Environmental Compliance Survey Final Report

Prepared for

The Federal Bureau of Prisons FCC Allenwood

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Environmental Compliance Survey of Federal Bureau of Prisons

FCC Allenwood

Performed By Aarcher Inc.

I Executive Summary

A. An environmental compliance survey was conducted by Aarcher Inc. for the Federal Bureau of Prisons; Federal Corrections Complex (FCC) Allenwood, Union County, Pennsylvania. Jay Collert performed the survey for Aarcher Inc. Representatives from the Bureau of Prisons included Robert Scinta, Steven Flannery, Cheryl Howard, Roxanne Mudge and Dave Bostian.

B. The survey was conducted at FCC Allenwood, in White Dear, Pennsylvania. The facility is located in Union County in central Pennsylvania, 2 miles north of Allenwood on U.S. Route 15; 11 miles south of Williamsport; and 197 miles north of Washington, DC.

C. FCC Allenwood consists of 3 active facilities and one inactive facility. The active institutions are a high security facility housing male inmates, a low security FCI housing male inmates and a medium FCI housing male inmates. An adjacent camp is deactivated but is included as part of this survey.

D. According to the pre-survey information data sheet submitted prior to the survey, and the BOP website, FCC Allenwood has an inmate and staff population of approximately 4,780.

E. Draft report comments addressed

   a. A comment concerning survey finding PRI 2 – HW – 001 asked for clarification as to where or which hazardous waste storage building I was referring to. The hazardous waste storage area was actually a room located in the UNICOR warehouse. I have made changes to the finding to clarify the location.

F. The survey was performed using state and federal-specific protocols dated August 2007. Survey findings are categorized into the following areas:

   a. Priority 1: Areas with actual or potential immediate harm to human health or the environment, potential for significant liability, or other potential to inhibit the institution from meeting its mission or the mission of the Federal Bureau of Prisons.

   b. Priority 2: Regulatory findings that are not Priority 1. These include Federal and state laws, regulations, and applicable Executive Orders.

c. Priority 3: Non-regulatory findings that are not Priority 1 or Priority 2.

G. FCC Allenwood is located in Pennsylvania and applicable protocols for that state were used. Items that have no state equivalence or when the state incorporates by reference the Federal requirement, the Federal citation is indicated and used. The compliance areas surveyed and a summary of findings in each of the different levels are as follows:

1. Air Emissions

   a- Priority 1: - 0

   b- Priority 2: - 2

   c- Priority 3: - 0

2. Water Quality

   a- Priority 1: - 0

   b- Priority 2: - 0

   c- Priority 3: - 0

3. Waste water Quality

   a- Priority 1: - 0

   b- Priority 2: - 0

   c- Priority 3: - 0

4. Hazardous Waste Management

   a- Priority 1: - 0

   b- Priority 2: - 5

   c- Priority 3: - 0

5. Universal Waste/Used Oil Management

   a- Priority 1: - 0

   b- Priority 2: - 3

   c- Priority 3: - 0

6. Tank Management/SPCC

a- Priority 1: - 0

b- Priority 2: - 3

c- Priority 3: - 0

7. EPCRA

a- Priority 1: - 0

b- Priority 2: - 1

c- Priority 3: - 0

8. Oils/Hazardous Substances Spills and Reporting

a- Priority 1: - 0

b- Priority 2: - 0

c- Priority 3: - 0

9. Medical/Bio Wastes

a- Priority 1: - 0

b- Priority 2: - 0

c- Priority 3: - 0

10. Environmental Training

a- Priority 1: - 0

b- Priority 2: - 1

c- Priority 3: - 0

11. Miscellaneous Requirements

a- Priority 1: - 0

b- Priority 2: - 1

c- Priority 3: - 0

II Survey Findings – FCC Allenwood

A. Air Emissions

1. **Audit Finding:** PRI 2 – AE – 001: Leak calculations on Refrigerant Equipment

   a- **Activity/Operation**: The institution utilizes staff personnel who repair and recycle equipment that contains refrigerants.

   b- **Requirement**: IAW 40 CFR 82.156(h), owners/operators of refrigerant-containing equipment that contains more than 50 pounds of Class I or Class II refrigerant must calculate the leak rate whenever the refrigerant-containing equipment requires recharging or a repair is necessary.

   c- **Finding**: According to facility personnel, the institution has units that hold more than 50 pounds of refrigerant. And, according to personnel, refrigerant has been added in the past, thereby requiring leak calculations. No leak calculations could be located during the survey.

   d- **Recommendation**: Perform an institution-wide survey to ensure that all equipment holding more than 50lbs of Class I and Class II type refrigerants are identified. Develop a procedure that requires leak rate calculations on all equipment holding more than 50lbs of refrigerants whenever refrigerants are added due to leaks. Train all employees responsible for refrigerant recycling/recovery once those procedures are developed and implemented.

2. **Audit Finding:** PRI 2 – AE – 002: Refrigerant Records

   a- **Activity/Operation**: The institution utilizes staff personnel who repair and recycle systems that contain over 50lbs of refrigerants.

   b- **Requirement**: IAW 40 CFR 82.150(b) and 40 CFR 82.166(n)-(q), owners/operators of refrigerant-containing equipment that contains more than 50 pounds of Class I or Class II refrigerant keep documentation as to how much refrigerant was added. The servicing records must be kept for at least 3 years.

   c- **Finding**: While reviewing the servicing logs, the records for 2005 were not found. Institution personnel indicated that the person who normally handles this task was not at the institution during 2005.

   d- **Recommendation**: Ensure that all servicing records are kept for at least 3 years.

B. Water Quality

1. **No Findings**

C. Waste Water Quality

1. **Audit Finding: No Findings**

D. Hazardous Waste Management

1. **Audit Finding:** PRI 2 – HW – 001: Hazardous Waste Management

   a- **Activity/Operation:** The institute generates hazardous waste as defined by 25 PA Code 261a, which incorporates by reference 40 CFR 261.

   b- **Requirement:** IAW 25 PA Code 262a, which incorporates by reference 40 CFR 262.30 through 40 CFR 262.34 and 40 CFR 265.171, hazardous waste, must be stored in containers marked with the words "hazardous waste". The labels must have the accumulation start date and the containers must be in good condition and not leaking, bulging, rusting or dented. The containers of hazardous waste must be separated to ensure incompatible wastes are not stored adjacent to each other.

   c- **Finding:** In the UNICOR hazardous waste storage room, located in the UNICOR warehouse, a pallet holding containers of hazardous waste was not labeled, dated, or otherwise classified. The containers were actually product containers. Some of the containers were not in good condition. The wastes were not classified so an incompatible determination was not possible.

   d- **Recommendation:** Develop a procedure for moving wastes from a satellite accumulation point or from the point the materials become a waste to the container storage area. Once developed, train all institution personnel responsible for moving wastes and managing the container storage area.

2. **Audit Finding:** PRI 2 – HW – 002: Hazardous Waste Management

   a- **Activity/Operation:** The institute generates hazardous waste as defined by 25 PA Code 261a, which incorporates by reference 40 CFR 261.

   b- **Requirement:** IAW 25 PA Code 262a, which incorporates by reference 40 CFR 262.30 through 40 CFR 262.34 and 40 CFR 265.171, hazardous waste, must be stored in a safe manner. The hazardous waste regulations refer to 29 CFR 1910.106(d) when storing flammable or combustible liquids. Those requirements include the following:

   - Self closing fire doors (NFPA 80)

- Proper signage indicating flammable and combustible storage inside the room

- Electrical wiring and equipment that meet NFPA 70 requirements

- An exhaust system that provides for six changes of air in the room per hour

- A mechanical switch that is activated outside the door and operates simultaneously with a light switch, if one is installed, and a pilot light illuminates indicating the exhaust system is operating

c- **Finding:** In the UNICOR hazardous waste building, flammable and combustible hazardous wastes are stored. The room is not fully compliant with NFPA standards.

d- **Recommendation:** Perform an inspection of the hazardous waste storage roomn with an NFPA trained inspector to determine what deficiencies exist and correct those deficiencies.

3. **Audit Finding:** PRI 2 – HW – 003: Hazardous Waste Management

a- **Activity/Operation:** The institute generates hazardous waste as defined by 25 PA Code 261a, which incorporates by reference 40 CFR 261.

b- **Requirement:** IAW 25 PA Code 262a, which incorporates by reference 40 CFR 262.30 through 40 CFR 262.34 and 40 CFR 265.171, hazardous waste, must be stored in containers marked with the words “hazardous waste”. The labels must have the accumulation start date and the containers must be in good condition and not leaking, bulging, rusting or dented and must be stored safely. The containers of hazardous waste must be classified to ensure incompatible wastes are not stored adjacent to each other.

c- **Finding:** At the inactive camp hazardous waste building, containers of hazardous waste were not labeled, dated, or formally classified. The containers were actually product containers. Some of the containers were not in good condition. Incompatible wastes were stored within the building. Flammable wastes were stored in the building and the building did not meet NFPA standards for a flammable storage building. Those requirements include the following:

- Self closing fire doors (NFPA 80)

- Electrical wiring and equipment that meet NFPA 70 requirements

- An exhaust system that provides for six changes of air in the room per hour

- A mechanical switch that is activated outside the door and operates simultaneously with a light switch, if one is installed, and a pilot light illuminates indicating the exhaust system is operating

d- **Recommendation:** Develop a procedure for moving wastes from a satellite accumulation point or from the point the materials become a waste to the container storage area. Once developed, train all institution personnel responsible for moving wastes and managing the container storage area. Since this is an inactive site, suggest a facility-wide inspection of all hazardous wastes with coordination by a licensed transporter and TSD facility so that all hazardous waste may be picked up at the same time. If this storage building is to be used for future hazardous wastes that are ignitable, perform an inspection with an NFPA trained inspector to determine what deficiencies exist with the hazardous waste storage room and correct those deficiencies.

