List of Subjects in 40 CFR Part 82

Environmental protection, Air pollution control, Dynamic test, Industrial process refrigeration, Leak repair, Recordkeeping requirements, Static test.

Dated: January 9, 1995. Carol M. Browner, *Administrator*.

Part 82, chapter I, title 40, of the code of Federal Regulations, is amended to read as follows:

## PART 82—PROTECTION OF STRATOSPHERIC OZONE

1. The authority citation for part 82 continues to read as follows:

Authority: 42 U.S.C. 7414, 7601, 7671–7671q.

2. Section 82.152 is amended by removing the paragraph designations from the definitions and placing them in alphabetical order and by adding the following definitions in alphabetical order:

## §82.152 Definitions.

\* \* \* \* \*

Critical component means for the purposes of § 82.156(i) a component without which an industrial process refrigeration system will not function, will be unsafe in its intended environment, and/or will be subject to failures that would cause the industrial process served by the refrigeration system to be unsafe.

Custom-built means for the purposes of §82.156(i) if the equipment or any of its critical components cannot be purchased and/or installed without being specifically designed, fabricated and/or assembled to satisfy a specific set of industrial process conditions.

Dynamic test means for the purposes of §82.156(i) those tests that involve checking the repairs within 30 days of returning to steady-state operating characteristics. Dynamic tests for equipment from which the refrigerant charge has been evacuated means a test conducted after the appliance or portion of the appliance has resumed operation at steady-state or normal operating conditions of temperature and pressure. A dynamic test with respect to repairs conducted without evacuation of the refrigerant charge means a reverification test conducted after the static test. Where a system is not evacuated, it is only necessary to conclude any required changes in pressure, temperature or other conditions to return the system to a steady-steady for operations.

Full charge means for the purposes of § 82.156(i) the amount of refrigerant

required for steady-state operations of the industrial process refrigeration equipment as determined using one of the following three methods or a combination of one of the following three methods:

(1) The use of the equipment manufacturers' determination of the correct full charge for the equipment;

- (2) Determining the full charge based on the use of appropriate calculations where the owners or operators of a system are able to calculate the full charge based on component sizes, density of refrigerant, volume of piping, and other relevant considerations; and/or
- (3) The use of actual measurements by the owners or operators of the amount of refrigerant added or evacuated from an industrial process refrigeration system.

\* \* \* \* \*

Process shutdown means for the purposes of § 82.156(i) when, for purposes such as maintenance or repair, an industrial process or facility temporarily ceases to operate or manufacture whatever is being produced at the particular facility.

Static test means for the purposes of §82.156(i) those leak tests that are conducted as soon as practicable after the repair is completed. A static test with regard to the leak repairs that require the evacuation of the equipment or portion of the equipment means a test conducted prior to the replacement of the full refrigerant charge and before the appliance or portion of the appliance has reached operation at normal working conditions of temperature and pressure. A static test with regard to repairs conducted without the evacuation of the refrigerant charge means a test conducted as soon as practicable after the conclusion of the repair work.

Steady-state operating characteristics or conditions means for the purposes of § 82.156(i) operating at temperatures, pressures, fluid flows, speeds and other characteristics that would normally be expected for a given process load and ambient condition. Steady-state operating characteristics are marked by the absence of atypical conditions affecting the operation of the refrigeration system.

Suitable replacement refrigerant means for the purposes of § 82.156(i)(2)(i) that a refrigerant is acceptable under section 612(c) of the Clean Air Act Amendments of 1990 and all regulations promulgated under that section, compatible with other materials with which it may come into contact,

and be able to achieve the temperatures required for the affected industrial process in a technically feasible manner.

System mothballing means the intentional shutting down of a refrigerant system undertaken for an extended period of time by the owners or operators of that facility, not for the purposes of servicing or repairing the appliance, where the refrigerant has been evacuated from the appliance or the isolated section of the appliance, at least to atmospheric pressure.

3. Section 82.156 is amended by revising paragraphs (a)(2)(i)(A) and (a)(2)(i)(B), adding a new paragraph (a)(2)(i)(C), and revising paragraph (i) to read as follows:

## §82.156 Required practices.

\* \* \* \* \* (a) \* \* \*

(2)(i) \* \* \*

(A) Be evacuated to a pressure no higher than 0 psig before it is opened if it is a high- or very high-pressure appliance;

(B) Be pressurized to 0 psig before it is opened if it is a low-pressure appliance. Persons pressurizing lowpressure appliances that use refrigerants with boiling points at or below 85 degrees Fahrenheit at 29.9 inches of mercury (standard atmospheric pressure), (e.g., CFC-11 and HCFC-123), must not use methods, such as nitrogen, that require subsequent purging. Persons pressurizing low-pressure appliances that use refrigerants with boiling points above 85 degrees Fahrenheit at 29.9 inches of mercury, e.g., CFC-113, must use heat to raise the internal pressure of the appliance as much as possible, but may use nitrogen to raise the internal pressure of the appliance from the level attainable through use of heat to atmospheric pressure; or

(C) In the case of oil changes, be evacuated or pressurized to a pressure no higher than 5 psig, before it is opened.

\* \* \* \* \*

(i)(1) Owners of commercial refrigeration equipment must have leaks repaired if the equipment is leaking at a rate such that the loss of refrigerant will exceed 35 percent of the total charge during a 12-month period in accordance with paragraph (i)(9) of this section, except as described in paragraphs (i)(6) and (i)(8) of this section and paragraphs (i)(1)(i), (i)(1)(ii), and (i)(1)(iii) of this section. Repairs must bring the annual leak rate to below 35%.