original construction or acquisition cost as recorded on a firm's accounting records. Depending upon the industry, it may be appropriate to trend HCLD to current costs. Only trending indexes commonly recognized by the specific industry may be used to adjust HCLD.

(v) RCNLD may be impractical to implement; therefore the preferred cost indicator of value in a mass appraisal environment for unitary property is HCLD. A party may challenge the use of HCLD by proposing a different cost indicator that establishes a more accurate cost estimate of value.

(b) Income Capitalization Approach. Under the principle of anticipation, benefits from income in the future may be capitalized into an estimate of present value.

(i) Yield Capitalization. The yield capitalization formula is CF/(k-g), where "CF" is a single year's normalized cash flow, "k" is the nominal, risk adjusted discount or yield rate, and "g" is the expected growth rate of the cash flow.

(A) Cash flow is restricted to the operating property in existence on the lien date, together with any replacements intended to maintain, but not expand or modify, existing capacity or function. Cash flow is calculated as net operating income (NOI) plus non-cash charges (e.g., depreciation and deferred income taxes), less capital expenditures and additions to working capital necessary to achieve the expected growth "g". Information necessary for the Division to calculate the cash flow shall be summarized and submitted to the Division by March 1 on a form provided by the Division.

(I) NOI is defined as net income plus interest.

(II) Capital expenditures should include only those necessary to replace or maintain existing plant and should not include any expenditure intended primarily for expansion or productivity and capacity enhancements.

(III) Cash flow is to be projected for the year immediately following the lien date, and may be estimated by reviewing historic cash flows, forecasting future cash flows, or a combination of both.

(Aa) If cash flows for a subsidiary company are not available or are not allocated on the parent company's cash flow statements, a method of allocating total cash flows must be developed based on sales, fixed assets, or other reasonable criteria. The subsidiary's total is divided by the parent's total to derive the allocation percentage to estimate the subsidiary's cash flow.

(Bb) If the subject company does not provide the Commission with its most recent cash flow statements by March 1 of the assessment year, the Division may estimate cash flow using the best information available.

(B) The discount rate (k) shall be based upon a weighted average cost of capital (WACC) considering current market debt rates and equity yields. WACC should reflect a typical capital structure for comparable companies within the industry.

(I) The cost of debt should reflect the current market rate (yield to maturity) of debt with the same credit rating as the subject company.

(II) The cost of equity is estimated using standard methods such as the capital asset pricing model (CAPM), the Risk Premium and Dividend Growth models, or other recognized models.

(Aa) The CAPM is the preferred method to estimate the cost of equity. More than one method may be used to correlate a cost of equity, but only if the CAPM method is weighted at least 50% in the correlation.

(Bb) The CAPM formula is k(e) = R(f) + (Beta x Risk Premium), where k(e) is the cost of equity and R(f) is the risk free rate.

(Cc) The risk free rate shall be the current market rate on 20-year Treasury bonds.

(Dd) The beta should reflect an average or value-weighted average of comparable companies and should be drawn consistently from Value Line or an equivalent source. The beta of the specific assessed property should also be considered.

(Ee) The risk premium shall be the arithmetic average of the spread between the return on stocks and the income return on long term bonds for the entire historical period contained in the Ibbotson Yearbook published immediately following the lien date.

(C) The growth rate "g" is the expected future growth of the cash flow attributable to assets in place on the lien date, and any future replacement assets.

(I) If insufficient information is available to the Division, either from public sources or from the taxpayer, to determine a

rate, "g" will be the expected inflationary rate in the Gross Domestic Product Price Deflator obtained in Value Line. The growth rate and the methodology used to produce it shall be disclosed in a capitalization rate study published by the Commission by February 15 of the assessment year.

(ii) A discounted cash flow (DCF) method may be impractical to implement in a mass appraisal environment, but may be used when reliable cash flow estimates can be established.

