**R307. Environmental Quality, Air Quality.**

**R307-101. General Requirements.**

**R307-101-1. Foreword.**

Chapter 19-2 and the rules adopted by the Air Quality Board constitute the basis for control of air pollution sources in the state. Title R307 applies and shall be enforced throughout the state and are recommended for adoption in local jurisdictions where environmental specialists are available to cooperate in implementing rule requirements.

National Ambient Air Quality Standards (NAAQS), National Standards of Performance for New Stationary Sources (NSPS), National Prevention of Significant Deterioration of Air Quality (PSD) standards, and the National Emission Standards for Hazardous Air Pollutants (NESHAPS) apply throughout the nation and are legally enforceable in Utah.

**R307-101-2. Definitions.**

Except where specified in individual rules, definitions in Section R307-101-2 are applicable to any rules adopted by the Air Quality Board.

"Actual Emissions" means the actual rate of emissions of a pollutant from an emissions unit determined as follows:

(1) In general, actual emissions as of a particular date shall equal the average rate, in tons per year, at which the unit actually emitted the pollutant during a two-year period which precedes the particular date and which is representative of normal source operations. The director shall allow the use of a different period upon a determination that it is more representative of normal source operation. Actual emissions shall be calculated using the unit's actual operating hours, production rates, and types of materials processed, stored, or combusted during the selected period.

(2) The director may presume that source-specific allowable emissions for the unit are equivalent to the actual emissions of the unit.

(3) For any emission unit, other than an electric utility steam generating unit specified in Subsection (4), which has not begun normal operations on the date, actual emissions shall equal the potential to emit of the unit on that date.

(4) For an electric utility steam generating unit, other than a new unit or the replacement of an existing unit, actual emissions of the unit following the physical or operational change shall equal the representative actual annual emissions of the unit, provided the source owner or operator maintains and submits to the director, on an annual basis for a period of five years from the date the unit resumes regular operation, information demonstrating that the physical or operational change did not result in an emissions increase. A longer period, not to exceed ten years, may be required by the director if the director determines a period to be more representative of normal source post-change operations.

"Acute Hazardous Air Pollutant" means any noncarcinogenic hazardous air pollutant for which a threshold limit value - ceiling (TLV-C) has been adopted by the American Conference of Governmental Industrial Hygienists (ACGIH) in its "Threshold Limit Values for Chemical Substances and Physical Agents and Biological Exposure Indices, (2009)."

"Air pollutant" means a substance that qualifies as an air pollutant as defined in 42 U.S.C. Sec. 7602.

"Air Pollutant Source" means private and public sources of emissions of air pollutants.

"Air Pollution" means the presence of an air pollutant in the ambient air in quantities and duration and under conditions and circumstances, that are injurious to human health or welfare, animal or plant life, or property, or would unreasonably interfere with the enjoyment of life or use of property as determined by the standards, rules adopted by the Air Quality Board, Section 19-2-104.

"Allowable Emissions" means the emission rate of a source calculated using the maximum rated capacity of the source, unless the source is subject to enforceable limits which restrict the operating rate, or hours of operation, or both, and the emission limitation established pursuant to Section R307-401-8.

"Ambient Air" means that portion of the atmosphere, external to buildings, to which the general public has access. See Subsection 19-2-102(4).

"Appropriate Authority" means the governing body of any city, town, or county.

"Atmosphere" means the air that envelops or surrounds the earth and includes any space outside of buildings, stacks, or exterior ducts.

"Authorized Local Authority" means:

(1) city, county, city-county, or district health department;

(2) a city, county, or combination fire department;

(3) other local agency designated by appropriate authority, with approval of the Utah Department of Health and Human Services; or

(4) other lawfully adopted ordinances, codes, or regulations not in conflict with.

"Board" means Air Quality Board. See Subsection 19-2-102(8)(a).

"Breakdown" means any malfunction or procedural error, to include any malfunction or procedural error during start-up and shutdown, which will result in the inoperability or sudden loss of performance of the control equipment or process equipment causing emissions in excess of those allowed by approval order or Title R307.

"BTU" means British Thermal Unit, the quantity of heat necessary to raise the temperature of one pound of water one degree Fahrenheit.

"Calibration Drift" means the change in the instrument meter readout over a stated period of normal continuous operation when the VOC concentration at the time of measurement is the same known upscale value.

"Carbon Adsorption System" means a device containing adsorbent material including activated carbon, aluminum, silica gel, an inlet and outlet for exhaust gases, and a system for the proper disposal or reuse of any VOC adsorbed.