4. **Audit Finding:** PRI 2 – HW – 004: Hazardous Waste Management

a- **Activity/Operation:** The institute generates hazardous waste as defined by 25 PA Code 261a, which incorporates by reference 40 CFR 261.

b- **Requirement:** IAW 25 PA Code 262a, which incorporates by reference 40 CFR 262, which further references 40 CFR 265.171, hazardous waste must be stored in a closed container except when adding or removing the hazardous waste.

c- **Finding:** In the FCI paint shop, an open container of hazardous waste was found.

d- **Recommendation:** Train all institution personnel on the storage requirements of hazardous waste, and specifically, that all waste must be stored in closed containers.

5. **Audit Finding:** PRI 2 – HW – 005: Hazardous Waste Management

a- **Activity/Operation:** The institute generates hazardous waste as defined by 25 PA Code 261a, which incorporates by reference 40 CFR 261.

b- **Requirement:** IAW 25 PA Code 265 which incorporate by reference 40 CFR 265.174, a weekly inspection must be performed at the hazardous waste container storage areas. The record of the weekly inspections must be maintained at least 3 years.

c- **Finding:** In the UNICOR warehouse hazardous waste storage room, no record of a weekly inspection could be located.

d- **Recommendation:** Ensure institution personnel responsible for the management of hazardous waste are aware of the weekly inspection

requirements and that a checklist, which will serve as a record of the inspections, is developed as soon as practicable. Ensure all records are kept a minimum of three years.

E. Universal Waste/Waste Oil Management

1. **Audit Finding**: PRI 2 – UW – 001: Waste Oil Labels.

   a- **Activity/Operation**: The facility generates waste oil as defined by 25 PA § 298.10(a).

   b- **Requirement**: IAW 25 PA § 298.22(c)(1-4), labels with the words "waste oil" will be placed on all containers/tanks/pipes holding waste oil. (Federal requirements specify a "used oil" label be placed on all containers. Pennsylvania requirements specify a "waste oil" label be placed on all containers.)

   c- **Finding**: In the FCI paint shop, waste oil was labeled used oil.

   d- **Recommendation**: Procure waste oil labels and ensure all containers/tanks/pipes holding waste oil that is to be recycled are labeled "Waste Oil".

2. **Audit Finding**: PRI 2 – UW – 002: Universal Waste Storage.

   a- **Activity/Operation**: The facility generates universal wastes lamps as defined by 25 PA Code 266b which incorporates by reference 40 CFR 273.

   b- **Requirement**: IAW 25 PA Code 266b, which incorporates by reference 40 CFR 273.13(d) and 40 CFR 273.14, universal wastes lamps must be managed according to specific parameters. The containers must be closed except when adding or removing the universal wastes. The containers must be marked WASTE LAMP(S), USED LAMP(S), or UNIVERSAL WASTE – LAMP(S). The package must be designed so as to prevent breakage during normal handling and storage. The container must be dated or evidence provided that indicates the universal waste has not been stored onsite longer than 1 year.

   c- **Finding**: At the inactive camp garage area, spent fluorescent tubes were found not boxed, unlabeled and not dated.

   d- **Recommendation**: Develop procedures which address the specific requirements for accumulating and storing of universal waste lamps onsite. Train all institution personnel responsible for handling universal waste addressing the procedures developed.

3. **Audit Finding**: PRI 2 – UW – 003: Universal Waste Storage.

   a- **Activity/Operation**: The facility generates universal wastes lamps as defined by 25 PA Code 266b which incorporates by reference 40 CFR 273.

   b- **Requirement**: IAW 25 PA Code 266b, which incorporates by reference 40 CFR 273.13(d) and 40 CFR 273.14, universal wastes lamps must be managed according to specific parameters. The containers must be closed except when adding or removing the universal wastes.

   c- **Finding**: At the FCI Low electric shop, an open box of fluorescent tubes was found.

   d- **Recommendation**: Develop procedures which address the specific requirements for accumulating and storing of universal waste onsite. Train all institution personnel responsible for handling universal waste addressing the procedures developed.

F. Tank Management/SPCC

1. **Audit Finding**: PRI 2 – TM – 001: Inaccurate ICP/SPCC

   a- **Activity/Operation**: The institution stores in above ground containers/tanks over 1,320 gallons of oil/petroleum.

   b- **Requirement**: IAW 40 CFR 112.7, facilities that have more than 1,320 gallons of oil/petroleum in above ground storage tanks must prepare and maintain a Spill Prevention, Controls and Countermeasures Plan (SPCC). The SPCC Plan, at the discretion of the facility, may be combined into an Integrated Contingency Plan as long as all of the SPCC elements are contained in the plan and a cross reference is included if the plan does not follow the order listed in 40 CFR 112.7.

   c- **Finding**: After reviewing the ICP/SPCC Plan, the following items were either missing or not adequately addressed:

      - Does not include the 5 attestations as required by 40 CFR 112.3(d)
      - Emergency generator containers (fuel tanks) not in plan
      - Plan does not follow the sequence of 40 CFR 112.7 and does not have a regulatory cross reference to all 40 CFR 112 requirements (40 CFR 112.7))
      - No requirements to certify amendments in plan

- Does not have a facility diagram that physically marks the location of all containers and their contents. The diagram does not mark all transfer stations and connecting pipes. (40 CFR 112.7(a)(3))

- There are no written inspection procedures in the plan (40 CFR 112.7(e))

- Training of oil handling employees are not described in the plan nor are oil handling employees determined or defined. (40 CFR 112.7(f))

- No statement of conformance

- The plan must reflect the specific requirements relating to security; tank car/tank truck loading and unloading; and facility drainage based on 40 CFR 112.7, or there must be a statement of nonconformance and an applicable environmental equivalency must be written in the plan.

- Downstream notification of likely affected facilities was not included in the plan. This requirement includes a 20-mile downstream Notification List, an annual notification requirement, and an annual Notification List update (Pennsylvania requirement that was included in the ICP – see Finding PRI 2 – TM – 002).

- The ICP does not address container inspection, which must either have specific requirements listed at 40 CFR 112.8(c)(6) or there must be a statement of nonconformance and an applicable environmental equivalency must be written in the plan.

d- **Recommendation**: An SPCC plan should be developed following all of the elements from 40 CFR 112. Once developed, comply with all requirements listed in the SPCC/ICP plan.

2. **Audit Finding**: PRI 2 – TM – 002: Spill Prevention Response Plan

a- **Activity/Operation**: The institution has aggregate storage capacity of over 21,000 gallons of petroleum.

b- **Requirement**: IAW 25 PA § 245.603 which incorporates by reference the PA Storage Tank and Spill Prevention Act (Act 32-1989) and implemented by the PA DEP as part of the Storage Tank Program, the institution is required to develop and maintain a Spill Prevention Response (SPR) Plan. The plan must contain specific information and must be submitted to the county and local Emergency Management Agencies, local fire service agencies and/or HAZMAT team, local emergency medical service agencies, and the local police. For a complete list of requirements for the SPR Plan, see the document "Guidelines for the Development and

Implementation of Environmental Emergency Response Plans", dated August 6th, 2005 which can be found in Section IV.

c- **Finding**: A SPR Plan could not be located during the survey. Reference to downstream notification existed in the ICP, but that plan did not list any of the facilities that required notification nor did the ICP contain any of the other requirements of the SPR Plan.

d- **Recommendation**: Develop and implement a compliant SPR Plan as soon as possible and submit the plan to all the required agencies.

3. **Audit Finding**: PRI 2 – TM – 003: Aboveground Storage Tanks

a- **Activity/Operation**: The institution owns and operates aboveground storage tanks.

b- **Requirement**: IAW 25 PA Code 245.513, operating tanks must perform routine maintenance inspection procedures at each storage tank. The institution is responsible to assure that a visual inspection is performed once every 72 hours. The visual inspection may be accomplished by or supplemented with electronic surveillance and shall include:

- A check of the facility to ensure that no potential hazardous environmental conditions exist. This includes a check for evidence of a release for example, spill, overflow or leakage.

- A check of the containment areas for accumulation of water and a confirmation that containment drain valves are secured in a closed position when not in use. If excessive water has accumulated, it shall be drained off and disposed of in accordance with applicable State and Federal require

c- **Finding**: A number of tanks located in the inactive camp contain materials, are not closed, and are not being properly inspected. Tanks 1, 2, 4, and 5 either have alarms that have been deactivated or indicate trouble and have not been maintained.

d- **Recommendation**: Determine what tanks the institution wants to continue to operate. Develop an inspection procedure which complies with 25 PA Code 245.513. Have a certified PA installer perform maintenance on the alarms out of service. For those tanks the institution does not want to continue to operate, have a certified PA tank installer perform the necessary functions to close the tanks and send that information to the state regulators.