(A) A DCF model should incorporate for the terminal year, and to the extent possible for the holding period, growth and discount rate assumptions that would be used in the yield capitalization method defined under Subsection (5)(b)(i).

(B) Forecasted growth may be used where unusual income patterns are attributed to

(I) unused capacity;

(II) economic conditions; or

(III) similar circumstances.

(C) Growth may not be attributed to assets not in place as of the lien date.

(iii) Direct Capitalization is an income technique that converts an estimate of a single year's income expectancy into an indication of value in one direct step, either by dividing the normalized income estimate by a capitalization rate or by multiplying the normalized income estimate by an income factor.

(c) Market or Sales Comparison Approach. The market value of property is directly related to the prices of comparable, competitive properties. The market approach is estimated by comparing the subject property to similar properties that have recently sold.

(I) Sales of comparable property must, to the extent possible, be adjusted for elements of comparison, including market conditions, financing, location, physical characteristics, and economic characteristics. When considering the sales of stock, business enterprises, or other properties that include intangible assets, adjustments must be made for those intangibles.

(II) Because sales of unitary properties are infrequent, a stock and debt indicator may be viewed as a surrogate for the market approach. The stock and debt method is based on the accounting principle which holds that the market value of assets equal the market value of liabilities plus shareholder's equity.

(d) Reconciliation. When reconciling value indicators into a final estimate of value, the appraiser shall take into consideration the availability, quantity, and quality of data, as well as the strength and weaknesses of each value indicator. Weighting percentages used to correlate the value approaches will generally vary by industry, and may vary by company if evidence exists to support a different weighting. The Division must disclose in writing the weighting percentages used in the reconciliation for the final assessment. Any departure from the prior year's weighting must be explained in writing.

(6) Property Specific Considerations. Because of unique characteristics of properties and industries, modifications or alternatives to the general value indicators may be required for specific industries.

(a) Cost Regulated Utilities.

(i) HCLD is the preferred cost indicator of value for cost regulated utilities because it represents an approximation of the basis upon which the investor can earn a return. HCLD is calculated by taking the historic cost less depreciation as reflected in the utility's net plant accounts, and then:

(A) subtracting intangible property;

(B) subtracting any items not included in the utility's rate base (e.g., deferred income taxes and, if appropriate, acquisition adjustments); and

(C) adding any taxable items not included in the utility's net plant account or rate base.

(ii) Deferred Income Taxes, also referred to as DFIT, is an accounting entry that reflects the difference between the use of accelerated depreciation for income tax purposes and the use of straight-line depreciation for financial statements. For traditional rate base regulated companies, regulators generally exclude deferred income taxes from rate base, recognizing it as ratepayer contributed capital. Where rate base is reduced by deferred income taxes for rate base regulated companies, they shall be removed from HCLD.

(iii) Items excluded from rate base under Subsections (6)(a)(i)(A) or (B) should not be subtracted from HCLD to the extent it can be shown that regulators would likely permit the rate base of a potential purchaser to include a premium over existing rate base.

(b)(i) Railroads.

(ii) The cost indicator should generally be given little or no weight because there is no observable relationship between cost and fair market value.

(c) Airlines, air charter services, and air contract services.

(i) For purposes of this Subsection (6)(c):

(A) "aircraft pricing guide" means a nationally recognized publication that assigns value estimates for individual commercial aircraft that are in average condition typical for their type and vintage, and identified by year, make and model;

(B) "airline" means an:

(I) airline under Section 59-2-102;

(II) air charter service under Section 59-2-102; and

(III) air contract service under Section 59-2-102;

(C) "airline market indicator" means an estimate of value based on an aircraft pricing guide; and

(D) "non-mobile flight equipment" means all operating property of an airline, air charter service, or air contract service that is not within the definition of mobile flight equipment under Section 59-2-102.

