

this location shall be at the exit of the combustion, recovery, or recapture device.

(iii) If the owner or operator does not use a nonepoxide recovery device after extended cookout to reduce epoxide emissions, this location shall be at the exit from the continuous unit operation. For the purpose of these determinations, the primary condenser operating as a reflux condenser on a reactor or distillation column shall be considered part of the unit operation.

(2) The owner or operator of a Group 2 continuous process vent shall recalculate the TRE index value as necessary to determine whether the process vent is Group 1 or Group 2, whenever process changes are made that could reasonably be expected to change the process vent to Group 1. Examples of process changes include, but are not limited to, increases in production capacity or production rate, changes in feedstock type or catalyst type, or whenever there is replacement, removal, or addition of recovery equipment. For purposes of this paragraph, process changes do not include: process upsets; unintentional, temporary process changes; and changes that are within the range on which the original TRE calculation was based.

(i) The TRE index value shall be recalculated based on measurements of process vent stream flow rate, TOC, and nonepoxide organic HAP concentrations, and heating values as specified in the HON process vent group determination procedures in § 63.115(a), (b), (c), and (d), as applicable, or on best engineering assessment of the effects of the change. Engineering assessments shall meet the specifications in § 63.115(d)(1).

(ii) Where the recalculated TRE index value is less than or equal to 1.0, or, where the TRE index value before the process change was greater than 4.0 and the recalculated TRE index value is less than or equal to 4.0 but greater than 1.0, the owner or operator shall submit a report as specified in the process vent reporting and record-keeping provisions in § 63.1430(j) or (k), and shall comply with the appropriate provisions in the process vent control requirements in § 63.1425 by the dates specified in § 63.1422 (the section de-

scribing compliance dates for sources subject to this subpart).

(iii) Where the recalculated TRE index value is greater than 4.0, the owner or operator is not required to submit a report.

(i) *Combination of process vents from batch unit operations and process vents from continuous unit operations.* If an owner or operator combines a process vent from a batch unit operation that is associated with the use of a non-epoxide organic HAP to make or modify the product with a process vent from a continuous unit operation that is associated with the use of a non-epoxide prior to the epoxide control technique, or prior to a nonepoxide recovery device that is after the epoxide control technique, then the provisions in paragraphs (i)(1) and (2) of this section shall apply.

(1) The process vent from the batch unit operation is not required to be included in the group determination required by paragraphs (a) through (e) of this section.

(2) The TRE index value of the combined stream shall be determined in accordance with paragraph (h) of this section, and the TRE index value shall be calculated during a period when non-epoxide organic HAP emissions are being generated by the batch unit operation.

[64 FR 29439, June 1, 1999, as amended at 65 FR 26501, May 8, 2000]

#### § 63.1429 Process vent monitoring requirements.

(a) *Monitoring equipment requirements.* The owner or operator of a process vent that uses a combustion, recovery, or recapture device to comply with the process vent control requirements in § 63.1425(b)(1), (b)(2), (c)(1), (c)(3), or (d) shall install monitoring equipment specified in paragraph (a)(1), (2), (3), (4), (5), (6), or (7) of this section, depending on the type of device used. Also, the owner or operator that uses a recovery or recapture device to comply with § 63.1425(c)(4) shall install monitoring equipment as specified in paragraph (a)(4), (5), (6), or (7) of this section. All monitoring equipment shall be installed, calibrated, maintained, and operated according to manufacturers'

specifications or other written procedures that provide adequate assurance that the equipment would reasonably be expected to monitor accurately.

(1) Where an incinerator is used, a temperature monitoring device equipped with a continuous recorder is required.

(i) Where an incinerator other than a catalytic incinerator is used, a temperature monitoring device shall be installed in the firebox or in the ductwork immediately downstream of the firebox in a position before any substantial heat exchange occurs.

(ii) Where a catalytic incinerator is used, temperature monitoring devices shall be installed in the gas stream immediately before and after the catalyst bed.

(2) Where a flare is used, the following monitoring equipment is required: a device (including but not limited to a thermocouple, ultra-violet beam sensor, or infrared sensor) capable of continuously detecting the presence of a pilot flame.

(3) Where a boiler or process heater of less than 44 megawatts design heat input capacity is used, the following monitoring equipment is required: a temperature monitoring device in the firebox equipped with a continuous recorder. Any boiler or process heater in which all process vent streams are introduced with primary fuel or are used as the primary fuel is exempt from this requirement.

(4) Where an absorber is used, a scrubbing liquid flow rate meter or a pressure monitoring device is required and should be equipped with a continuous recorder. If an acid or base absorbent is used, a pH monitoring device to monitor scrubber effluent is also required. If two or more absorbers in series are used, a scrubbing liquid flow rate meter, or a pressure monitoring device, equipped with a continuous recorder, is required for each absorber in the series. An owner or operator may submit a request to instead install the scrubbing liquid flow rate meter, or a pressure monitoring device, equipped with a continuous recorder, on only the final absorber in a series, in accordance with the alternative parameter monitoring reporting requirements in § 63.1439(f).