"Carcinogenic Hazardous Air Pollutant" means any hazardous air pollutant that is classified as a known human carcinogen (A1) or suspected human carcinogen (A2) by the American Conference of Governmental Industrial Hygienists (ACGIH) in its "Threshold Limit Values for Chemical Substances and Physical Agents and Biological Exposure Indices, (2009)."

"Chargeable Pollutant" means any regulated air pollutant except the following:

(1) carbon monoxide;

(2) any pollutant that is a regulated air pollutant solely because it is a Class I or II substance subject to a standard promulgated or established by Title VI of the Act, Stratospheric Ozone Protection; or

(3) any pollutant that is a regulated air pollutant solely because it is subject to a standard or regulation under Section 112(r) of the Act, Prevention of Accidental Releases.

"Chronic Hazardous Air Pollutant" means any noncarcinogenic hazardous air pollutant for which a threshold limit value - time weighted average (TLV-TWA) having no threshold limit value - ceiling (TLV-C) has been adopted by the American Conference of Governmental Industrial Hygienists (ACGIH) in its "Threshold Limit Values for Chemical Substances and Physical Agents and Biological Exposure Indices, (2009)."

"Clean Air Act" means federal Clean Air Act as found in 42 U.S.C. Chapter 85.

"Clean Coal Technology" means any technology, including technologies applied at the precombustion, combustion, or post combustion stage, at a new or existing facility which will achieve significant reductions in air emissions of sulfur dioxide or oxides of nitrogen associated with the utilization of coal in the generation of electricity, or process steam which was not in widespread use as of November 15, 1990.

"Clean Coal Technology Demonstration Project" means a project using funds appropriated under the heading "Department of Energy-Clean Coal Technology," up to a total amount of $2,500,000,000 for commercial demonstration of clean coal technology, or similar projects funded through appropriations for the Environmental Protection Agency. The federal contribution for a qualifying project shall be at least 20% of the total cost of the demonstration project.

"Clearing Index" means an indicator of the predicted rate of clearance of ground level pollutants from a given area. This number is provided by the National Weather Service.

"Coating" means a material that can be applied to a substrate and which cures to form a continuous solid film for protective, decorative, or functional purposes. Materials include paints, varnishes, sealants, adhesives, caulks, maskants, inks, and temporary protective coatings.

"Commence" as applied to construction of a major source or major modification means that the owner or operator has any necessary pre-construction approvals or permits and either has:

(1) begun, or caused to begin, a continuous program of actual on-site construction of the source, to be completed within a reasonable time; or

(2) entered into binding agreements or contractual obligations, which cannot be canceled or modified without substantial loss to the owner or operator, to undertake a program of actual construction of the source to be completed within a reasonable time.

"Composite vapor pressure" means the sum of the partial pressures of the compounds defined as VOCs.

"Condensable PM2.5" means material that is vapor phase at stack conditions, but which condenses or reacts upon cooling and dilution in the ambient air to form solid or liquid particulate matter immediately after discharge from the stack.

"Compliance Schedule" means a schedule of events, by date, which shall result in compliance with this rule.

"Construction" means any physical change or change in the method of operation including fabrication, erection, installation, demolition, or modification of a source which would result in a change in actual emissions.

"Control Apparatus" means any device which prevents or controls the emission of any air pollutant directly or indirectly into the outdoor atmosphere.

"Department" means Utah State Department of Environmental Quality. See Subsection 19-1-103(1).

"Director" means the Director of the Division of Air Quality. See Subsection 19-1-103(1).

"Division" means the Division of Air Quality.

"Electric Utility Steam Generating Unit" means any steam electric generating unit that is constructed to supply more than one-third of its potential electric output capacity and more than 25 MW electrical output to any utility power distribution system for sale. Any steam supplied to a steam distribution system for providing steam to a steam-electric generator that would produce electrical energy for sale is also considered in determining the electrical energy output capacity of the affected facility.

"Emission" means the act of discharge into the atmosphere of an air pollutant or an effluent which contains or may contain an air pollutant, or the effluent so discharged into the atmosphere.