G. Emergency Planning and Community-Right-to-Know (EPCRA)

1. **Audit Finding**: PRI 2-EM-001: EPCRA Section 311/312 Reporting

a- **Activity/Operation**: This facility otherwise uses EPCRA Section 311/312 regulated.

b- **Requirement**: IAW Executive Order 13423, federal facilities must comply with all sections of EPCRA, including Sections 311/312. The Tier II report is an annual report due in March.

c- **Finding**: After reviewing the last Tier II report, #2 Fuel oil and Diesel Fuel were reported as the same chemical. Since the Tier II is based on any chemical having a Material Safety Data Sheets (MSDS) found on site over 10,000 pounds at any one time during a calendar year, and since the #2 fuel oil and diesel have different MSDS sheets, these two chemicals, while similar, are reported separately.

d- **Recommendation**: For future reports, track and report these two materials separately, using the separate MSDS sheets to identify the two materials.

H. Oils and Hazardous Substances Spills and Reporting

1. **No findings found in this area.**

I. Medical/Biohazard Wastes

1. **No findings found in this area**.

J. Environmental Training

1. **Audit Finding**: PRI 2-TNG-001: SPCC Training

a- **Activity/Operation**: The institution stores in above ground containers/tanks over 1,320 gallons of oil/petroleum.

b- **Requirement**: IAW 40 CFR 112.7(f)(3), all oil handling employees must be trained at least once a year to ensure adequate understanding of the SPCC plan.

c- **Finding**: No record of this training could be located at the institution.

d- **Recommendation**: Start training all oil handling employees at least once a year and documents the training and the personnel who attended.

K. Miscellaneous Findings

1. **Audit Finding**: PRI 2-MIF-001: PCB Storage

   a- **Activity/Operation**: The institution is removing and storing PCB wastes (light ballasts).

   b- **Requirement**: IAW 25 PA Code 299.154, PCB wastes must be stored in labeled containers indicating the date the waste was first placed in temporary storage. Temporary storage cannot exceed six months without written approval from the state.

   c- **Finding**: At the inactive camp hazardous waste storage area, approximately 39 light ballasts manufactured pre-1979 were found in storage. The ballasts were stored in plastic bags and buckets. No labels were on the containers and there was no date indicating when the temporary storage started.

   d- **Recommendation**: Move the ballasts into proper containers that are labeled. Arrange for a pickup and disposal of these wastes as soon as practicable. Train all institution personnel responsible for picking up and storing PCB wastes with compliant procedures.

III Federal Rules

The following citations were used to support the findings based on federal regulations. The citations are listed in numeric order.

back within 15 feet of any bulk oxygen storage container.

[39 FR 23502, June 27, 1974, as amended at 43 FR 49746, Oct. 24, 1978; 61 FR 9237, Mar. 7, 1996]

§ 1910.105 Nitrous oxide.

The piped systems for the in-plant transfer and distribution of nitrous oxide shall be designed, installed, maintained, and operated in accordance with Compressed Gas Association Pamphlet G–8.1–1964, which is incorporated by reference as specified in § 1910.6.

[39 FR 23502, June 27, 1974, as amended at 61 FR 9237, Mar. 7, 1996]

§ 1910.106 Flammable and combustible liquids.

(a) *Definitions.* As used in this section:

(1) Aerosol shall mean a material which is dispensed from its container as a mist, spray, or foam by a propellant under pressure.

(2) Atmospheric tank shall mean a storage tank which has been designed to operate at pressures from atmospheric through 0.5 p.s.i.g.

(3) Automotive service station shall mean that portion of property where flammable or combustible liquids used as motor fuels are stored and dispensed from fixed equipment into the fuel tanks of motor vehicles and shall include any facilities available for the sale and service of tires, batteries, and accessories, and for minor automotive maintenance work. Major automotive repairs, painting, body and fender work are excluded.

(4) Basement shall mean a story of a building or structure having one-half or more of its height below ground level and to which access for fire fighting purposes is unduly restricted.

(5) Boiling point shall mean the boiling point of a liquid at a pressure of 14.7 pounds per square inch absolute (p.s.i.a.) (760 mm.). Where an accurate boiling point is unavailable for the material in question, or for mixtures which do not have a constant boiling point, for purposes of this section the 10 percent point of a distillation performed in accordance with the Standard Method of Test for Distillation of Petroleum Products, ASTM D–86–62, which is incorporated by reference as specified in § 1910.6, may be used as the boiling point of the liquid.

(6) Boilover shall mean the expulsion of crude oil (or certain other liquids) from a burning tank. The light fractions of the crude oil burnoff producing a heat wave in the residue, which on reaching a water strata may result in the expulsion of a portion of the contents of the tank in the form of froth.

(7) Bulk plant shall mean that portion of a property where flammable or combustible liquids are received by tank vessel, pipelines, tank car, or tank vehicle, and are stored or blended in bulk for the purpose of distributing such liquids by tank vessel, pipeline, tank car, tank vehicle, or container.

(8) Chemical plant shall mean a large integrated plant or that portion of such a plant other than a refinery or distillery where flammable or combustible liquids are produced by chemical reactions or used in chemical reactions.

(9) Closed container shall mean a container as herein defined, so sealed by means of a lid or other device that neither liquid nor vapor will escape from it at ordinary temperatures.

(10) Crude petroleum shall mean hydrocarbon mixtures that have a flash point below 150 °F. and which have not been processed in a refinery.

(11) Distillery shall mean a plant or that portion of a plant where flammable or combustible liquids produced by fermentation are concentrated, and where the concentrated products may also be mixed, stored, or packaged.

(12) Fire area shall mean an area of a building separated from the remainder of the building by construction having a fire resistance of at least 1 hour and having all communicating openings properly protected by an assembly having a fire resistance rating of at least 1 hour.

(13) Flammable aerosol shall mean an aerosol which is required to be labeled ''Flammable'' under the Federal Hazardous Substances Labeling Act (15 U.S.C. 1261). For the purposes of paragraph (d) of this section, such aerosols are considered Class IA liquids.

(14) *Flashpoint* means the minimum temperature at which a liquid gives off vapor within a test vessel in sufficient

concentration to form an ignitable mixture with air near the surface of the liquid, and shall be determined as follows:

(i) For a liquid which has a viscosity of less than 45 SUS at 100 °F. (37.8 °C.), does not contain suspended solids, and does not have a tendency to form a surface film while under test, the procedure specified in the Standard Method of Test for Flashpoint by Tag Closed Tester (ASTM D–56–70), which is incorporated by reference as specified in § 1910.6, shall be used.

(ii) For a liquid which has a viscosity of 45 SUS or more at 100 °F. (37.8 °C.), or contains suspended solids, or has a tendency to form a surface film while under test, the Standard Method of Test for Flashpoint by Pensky-Martens Closed Tester (ASTM D–93–71) shall be used, except that the methods specified in Note 1 to section 1.1 of ASTM D–93–71 may be used for the respective materials specified in the Note. The preceding ASTM standards are incorporated by reference as specified in § 1910.6.

(iii) For a liquid that is a mixture of compounds that have different volatilities and flashpoints, its flashpoint shall be determined by using the procedure specified in paragraph (a)(14) (i) or (ii) of this section on the liquid in the form it is shipped. If the flashpoint, as determined by this test, is 100 °F. (37.8 °C.) or higher, an additional flashpoint determination shall be run on a sample of the liquid evaporated to 90 percent of its original volume, and the lower value of the two tests shall be considered the flashpoint of the material.

(iv) Organic peroxides, which undergo autoaccelerating thermal decomposition, are excluded from any of the flashpoint determination methods specified in this subparagraph.

(15) Hotel shall mean buildings or groups of buildings under the same management in which there are sleeping accommodations for hire, primarily used by transients who are lodged with or without meals including but not limited to inns, clubs, motels, and apartment hotels.

(16) Institutional occupancy shall mean the occupancy or use of a building or structure or any portion thereof by persons harbored or detained to receive medical, charitable or other care or treatment, or by persons involuntarily detained.

(17) Liquid shall mean, for the purpose of this section, any material which has a fluidity greater than that of 300 penetration asphalt when tested in accordance with ASTM Test for Penetration for Bituminous Materials, D–5–65, which is incorporated by reference as specified in § 1910.6. When not otherwise identified, the term liquid shall include both flammable and combustible liquids.

(18) *Combustible liquid* means any liquid having a flashpoint at or above 100 °F. (37.8 °C.) Combustible liquids shall be divided into two classes as follows:

(i) *Class II liquids* shall include those with flashpoints at or above 100 °F. (37.8 °C.) and below 140 °F. (60 °C.), except any mixture having components with flashpoints of 200 °F. (93.3 °C.) or higher, the volume of which make up 99 percent or more of the total volume of the mixture.

(ii) *Class III liquids* shall include those with flashpoints at or above 140 °F. (60 °C.) Class III liquids are subdivided into two subclasses:

(*a*) *Class IIIA liquids* shall include those with flashpoints at or above 140 °F. (60 °C.) and below 200 °F. (93.3 °C.), except any mixture having components with flashpoints of 200 °F. (93.3 °C.), or higher, the total volume of which make up 99 percent or more of the total volume of the mixture.

(*b*) *Class IIIB liquids* shall include those with flashpoints at or above 200 °F. (93.3 °C.). This section does not cover Class IIIB liquids. Where the term ''Class III liquids is used in this section, it shall mean only Class IIIA liquids.

(iii) When a combustible liquid is heated for use to within 30 °F. (16.7 °C.) of its flashpoint, it shall be handled in accordance with the requirements for the next lower class of liquids.

