

Adopted Amendments to Division 228

DIVISION 228
Mercury Rules for Coal-Fired Power Plants
Utility Mercury Rule
General Provisions

340-228-0606

Hg Emission Standards

(1) Mercury reduction plan. By July 1, 2009 or 1-year prior to commencement of commercial operation, whichever is later, the owner or operator of each coal-fired electric generating unit must develop and submit for Department approval a mercury reduction plan for each coal-fired electric generating unit. The plan must propose a control strategy for mercury that is most likely to result in the capture of at least 90 percent of the mercury emitted from the unit or that will limit mercury emissions to 0.60 pounds per trillion BTU of heat input. The owner or operator must demonstrate that the plan reflects technology that could reasonably be expected to meet the limits in this section if the technology operates as anticipated by the manufacturer. The plan must provide a timeframe for implementation of the selected control strategy including major milestones, installation and operation requirements, and work practice standards for the selected technology. The owner and operator of the coal-fired electric generating unit may proceed with the plan within 60 days of submittal unless, within the 60 day period, the Department notifies the owner or operator of the coal-fired electric generating unit that the plan must be revised.

(2) Mercury emission standards. On and after July 1, 2012 or at commencement of commercial startup, whichever is later, except as allowed under section (3) of this rule, each coal-fired electric generating unit must have implemented the approved control strategy projected to achieve at least 90 percent mercury capture or that will limit mercury emissions to 0.60 pounds per trillion BTU of heat input.

(3) Compliance extension. Up to a ~~1~~2-year extension of the requirement to implement the approved control strategy may be granted by the Department if the owner or operator of a coal-fired electric generating unit demonstrates that it is not practical to install mercury control equipment by July 1, 2012 due to supply limitations, [ESP fly ash contamination](#), or other extenuating circumstances that are beyond the control of the owner or operator.

(4) Compliance demonstration. Commencing in July 2013 or 12 months after commercial startup or 12 months after expiration of the extension granted under section (3) of this rule, whichever is later, each coal-fired electric generating unit must thereafter demonstrate compliance with one of the standards in subsections (4)(a) or (4)(b) of this rule for each compliance period, except as allowed under sections (5) and (6) of this rule. A compliance period consists of twelve months. Each month commencing with June 2013 or the twelfth month after commencement of commercial operation or twelfth month after expiration of the extension granted under section (3) of this rule, whichever is later, is the end of a compliance period consisting of that month and the previous 11 months.

(a) A mercury emission standard of 0.60 pounds per trillion BTU of heat input calculated by dividing the Hg mass emissions determined using a mercury CEMS or sorbent trap monitoring system by heat input as determined according to 40 CFR part 75, appendix F (procedure 5); or

(b) A minimum 90 percent capture of inlet mercury determined as follows:

(A) Inlet mercury must be determined as specified in subparagraph (4)(b)(A)(i) or (4)(b)(A)(ii) of this rule:

(i) Coal sampling and analysis. To demonstrate compliance by coal sampling and analysis, the owner or operator of a coal-fired electric generating unit must test its coal for mercury consistent with a coal sampling and analysis plan. The coal sampling and analysis plan must be consistent with the requirements of 40 CFR 63.7521.

(ii) Hg mass emissions prior to any control device(s). To demonstrate compliance by measuring Hg mass emissions, the owner or operator of a coal-fired electric generating unit must measure mercury emissions prior to any control device(s) using a Hg CEMS or sorbent trap.

(B) The mercury capture efficiency must be calculated using the Hg emissions determined using a mercury CEMS or sorbent trap monitoring system and the inlet mercury determined using the coal mercury content data obtained in accordance with subparagraph (4)(b)(A)(i) of this rule or the measured inlet mercury data obtained in accordance with subparagraph (4)(b)(A)(ii) of this rule and a calculation methodology approved by the Department.