"Emissions Information" means any source operation, equipment, or control apparatus:

(1) information necessary to determine the identity, amount, frequency, concentration, or other characteristics related to air quality of any air pollutant which has been emitted by the source operation, equipment, or control apparatus;

(2) information necessary to determine the identity, amount, frequency, concentration, or other characteristics to the extent related to air quality, of any air pollutant which, under an applicable standard or limitation, the source operation was authorized to emit including, to the extent necessary for such purposes, a description of the manner or rate of operation of the source operation, or any combination of the foregoing; and

(3) a general description of the location or nature of the source operation to the extent necessary to identify the source operation and to distinguish it from other source operations including, to the extent necessary for such purposes, a description of the device, installation, or operation constituting the source operation.

"Emission Limitation" means a requirement established by the Board, the director or the Administrator, EPA, which limits the quantity, rate or concentration of emission of air pollutants on a continuous emission reduction including any requirement relating to the operation or maintenance of a source to ensure continuous emission reduction. See Section 302(k).

"Emissions Unit" means any part of a stationary source which emits or would have the potential to emit any pollutant subject to regulation under the Clean Air Act.

"Enforceable" means any limitations and conditions which are enforceable by the Administrator, including those requirements developed pursuant to 40 CFR Parts 60 and 61, requirements within the State Implementation Plan and Title R307, any permit requirements established pursuant to 40 CFR 52.21 or Rule R307-401.

"EPA" means Environmental Protection Agency.

"EPA Method 9" means 40 CFR Part 60, Appendix A, Method 9, "Visual Determination of Opacity of Emissions from Stationary Sources," and Alternate 1, "Determination of the opacity of emissions from stationary sources remotely by LIDAR."

"Executive Director" means the Executive Director of the Utah Department of Environmental Quality. See Subsection 19-1-103(2).

"Existing Installation" means an installation, construction of which began before the effective date of any regulation having application to it.

"Filterable PM2.5" means particles with an aerodynamic diameter equal to or less than 2.5 micrometers that are directly emitted by a source as a solid or liquid at stack or release conditions and can be captured on the filter of a stack test train.

"Fireplace" means any devices both masonry or factory built units, free standing fireplaces with a hearth, fire chamber or similarly prepared device connected to a chimney which provides the operator with little control of combustion air, leaving its fire chamber fully or at least partially open to the room. Fireplaces include those devices with circulating systems, heat exchangers, or draft reducing doors with a net thermal efficiency of no greater than 20% and are used for aesthetic purposes.

"Fugitive Dust" means particulate, composed of soil, industrial particulates, or both including ash, coal, and minerals which becomes airborne because of wind or mechanical disturbance of surfaces. Natural sources of dust and fugitive emissions are not fugitive dust within the meaning of this definition.

"Fugitive Emissions" means emissions from an installation or facility which are neither passed through an air cleaning device nor vented through a stack or could not reasonably pass through a stack, chimney, vent, or other functionally equivalent opening.

"Garbage" means any putrescible animal and vegetable matter resulting from the handling, preparation, cooking and consumption of food, including wastes attendant thereto.

"Gasoline" means any petroleum distillate, used as a fuel for internal combustion engines, having a Reid vapor pressure of four pounds or greater.

"Hazardous Air Pollutant (HAP)" means any pollutant listed by the EPA as a hazardous air pollutant in conformance with Section 112(b) of the Clean Air Act. A list of these pollutants is available at the Division of Air Quality.

"Household Waste" means any solid or liquid material normally generated by the family in a residence in the course of ordinary day-to-day living, including garbage, paper products, rags, leaves, and garden trash.

"Incinerator" means a combustion apparatus designed for high temperature operation in which solid, semisolid, liquid, or gaseous combustible wastes are ignited and burned efficiently and from which the solid and gaseous residues contain little or no combustible material.

"Installation" means a discrete process with identifiable emissions which may be part of a larger industrial plant. Pollution equipment may not be considered a separate installation or installations.

"LPG" means liquified petroleum gas including propane or butane.

"Maintenance Area" means an area that is subject to the provisions of a maintenance plan that is included in the Utah State Implementation Plan, and that has been redesignated by EPA from nonattainment to attainment of any National Ambient Air Quality Standard.

(1) Provo City is considered a maintenance areas for carbon monoxide effective January 3, 2006.

(2) The following areas are considered maintenance areas for PM10:

(a) Salt Lake County, effective on the date that EPA approves the maintenance plan that was adopted by the Board on December 2, 2015;

(b) Utah County, effective on the date that EPA approves the maintenance plan that was adopted by the Board on December 2, 2015; and

(c) Ogden City, effective on the date that EPA approves the maintenance plan that was adopted by the Board on December 2, 2015.