(19) *Flammable liquid* means any liquid having a flashpoint below 100 °F. (37.8 °C.), except any mixture having components with flashpoints of 100 °F. (37.8 °C.) or higher, the total of which make up 99 percent or more of the total volume of the mixture. Flammable liquids shall be known as Class I liquids.

Class I liquids are divided into three classes as follows:

(i) Class IA shall include liquids having flashpoints below 73 °F. (22.8 °C.) and having a boiling point below 100 °F. (37.8 °C.).

(ii) Class IB shall include liquids having flashpoints below 73 °F. (22.8 °C.) and having a boiling point at or above 100 °F. (37.8 °C.).

(iii) Class IC shall include liquids having flashpoints at or above 73 °F. (22.8 °C.) and below 100 °F. (37.8 °C.).

(20) Unstable (reactive) liquid shall mean a liquid which in the pure state or as commercially produced or transported will vigorously polymerize, decompose, condense, or will become self-reactive under conditions of shocks, pressure, or temperature.

(21) Low-pressure tank shall mean a storage tank which has been designed to operate at pressures above 0.5 p.s.i.g. but not more than 15 p.s.i.g.

(22) Marine service station shall mean that portion of a property where flammable or combustible liquids used as fuels are stored and dispensed from fixed equipment on shore, piers, wharves, or floating docks into the fuel tanks of self-propelled craft, and shall include all facilities used in connection therewith.

(23) Mercantile occupancy shall mean the occupancy or use of a building or structure or any portion thereof for the displaying, selling, or buying of goods, wares, or merchandise.

(24) Office occupancy shall mean the occupancy or use of a building or structure or any portion thereof for the transaction of business, or the rendering or receiving of professional services.

(25) Portable tank shall mean a closed container having a liquid capacity over 60 U.S. gallons and not intended for fixed installation.

(26) Pressure vessel shall mean a storage tank or vessel which has been designed to operate at pressures above 15 p.s.i.g.

(27) Protection for exposure shall mean adequate fire protection for structures on property adjacent to tanks, where there are employees of the establishment.

(28) Refinery shall mean a plant in which flammable or combustible liquids are produced on a commercial scale from crude petroleum, natural gasoline, or other hydrocarbon sources.

(29) Safety can shall mean an approved container, of not more than 5 gallons capacity, having a spring-closing lid and spout cover and so designed that it will safely relieve internal pressure when subjected to fire exposure.

(30) Vapor pressure shall mean the pressure, measured in pounds per square inch (absolute) exerted by a volatile liquid as determined by the ''Standard Method of Test for Vapor Pressure of Petroleum Products (Reid Method),'' American Society for Testing and Materials ASTM D323–68, which is incorporated by reference as specified in § 1910.6.

(31) Ventilation as specified in this section is for the prevention of fire and explosion. It is considered adequate if it is sufficient to prevent accumulation of significant quantities of vapor-air mixtures in concentration over one-fourth of the lower flammable limit.

(32) Storage: Flammable or combustible liquids shall be stored in a tank or in a container that complies with paragraph (d)(2) of this section.

(33) Barrel shall mean a volume of 42 U.S. gallons.

(34) Container shall mean any can, barrel, or drum.

(35) Approved unless otherwise indicated, approved, or listed by a nationally recognized testing laboratory. Refer to § 1910.7 for definition of nationally recognized testing laboratory.

(36) Listed see ''approved'' in § 1910.106(a)(35).

(37) *SUS* means Saybolt Universal Seconds as determined by the Standard Method of Test for Saybolt Viscosity (ASTM D–88–56), and may be determined by use of the SUS conversion tables specified in ASTM Method D2161–66 following determination of viscosity in accordance with the procedures specified in the Standard Method of Test for Viscosity of Transparent and Opaque Liquids (ASTM D445–65).

(38) *Viscous* means a viscosity of 45 SUS or more.

(b) *Tank storage*—(1) *Design and construction of tanks*—(i) *Materials.* (*a*) Tanks shall be built of steel except as provided in paragraphs (b)(1)(i) (*b*) through (*e*) of this section.

(*b*) Tanks may be built of materials other than steel for installation underground or if required by the properties of the liquid stored. Tanks located above ground or inside buildings shall be of noncombustible construction.

(*c*) Tanks built of materials other than steel shall be designed to specifications embodying principles recognized as good engineering design for the material used.

(*d*) Unlined concrete tanks may be used for storing flammable or combustible liquids having a gravity of 40° API or heavier. Concrete tanks with special lining may be used for other services provided the design is in accordance with sound engineering practice.

(*e*) [Reserved]

(*f*) Special engineering consideration shall be required if the specific gravity of the liquid to be stored exceeds that of water or if the tanks are designed to contain flammable or combustible liquids at a liquid temperature below 0 °F.

(ii) *Fabrication.* (*a*) [Reserved]

(*b*) Metal tanks shall be welded, riveted, and caulked, brazed, or bolted, or constructed by use of a combination of these methods. Filler metal used in brazing shall be nonferrous metal or an alloy having a melting point above 1000 °F. and below that of the metal joined.

(iii) *Atmospheric tanks.* (*a*) Atmospheric tanks shall be built in accordance with acceptable good standards of design. Atmospheric tanks may be built in accordance with the following consensus standards that are incorporated by reference as specified in § 1910.6:

(*1*) Underwriters' Laboratories, Inc., Subjects No. 142, Standard for Steel Aboveground Tanks for Flammable and Combustible Liquids, 1968; No. 58, Standard for Steel Underground Tanks for Flammable and Combustible Liquids, Fifth Edition, December 1961; or No. 80, Standard for Steel Inside Tanks for Oil-Burner Fuel, September 1963.

(*2*) American Petroleum Institute Standards No. 650, Welded Steel Tanks for Oil Storage, Third Edition, 1966.

(*3*) American Petroleum Institute Standards No. 12B, Specification for Bolted Production Tanks, Eleventh Edition, May 1958, and Supplement 1, March 1962; No. 12D, Specification for Large Welded Production Tanks, Seventh Edition, August 1957; or No. 12F, Specification for Small Welded Production Tanks, Fifth Edition, March 1961. Tanks built in accordance with these standards shall be used only as production tanks for storage of crude petroleum in oil-producing areas.

(*b*) Tanks designed for underground service not exceeding 2,500 gallons capacity may be used aboveground.

(*c*) Low-pressure tanks and pressure vessels may be used as atmospheric tanks.

(*d*) Atmospheric tanks shall not be used for the storage of a flammable or combustible liquid at a temperature at or above its boiling point.

(iv) *Low pressure tanks.* (*a*) The normal operating pressure of the tank shall not exceed the design pressure of the tank.

(*b*) Low-pressure tanks shall be built in accordance with acceptable standards of design. Low-pressure tanks may be built in accordance with the following consensus standards that are incorporated by reference as specified in § 1910.6:

(*1*) American Petroleum Institute Standard No. 620. Recommended Rules for the Design and Construction of Large, Welded, Low-Pressure Storage Tanks, Third Edition, 1966.

(*2*) The principles of the Code for Unfired Pressure Vessels, Section VIII of the ASME Boiler and Pressure Vessels Code, 1968.

(*c*) Atmospheric tanks built according to Underwriters' Laboratories, Inc., requirements in subdivision (iii)(*a*) of and shall be limited to 2.5 p.s.i.g. under emergency venting conditions.

This paragraph may be used for operating pressures not exceeding 1 p.s.i.g.

(*d*) Pressure vessels may be used as low-pressure tanks.

(v) *Pressure vessels.* (*a*) The normal operating pressure of the vessel shall not exceed the design pressure of the vessel.

(*b*) Pressure vessels shall be built in accordance with the Code for Unfired Pressure Vessels, Section VIII of the ASME Boiler and Pressure Vessel Code 1968.

(vi) *Provisions for internal corrosion.* When tanks are not designed in accordance with the American Petroleum Institute, American Society of Mechanical Engineers, or the Underwriters' Laboratories, Inc.'s, standards, or if corrosion is anticipated beyond that provided for in the design formulas used, additional metal thickness or suitable protective coatings or linings shall be provided to compensate for the corrosion loss expected during the design life of the tank.

(2) *Installation of outside aboveground tanks.*

(i) [Reserved]

(ii) *Spacing (shell-to-shell) between aboveground tanks.* (*a*) The distance between any two flammable or combustible liquid storage tanks shall not be less than 3 feet.

(*b*) Except as provided in paragraph (b)(2)(ii)(*c*) of this section, the distance between any two adjacent tanks shall not be less than one-sixth the sum of their diameters. When the diameter of one tank is less than one-half the diameter of the adjacent tank, the distance between the two tanks shall not be less than one-half the diameter of the smaller tank.

(*c*) Where crude petroleum in conjunction with production facilities are located in noncongested areas and have capacities not exceeding 126,000 gallons (3,000 barrels), the distance between such tanks shall not be less than 3 feet.

(*d*) Where unstable flammable or combustible liquids are stored, the distance between such tanks shall not be less than one-half the sum of their diameters.

(*e*) When tanks are compacted in three or more rows or in an irregular pattern, greater spacing or other means shall be provided so that inside tanks are accessible for firefighting purposes.