(ii) In situations where the use of preferred methods for determining fair market value under Subsection (5) does not produce a reasonable estimate of the fair market value of the property of an airline operating as a unit, an airline market indicator published in an aircraft pricing guide, and adjusted as provided in Subsections (6)(c)(ii)(A) and (6)(c)(ii)(B), may be used to estimate the fair market value of the airline property.

(A)(I) In order to reflect the value of a fleet of aircraft as part of an operating unit, an aircraft market indicator shall include a fleet adjustment or equivalent valuation for a fleet.

(II) If a fleet adjustment is provided in an aircraft pricing guide, the adjustment under Subsection (6)(c)(ii)(A)(I) shall follow the directions in that guide. If no fleet adjustment is provided in an aircraft pricing guide, the standard adjustment under Subsection (6)(c)(ii)(A)(I) shall be 20 percent from a wholesale value or equivalent level of value as published in the guide.

(B) Non-mobile flight equipment shall be valued using the cost approach under Subsection (5)(a) or the market or sales comparison approach under Subsection (5)(c), and added to the value of the fleet.

(iii) An income capitalization approach under Subsection (5)(b) shall incorporate the information available to make an estimate of future cash flows.

(iv)(A) When an aircraft market indicator under Subsection (6)(c)(ii) is used to estimate the fair market value of an airline, the Division shall:

(I) calculate the fair market value of the airline using the preferred methods under Subsection (5);

(II) retain the calculations under Subsection (6)(c)(iv)(A)(I) in the work files maintained by the Division; and

(III) include the amounts calculated under Subsection (6)(c)(iv)(A)(I) in any appraisal report that is produced in association with an assessment issued by the Division.

(B) When an aircraft market indicator under Subsection (6)(c)(ii) is used, the Division shall justify in any appraisal report issued with an assessment why the preferred methods under Subsection (5) were not used.

(v)(A) When the preferred methods under Subsection (5) are used to estimate the fair market value of an airline, the Division shall:

(I) calculate an aircraft market indicator under Subsection (6)(c)(ii);

(II) retain the calculations under Subsection (6)(c)(v)(A)(I) in the work files maintained by the Division; and

(III) include the amounts calculated under Subsection (6)(c)(v)(A)(I) in any appraisal report that is produced in association with an assessment issued by the Division.

(B) Value estimates from an aircraft pricing guide under Subsection (6)(c)(i)(A) along with the valuation of non-mobile flight equipment under Subsection (6)(c)(ii)(B) shall, when possible, also be included in an assessment or appraisal report for purposes of comparison.

(C) Reasons for not including a value estimate required under Subsection (6)(c)(v)(B) include:

(I) failure to file a return; or

(II) failure to identify specific aircraft.

R884-24P-63. Performance Standards and Training Requirements Pursuant to Utah Code Ann. Section 59-2-406.

A. The party contracting to perform services shall develop a written customer service performance plan within 60 days after the contract for performance of services is signed.

1. The customer service performance plan shall address:

a) procedures the contracting party will follow to minimize the time a customer waits in line; and

b) the manner in which the contracting party will promote alternative methods of registration.

2. The party contracting to perform services shall provide a copy of its customer service performance plan to the party for whom it provides services.

3. The party for whom the services are provided may, no more often than semiannually, audit the contracting party's performance based on its customer service performance plan, and may report the results of the audit to the county commission or the state tax commissioners, as applicable.

B. Each county office contracting to perform services shall conduct initial training of its new employees.

C. The Tax Commission shall provide regularly scheduled training for all county offices contracting to perform motor vehicle functions.

R884-24P-64. Determination and Application of Taxable Value for Purposes of the Property Tax Exemptions for Veterans With a Disability and the Blind Pursuant to Utah Code Ann. Sections 59-2-1104 and 59-2-1106.

For purposes of Sections 59-2-1104 and 59-2-1106, the taxable value of tangible personal property subject to a uniform fee under Sections 59-2-405.1 or 59-2-405.2 shall be calculated by dividing the uniform fee the tangible personal property is subject to by .015.