(3) The following area is considered a maintenance area for sulfur dioxide: Salt Lake County and the eastern portion of Tooele County above 5,600 feet, effective on the date that EPA approves the maintenance plan that was adopted by the Board on January 5, 2005.

(4) The following areas are considered maintenance areas for PM2.5:

(a) the Salt Lake City, Utah 24-hr PM2.5 nonattainment area, as defined in the July 1, 2019 version of 40 CFR 81.345, effective on the date that EPA redesignates the area to attainment for PM2.5;

(b) the Provo, Utah 24-hr PM2.5 nonattainment area, as defined in the July 1, 2019 version of 40 CFR 81.345, effective on the date that EPA redesignates the area to attainment for PM2.5; and

(c) the Utah portion of the Logan, Utah-Idaho 24-hr PM2.5 nonattainment area, as defined in the July 1, 2019 version of 40 CFR 81.345, effective on the date that EPA redesignates the area to attainment for PM2.5.

"Major Modification" means any physical change in or change in the method of operation of a major source that would result in a significant net emissions increase of any pollutant. A net emissions increase that is significant for volatile organic compounds shall be considered significant for ozone. Within Salt Lake and Davis Counties or any nonattainment area for ozone, a net emissions increase that is significant for nitrogen oxides shall be considered significant for ozone. Within areas of nonattainment for PM10, a significant net emission increase for any PM10 precursor is also a significant net emission increase for PM10. A physical change or change in the method of operation may not include:

(1) routine maintenance, repair, and replacement;

(2) use of an alternative fuel or raw material by reason of an order under Section 2(a) and (b) of the Energy Supply and Environmental Coordination Act of 1974, or by reason of a natural gas curtailment plan pursuant to the Federal Power Act;

(3) use of an alternative fuel by reason of an order or rule under Section 125 of the federal Clean Air Act;

(4) use of an alternative fuel at a steam generating unit to the extent that the fuel is generated from municipal solid waste;

(5) use of an alternative fuel or raw material by a source:

(a) which the source was capable of accommodating before January 6, 1975, unless such change would be prohibited under any enforceable permit condition; or

(b) which the source is otherwise approved to use;

(6) an increase in the hours of operation or in the production rate unless the change would be prohibited under any enforceable permit condition;

(7) any change in ownership at a source;

(8) the addition, replacement, or use of a pollution control project at an existing electric utility steam generating unit, unless the director determines that the addition, replacement, or use renders the unit less environmentally beneficial, or except:

(a) when the director has reason to believe that the pollution control project would result in a significant net increase in representative actual annual emissions of any criteria pollutant over levels used for that source in the most recent air quality impact analysis in the area conducted for Title I of the Clean Air Act, if any; and

(b) the director determines that the increase will cause or contribute to a violation of any national ambient air quality standard or PSD increment, or visibility limitation;

(9) the installation, operation, cessation, or removal of a temporary clean coal technology demonstration project, provided that the project complies with:

(a) the Utah State Implementation Plan; and

(b) other requirements necessary to attain and maintain the national ambient air quality standards during the project and after it is terminated.

"Major Source" means, to the extent provided by the federal Clean Air Act as applicable to Title R307:

(1) any stationary source of air pollutants which emits, or has the potential to emit, 100 tons per year or more of any pollutant subject to regulation under the Clean Air Act; or

(a) any source located in a nonattainment area for carbon monoxide which emits, or has the potential to emit, carbon monoxide in the amounts outlined in Section 187 of the federal Clean Air Act with respect to the severity of the nonattainment area as outlined in Section 187 of the federal Clean Air Act;

(b) any source located in Salt Lake or Davis Counties or in a nonattainment area for ozone which emits, or has the potential to emit, VOC or nitrogen oxides in the amounts outlined in Section 182 of the federal Clean Air Act with respect to the severity of the nonattainment area as outlined in Section 182 of the federal Clean Air Act; or

(c) any source located in a nonattainment area for PM10 which emits, or has the potential to emit, PM10 or any PM10 precursor in the amounts outlined in Section 189 of the federal Clean Air Act with respect to the severity of the nonattainment area as outlined in Section 189 of the federal Clean Air Act.