(5) Temporary compliance alternative. If the owner or operator of a coal-fired electric generating unit properly implements the approved control strategy and the strategy fails to achieve at least 90 percent mercury capture or limit mercury emissions to 0.60 pounds per trillion BTU of heat input:

(a) The owner or operator must notify the Department of the failure within 30 days of the end of the initial compliance period; and

(b) The owner or operator must file an application with the Department for a permit or permit modification in accordance with OAR 340 division 216 to establish a temporary alternative mercury emission limit. The application must be filed within 60 days of the end of the initial compliance period, and must include a continual program of mercury control progression able to achieve at least 90 percent mercury capture or to limit mercury emissions to 0.60 pounds per trillion BTU of heat input and all monitoring and operating data for the coal-fired electric generating unit.

(c) The Department may establish a temporary alternative mercury emission limit only if the owner or operator applies for a permit or permit modification, that includes a control strategy that the Department determines constitutes a continual program of mercury control progression able to achieve at least 90 percent mercury capture or to limit mercury emissions to 0.60 pounds per trillion BTU of heat input.

(d) Establishment of a temporary alternative mercury emission limit requires public notice in accordance with OAR 340 division 209 for Category III permit actions

(e) If the owner or operator files an application under subsection (5)(b) of this rule, the coal-fired electric generating unit must operate according to the temporary alternative mercury emission limit proposed in the permit or permit modification application until the Department either denies the application or issues the permit or permit modification. Compliance with the proposed temporary alternative mercury emission limit prior to final Department action on the application shall constitute compliance with the limits in section (2) of this rule.

(f) A temporary alternative mercury emission limit established in a permit expires July 1, 2015~~6~~ or within 2 years of commencement of commercial operation, whichever is later.

(6) Permanent compliance alternative. If the owner or operator of a coal-fired electric generating unit is unable to achieve at least 90 percent mercury capture or an emission level of 0.60 pounds per trillion BTU of heat input by July 1, 2015~~6~~ or within 2 years of commencement of commercial operation, whichever is later, despite properly implementing the continual program of mercury progression required in section (5) of this rule:

(a) The owner or operator of the coal-fired electric generating unit may file an application with the Department for a permit modification in accordance with OAR 340 division 216 to establish a permanent alternative mercury emission limit that comes as near as technically possible to achieving 90 percent mercury capture or an emission level of 0.60 pounds per trillion BTU of heat input.

(b) The Department may establish a permanent alternative mercury emission limit only if the owner or operator applies for a permit modification, that proposes an alternative mercury emission limit that the Department determines comes as near as technically possible to achieving 90 percent mercury capture or an emission level of 0.60 pounds per trillion BTU of heat input.

(c) Establishment of a permanent alternative mercury emission limit requires public notice in accordance with OAR 340 division 209 for Category IV permit actions.

(d) If the owner or operator files an application under subsection (6)(a) of this rule, the coal-fired electric generating unit must operate according to the permanent alternative mercury emission limit proposed in the permit modification application until the Department either denies the application or modifies the permit. Compliance with the proposed permanent alternative mercury emission limit prior to final Department action on the application shall constitute compliance with the limits in section (4) of this rule.

(7) Emission Caps. Beginning in calendar year 2018, the following coal-fired electric generating unit specific emission caps shall apply.

(a) Existing Boardman coal-fired electric generating unit cap. The existing coal-fired electric generating unit in Boardman shall emit no more than:

(A) 60 pounds of mercury in any calendar year in which there are no new coal-fired electric generating units operated in Oregon.

(B) 35 pounds of mercury in any calendar year in which there are new coal-fired electric generating units operated in Oregon.

(b) New coal-fired electric generating unit cap:

(A) New coal-fired electric generating units, in aggregate, shall emit no more than:

(i) 25 pounds of mercury in any calendar year in which the existing coal-fired electric generating unit in Boardman is operated.

(ii) 60 pounds of mercury in any calendar year in which the existing coal-fired electric generating unit in Boardman is not operated.

