

(c) The storage vessel shall be equipped with a carbon adsorption system, meeting the monitoring requirements of § 63.1303(a), that routes displaced vapors through activated carbon before discharging to the atmosphere. The owner or operator shall replace the existing carbon with fresh carbon upon indication of breakthrough before the next unloading event.

**§ 63.1296 Standards for slabstock flexible polyurethane foam production—HAP ABA equipment leaks.**

Each owner or operator of a new or existing slabstock affected source complying with the emission point specific limitation option provided in § 63.1293(a) shall control HAP ABA emissions from leaks from transfer pumps, valves, connectors, pressure-relief valves, and open-ended lines in accordance with the provisions in this section.

(a) *Pumps.* Each pump in HAP ABA service shall be controlled in accordance with either paragraph (a)(1) or (a)(2) of this section.

(1) The pump shall be a sealless pump, or

(2) Each pump shall be monitored for leaks in accordance with paragraphs (a)(2)(i) and (ii) of this section. Leaks shall be repaired in accordance with paragraph (a)(2)(iii) of this section.

(i) Each pump shall be monitored quarterly to detect leaks by the method specified in § 63.1304(a). If an instrument reading of 10,000 parts per million (ppm) or greater is measured, a leak is detected.

(ii) Each pump shall be checked by visual inspection each calendar week for indications of liquids dripping from the pump seal. If there are indications of liquids dripping from the pump seal, a leak is detected.

(iii) When a leak is detected, it shall be repaired in accordance with the procedures in paragraphs (a)(2)(iii)(A) and (B) of this section, except as provided in paragraph (f) of this section.

(A) The leak shall be repaired as soon as practicable, but not later than 15 calendar days after it is detected.

(B) A first attempt at repair shall be made no later than 5 calendar days after the leak is detected. First attempts at repair include, but are not

limited to, the following practices, where practicable:

(1) Tightening of packing gland nuts.

(2) Ensuring that the seal flush is operating at design pressure and temperature.

(b) *Valves.* Each valve in HAP ABA service shall be monitored for leaks in accordance with paragraph (b)(1) of this section, except as provided in paragraphs (b)(3) and (4) of this section. Leaks shall be repaired in accordance with paragraph (b)(2) of this section.

(1) Each valve shall be monitored quarterly to detect leaks by the method specified in § 63.1304(a). If an instrument reading of 10,000 parts per million or greater is measured, a leak is detected.

(2) When a leak is detected, the owner or operator shall repair the leak in accordance with the procedures in paragraphs (b)(2)(i) and (ii) of this section, except as provided in paragraph (f) of this section.

(i) The leak shall be repaired as soon as practicable, but not later than 15 calendar days after it is detected.

(ii) A first attempt at repair shall be made no later than 5 calendar days after the leak is detected. First attempts at repair include, but are not limited to, the following practices where practicable:

(A) Tightening of bonnet bolts;

(B) Replacement of bonnet bolts;

(C) Tightening of packing gland nuts; and

(D) Injection of lubricant into lubricated packing.

(3) Any valve that is designated as an unsafe-to-monitor valve is exempt from the requirements of paragraphs (b)(1) and (2) of this section if:

(i) 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 paragraphs (b)(1) and (2) of this section; and

(ii) The owner or operator of the valve has a written plan that requires monitoring of the valve as frequently as practicable during safe-to-monitor times. The plan shall also include requirements for repairing leaks as soon as possible after detection.

(iii) The owner or operator shall monitor the unsafe-to-monitor valve in accordance with the written plan, and

(iv) The owner or operator shall repair leaks in accordance with the written plan.

(4) Any valve that is designated as a difficult-to-monitor valve is exempt from the requirements of paragraphs (b)(1) and (2) of this section if:

(i) 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 or it is not accessible at any time in a safe manner;

(ii) The process within which the valve is located is an existing source, or the process within which the valve is located is a new source that has less than 3 percent of the total number of valves designated as difficult to monitor; and

(iii) The owner or operator of the valve develops a written plan that requires monitoring of the valve at least once per calendar year. The plan shall also include requirements for repairing leaks as soon as possible after detection.

(iv) The owner or operator shall monitor the difficult-to-monitor valve in accordance with the written plan, and

(v) The owner or operator shall repair leaks in accordance with the written plan.

(c) *Connectors.* Each connector in HAP ABA service shall be monitored for leaks in accordance with paragraph (c)(1) of this section, except as provided in paragraph (c)(3) of this section. Leaks shall be repaired in accordance with (c)(2) of this section, except as provided in paragraph (c)(4) of this section.

(1) Connectors shall be monitored at the times specified in paragraphs (c)(1)(i) through (iii) of this section to detect leaks by the method specified in § 63.1304(a). If an instrument reading of 10,000 ppm or greater is measured, a leak is detected.

(i) Each connector shall be monitored annually, and

(ii) Each connector that has been opened or has otherwise had the seal broken shall be monitored for leaks within the first 3 months after being returned to HAP ABA service.