R884-24P-65. Assessment of Transitory Personal Property Pursuant to Utah Code Ann. Section 59-2-402.

A. "Transitory personal property"means tangible personal property that is used or operated primarily at a location other than a fixed place of business of the property owner or lessee.

B. Transitory personal property in the state on January 1 shall be assessed at 100 percent of fair market value.

C. Transitory personal property that is not in the state on January 1 is subject to a proportional assessment when it has been in the state for 90 consecutive days in a calendar year.

1. The determination of whether transitory personal property has been in the state for 90 consecutive days shall include the days the property is outside the state if, within 10 days of its removal from the state, the property is:

a) brought back into the state; or

b) substituted with transitory personal property that performs the same function.

D. Once transitory personal property satisfies the conditions under C., tax shall be proportionally assessed for the period:

1. beginning on the first day of the month in which the property was brought into Utah; and

2. for the number of months remaining in the calendar year.

E. An owner of taxable transitory personal property who removes the property from the state prior to December and who qualifies for a refund of taxes assessed and paid, shall receive a refund based on the number of months remaining in the calendar year at the time the property is removed from the state and for which the tax has been paid.

1. The refund provisions of this subsection apply to transitory personal property taxes assessed under B. and C.

2. For purposes of determining the refund under this subsection, any portion of a month remaining shall be counted as a full month.

F. If tax has been paid for transitory personal property and that property is subsequently moved to another county in Utah:

1. No additional assessment may be imposed by any county to which the property is subsequently moved; and

2. No portion of the assessed tax may be transferred to the subsequent county.

R884-24P-66. County Board of Equalization Procedures and Appeals Pursuant to Utah Code Ann. Sections 59-2-1001 and 59-2-1004.

(1)(a) "Factual error" means an error that is:

(i) objectively verifiable without the exercise of discretion, opinion, or judgment;

(ii) demonstrated by clear and convincing evidence; and

(iii) agreed upon by the taxpayer and the assessor.

(b) Factual error includes:

(i) a mistake in the description of the size, use, or ownership of a property;

(ii) a clerical or typographical error in reporting or entering the data used to establish valuation or equalization;

(iii) an error in the classification of a property that is eligible for a property tax exemption under:

(A) Section 59-2-103; or

(B) Title 59, Chapter 2, Part 11;

(iv) an error in the classification of a property that is eligible for assessment under Title 59, Chapter 2, Part 5;

(v) valuation of a property that is not in existence on the lien date; and

(vi) a valuation of a property assessed more than once, or by the wrong assessing authority.

(c) Factual error does not include:

(i) an alternative approach to value;

(ii) a change in a factor or variable used in an approach to value; or

(iii) any other adjustment to a valuation methodology.

(2) To achieve standing with the county board of equalization and have a decision rendered on the merits of the case, the taxpayer shall provide the following minimum information to the county board of equalization:

(a) the name and address of the property owner;

(b) the identification number, location, and description of the property;

(c) the value placed on the property by the assessor;

(d) the taxpayer's estimate of the fair market value of the property;

(e) evidence or documentation that supports the taxpayer's claim for relief; and

(f) the taxpayer's signature.

(3) If the evidence or documentation required under Subsection (2)(e) is not attached, the county will notify the taxpayer in writing of the defect in the claim and permit at least ten calendar days to cure the defect before dismissing the matter for lack of sufficient evidence to support the claim for relief.

(4) If the taxpayer appears before the county board of equalization and fails to produce the evidence or documentation described under Subsection (2)(e) and the county has notified the taxpayer under Subsection (3), the county may dismiss the matter for lack of evidence to support a claim for relief.

(5) If the information required under Subsection (2) is supplied, the county board of equalization shall render a decision on the merits of the case.

(6) The county board of equalization may dismiss an appeal for lack of jurisdiction when the claimant limits arguments to issues not under the jurisdiction of the county board of equalization.