(*f*) The minimum separation between a liquefied petroleum gas container and a flammable or combustible liquid storage tank shall be 20 feet, except in the case of flammable or combustible liquid tanks operating at pressures exceeding 2.5 p.s.i.g. or equipped with emergency venting which will permit pressures to exceed 2.5 p.s.i.g. in which case the provisions of subdivisions (*a*) and (*b*) of this subdivision shall apply. Suitable means shall be taken to prevent the accumulation of flammable or combustible liquids under adjacent liquefied petroleum gas containers such as by diversion curbs or grading. When flammable or combustible liquid storage tanks are within a diked area, the liquefied petroleum gas containers shall be outside the diked area and at least 10 feet away from the centerline of the wall of the diked area. The foregoing provisions shall not apply when liquefied petroleum gas containers of 125 gallons or less capacity are installed adjacent to fuel oil supply tanks of 550 gallons or less capacity.

(iii) [Reserved]

(iv) *Normal venting for aboveground tanks.* (*a*) Atmospheric storage tanks shall be adequately vented to prevent the development of vacuum or pressure sufficient to distort the roof of a cone roof tank or exceeding the design pressure in the case of other atmospheric tanks, as a result of filling or emptying, and atmospheric temperature changes.

(*b*) Normal vents shall be sized either in accordance with: (*1*) The American Petroleum Institute Standard 2000 (1968), Venting Atmospheric and Low-Pressure Storage Tanks, which is incorporated by reference as specified in § 1910.6; or (*2*) other accepted standard; or (*3*) shall be at least as large as the filling or withdrawal connection, whichever is larger but in no case less than 1¼ inch nominal inside diameter.

(*c*) Low-pressure tanks and pressure vessels shall be adequately vented to prevent development of pressure or vacuum, as a result of filling or emptying and atmospheric temperature changes, from exceeding the design pressure of the tank or vessel. Protection shall also be provided to prevent overpressure from any pump discharging into the tank or vessel when the pump discharge pressure can exceed the design pressure of the tank or vessel.

(*d*) If any tank or pressure vessel has more than one fill or withdrawal connection and simultaneous filling or withdrawal can be made, the vent size shall be based on the maximum anticipated simultaneous flow.

(*e*) Unless the vent is designed to limit the internal pressure 2.5 p.s.i. or

less, the outlet of vents and vent drains shall be arranged to discharge in such a manner as to prevent localized overheating of any part of the tank in the event vapors from such vents are ignited.

(*f*) Tanks and pressure vessels storing Class IA liquids shall be equipped with venting devices which shall be normally closed except when venting to pressure or vacuum conditions. Tanks and pressure vessels storing Class IB and IC liquids shall be equipped with venting devices which shall be normally closed except when venting under pressure or vacuum conditions, or with approved flame arresters.

Exemption: Tanks of 3,000 bbls. capacity or less containing crude petroleum in crude-producing areas; and, outside aboveground atmospheric tanks under 1,000 gallons capacity containing other than Class IA flammable liquids may have open vents. (See subdivision (vi)(*b*) of this subparagraph.)

(*g*) Flame arresters or venting devices required in subdivision (*f*) of this subdivision may be omitted for Class IB and IC liquids where conditions are such that their use may, in case of obstruction, result in tank damage.

(v) *Emergency relief venting for fire exposure for aboveground tanks.* (*a*) Every aboveground storage tank shall have some form of construction or device that will relieve excessive internal pressure caused by exposure fires.

(*b*) In a vertical tank the construction referred to in subdivision (*a*) of this subdivision may take the form of a floating roof, lifter roof, a weak roof-to-shell seam, or other approved pressure relieving construction. The weak roof-to-shell seam shall be constructed to fail preferential to any other seam.

(*c*) Where entire dependence for emergency relief is placed upon pressure relieving devices, the total venting capacity of both normal and emergency vents shall be enough to prevent rupture of the shell or bottom of the tank if vertical, or of the shell or heads if horizontal. If unstable liquids are stored, the effects of heat or gas resulting from polymerization, decomposition, condensation, or self-reactivity shall be taken into account. The total capacity of both normal and emergency venting devices shall be not less than that derived from Table H–10 except as provided in subdivision (*e*) or (*f*) of this subdivision. Such device may be a self-closing manhole cover, or one using long bolts that permit the cover to lift under internal pressure, or an additional or larger relief valve or valves. The wetted area of the tank shall be calculated on the basis of 55 percent of the total exposed area of a sphere or spheroid, 75 percent of the total exposed area of a horizontal tank and the first 30 feet above grade of the exposed shell area of a vertical tank.

TABLE H–10—WETTED AREA VERSUS CUBIC FEET FREE AIR PER HOUR

[14.7 psia and 60 °F.]

Square feet	CFH	Square feet	CFH	Square feet	CFH
20	21,100	200	211,000	1,000	524,000
30	31,600	250	239,000	1,200	557,000
40	42,100	300	265,000	1,400	587,000
50	52,700	350	288,000	1,600	614,000
60	63,200	400	312,000	1,800	639,000
70	73,700	500	354,000	2,000	662,000
80	84,200	600	392,000	2,400	704,000
90	94,800	700	428,000	2,800	742,000
100	105,000	800	462,000	and	
120	126,000	900	493,000	over	
140	147,000	1,000	524,000		
160	168,000				
180	190,000				
200	211,000				

(*d*) For tanks and storage vessels designed for pressure over 1 p.s.i.g., the total rate of venting shall be determined in accordance with Table H–10, except that when the exposed wetted area of the surface is greater than 2,800 square feet, the total rate of venting

shall be calculated by the following formula:

$$CFH = 1{,}107A^{0.82}$$

Where;

CFH = Venting requirement, in cubic feet of free air per hour.
A = Exposed wetted surface, in square feet.

NOTE: The foregoing formula is based on $Q=21{,}000A^{0.82}$.

(*e*) The total emergency relief venting capacity for any specific stable liquid may be determined by the following formula:

$$V = 1337 \div L\sqrt{M}$$

V = Cubic feet of free air per hour from Table H–10.
L = Latent heat of vaporization of specific liquid in B.t.u. per pound.
M = Molecular weight of specific liquids.

(*f*) The required airflow rate of subdivision (*c*) or (*e*) of this subdivision may be multiplied by the appropriate factor listed in the following schedule when protection is provided as indicated. Only one factor may be used for any one tank.

0.5 for drainage in accordance with subdivision (vii)(*b*) of this subparagraph for tanks over 200 square feet of wetted area.
0.3 for approved water spray.
0.3 for approved insulation.
0.15 for approved water spray with approved insulation.

(*g*) The outlet of all vents and vent drains on tanks equipped with emergency venting to permit pressures exceeding 2.5 p.s.i.g. shall be arranged to discharge in such a way as to prevent localized overheating of any part of the tank, in the event vapors from such vents are ignited.

(*h*) Each commercial tank venting device shall have stamped on it the opening pressure, the pressure at which the valve reaches the full open position, and the flow capacity at the latter pressure, expressed in cubic feet per hour of air at 60 °F. and at a pressure of 14.7 p.s.i.a.

(*i*) The flow capacity of tank venting devices 12 inches and smaller in nominal pipe size shall be determined by actual test of each type and size of vent. These flow tests may be conducted by the manufacturer if certified by a qualified impartial observer, or may be conducted by an outside agency. The flow capacity of tank venting devices larger than 12 inches nominal pipe size, including manhole covers with long bolts or equivalent, may be calculated provided that the opening pressure is actually measured, the rating pressure and corresponding free orifice area are stated, the word ''calculated'' appears on the nameplate, and the computation is based on a flow coefficient of 0.5 applied to the rated orifice area.

(vi) *Vent piping for aboveground tanks.* (*a*) Vent piping shall be constructed in accordance with paragraph (c) of this section.

(*b*) Where vent pipe outlets for tanks storing Class I liquids are adjacent to buildings or public ways, they shall be located so that the vapors are released at a safe point outside of buildings and not less than 12 feet above the adjacent ground level. In order to aid their dispersion, vapors shall be discharged upward or horizontally away from closely adjacent walls. Vent outlets shall be located so that flammable vapors will not be trapped by eaves or other obstructions and shall be at least five feet from building openings.

(*c*) When tank vent piping is manifolded, pipe sizes shall be such as to discharge, within the pressure limitations of the system, the vapors they may be required to handle when manifolded tanks are subject to the same fire exposure.

(vii) *Drainage, dikes, and walls for aboveground tanks—(a) Drainage and diked areas.* The area surrounding a tank or a group of tanks shall be provided with drainage as in subdivision (*b*) of this subdivision, or shall be diked as provided in subdivision (*c*) of this subdivision, to prevent accidental discharge of liquid from endangering adjoining property or reaching waterways.

(*b*) *Drainage.* Where protection of adjoining property or waterways is by means of a natural or manmade drainage system, such systems shall comply with the following:

(*1*) [Reserved]

(*2*) The drainage system shall terminate in vacant land or other area or in an impounding basin having a capacity not smaller than that of the largest tank served. This termination area and the route of the drainage system shall

be so located that, if the flammable or combustible liquids in the drainage system are ignited, the fire will not seriously expose tanks or adjoining property.

(*c*) *Diked areas.* Where protection of adjoining property or waterways is accomplished by retaining the liquid around the tank by means of a dike, the volume of the diked area shall comply with the following requirements:

(*1*) Except as provided in subdivision (*2*) of this subdivision, the volumetric capacity of the diked area shall not be less than the greatest amount of liquid that can be released from the largest tank within the diked area, assuming a full tank. The capacity of the diked area enclosing more than one tank shall be calculated by deducting the volume of the tanks other than the largest tank below the height of the dike.