(iii) If a leak is detected, the connector shall be monitored for leaks in accordance with paragraph (c)(1) of this section within the first 3 months after its repair.

(2) When a leak is detected, it shall be repaired in accordance with the procedures in paragraphs (c)(2)(i) and (ii) of this section, except as provided in paragraph (c)(4) and paragraph (f) of this section.

(i) The leak shall be repaired as soon as practicable, but no later than 15 calendar days after the leak is detected.

(ii) A first attempt at repair shall be made no later than 5 calendar days after the leak is detected.

(3) Any connector that is designated as an unsafe-to-monitor connector is exempt from the requirements of paragraph (c)(1) of this section if:

(i) The owner or operator determines that the connector is unsafe to monitor because personnel would be exposed to an immediate danger as a result of complying with paragraph (c)(1) of this section; and

(ii) The owner or operator has a written plan that requires monitoring of the connector as frequently as practicable during safe-to-monitor periods.

(4) Any connector that is designated as an unsafe-to-repair connector is exempt from the requirements of paragraph (c)(2) of this section if:

(i) The owner or operator determines that repair personnel would be exposed to an immediate danger as a consequence of complying with paragraph (c)(2) of this section; and

(ii) The connector will be repaired as soon as practicable, but not later than 6 months after the leak was detected.

(d) *Pressure-relief devices.* Each pressure-relief device in HAP ABA service shall be monitored for leaks in accordance with paragraph (d)(1) of this section. Leaks shall be repaired in accordance with paragraph (d)(2) of this section.

(1) Each pressure-relief device in HAP ABA service shall be monitored within 5 calendar days by the method specified in § 63.1304(a) if evidence of a potential leak is found by visual, audible, olfactory, or any other detection method. If an instrument reading of 10,000 ppm or greater is measured, a leak is detected.

(2) When a leak is detected, the leak shall be repaired as soon as practicable, but not later than 15 calendar days after it is detected, except as provided in paragraph (f) of this section. The owner or operator shall make a first attempt at repair no later than 5 calendar days after the leak is detected.

(e) *Open-ended valves or lines.* (1)(i) Each open-ended valve or line in HAP ABA service shall be equipped with a cap, blind flange, plug, or a second valve, except as provided in paragraph (e)(4) of this section.

(ii) The cap, blind flange, plug, or second valve shall seal the open end at all times except during operations requiring process fluid flow through the open-ended valve or line, or during maintenance or repair.

(2) Each open-ended valve or line equipped with a second valve shall be operated in a manner such that the valve on the process fluid end is closed before the second valve is closed.

(3) 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 paragraph (e)(1) of this section at all other times.

(4) Open-ended valves or lines in an emergency shutdown system which are designed to open automatically in the event of a process upset are exempt from the requirements of paragraphs (e)(1), (2), and (3) of this section.

(f) *Delay of repair.* (1) Delay of repair of equipment for which leaks have been detected is allowed for equipment that is isolated from the process and that does not remain in HAP ABA service.

(2) Delay of repair for valves and connectors is also allowed if:

(i) The owner or operator determines that emissions of purged material resulting from immediate repair are greater than the fugitive emissions likely to result from delay of repair, and

(ii) The purged material is collected and destroyed or recovered in a control device when repair procedures are effected.

(3) Delay of repair for pumps is also allowed if repair requires replacing the existing seal design with a sealless pump, and repair is completed as soon

as practicable, but not later than 6 months after the leak was detected.

**§ 63.1297 Standards for slabstock flexible polyurethane foam production—HAP ABA emissions from the production line.**

(a) Each owner or operator of a new or existing slabstock affected source complying with the emission point specific limitation option provided in § 63.1293(a)(1) shall control HAP ABA emissions from the slabstock polyurethane foam production line in accordance with the provisions in this section. Compliance shall be determined on a rolling annual basis as described in paragraph (a)(1) of this section. As an alternative, the owner or operator can determine compliance on a monthly basis, as described in paragraph (a)(2) of this section.

(1) *Rolling annual compliance.* In determining compliance on a rolling annual basis, actual HAP ABA emissions shall be compared to allowable HAP ABA emissions for each consecutive 12-month period. The allowable HAP ABA emission level shall be calculated based on the production for the 12-month period, resulting in a potentially different allowable level for each 12-month period. Compliance shall be determined each month for the previous 12-month period. The compliance requirements are provided in paragraph (b) of this section.

(2) *Monthly compliance alternative.* As an alternative to determining compliance on a rolling annual basis, an owner or operator can determine compliance by comparing actual HAP ABA emissions to allowable HAP ABA emissions for each month. The allowable HAP ABA emission level shall be calculated based on the production for the month, resulting in a potentially different allowable level each month. The requirements for this monthly compliance alternative are provided in paragraph (c) of this section.

(3) Each owner or operator electing to change between the compliance methods described under paragraphs (a)(1) and (a)(2) of this section shall notify the Administrator no later than 180 calendar days prior to the change.