(7) The county board of equalization shall prepare and maintain a record of the appeal.

(a) For appeals concerning property value, the record shall include:

(i) the name and address of the property owner;

(ii) the identification number, location, and description of the property;

(iii) the value placed on the property by the assessor;

(iv) the basis for appeal stated in the taxpayer's appeal;

(v) facts and issues raised in the hearing before the county board that are not clearly evident from the assessor's records; and

(vi) the decision of the county board of equalization and the reasons for the decision.

(b) The record may be included in the minutes of the hearing before the county board of equalization.

(8)(a) The county board of equalization shall notify the taxpayer in writing of its decision.

(b) The notice required under Subsection (8)(a) shall include:

(i) the name and address of the property owner;

(ii) the identification number of the property;

(iii) the date the notice was sent;

(iv) a notice of appeal rights to the commission; and

(v) a statement of the decision of the county board of equalization; or

(vi) a copy of the decision of the county board of equalization.

(9) A county shall maintain a copy of a notice sent to a taxpayer under Subsection (8).

(10) If a decision affects the exempt status of a property, the county board of equalization shall prepare its decision in writing, stating the reasons and statutory basis for the decision.

(11) Decisions by the county board of equalization are final orders on the merits.

(12) Except as provided in Subsection (14), a county board of equalization shall accept an application to appeal the valuation or equalization of a property owner's real property that is filed after the time period prescribed by Subsection 59-2-1004(3)(a) if any of the following conditions apply:

(a) During the period prescribed by Subsection 59-2-1004(3)(a), the property owner was incapable of filing an appeal as a result of a medical emergency to the property owner or an immediate family member of the property owner, and no co-owner of the property was capable of filing an appeal.

(b) During the period prescribed by Subsection 59-2-1004(3)(a), the property owner or an immediate family member of the property owner died, and no co-owner of the property was capable of filing an appeal.

(c) The county did not comply with the notification requirements of Section 59-2-919.1.

(d) A factual error is discovered in the county records pertaining to the subject property.

(e) The property owner was unable to file an appeal within the time period prescribed by Subsection 59-2-1004(3)(a) because of extraordinary and unanticipated circumstances that occurred during the period prescribed by Subsection 59-2-1004(3)(a), and no co-owner of the property was capable of filing an appeal.

(13) Appeals accepted under Subsection (12)(d) shall be limited to correction of the factual error and any resulting changes to the property's valuation.

(14) The provisions of Subsection (12) apply only to appeals filed for a tax year for which the treasurer has not made a final annual settlement under Section 59-2-1365.

(15) The provisions of this rule apply only to appeals to the county board of equalization. For information regarding appeals of county board of equalization decisions to the Commission, please see Section 59-2-1006 and R861-1A-9.

R884-24P-67. Information Required for Valuation of Low-Income Housing Pursuant to Utah Code Ann. Sections 59-2-102 and 59-2-301.3.

(1) The purpose of this rule is to provide an annual reporting mechanism to assist county assessors in gathering data necessary for accurate valuation of low-income housing projects.

(2) The Utah Housing Corporation shall provide the following information that it has obtained from the owner of a low-income housing project to the commission:

(a) for each low-income housing project in the state that is eligible for a low-income housing tax credit:

(i) the Utah Housing Corporation project identification number;

(ii) the project name;

(iii) the project address;

(iv) the city in which the project is located;

(v) the county in which the project is located;

(vi) the building identification number assigned by the Internal Revenue Service for each building included in the project;

(vii) the building address for each building included in the project;

(viii) the total apartment units included in the project;

(ix) the total apartment units in the project that are eligible for low-income housing tax credits;

(x) the period of time for which the project is subject to rent restrictions under an agreement described in Subsection (2)(b);

(xi) whether the project is:

(A) the rehabilitation of an existing building; or

(B) new construction;

(xii) the date on which the project was placed in service;