(2) any physical change that would occur at a source not qualifying under Subsection (1) as a major source, if the change would constitute a major source by itself;

(3) the fugitive emissions and fugitive dust of a stationary source may not be included in determining for any of the purposes of Title R307 rules whether it is a major stationary source, unless the source belongs to one of the following categories of stationary sources:

(a) coal cleaning plants with thermal dryers;

(b) Kraft pulp mills;

(c) Portland cement plants;

(d) primary zinc smelters;

(e) iron and steel mills;

(f) primary aluminum or reduction plants;

(g) primary copper smelters;

(h) municipal incinerators capable of charging more than 250 tons of refuse per day;

(i) hydrofluoric, sulfuric, or nitric acid plants;

(j) petroleum refineries;

(k) lime plants;

(l) phosphate rock processing plants;

(m) coke oven batteries;

(n) sulfur recovery plants;

(o) carbon black plants or furnace process;

(p) primary lead smelters;

(q) fuel conversion plants;

(r) sintering plants;

(s) secondary metal production plants;

(t) chemical process plants;

(u) fossil-fuel boilers, or combination thereof, totaling more than 250 million British Thermal Units per hour heat input;

(v) petroleum storage and transfer units with a total storage capacity exceeding 300,000 barrels;

(w) taconite ore processing plants;

(x) glass fiber processing plants;

(y) charcoal production plants;

(z) fossil fuel-fired steam electric plants of more than 250 million British Thermal Units per hour heat input; or

(aa) any other stationary source category which, as of August 7, 1980, is being regulated under Section 111 or 112 of the federal Clean Air Act.

"Modification" means any planned change in a source which results in a potential increase of emission.

"National Ambient Air Quality Standards (NAAQS)" means the allowable concentrations of air pollutants in the ambient air specified by the federal government, see Title 40, Code of Federal Regulations, Part 50.

"Net Emissions Increase" means the amount by which the sum of the following exceeds zero:

(1) any increase in actual emissions from a particular physical change or change in method of operation at a source; and

(2) any other increases and decreases in actual emissions at the source that are contemporaneous with the particular change and are otherwise creditable. For purposes of determining a "net emissions increase":

(a) an increase or decrease in actual emissions is contemporaneous with the increase from the particular change only if it occurs between the date five years before construction on the particular change commences; and the date that the increase from the particular change occurs;

(b) An increase or decrease in actual emissions is creditable only if it has not been relied on in issuing a prior approval for the source which approval is in effect when the increase in actual emissions for the particular change occurs;

(c) An increase or decrease in actual emission of sulfur dioxide, nitrogen oxides or particulate matter which occurs before an applicable minor source baseline date is creditable only if it is required to be considered in calculating the amount of maximum allowable increases remaining available and with respect to particulate matter, only PM10 emissions will be used to evaluate this increase or decrease;

(d) an increase in actual emissions is creditable only to the extent that the new level of actual emissions exceeds the old level.

(e) a decrease in actual emissions is creditable only to the extent that:

(i) the old level of actual emissions or the old level of allowable emissions, whichever is lower, exceeds the new level of actual emissions;

(ii) it is enforceable at and after the time that actual construction on the particular change begins;

(iii) it has about the same qualitative significance for public health and welfare as that attributed to the increase from the particular change; and

(iv) it has not been relied on in issuing any permit under Rule R307-401 nor has it been relied on in demonstrating attainment or reasonable further progress.

(f) an increase that results from a physical change at a source occurs when the emissions unit on which construction occurred becomes operational and begins to emit a particular pollutant and any replacement unit that requires shakedown becomes operational only after a reasonable shakedown period, not to exceed 180 days.

"New Installation" means an installation, construction of which began after the effective date of any regulation having application to it.

"Nonattainment Area" means an area designated by the Environmental Protection Agency as nonattainment under Section 107, Clean Air Act for any National Ambient Air Quality Standard. The designations for Utah are listed in 40 CFR 81.345.

"Offset" means an amount of emission reduction, by a source, greater than the emission limitation imposed on the source by this rule, the State Implementation Plan, or both.

"Opacity" means the capacity to obstruct the transmission of light, expressed as percent.

"Open Burning" means any burning of combustible materials resulting in emission of products of combustion into ambient air without passage through a chimney or stack.

"Owner or Operator" means any person who owns, leases, controls, operates or supervises a facility, an emission source, or air pollution control equipment.

"PSD Area" means an area designated as attainment or unclassifiable under Section 107(d)(1)(D) or (E) of the federal Clean Air Act.

"PM2.5" means particulate matter with an aerodynamic diameter less than or equal to a nominal 2.5 micrometers as measured by an EPA reference or equivalent method.