(B) The owner or operator of each new coal-fired electric generating unit must submit to the Department a request, in a format specified by the Department, to receive a portion of the new coal-fired electric generating unit cap. The request may not be submitted until the new coal-fired electric generating unit has received its Site Certification from the Facility Siting Council, or if the new coal-fired electric generating unit is not required to obtain a Site Certificate, all governmental approvals necessary to commence construction.

(C) The Department will allocate the new coal-fired electric generating unit cap in order of receipt of requests and, once allocated, the new coal-fired electric generating unit shall be entitled to receive an equal allocation in future years unless the new coal-fired electric generating unit permanently ceases operations.

(D) Each individual new coal-fired electric generating unit shall emit no more than the lesser of:

(i) An amount of mercury determined by multiplying the design heat input in TBtu of such coal-fired electric generating unit by 0.60 pounds per TBtu rounded to the nearest pound as appropriate,

or

(ii) The amount of the emission cap under (7)(b) less the amount of the emission cap under (7)(b) that has been allocated to other new coal-fired electric generating units.

(c) Compliance demonstration. Each coal-fired electric generating unit must demonstrate compliance with the applicable calendar year emission cap in subsection (7)(a) or (7)(b) of this rule using a mercury CEMS or sorbent trap monitoring system.

(5) Recordkeeping and reporting requirements.

(a) Unless otherwise provided, the owners and operators of the Hg Budget source and each Hg Budget unit at the source must keep on site at the source each of the following documents for a period of 5 years from the date the document is created. This period may be extended for cause, at any time before the end of 5 years, in writing by the Department or the Administrator.

(A) The certificate of representation under OAR 340-228-0618 for the Hg designated representative for the source and each Hg Budget unit at the source and all documents that demonstrate the truth of the statements in the certificate of representation; provided that the certificate and documents are retained on site at the source beyond such 5-year period until such documents are superseded because of the submission of a new certificate of representation under OAR 340-228-0618 changing the Hg designated representative.

(B) All emissions monitoring information, in accordance with OAR 340-228-0658 through 0670, provided that to the extent that OAR 340-228-0658 through 0670 provides for a 3-year period for recordkeeping, the 3-year period applies.

(C) Copies of all reports, compliance certifications, and other submissions and all records made or required under the Hg Budget Trading Program.

(D) Copies of all documents used to complete a Hg Budget permit application and any other submission under the Hg Budget Trading Program or to demonstrate compliance with the requirements of the Hg Budget Trading Program.

(b) The Hg designated representative of a Hg Budget source and each Hg Budget unit at the source must submit the reports required under the Hg Budget Trading Program, including those under OAR 340-228-0658 through 0670.

(6) Liability.

(a) Each Hg Budget source and each Hg Budget unit must meet the requirements of the Hg Budget Trading Program for the control periods of 2010 through 2017.

(b) Any provision of the Hg Budget Trading Program that applies to a Hg Budget source or the Hg designated representative of a Hg Budget source also applies to the owners and operators of such source and of the Hg Budget units at the source.

(c) Any provision of the Hg Budget Trading Program that applies to a Hg Budget unit or the Hg designated representative of a Hg Budget unit also applies to the owners and operators of such unit.

(7) Effect on other authorities. No provision of the Hg Budget Trading Program, a Hg Budget permit application, a Hg Budget permit, or an exemption under OAR 340-228-0605 must be construed as exempting or excluding the owners and operators, and the Hg designated representative, of a Hg Budget source or Hg Budget unit from compliance with any other provision of the applicable, approved State implementation plan, a Federally enforceable permit, or the CAA.

Stat. Auth.: ORS 468.020 & 468A.310

Stats. Implemented: ORS 468A.025

Hist.: DEQ 13-2006, f. & cert. ef. 12-22-06; DEQ 15-2008, f. & cert. ef. 12-31-08