

**WAC 173-400-040 General standards for maximum emissions. (1)**

**General requirements.**

(a) All sources and emissions units are required to meet the emission standards of this chapter. Where an emission standard listed in another chapter is applicable to a specific emissions unit, such standard takes precedence over a general emission standard listed in this chapter.

(b) When two or more emissions units are connected to a common stack and the operator elects not to provide the means or facilities to sample emissions from the individual emissions units, and the relative contributions of the individual emissions units to the common discharge are not readily distinguishable, then the emissions of the common stack must meet the most restrictive standard of any of the connected emissions units.

(c) All emissions units are required to use reasonably available control technology (RACT) which may be determined for some sources or source categories to be more stringent than the applicable emission limitations of any chapter of Title 173 WAC. Where current controls are determined to be less than RACT, the permitting authority shall, as provided in RCW 70.94.154, define RACT for each source or source category and issue a rule or regulatory order requiring the installation of RACT.

(2) **Visible emissions.** No person shall cause or allow the emission for more than three minutes, in any one hour, of an air contaminant from any emissions unit which at the emission point, or within a reasonable distance of the emission point, exceeds twenty percent opacity as determined by ecology method 9A. The following are exceptions to this standard:

(a) Soot blowing or grate cleaning alternate visible emission standard.

(i) This provision is in effect until the effective date of EPA's removal of the September 20, 1993, version of WAC 173-400-107 from the SIP. The opacity emission standard in subsection (2) of this section shall apply except when the emissions occur due to soot blowing/grate cleaning and the operator can demonstrate that the emissions will not exceed twenty percent opacity for more than fifteen minutes in any eight consecutive hours. The intent of this provision is to allow the soot blowing and grate cleaning necessary to the operation of boiler facilities. This practice, except for testing and trouble shooting, is to be scheduled for the same approximate times each day and the permitting authority must be advised of the schedule.

(ii) This provision takes effect on the effective date of EPA's removal of the September 20, 1993, version of WAC 173-400-107 from the SIP. For emissions that occur due to soot blowing or grate cleaning of a hog fuel or wood-fired boiler: Visible emissions (as determined by ecology method 9A) shall not exceed twenty percent opacity; except that opacity shall not exceed forty percent for up to a fifteen minute period in any eight consecutive hours. For this provision to apply, the owner or operator must:

(A) Schedule the soot blowing and/or grate cleaning for the same approximate time(s) each day;

(B) Notify the permitting authority in writing of the schedule before using the forty percent standard; and

(C) Maintain contemporaneous records sufficient to demonstrate compliance. Records must include the date, start time, and stop time of each episode, and the results of opacity readings conducted during this time.

(b) When the owner or operator of a source supplies valid data to show that the presence of uncombined water is the only reason for the opacity to exceed twenty percent or an alternative opacity standard established in this section.

(c) When two or more emission units are connected to a common stack, the permitting authority may allow or require the use of an alternate time period if it is more representative of normal operations.

(d) When an alternative opacity limit has been established per RCW 70.94.331 (2)(c), WAC 173-400-081(4) or 173-400-082.

(e) Alternative visible emission standard for a hog fuel or wood-fired boiler in operation before January 24, 2018. This provision takes effect on the effective date of EPA's removal of the September 20, 1993, version of WAC 173-400-107 from the SIP. For emissions that occur due to planned startup or shutdown of a hog fuel or wood-fired boiler with dry particulate matter controls, an owner or operator may use the alternative standard in this subsection when all of the following requirements are met.

Note: This subsection does not apply to a combustion unit with wet particulate matter controls.

(i) A planned startup or shutdown means that the owner or operator notifies the permitting authority:

(A) At least twenty-four hours prior to the planned boiler startup or shutdown; or

(B) Within two hours after restarting the boiler for a startup within twenty-four hours after the end of an unplanned shutdown (i.e., malfunction or upset).

Note: A shutdown due to a malfunction is part of the malfunction.

(ii) Startup begins when fuel is ignited in the boiler fire box.