(xiii) the total square feet of the buildings included in the project;

(xiv) the maximum annual federal low-income housing tax credits for which the project is eligible;

(xv) the maximum annual state low-income housing tax credits for which the project is eligible; and

(xvi) for each apartment unit included in the project:

(A) the number of bedrooms in the apartment unit;

(B) the size of the apartment unit in square feet; and

(C) any rent limitation to which the apartment unit is subject; and

(b) a recorded copy of the agreement entered into by the Utah Housing Corporation and the property owner for the low-income housing project; and

(c) construction cost certifications for the project received

from the low-income housing project owner.

(3) The Utah Housing Corporation shall provide the commission the information under Subsection (2) by January 31 of the year following the year in which a project is placed into service.

R884-24P-68. Property Tax Exemption for Taxable Tangible Personal Property With a Total Aggregate Fair Market Value That is At or Below the Statutorily Prescribed Amount Pursuant to Utah Code Ann. Section 59-2-1115.

(1) The purpose of this rule is to provide for the administration of the property tax exemption for a taxpayer whose taxable tangible personal property has a total aggregate fair market value that is at or below the statutorily prescribed amount.

(a) Total aggregate fair market value is determined by aggregating the fair market value of all taxable tangible personal property owned by a taxpayer within a county.

(b) If taxable tangible personal property is required to be apportioned among counties, the determination of whether taxable tangible personal property has a total aggregate fair market value that is at or below the statutorily prescribed amount shall be made after apportionment.

(2) A taxpayer shall apply for the exemption provided under Section 59-2-1115:

(a) if the county assessor has requested a signed statement from the taxpayer under Section 59-2-306, within the time frame set forth under Section 59-2-306 for filing the signed statement; or

(b) if the county assessor has not requested a signed statement from the taxpayer under Section 59-2-306, within 30 days from the day the taxpayer is requested to indicate whether the taxpayer has taxable tangible personal property in the county that is at or below the statutorily prescribed amount.

R884-24P-70. Real Property Appraisal Requirements for County Assessors Pursuant to Utah Code Ann. Sections 59-2-303.1 and 59-2-919.1.

(1) Definitions.

(a) "Accepted valuation methodologies" means those methodologies approved or endorsed in the Standard on Mass Appraisal of Real Property and the Standard on Automated Valuation Models published by the International Association of Assessing Officers (IAAO).

(b) "Database," as referenced in Section 59-2-303.1(6), means an electronic storage of data using computer hardware and software that is relational, secure and archival, and adheres to generally accepted information technology standards of practice.

(2) County mass appraisal systems, as defined in Section 59-2-303.1, shall use accepted valuation methodologies to perform the annual update of all residential parcels.

(3)(a) A detailed review of property characteristics shall include a sufficient inspection to determine any changes to real property due to:

(i) new construction, additions, remodels, demolitions, land segregations, changes in use, or other changes of a similar nature; and

(ii) a change in condition or effective age.

(b)(i) A detailed review of property characteristics shall be made in accordance with the IAAO Standard on Mass Appraisal of Real Property.

(ii) When using aerial photography, including oblique aerial photography, the date of the photographic flight is the property review date for purposes of Section 59-2-303.1.

(4) The last property review date to be included in the county's computer system shall include the actual day, month, and year that the last detailed review of a property's characteristics was conducted.

(5) The last property review date to be included on the notice shall include at least the actual year or tax year that the last detailed review of a property's characteristics was conducted. The month and day of the review may also be included on the notice at the discretion of the county assessor and auditor.

(6)(a) The five-year plan shall detail the current year plus four subsequent years into the future. The plan shall define the properties being reviewed for each of the five years by one or more of the following:

(i) class;

(ii) property type;

(iii) geographic location; and

(iv) age.

(b) The five-year plan shall also include parcel counts for each defined property group.

