## **Subpart UU-Standards of Performance for Asphalt Processing and Asphalt Roofing Manufacture**

**Applicability of affected facilities - §60.470** 

Source	All Emissions
General	<ol> <li>Each saturator and each mineral handling and storage facility at asphalt roofing plants; and each asphalt storage tank and each blowing still at asphalt processing plants, petroleum refineries, and asphalt roofing plants.</li> <li>Any saturator or mineral handling and storage facility under paragraph (1) of this section that commences construction or modification after November 18, 1980, is subject to the requirements of this subpart. Any asphalt storage tank or blowing still that processes and/or stores asphalt used for roofing only or for roofing and other purposes, and that commences construction or modification after November 18, 1980, is subject to the requirements of this subpart.</li> <li>Any asphalt storage tank or blowing still that processes and/or stores only nonroofing asphalts and that commences construction or modification after May 26, 1981, is subject to the requirements of this subpart.</li> </ol>

**Standards for particulate matter - §60.472** 

Source	All Emissions
General	<ol> <li>Within 60 days after achieving the maximum production rate at which the affected facility will be operated, but not later than 180 days after initial startup of such facility, no owner or operator subject to the provisions of this subpart shall cause to be discharged into the atmosphere from any asphalt storage tank exhaust gases with opacity greater than 0 percent, except for one consecutive 15-minute period in any 24-hour period when the transfer lines are being blown for clearing. The control device shall not be bypassed during this 15-minute period. If, however, the emissions from any asphalt storage tank(s) are ducted to a control device for a saturator, the combined emissions shall meet the emission limit contained in paragraph (a) of this section during the time the saturator control device is operating. At any other time the asphalt storage tank(s) must meet the opacity limit specified above for storage tanks.</li> <li>Within 60 days after achieving the maximum production rate at which the affected facility will be operated, but not later than 180 days after initial startup of such facility, no owner or operator subject to the provisions of this subpart shall cause to be discharged into the atmosphere from any mineral handling and storage facility emissions with opacity greater than 1 percent.</li> </ol>
Saturator	<ol> <li>Facility shall not emit particulate matter in excess of:         <ul> <li>a.) 0.04 kilograms of particulate per megagram of asphalt shingle or mineral-surfaced roll roofing produced, or</li> <li>b.) 0.4 kilograms per megagram of saturated felt or smooth-surfaced roll roofing produced;</li> </ul> </li> <li>Facility shall not emit exhaust gases with opacity greater than 20 percent; and</li> <li>Facility shall not emit any visible emissions from a saturator capture system for more than 20 percent of any period of consecutive valid observations totaling 60 minutes. Saturators that were constructed before November 18, 1980, and that have not been reconstructed since that date and that become subject to these standards through modification are exempt from the visible emissions standard. Saturators that have been newly constructed or reconstructed since November 18, 1980 are subject to the visible emissions standard.</li> </ol>

Blowing still	1.) Facility shall not emit particulate matter in excess of 0.67 kilograms of particulate per megagram of asphalt charged to the still when a catalyst is added to the still; and
	2.) Facility shall not emit particulate matter in excess of 0.71 kilograms of particulate per megagram of asphalt charged to the still when a catalyst is added to the still and when No. 6 fuel oil is fired in the afterburner; and
	3.) Facility shall not emit particulate matter in excess of 0.60 kilograms of particulate per megagram of asphalt charged to the still during blowing without a catalyst; and
	4.) Facility shall not emit particulate matter in excess of 0.64 kilograms of particulate per megagram of asphalt charged to the still during blowing without a catalyst and when No. 6 fuel oil is fired in the afterburner; and
	5.) Facility shall not emit exhaust gases with an opacity greater than 0 percent unless an opacity limit for the blowing still when fuel oil is used to fire the afterburner has been established by the Administrator in accordance with the procedures in §60.474(k).

**Monitoring of operations - §60.473** 

Source	All Emissions
General	<ol> <li>The industry is exempted from the quarterly reports required under § 60.7(c).</li> <li>The owner/operator is required to record and report the operating temperature of the control device during the performance test and, as required by § 60.7(d), maintain a file of the temperature monitoring results for at least two years.</li> </ol>
Facility using either an electrostatic precipitator or a high velocity air filter to meet the emission limit	Facility shall continuously monitor and record the temperature of the gas at the inlet of the control device. The temperature monitoring instrument shall have an accuracy of $\pm 15^{\circ}$ C over its range.
Facility using an afterburner to meet the emission limit	Facility shall continuously monitor and record the temperature in the combustion zone of the afterburner. The monitoring instrument shall have an accuracy of $\pm 10^{\circ}$ C over its range.
Facility using a control device not mentioned above	Facility shall provide to the Administrator information describing the operation of the control device and the process parameter(s) which would indicate proper operation and maintenance of the device. The Administrator may require continuous monitoring and will determine the process parameters to be monitored.

Test methods and procedures - §60.474

Source	All Emissions
General	<ol> <li>In conducting the performance tests required in §60.8, the owner or operator shall use as reference methods and procedures the test methods in appendix A of this part or other methods and procedures as specified in this section, except as provided in §60.8(b).</li> <li>Facility shall determine compliance with the particulate matter standards in §60.472 as follows:         <ul> <li>The emission rate (E) of particulate matter shall be computed for each run using the following equation:</li> <li>E=(csQsd)(PK)</li> <li>See §60.474 (c) (1) for variables and units.</li> <li>Method 5A shall be used to determine the particulate matter concentration (cs) and volumetric flow rate (Qsd) of the effluent gas. For a saturator, the sampling time and sample volume for each run shall be at least 120 minutes and 3.00 dxcm (106 dxcf), and for the blowing still, at least 90 minutes or the duration of the coating blow or non-coating blow, whichever is greater, and 2.25 dxcm (79.4 dxcf).</li> <li>For the saturator, the asphalt roofing production rate (P) for each run shall be determined as follows: The amount of asphalt roofing produced on the shingle or saturated felt process lines shall be obtained by direct measurement. The asphalt roofing production rate is the amount produced divided by the time taken for the run.</li> <li>For the blowing still, the asphalt charging rate (P) shall be computed for each run using the following equation: P=(Vd)/(K* Θ)</li> <li>See §60.474 (c) (4) for variables and units.</li> <li>Method 9 and the procedures in §60.11 shall be used to determine opacity.</li> </ul> </li> <li>The Administrator will determine compliance with the standards in §60.472(a)(3) by using Method 22, modified so that readings are recorded every 15 seconds for a period of consecutive observations during representative conditions (in accordance with §60.8(c)) totaling 60 minutes. A performance test sha</li></ol>
Saturator	Facility shall conduct performance tests required in § 60.8 as follows:  1.) If the final product is shingle or mineral-surfaced roll roofing, the tests shall be conducted while 106.6-kg (235-lb) shingle is being produced.  2.) If the final product is saturated felt or smooth-surfaced roll roofing, the tests shall be conducted while 6.8-kg (15-lb) felt is being produced.  3.) If the final product is fiberglass shingle, the test shall be conducted while a nominal 100-kg (220-lb) shingle is being produced.