"PM2.5 Precursor" means any chemical compound or substance which, after it has been emitted into the atmosphere, undergoes chemical or physical changes that convert it into particulate matter, specifically PM2.5.

(1) Specifically, Sulfur dioxide, Nitrogen oxides, Volatile organic compounds and Ammonia are precursors to PM2.5 in any PM2.5nonattainment area, except where the Administrator of the EPA has approved a demonstration satisfying 40 CFR 51.1006(a)(3) which has, for a particular PM2.5 nonattainment area, determined otherwise.

(2) The following subparagraphs denote specific nonattainment areas, as defined in the July 1, 2017 version of 40 CFR 81.345, within which certain pollutants identified in Subsection (1) are exempted from the definition of PM2.5 precursor for the purposes of 40 CFR 51.165

(a) In the Logan UT-ID PM2.5 nonattainment area, Ammonia is exempted.

"PM10" means particulate matter with an aerodynamic diameter less than or equal to a nominal ten micrometers as measured by an EPA reference or equivalent method.

"PM10 Precursor" means any chemical compound or substance which, after it has been emitted into the atmosphere, undergoes chemical or physical changes that convert it into particulate matter, specifically PM10.

"Part 70 Source" means any source subject to the permitting requirements of Rule R307-415.

"Person" means an individual, trust, firm, estate, company, corporation, partnership, association, state, state or federal agency or entity, municipality, commission, or political subdivision of a state. See Subsection 19-2-103(4).

"Pollution Control Project" means any activity or project at an existing electric utility steam generating unit for purposes of reducing emissions from a unit. Activities or projects are limited to:

(1) the installation of conventional or innovative pollution control technology, including advanced flue gas desulfurization, sorbent injection for sulfur dioxide and nitrogen oxides controls, and electrostatic precipitators;

(2) an activity or project to accommodate switching to a fuel which is less polluting than the fuel used before the activity or project, including natural gas or coal reburning, or the cofiring of natural gas and other fuels for controlling emissions;

(3) a permanent clean coal technology demonstration project conducted under Title II, Section 101(d) of the Further Continuing Appropriations Act of 1985 (sec. 5903(d) of title 42 of the United States Code), or subsequent appropriations, up to a total amount of $2,500,000,000 for commercial demonstration of clean coal technology, or similar projects funded through appropriations for the Environmental Protection Agency; or

(4) a permanent clean coal technology demonstration project that constitutes a repowering project.

"Potential to Emit" means the maximum capacity of a source to emit a pollutant under its physical and operational design. Any physical or operational limitation on the capacity of the source to emit a pollutant including air pollution control equipment and restrictions on hours of operation or on the type or amount of material combusted, stored, or processed shall be treated as part of its design if the limitation or the effect it would have on emissions is enforceable. Secondary emissions do not count in determining the potential to emit of a stationary source.

"Primary PM2.5" means the sum of filterable PM2.5 and condensable PM2.5.

"Process Level" means the operation of a source, specific to the kind or type of fuel, input material, or mode of operation.

"Process Rate" means the quantity per unit of time of any raw material or process intermediate consumed, or product generated, through the use of any equipment, source operation, or control apparatus. For a stationary internal combustion unit or any other fuel burning equipment, this term may be expressed as the quantity of fuel burned per unit of time.

"Reactivation of a Very Clean Coal-Fired Electric Utility Steam Generating Unit" means any physical change or change in the method of operation associated with the commencement of commercial operations by a coal-fired utility unit after a period of discontinued operation where the unit:

(1) has not been in operation for the two-year period before the enactment of the Clean Air Act Amendments of 1990, and the emissions from the unit continue to be carried in the emission inventory at the time of enactment;

(2) was equipped before shutdown with a continuous system of emissions control that achieves a removal efficiency for sulfur dioxide of no less than 85% and a removal efficiency for particulates of no less than 98%;

(3) is equipped with low-NOx burners before operations begin following reactivation; and

(4) is otherwise in compliance with the requirements of the Clean Air Act.

"Reasonable Further Progress" means annual incremental reductions in emission of an air pollutant which are sufficient to provide for attainment of the NAAQS by the date identified in the State Implementation Plan.

"Refuse" means solid wastes, such as garbage and trash.