(5) Where a condenser is used, a condenser exit temperature (product side) monitoring device equipped with a continuous recorder is required.

(6) Where a carbon adsorber is used, an integrating regeneration stream flow monitoring device having an accuracy of +10 percent or better, capable of recording the total regeneration stream mass or volumetric flow for each regeneration cycle, and a carbon bed temperature monitoring device, capable of recording the carbon bed temperature after each regeneration and within 15 minutes of completing any cooling cycle are required.

(7) As an alternative to paragraphs (a)(4) through (6) of this section, the owner or operator may install an organic monitoring device equipped with a continuous recorder.

(b) *Alternative parameters.* An owner or operator of a process vent may request approval to monitor parameters other than those listed in paragraph (a) of this section. The request shall be submitted according to the procedures specified in the process vent reporting and recordkeeping requirements in § 63.1430(j) and the alternative parameter monitoring reporting requirements in § 63.1439(f). Approval shall be requested if the owner or operator:

(1) Uses a combustion device other than an incinerator, boiler, process heater, or flare; or

(2) For a Group 2 continuous process vent, maintains a TRE greater than 1.0 but less than or equal to 4.0 without a recovery device or with a recovery device other than the recovery devices listed in paragraph (a) of this section; or

(3) Uses one of the combustion, recovery, or recapture devices listed in paragraph (a) of this section, but seeks to monitor a parameter other than those specified in paragraph (a) of this section.

(c) *Monitoring of bypass lines.* The owner or operator of a process vent using a process vent system that contains bypass lines that could divert a process vent stream away from the combustion, recovery, or recapture device used to comply with the process vent control requirements in § 63.1425(b), (c), or (d) shall comply with paragraph (c)(1) or (2) of this section.

Equipment such as low leg drains, high point bleeds, analyzer vents, opened valves or lines, and pressure relief valves needed for safety purposes are not subject to paragraphs (c)(1) or (2) of this section.

(1) Properly install, maintain, and operate a flow indicator that takes a reading at least once at approximately equal intervals of about 15 minutes. Records shall be generated as specified in the process vent reporting and recordkeeping provisions in § 63.1430(d)(3). The flow indicator shall be installed at the entrance to any bypass line that could divert emissions away from the combustion, recovery, or recapture device and to the atmosphere; or

(2) Secure the bypass line valve in the non-diverting position with a car-seal or a lock-and-key type configuration. A visual inspection of the seal or closure mechanism shall be performed at least once every month to ensure that the valve is maintained in the non-diverting position and emissions are not diverted through the bypass line. Records shall be generated as specified in the process vent reporting and recordkeeping provisions in § 63.1430(d)(4)(i).

(d) *Establishment of parameter monitoring levels.* Parameter monitoring levels for process vents from continuous or batch unit operations using a combustion, recovery, or recapture device to comply with the process vent control requirements in § 63.1425(b), (c), or (d) shall be established as specified in paragraphs (d)(1) through (3) of this section.

(1) For each parameter monitored under paragraph (a) or (b) of this section, the owner or operator shall establish a level, defined as either a maximum or minimum operating parameter as denoted in Table 5 of this subpart (the table listing the monitoring, recordkeeping, and reporting requirements for process vents from batch unit operations), that indicates that the combustion, recovery, or recapture device is operated in a manner to ensure compliance with the provisions of this subpart. The level shall be established in accordance with the procedures specified in the process vent control requirements in § 63.1430(d). The level may be based upon a prior per-

formance test conducted for determining compliance with a regulation promulgated by the EPA, and the owner or operator is not required to conduct a performance test under the process vent requirements for determining organic HAP concentration, control efficiency, and aggregated organic HAP emission reductions in § 63.1426, provided that the prior performance test meets the conditions of § 63.1426(b)(3).

(2) The established level, along with supporting documentation, shall be submitted in the Notification of Compliance Status or the operating permit application as required in the Notification of Compliance Status requirements in § 63.1439(e)(5) or in the operating permit application requirements in § 63.1439(e)(8), respectively.

(3) The operating day shall be defined as part of establishing the parameter monitoring level and shall be submitted with the information in paragraph (d)(2) of this section. The definition of operating day shall specify the time(s) at which an operating day begins and ends.

**§ 63.1430 Process vent reporting and recordkeeping requirements.**

(a) [Reserved]

(b) *Records to demonstrate compliance.* The owner or operator complying with the process vent control requirements in § 63.1425(b), (c), or (d) shall keep the following records, as applicable, readily accessible:

(1) When using a flare to comply with the process vent control requirements in § 63.1425(b)(2)(i), (c)(1)(i), (c)(3)(i), or (d)(1):

(i) The flare design (i.e., steam-assisted, air-assisted, or non-assisted);

(ii) All visible emission readings, heat content determinations, flow rate determinations, and exit velocity determinations made during the flare specification determination required by § 63.1437(c); and

(iii) All periods during the flare specification determination required by § 63.1437(c) when all pilot flames are absent.

(2) The following information when using a combustion, recovery, or recapture device (other than a flare) to achieve compliance with the process