R884-24P-71. Agreements with Commercial or Industrial Taxpayers for Equal Property Tax Payments Pursuant to Utah Code Ann. Section 59-2-1308.5.

(1) An agreement with a commercial or industrial taxpayer for equal property tax payments under Section 59-2-1308.5 is effective:

(a) the current calendar year, if the agreement is agreed to by all parties on or before May 31; or

(b) the subsequent calendar year, if the agreement is agreed to by all parties after May 31.

(2) An agreement under Subsection (1) affects only those taxing entities that are a party to the agreement.

(3) The commission shall ensure that an agreement under Subsection (1) does not affect the calculation of the certified tax rate by adjusting the formula under Section 59-2-924 so that the collection ratio for each taxpayer that is a party to the agreement is based on the amount that would have been collected according to the same valuation and assessment methodologies that would have been applied in the absence of the agreement.

R884-24P-72. State Farmland Evaluation Advisory Committee Procedures Pursuant to Utah Code Ann. Section 59-2-514.

(1) "Committee" means the State Farmland Evaluation Advisory Committee established in Section 59-2-514.

(2) The committee is subject to Title 52, Chapter 4, Open and Public Meetings Act.

(3) A committee member may participate electronically in a meeting open to the public under Section 52-4-207 if:

(a) the agenda posted for the meeting establishes one or more anchor locations for the meeting where the public may attend;

(b) at least one committee member is at an anchor location; and

(c) all of the committee members may be heard by any person attending an anchor location.

R884-24P-74. Changes to Jurisdiction of Mining Claims Pursuant to Utah Code Ann. Section 59-2-201.

(1) A mining claim shall be assessed by the county in which the mining claim is located if the commission determines that the mining claim is used for other than mining purposes.

(2) The owner of a mining claim may request that the mining claim be assessed by the county in which the mining claim is located by providing the following to the commission:

(a) a copy of the title to the mining claim;

(b) certification that all owners of the mining claim seek assessment by the county in which the mining claim is located;

(c) a valid metes and bounds legal description of the mining claim approved by the county recorder where the mining claim is located; and

(d) evidence that the mining claim is used for other than

mining purposes.

(3) A county may request that a mining claim be assessed by the county in which the mining claim is located by providing the following to the commission:

(a) a valid metes and bounds legal description of the mining claim approved by the county recorder where the mining claim is located; and

(b) evidence that the mining claim is used for other than mining purposes.

(4) Evidence that a mining claim is used for other than mining purposes is dependent on specific facts and circumstances and includes:

(a) evidence that the mining claim will be actively and solely used for other than mining purposes for more than a temporary period of time;

(b) evidence that a restrictive covenant or conservation easement prohibiting mining activities on the mining claim is recorded in the county where the mining claim is located;

(c) evidence that local zoning ordinances prohibit mining activities on the mining claim; or

(d) in the case where the mining claim has been used for mining activities at any time, the mining claim has been reclaimed as evidenced by the return of the mine reclamation bond to the owner of the mining claim by the Division of Oil, Gas, and Mining.

KEY: taxation, personal property, property tax, appraisals
October 24, 2019 **Art. XIII, Sec 2**
Notice of Continuation November 10, 2016 **9-2-201**
11-13-302
41-1a-202
41-1a-301
59-1-210
59-2-102
59-2-103
59-2-103.5
59-2-104
59-2-201
59-2-210
59-2-211
59-2-301
59-2-301.3
59-2-302
59-2-303
59-2-303.1
59-2-305
59-2-306
59-2-401
59-2-402
59-2-404
59-2-405
59-2-405.1
59-2-406
59-2-508
59-2-514
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59-2-701
59-2-702
59-2-703
59-2-704
59-2-704.5
59-2-705
59-2-801
59-2-918 through 59-2-924
59-2-1002
59-2-1004
59-2-1005
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59-2-1101
59-2-1102
59-2-1104
59-2-1106
59-2-1107 through 59-2-1109
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