"Regulated air pollutant" means any of the following:

(a) nitrogen oxides or any volatile organic compound;

(b) any pollutant for which a national ambient air quality standard has been promulgated;

(c) any pollutant that is subject to any standard promulgated under Section 111 of the Act, Standards of Performance for New Stationary Sources;

(d) any Class I or II substance subject to a standard promulgated under or established by Title VI of the Act, Stratospheric Ozone Protection; or

(e) any pollutant subject to a standard promulgated under Section 112, Hazardous Air Pollutants, or other requirements established under Section 112 of the Act, including Sections 112(g), (j), and (r) of the Act, including any of the following:

(i) Any pollutant subject to requirements under Section 112(j) of the Act, Equivalent Emission Limitation by Permit. If the Administrator fails to promulgate a standard by the date established pursuant to Section 112(e) of the Act, any pollutant for which a subject source would be major shall be regulated on the date 18 months after the applicable date established pursuant to Section 112(e) of the Act;

(ii) Any pollutant for which the requirements of Section 112(g)(2) of the Act, Construction, Reconstruction and Modification, have been met, but only with respect to the individual source subject to Section 112(g)(2) requirement.

"Repowering" means replacement of an existing coal-fired boiler with one of the following clean coal technologies:

(a) atmospheric or pressurized fluidized bed combustion;

(b) integrated gasification combined cycle;

(c) magnetohydrodynamics;

(d) direct and indirect coal-fired turbines;

(e) integrated gasification fuel cells; or

(f) as determined by the Administrator, in consultation with the Secretary of Energy, a derivative of one or more of these technologies, and any other technology capable of controlling multiple combustion emissions simultaneously with improved boiler or generation efficiency and with significantly greater waste reduction relative to the performance of technology in widespread commercial use as of November 15, 1990.

(1) Repowering shall also include any oil or gas-fired unit which has been awarded clean coal technology demonstration funding as of January 1, 1991, by the Department of Energy.

(2) The director shall give expedited consideration to permit applications for any source that satisfies the requirements of this definition and is granted an extension under Section 409 of the Clean Air Act.

"Representative Actual Annual Emissions" means the average rate, in tons per year, at which the source is projected to emit a pollutant for the two-year period after a physical change or change in the method of operation of unit, or a different consecutive two-year period within ten years after that change, where the director determines that the period is more representative of source operations, considering the effect any change will have on increasing or decreasing the hourly emissions rate and on projected capacity utilization. In projecting future emissions, the director shall:

(1) consider any relevant information, including historical operational data, the company's own representations, filings with the State of Federal regulatory authorities, and compliance plans under title IV of the Clean Air Act; and

(2) exclude, in calculating any increase in emissions that results from the particular physical change or change in the method of operation at an electric utility steam generating unit, that portion of the unit's emissions following the change that could have been accommodated during the representative baseline period and is attributable to an increase in projected capacity utilization at the unit that is unrelated to the particular change, including any increased utilization due to the rate of electricity demand growth for the utility system as a whole.

"Residence" means a dwelling in which people live, including all ancillary buildings.

"Residential Solid Fuel Burning" device means any residential burning device except a fireplace connected to a chimney that burns solid fuel and is capable of, and intended for use as a space heater, domestic water heater, or indoor cooking appliance, and has an air-to-fuel ratio less than 35-to-1 as determined by the test procedures prescribed in 40 CFR 60.534. It shall also have a useable firebox volume of less than 6.10 cubic meters or 20 cubic feet, a minimum burn rate less than 5 kilograms per hour or 11 pounds per hour as determined by test procedures prescribed in 40 CFR 60.534, and weigh less than 800 kilograms or 362.9 pounds. Appliances that are described as prefabricated fireplaces and are designed to accommodate doors or other accessories that would create the air starved operating conditions of a residential solid fuel burning device shall be considered as such. Fireplaces are not included in this definition for solid fuel burning devices.

"Road" means any public or private road.

"Salvage Operation" means any business, trade or industry engaged in whole or in part in salvaging or reclaiming any product or material, including metals, chemicals, shipping containers, or drums.

"Secondary Emissions" means emissions which would occur as a result of the construction or operation of a major source or major modification, but do not come from the major source or major modification itself.

Secondary emissions shall be specific, well defined, quantifiable, and impact the same general area as the source or modification which causes the secondary emissions. Secondary emissions include emissions from any off-site support facility which would not be constructed or increase its emissions except as a result of the construction or operation of the major source or major modification. Secondary emissions do not include any emissions which come directly from a mobile source including emissions from the tailpipe of a motor vehicle, from a train, or from a vessel.

Fugitive emissions and fugitive dust from the source or modification are not considered secondary emissions.