(iii) Startup ends:

(A) When the boiler starts supplying useful thermal energy; or

(B) Four hours after the boiler starts supplying useful thermal energy if the facility follows the work practices in (e)(vi)(B) of this subsection.

(iv) Shutdown begins when the boiler no longer supplies useful thermal energy, or when no fuel is being fed to the boiler or process heater, whichever is earlier.

(v) Shutdown ends when the boiler or process heater no longer supplies useful thermal energy and no fuel is being combusted in the boiler.

(vi) The facility complies with one of the following requirements:

(A) Visible emissions during startup or shutdown shall not exceed forty percent opacity for more than three minutes in any hour, as determined by ecology method 9A; or

(B) During startup or shutdown, the owner or operator shall:

(I) Operate all continuous monitoring systems;

(II) In the boiler, use only clean fuel identified in 5.b. in Table 3 in 40 C.F.R. Part 63, Subpart DDDDD;

(III) Engage all applicable control devices so as to comply with the twenty percent opacity standard within four hours of the start of supplying useful thermal energy;

(IV) Engage and operate particulate matter control within one hour of first feeding fuels that are not clean fuels; and

(V) Develop and implement a written startup and shutdown plan. The plan must minimize the startup period according to the manufacturer's recommended procedure. In the absence of manufacturer's recommendation, the owner or operator shall use the recommended startup proce-

dures for a unit of a similar design. The plan must be maintained on-site and available upon request for public inspection.

(vii) The facility maintains records sufficient to demonstrate compliance with (e)(i) through (v) of this subsection. The records must include the following:

(A) The date and time of notification of the permitting authority;

(B) The date and time when startup and shutdown began;

(C) The date and time when startup and shutdown ended;

(D) The compliance option in (e)(vi) of this subsection that was chosen (either (A) or (B)) and documentation of how the conditions of that option were met.

(f) Furnace refractory alternative visible emission standard. This provision takes effect on the effective date of EPA's removal of the September 20, 1993, version of WAC 173-400-107 from the SIP. For emissions that occur during curing of furnace refractory in a lime kiln or boiler, visible emissions (as determined by ecology method 9A) shall not exceed forty percent opacity for more than three minutes in any hour, except when (b) of this subsection applies. For this provision to apply, the owner or operator must meet all of the following requirements:

(i) The total duration of refractory curing shall not exceed thirty-six hours; and

(ii) Use only clean fuel identified in 5.b. in Table 3 in 40 C.F.R. Part 63, Subpart DDDDD; and

(iii) The owner or operator provides a copy of the manufacturer's instructions on curing refractory to the permitting authority; and

(iv) The manufacturer's instructions on curing refractory must be followed, including all instructions on temperature increase rates and holding temperatures and time; and

(v) The emission controls must be engaged as soon as possible during the curing process; and

(vi) The permitting authority must be notified at least one working day prior to the start of the refractory curing process.

(g) Visible emissions reader certification testing. Visible emissions from the "smoke generator" used during testing and certifying visible emission readers are exempt from the twenty percent opacity limit. Testing must follow testing and certification requirements in 40 C.F.R. Part 60, Appendix A, Test Method 9 (in effect on the date in WAC 173-400-025) and Source Test Methods 9A and 9B in *Source Test Manual - Procedures for Compliance Testing*, state of Washington, department of ecology, as of September 20, 2004, on file at ecology.

(h) Military training exercises. Visible emissions during military obscurant training exercises are exempt from the twenty percent opacity limit when the following requirements are met:

(i) No visible emissions shall cross the boundary of the military training site/reservation.

(ii) The operation shall have in place methods, which have been reviewed and approved by the permitting authority, to detect changes in weather that would cause the obscurant to cross the site boundary either during the course of the exercise or prior to the start of the exercise. The approved methods shall include provisions that result in cancellation of the training exercise, cease the use of obscurants during the exercise until weather conditions would allow such training to occur without causing obscurant to leave the site boundary of the military site/reservation.

(i) Firefighter training. Visible emissions from fixed and mobile firefighter training facilities occurring during the training of firefighters are exempt from the twenty percent opacity limit. Compliance with chapter 173-425 WAC is required.