(*2*) For a tank or group of tanks with fixed roofs containing crude petroleum with boilover characteristics, the volumetric capacity of the diked area shall be not less than the capacity of the largest tank served by the enclosure, assuming a full tank. The capacity of the diked enclosure shall be calculated by deducting the volume below the height of the dike of all tanks within the enclosure.

(*3*) Walls of the diked area shall be of earth, steel, concrete or solid masonry designed to be liquidtight and to withstand a full hydrostatic head. Earthen walls 3 feet or more in height shall have a flat section at the top not less than 2 feet wide. The slope of an earthen wall shall be consistent with the angle of repose of the material of which the wall is constructed.

(*4*) The walls of the diked area shall be restricted to an average height of 6 feet above interior grade.

(*5*) [Reserved]

(*6*) No loose combustible material, empty or full drum or barrel, shall be permitted within the diked area.

(viii) *Tank openings other than vents for aboveground tanks.*

(*a*)–(*c*) [Reserved]

(*d*) Openings for gaging shall be provided with a vaportight cap or cover.

(*e*) For Class IB and Class IC liquids other than crude oils, gasolines, and asphalts, the fill pipe shall be so designed and installed as to minimize the possibility of generating static electricity. A fill pipe entering the top of a tank shall terminate within 6 inches of the bottom of the tank and shall be installed to avoid excessive vibration.

(*f*) Filling and emptying connections which are made and broken shall be located outside of buildings at a location free from any source of ignition and not less than 5 feet away from any building opening. Such connection shall be closed and liquidtight when not in use. The connection shall be properly identified.

(3) *Installation of underground tanks*—(i) *Location.* Excavation for underground storage tanks shall be made with due care to avoid undermining of foundations of existing structures. Underground tanks or tanks under buildings shall be so located with respect to existing building foundations and supports that the loads carried by the latter cannot be transmitted to the tank. The distance from any part of a tank storing Class I liquids to the nearest wall of any basement or pit shall be not less than 1 foot, and to any property line that may be built upon, not less than 3 feet. The distance from any part of a tank storing Class II or Class III liquids to the nearest wall of any basement, pit or property line shall be not less than 1 foot.

(ii) *Depth and cover.* Underground tanks shall be set on firm foundations and surrounded with at least 6 inches of noncorrosive, inert materials such as clean sand, earth, or gravel well tamped in place. The tank shall be placed in the hole with care since dropping or rolling the tank into the hole can break a weld, puncture or damage the tank, or scrape off the protective coating of coated tanks. Tanks shall be covered with a minimum of 2 feet of earth, or shall be covered with not less than 1 foot of earth, on top of which shall be placed a slab of reinforced concrete not less than 4 inches thick. When underground tanks are, or are likely to be, subject to traffic, they shall be protected against damage from vehicles passing over them by at least 3 feet of earth cover, or 18 inches of

well-tamped earth, plus 6 inches of reinforced concrete or 8 inches of asphaltic concrete. When asphaltic or reinforced concrete paving is used as part of the protection, it shall extend at least 1 foot horizontally beyond the outline of the tank in all directions.

(iii) *Corrosion protection.* Corrosion protection for the tank and its piping shall be provided by one or more of the following methods:

(*a*) Use of protective coatings or wrappings;

(*b*) Cathodic protection; or,

(*c*) Corrosion resistant materials of construction.

(iv) *Vents.* (*a*) Location and arrangement of vents for Class I liquids. Vent pipes from tanks storing Class I liquids shall be so located that the discharge point is outside of buildings, higher than the fill pipe opening, and not less than 12 feet above the adjacent ground level. Vent pipes shall discharge only upward in order to disperse vapors. Vent pipes 2 inches or less in nominal inside diameter shall not be obstructed by devices that will cause excessive back pressure. Vent pipe outlets shall be so located that flammable vapors will not enter building openings, or be trapped under eaves or other obstructions. If the vent pipe is less than 10 feet in length, or greater than 2 inches in nominal inside diameter, the outlet shall be provided with a vacuum and pressure relief device or there shall be an approved flame arrester located in the vent line at the outlet or within the approved distance from the outlet.

(*b*) Size of vents. Each tank shall be vented through piping adequate in size to prevent blow-back of vapor or liquid at the fill opening while the tank is being filled. Vent pipes shall be not less than 1¼ inch nominal inside diameter.

TABLE H–11—VENT LINE DIAMETERS

Maximum flow GPM	Pipe length [1]		
	50 feet	100 feet	200 feet
	Inches	Inches	Inches
100	1¼	1¼	1¼
200	1¼	1¼	1¼
300	1¼	1¼	1½
400	1¼	1½	2
500	1½	1½	2
600	1½	2	2
700	2	2	2
800	2	2	3
900	2	2	3

TABLE H–11—VENT LINE DIAMETERS—Continued

Maximum flow GPM	Pipe length [1]		
	50 feet	100 feet	200 feet
1,000	2	2	3

[1] Vent lines of 50 ft., 100 ft., and 200 ft. of pipe plus 7 ells.

(*c*) Location and arrangement of vents for Class II or Class III liquids. Vent pipes from tanks storing Class II or Class III flammable liquids shall terminate outside of the building and higher than the fill pipe opening. Vent outlets shall be above normal snow level. They may be fitted with return bends, coarse screens or other devices to minimize ingress of foreign material.

(*d*) Vent piping shall be constructed in accordance with paragraph (*c*) of this section. Vent pipes shall be so laid as to drain toward the tank without sags or traps in which liquid can collect. They shall be located so that they will not be subjected to physical damage. The tank end of the vent pipe shall enter the tank through the top.

(*e*) When tank vent piping is manifolded, pipe sizes shall be such as to discharge, within the pressure limitations of the system, the vapors they may be required to handle when manifolded tanks are filled simultaneously.

(v) *Tank openings other than vents.* (*a*) Connections for all tank openings shall be vapor or liquid tight.

(*b*) Openings for manual gaging, if independent of the fill pipe, shall be provided with a liquid-tight cap or cover. If inside a building, each such opening shall be protected against liquid overflow and possible vapor release by means of a spring loaded check valve or other approved device.

(*c*) Fill and discharge lines shall enter tanks only through the top. Fill lines shall be sloped toward the tank.

(*d*) For Class IB and Class IC liquids other than crude oils, gasolines, and asphalts, the fill pipe shall be so designed and installed as to minimize the possibility of generating static electricity by terminating within 6 inches of the bottom of the tank.

(*e*) Filling and emptying connections which are made and broken shall be located outside of buildings at a location

free from any source of ignition and not less than 5 feet away from any building opening. Such connection shall be closed and liquidtight when not in use. The connection shall be properly identified.

(4) *Installation of tanks inside of buildings*—(i) *Location.* Tanks shall not be permitted inside of buildings except as provided in paragraphs (e), (g), (h), or (i) of this section.

(ii) *Vents.* Vents for tanks inside of buildings shall be as provided in subparagraphs (2) (iv), (v), (vi)(*b*), and (3)(iv) of this paragraph, except that emergency venting by the use of weak roof seams on tanks shall not be permitted. Vents shall discharge vapors outside the buildings.

(iii) *Vent piping.* Vent piping shall be constructed in accordance with paragraph (c) of this section.

(iv) *Tank openings other than vents.* (*a*) Connections for all tank openings shall be vapor or liquidtight. Vents are covered in subdivision (ii) of this subparagraph.

(*b*) Each connection to a tank inside of buildings through which liquid can normally flow shall be provided with an internal or an external valve located as close as practical to the shell of the tank. Such valves, when external, and their connections to the tank shall be of steel except when the chemical characteristics of the liquid stored are incompatible with steel. When materials other than steel are necessary, they shall be suitable for the pressures, structural stresses, and temperatures involved, including fire exposures.

(*c*) Flammable or combustible liquid tanks located inside of buildings, except in one-story buildings designed and protected for flammable or combustible liquid storage, shall be provided with an automatic-closing heat-actuated valve on each withdrawal connection below the liquid level, except for connections used for emergency disposal, to prevent continued flow in the event of fire in the vicinity of the tank. This function may be incorporated in the valve required in (*b*) of this subdivision, and if a separate valve, shall be located adjacent to the valve required in (*b*) of this subdivision.

(*d*) Openings for manual gaging, if independent of the fill pipe (see (*f*) of this subdivision), shall be provided with a vaportight cap or cover. Each such opening shall be protected against liquid overflow and possible vapor release by means of a spring loaded check valve or other approved device.

(*e*) For Class IB and Class IC liquids other than crude oils, gasolines, and asphalts, the fill pipe shall be so designed and installed as to minimize the possibility of generating static electricity by terminating within 6 inches of the bottom of the tank.

(*f*) The fill pipe inside of the tank shall be installed to avoid excessive vibration of the pipe.

(*g*) The inlet of the fill pipe shall be located outside of buildings at a location free from any source of ignition and not less than 5 feet away from any building opening. The inlet of the fill pipe shall be closed and liquidtight when not in use. The fill connection shall be properly identified.

(*h*) Tanks inside buildings shall be equipped with a device, or other means shall be provided, to prevent overflow into the building.

(5) *Supports, foundations, and anchorage for all tank locations*—(i) *General.* Tank supports shall be installed on firm foundations. Tank supports shall be of concrete, masonry, or protected steel. Single wood timber supports (not cribbing) laid horizontally may be used for outside aboveground tanks if not more than 12 inches high at their lowest point.