"Secondary PM2.5" means particles that form or grow in mass through chemical reactions in the ambient air well after dilution and condensation have occurred. Secondary PM2.5 is usually formed at some distance downwind from the source.

"Significant" means:

(1) In reference to a net emissions increase or the potential of a source to emit any of the following pollutants, a rate of emissions that would equal or exceed any of the following rates:

Carbon monoxide: 100 ton per year (tpy);

Nitrogen oxides: 40 tpy;

Sulfur dioxide: 40 tpy;

PM10: 15 tpy;

PM2.5: 10 tpy;

Particulate matter: 25 tpy;

Ozone: 40 tpy of volatile organic compounds; or

Lead: 0.6 tpy.

"Solid Fuel" means wood, coal, and other similar organic material or combination of these materials.

"Solvent" means organic materials which are liquid at standard conditions, Standard Temperature and Pressure, and which are used as dissolvers, viscosity reducers, or cleaning agents.

"Source" means any structure, building, facility, or installation which emits or may emit any air pollutant subject to regulation under the Clean Air Act and which is located on one or more continuous or adjacent properties and which is under the control of the same person under common control. A building, structure, facility, or installation means any of the pollutant-emitting activities which belong to the same industrial grouping. Pollutant-emitting activities shall be considered as part of the same industrial grouping if they belong to the same "Major Group" which have the same two-digit code as described in the Standard Industrial Classification Manual, 1972, as amended by the 1977 Supplement, US Government Printing Office stock numbers 4101-0065 and 003-005-00176-0, respectively.

"Stack" means any point in a source designed to emit solids, liquids, or gases into the air, including a pipe or duct but not including flares.

"Standards of Performance for New Stationary Sources" means the federally established requirements for performance and record keeping, Title 40 Code of Federal Regulations, Part 60.

"Temporary" means not more than 180 calendar days.

"Temporary Clean Coal Technology Demonstration Project" means a clean coal technology demonstration project that is operated for a period of five years or less, and which complies with the Utah State Implementation Plan and other requirements necessary to attain and maintain the national ambient air quality standards during the project and after it is terminated.

"Threshold Limit Value - Ceiling (TLV-C)" means the airborne concentration of a substance which may not be exceeded, as adopted by the American Conference of Governmental Industrial Hygienists in its "Threshold Limit Values for Chemical Substances and Physical Agents and Biological Exposure Indices, (2009)."

"Threshold Limit Value - Time Weighted Average (TLV-TWA)" means the time-weighted airborne concentration of a substance adopted by the American Conference of Governmental Industrial Hygienists in its "Threshold Limit Values for Chemical Substances and Physical Agents and Biological Exposure Indices, (2009)."

"Total Suspended Particulate (TSP)" means minute separate particles of matter, collected by high volume sampler.

"Toxic Screening Level" means an ambient concentration of an air pollutant equal to a threshold limit value - ceiling (TLV- C) or threshold limit value -time weighted average (TLV-TWA) divided by a safety factor.

"Trash" means solids not considered to be highly flammable or explosive including clothing, rags, leather, plastic, rubber, floor coverings, excelsior, tree leaves, yard trimmings, and other similar materials.

"VOC content" means the weight of VOC per volume of material and is calculated by the following equation in gram/liter, pound/gallon, or pound/pound:

Grams of VOC per Liter of Material = Ws- Ww - Wes / Vm

Where:

Ws = weight of volatile organic compounds

Ww = weight of water

Wes = weight of exempt compounds

Vm = volume of material

"Volatile Organic Compound (VOC)" means VOC as defined in 40 CFR 51.100(s), effective as of the date referenced in Section R307-101-3, is incorporated by reference.

"Waste" means any solid, liquid or gaseous material, including garbage, trash, household refuse, construction or demolition debris, or other refuse including that resulting from the prosecution of any business, trade or industry.

"Zero Drift" means the change in the instrument meter readout over a stated period of normal continuous operation when the VOC concentration at the time of measurement is zero.

**R307-101-3. Version of Code of Federal Regulations Incorporated by Reference.**

Except as specifically identified in an individual rule, the version of the Code of Federal Regulations (CFR) incorporated throughout Title R307 is dated July 1, 2024.

**KEY: air pollution, definitions**

**Date of Last Change: November 6, 2024**

**Notice of Continuation: November 1, 2023**

**Authorizing, and Implemented or Interpreted Law: 19-2-104(1)(a)**