(3) **Fallout.** No person shall cause or allow the emission of particulate matter from any source to be deposited beyond the property under direct control of the owner or operator of the source in sufficient quantity to interfere unreasonably with the use and enjoyment of the property upon which the material is deposited.

(4) **Fugitive emissions.** The owner or operator of any emissions unit engaging in materials handling, construction, demolition or other operation which is a source of fugitive emission:

(a) If located in an attainment area and not impacting any nonattainment area, shall take reasonable precautions to prevent the release of air contaminants from the operation.

(b) If the emissions unit has been identified as a significant contributor to the nonattainment status of a designated nonattainment area, the owner or operator shall be required to use reasonable and available control methods, which shall include any necessary changes in technology, process, or other control strategies to control emissions of the air contaminants for which nonattainment has been designated.

(5) **Odors.** Any person who shall cause or allow the generation of any odor from any source or activity which may unreasonably interfere with any other property owner's use and enjoyment of her or his property must use recognized good practice and procedures to reduce these odors to a reasonable minimum.

(6) **Emissions detrimental to persons or property.** No person shall cause or allow the emission of any air contaminant from any source if it is detrimental to the health, safety, or welfare of any person, or causes damage to property or business.

(7) **Sulfur dioxide.** No person shall cause or allow the emission of a gas containing sulfur dioxide from any emissions unit in excess of one thousand ppm of sulfur dioxide on a dry basis, corrected to seven percent oxygen for combustion sources, and based on the average of any period of sixty consecutive minutes.

(8) **Concealment and masking.** No person shall cause or allow the installation or use of any means which conceals or masks an emission of an air contaminant which would otherwise violate any provisions of this chapter.

(9) **Fugitive dust.**

(a) The owner or operator of a source or activity that generates fugitive dust must take reasonable precautions to prevent that fugitive dust from becoming airborne and must maintain and operate the source to minimize emissions.

(b) The owner or operator of any existing source or activity that generates fugitive dust that has been identified as a significant contributor to a PM-10 or PM-2.5 nonattainment area is required to use reasonably available control technology to control emissions. Significance will be determined by the criteria found in WAC 173-400-113(4).

[Statutory Authority: Chapter 70.94 RCW. WSR 18-17-111 (Order 15-07), § 173-400-040, filed 8/16/18, effective 9/16/18. Statutory Authority: RCW 70.94.152, 70.94.331, 70.94.860. WSR 16-12-099 (Order 16-01), § 173-400-040, filed 5/31/16, effective 7/1/16. Statutory Authority: Chapter 70.94 RCW. WSR 11-06-060 (Order 09-01), § 173-400-040, filed 3/1/11, effective 4/1/11. Statutory Authority: RCW 70.94.152. WSR

05-03-033 (Order 03-07), § 173-400-040, filed 1/10/05, effective 2/10/05. Statutory Authority: Chapter 70.94 RCW, RCW 70.94.141, [70.94.]152, [70.94.]331, [70.94.]510 and 43.21A.080. WSR 01-17-062 (Order 99-06), § 173-400-040, filed 8/15/01, effective 9/15/01. Statutory Authority: [RCW 70.94.331, 70.94.510 and chapter 70.94 RCW.] WSR 00-23-130 (Order 98-27), § 173-400-040, filed 11/22/00, effective 12/23/00. Statutory Authority: Chapter 70.94 RCW. WSR 93-18-007 (Order 93-03), § 173-400-040, filed 8/20/93, effective 9/20/93; WSR 91-05-064 (Order 90-06), § 173-400-040, filed 2/19/91, effective 3/22/91. Statutory Authority: Chapters 43.21A and 70.94 RCW. WSR 83-09-036 (Order DE 83-13), § 173-400-040, filed 4/15/83. Statutory Authority: RCW 70.94.331. WSR 80-11-059 (Order DE 80-14), § 173-400-040, filed 8/20/80. Statutory Authority: RCW 43.21A.080 and 70.94.331. WSR 79-06-012 (Order DE 78-21), § 173-400-040, filed 5/8/79; Order DE 76-38, § 173-400-040, filed 12/21/76. Formerly WAC 18-04-040.]