(ii) *Fire resistance.* Steel supports or exposed piling shall be protected by materials having a fire resistance rating of not less than 2 hours, except that steel saddles need not be protected if less than 12 inches high at their lowest point. Water spray protection or its equivalent may be used in lieu of fire-resistive materials to protect supports.

(iii) *Spheres.* The design of the supporting structure for tanks such as spheres shall receive special engineering consideration.

(iv) *Load distribution.* Every tank shall be so supported as to prevent the excessive concentration of loads on the supporting portion of the shell.

(v) *Foundations.* Tanks shall rest on the ground or on foundations made of concrete, masonry, piling, or steel. Tank foundations shall be designed to

minimize the possibility of uneven settling of the tank and to minimize corrosion in any part of the tank resting on the foundation.

(vi) *Flood areas.* Where a tank is located in an area that may be subjected to flooding, the applicable precautions outlined in this subdivision shall be observed.

(*a*) No aboveground vertical storage tank containing a flammable or combustible liquid shall be located so that the allowable liquid level within the tank is below the established maximum flood stage, unless the tank is provided with a guiding structure such as described in (*m*), (*n*), and (*o*) of this subdivision.

(*b*) Independent water supply facilities shall be provided at locations where there is no ample and dependable public water supply available for loading partially empty tanks with water.

(*c*) In addition to the preceding requirements, each tank so located that more than 70 percent, but less than 100 percent, of its allowable liquid storage capacity will be submerged at the established maximum flood stage, shall be safeguarded by one of the following methods: Tank shall be raised, or its height shall be increased, until its top extends above the maximum flood stage a distance equivalent to 30 percent or more of its allowable liquid storage capacity: *Provided, however,* That the submerged part of the tank shall not exceed two and one-half times the diameter. Or, as an alternative to the foregoing, adequate noncombustible structural guides, designed to permit the tank to float vertically without loss of product, shall be provided.

(*d*) Each horizontal tank so located that more than 70 percent of its storage capacity will be submerged at the established flood stage, shall be anchored, attached to a foundation of concrete or of steel and concrete, of sufficient weight to provide adequate load for the tank when filled with flammable or combustible liquid and submerged by flood waters to the established flood stage, or adequately secured by other means.

(*e*) [Reserved]

(*f*) At locations where there is no ample and dependable water supply, or where filling of underground tanks with liquids is impracticable because of the character of their contents, their use, or for other reasons, each tank shall be safeguarded against movement when empty and submerged by high ground water or flood waters by anchoring, weighting with concrete or other approved solid loading material, or securing by other means. Each such tank shall be so constructed and installed that it will safely resist external pressures due to high ground water or flood waters.

(*g*) At locations where there is an ample and dependable water supply available, underground tanks containing flammable or combustible liquids, so installed that more than 70 percent of their storage capacity will be submerged at the maximum flood stage, shall be so anchored, weighted, or secured by other means, as to prevent movement of such tanks when filled with flammable or combustible liquids, and submerged by flood waters to the established flood stage.

(*h*) Pipe connections below the allowable liquid level in a tank shall be provided with valves or cocks located as closely as practicable to the tank shell. Such valves and their connections to tanks shall be of steel or other material suitable for use with the liquid being stored. Cast iron shall not be permitted.

(*i*) At locations where an independent water supply is required, it shall be entirely independent of public power and water supply. Independent source of water shall be available when flood waters reach a level not less than 10 feet below the bottom of the lowest tank on a property.

(*j*) The self-contained power and pumping unit shall be so located or so designed that pumping into tanks may be carried on continuously throughout the rise in flood waters from a level 10 feet below the lowest tank to the level of the potential flood stage.

(*k*) Capacity of the pumping unit shall be such that the rate of rise of water in all tanks shall be equivalent to the established potential average rate of rise of flood waters at any stage.

(*l*) Each independent pumping unit shall be tested periodically to insure

that it is in satisfactory operating condition.

(*m*) Structural guides for holding floating tanks above their foundations shall be so designed that there will be no resistance to the free rise of a tank, and shall be constructed of noncombustible material.

(*n*) The strength of the structure shall be adequate to resist lateral movement of a tank subject to a horizontal force in any direction equivalent to not less than 25 pounds per square foot acting on the projected vertical cross-sectional area of the tank.

(*o*) Where tanks are situated on exposed points or bends in a shoreline where swift currents in flood waters will be present, the structures shall be designed to withstand a unit force of not less than 50 pounds per square foot.

(*p*) The filling of a tank to be protected by water loading shall be started as soon as flood waters reach a dangerous flood stage. The rate of filling shall be at least equal to the rate of rise of the floodwaters (or the established average potential rate of rise).

(*q*) Sufficient fuel to operate the water pumps shall be available at all times to insure adequate power to fill all tankage with water.

(*r*) All valves on connecting pipelines shall be closed and locked in closed position when water loading has been completed.

(*s*) Where structural guides are provided for the protection of floating tanks, all rigid connections between tanks and pipelines shall be disconnected and blanked off or blinded before the floodwaters reach the bottom of the tank, unless control valves and their connections to the tank are of a type designed to prevent breakage between the valve and the tank shell.

(*t*) All valves attached to tanks other than those used in connection with water loading operations shall be closed and locked.

(*u*) If a tank is equipped with a swing line, the swing pipe shall be raised to and secured at its highest position.

(*v*) Inspections. The Assistant Secretary or his designated representative shall make periodic inspections of all plants where the storage of flammable or combustible liquids is such as to require compliance with the foregoing requirements, in order to assure the following:

(*1*) That all flammable or combustible liquid storage tanks are in compliance with these requirements and so maintained.

(*2*) That detailed printed instructions of what to do in flood emergencies are properly posted.

(*3*) That station operators and other employees depended upon to carry out such instructions are thoroughly informed as to the location and operation of such valves and other equipment necessary to effect these requirements.

(vii) *Earthquake areas.* In areas subject to earthquakes, the tank supports and connections shall be designed to resist damage as a result of such shocks.

(6) *Sources of ignition.* In locations where flammable vapors may be present, precautions shall be taken to prevent ignition by eliminating or controlling sources of ignition. Sources of ignition may include open flames, lightning, smoking, cutting and welding, hot surfaces, frictional heat, sparks (static, electrical, and mechanical), spontaneous ignition, chemical and physical-chemical reactions, and radiant heat.

(7) *Testing*—(i) *General.* All tanks, whether shop built or field erected, shall be strength tested before they are placed in service in accordance with the applicable paragraphs of the code under which they were built. The American Society of Mechanical Engineers (ASME) code stamp, American Petroleum Institute (API) monogram, or the label of the Underwriters' Laboratories, Inc., on a tank shall be evidence of compliance with this strength test. Tanks not marked in accordance with the above codes shall be strength tested before they are placed in service in accordance with good engineering principles and reference shall be made to the sections on testing in the codes listed in subparagraphs (1) (iii)(*a*), (iv)(*b*), or (v)(*b*) of this paragraph.

(ii) *Strength.* When the vertical length of the fill and vent pipes is such that when filled with liquid the static head imposed upon the bottom of the tank exceeds 10 pounds per square inch, the tank and related piping shall be

tested hydrostatically to a pressure equal to the static head thus imposed.

(iii) *Tightness.* In addition to the strength test called for in subdivisions (i) and (ii) of this subparagraph, all tanks and connections shall be tested for tightness. Except for underground tanks, this tightness test shall be made at operating pressure with air, inert gas, or water prior to placing the tank in service. In the case of field-erected tanks the strength test may be considered to be the test for tank tightness. Underground tanks and piping, before being covered, enclosed, or placed in use, shall be tested for tightness hydrostatically, or with air pressure at not less than 3 pounds per square inch and not more than 5 pounds per square inch.

(iv) *Repairs.* All leaks or deformations shall be corrected in an acceptable manner before the tank is placed in service. Mechanical caulking is not permitted for correcting leaks in welded tanks except pinhole leaks in the roof.

(v) *Derated operations.* Tanks to be operated at pressures below their design pressure may be tested by the applicable provisions of subdivision (i) or (ii) of this subparagraph, based upon the pressure developed under full emergency venting of the tank.

(c) *Piping, valves, and fittings*—(1) *General*—(i) *Design.* The design (including selection of materials) fabrication, assembly, test, and inspection of piping systems containing flammable or combustible liquids shall be suitable for the expected working pressures and structural stresses. Conformity with the applicable provisions of Pressure Piping, ANSI B31 series and the provisions of this paragraph, shall be considered prima facie evidence of compliance with the foregoing provisions.

(ii) *Exceptions.* This paragraph does not apply to any of the following:

(*a*) Tubing or casing on any oil or gas wells and any piping connected directly thereto.

(*b*) Motor vehicle, aircraft, boat, or portable or stationary engines.

(*c*) Piping within the scope of any applicable boiler and pressures vessel code.

(iii) *Definitions.* As used in this paragraph, piping systems consist of pipe, tubing, flanges, bolting, gaskets, valves, fittings, the pressure containing parts of other components such as expansion joints and strainers, and devices which serve such purposes as mixing, separating, snubbing, distributing, metering, or controlling flow.

(2) *Materials for piping, valves, and fittings*—(i) *Required materials.* Materials for piping, valves, or fittings shall be steel, nodular iron, or malleable iron, except as provided in paragraph (c)(2)(ii), (iii) and (iv) of this section.

(ii) *Exceptions.* Materials other than steel, nodular iron, or malleable iron may be used underground, or if required by the properties of the flammable or combustible liquid handled. Material other than steel, nodular iron, or malleable iron shall be designed to specifications embodying principles recognized as good engineering practices for the material used.

(iii) *Linings.* Piping, valves, and fittings may have combustible or noncombustible linings.

(iv) *Low-melting materials.* When low-melting point materials such as aluminum and brass or materials that soften on fire exposure such as plastics, or non-ductile materials such as cast iron, are necessary, special consideration shall be given to their behavior on fire exposure. If such materials are used in above ground piping systems or inside buildings, they shall be suitably protected against fire exposure or so located that any spill resulting from the failure of these materials could not unduly expose persons, important buildings or structures or can be readily controlled by remote valves.

(3) *Pipe joints.* Joints shall be made liquid tight. Welded or screwed joints or approved connectors shall be used. Threaded joints and connections shall be made up tight with a suitable lubricant or piping compound. Pipe joints dependent upon the friction characteristics of combustible materials for mechanical continuity of piping shall not be used inside buildings. They may be used outside of buildings above or below ground. If used above ground, the piping shall either be secured to prevent disengagement at the fitting or the piping system shall be so designed that any spill resulting from such disengagement could not unduly expose

persons, important buildings or structures, and could be readily controlled by remote valves.

(4) *Supports.* Piping systems shall be substantially supported and protected against physical damage and excessive stresses arising from settlement, vibration, expansion, or contraction.

(5) *Protection against corrosion.* All piping for flammable or combustible liquids, both aboveground and underground, where subject to external corrosion, shall be painted or otherwise protected.

(6) *Valves.* Piping systems shall contain a sufficient number of valves to operate the system properly and to protect the plant. Piping systems in connection with pumps shall contain a sufficient number of valves to control properly the flow of liquid in normal operation and in the event of physical damage. Each connection to pipelines, by which equipments such as tankcars or tank vehicles discharge liquids by means of pumps into storage tanks, shall be provided with a check valve for automatic protection against backflow if the piping arrangement is such that backflow from the system is possible.

(7) *Testing.* All piping before being covered, enclosed, or placed in use shall be hydrostatically tested to 150 percent of the maximum anticipated pressure of the system, or pneumatically tested to 110 percent of the maximum anticipated pressure of the system, but not less than 5 pounds per square inch gage at the highest point of the system. This test shall be maintained for a sufficient time to complete visual inspection of all joints and connections, but for at least 10 minutes.

(d) *Container and portable tank storage*—(1) *Scope*—(i) *General.* This paragraph shall apply only to the storage of flammable or combustible liquids in drums or other containers (including flammable aerosols) not exceeding 60 gallons individual capacity and those portable tanks not exceeding 660 gallons individual capacity.

(ii) *Exceptions.* This paragraph shall not apply to the following:

(*a*) Storage of containers in bulk plants, service stations, refineries, chemical plants, and distilleries;

(*b*) Class I or Class II liquids in the fuel tanks of a motor vehicle, aircraft, boat, or portable or stationary engine;

(*c*) Flammable or combustible paints, oils, varnishes, and similar mixtures used for painting or maintenance when not kept for a period in excess of 30 days;

(*d*) Beverages when packaged in individual containers not exceeding 1 gallon in size.

(2) *Design, construction, and capacity of containers*—(i) *General.* Only approved containers and portable tanks shall be used. Metal containers and portable tanks meeting the requirements of and containing products authorized by chapter I, title 49 of the Code of Federal Regulations (regulations issued by the Hazardous Materials Regulations Board, Department of Transportation), shall be deemed to be acceptable.

(ii) *Emergency venting.* Each portable tank shall be provided with one or more devices installed in the top with sufficient emergency venting capacity to limit internal pressure under fire exposure conditions to 10 p.s.i.g., or 30 percent of the bursting pressure of the tank, whichever is greater. The total venting capacity shall be not less than that specified in paragraphs (b)(2)(v) (*c*) or (*e*) of this section. At least one pressure-activated vent having a minimum capacity of 6,000 cubic feet of free air (14.7 p.s.i.a. and 60 °F.) shall be used. It shall be set to open at not less than 5 p.s.i.g. If fusible vents are used, they shall be actuated by elements that operate at a temperature not exceeding 300 °F.

(iii) *Size.* Flammable and combustible liquid containers shall be in accordance with Table H–12, except that glass or plastic containers of no more than 1-gallon capacity may be used for a Class IA or IB flammable liquid if:

(*a*)(*1*) Such liquid either would be rendered unfit for its intended use by contact with metal or would excessively corrode a metal container so as to create a leakage hazard; and

(*2*) The user's process either would require more than 1 pint of a Class IA liquid or more than 1 quart of a Class IB liquid of a single assay lot to be used at one time, or would require the maintenance of an analytical standard liquid

of a quality which is not met by the specified standards of liquids available, and the quantity of the analytical standard liquid required to be used in any one control process exceeds one-sixteenth the capacity of the container allowed under Table H–12 for the class of liquid; or

(*b*) The containers are intended for direct export outside the United States.

TABLE H–12—MAXIMUM ALLOWABLE SIZE OF CONTAINERS AND PORTABLE TANKS

Container type	Flammable liquids			Combustible liquids	
	Class IA	Class IB	Class IC	Class II	Class III
Glass or approved plastic	1 pt	1 qt	1 gal	1 gal	1 gal.
Metal (other than DOT drums)	1 gal	5 gal	5 gal	5 gal	5 gal.
Safety cans	2 gal	5 gal	5 gal	5 gal	5 gal.
Metal drums (DOT specifications)	60 gal	60 gal	60 gal	60 gal	60 gal.
Approved portable tanks	660 gal	660 gal	660 gal	660 gal	660 gal.

NOTE: Container exemptions: (a) Medicines, beverages, foodstuffs, cosmetics, and other common consumer items, when packaged according to commonly accepted practices, shall be exempt from the requirements of § 1910.106(d)(2) (i) and (ii).

(3) *Design, construction, and capacity of storage cabinets*—(i) *Maximum capacity*. Not more than 60 gallons of Class I or Class II liquids, nor more than 120 gallons of Class III liquids may be stored in a storage cabinet.

(ii) *Fire resistance.* Storage cabinets shall be designed and constructed to limit the internal temperature to not more than 325 °F. when subjected to a 10-minute fire test using the standard time-temperature curve as set forth in Standard Methods of Fire Tests of Building Construction and Materials, NFPA 251–1969, which is incorporated by reference as specified in § 1910.6. All joints and seams shall remain tight and the door shall remain securely closed during the fire test. Cabinets shall be labeled in conspicuous lettering, ''Flammable—Keep Fire Away.''

(*a*) Metal cabinets constructed in the following manner shall be deemed to be in compliance. The bottom, top, door, and sides of cabinet shall be at least No. 18 gage sheet iron and double walled with 1½-inch air space. Joints shall be riveted, welded or made tight by some equally effective means. The door shall be provided with a three-point lock, and the door sill shall be raised at least 2 inches above the bottom of the cabinet.

(*b*) Wooden cabinets constructed in the following manner shall be deemed in compliance. The bottom, sides, and top shall be constructed of an approved grade of plywood at least 1 inch in thickness, which shall not break down or delaminate under fire conditions. All joints shall be rabbetted and shall be fastened in two directions with flathead woodscrews. When more than one door is used, there shall be a rabbetted overlap of not less than 1 inch. Hinges shall be mounted in such a manner as not to lose their holding capacity due to loosening or burning out of the screws when subjected to the fire test.

(4) *Design and construction of inside storage rooms*—(i) *Construction*. Inside storage rooms shall be constructed to meet the required fire-resistive rating for their use. Such construction shall comply with the test specifications set forth in Standard Methods of Fire Tests of Building Construction and Materials, NFPA 251–1969. Where an automatic sprinkler system is provided, the system shall be designed and installed in an acceptable manner. Openings to other rooms or buildings shall be provided with noncombustible liquid-tight raised sills or ramps at least 4 inches in height, or the floor in the storage area shall be at least 4 inches below the surrounding floor. Openings shall be provided with approved self-closing fire doors. The room shall be liquid-tight where the walls join the floor. A permissible alternate to the sill or ramp is an open-grated trench inside of the room which drains to a safe location. Where other portions of the building or other properties are exposed, windows shall be protected as set forth in the Standard for Fire Doors and Windows, NFPA No. 80–1968, which is incorporated by reference as specified in § 1910.6, for Class E or F openings. Wood

at least 1 inch nominal thickness may be used for shelving, racks, dunnage, scuffboards, floor overlay, and similar installations.

(ii) *Rating and capacity.* Storage in inside storage rooms shall comply with Table H–13.

TABLE H–13—STORAGE IN INSIDE ROOMS

Fire protection[1] provided	Fire resistance	Maximum size	Total allowable quantities (gals./sq. ft./floor area)
Yes	2 hours	500 sq. ft	10
No	2 hours	500 sq. ft	5
Yes	1 hour	150 sq. ft	4
No	1 hour	150 sq. ft	2

[1] Fire protection system shall be sprinkler, water spray, carbon dioxide, or other system.

(iii) *Wiring.* Electrical wiring and equipment located in inside storage rooms used for Class I liquids shall be approved under Subpart S of this part for Class I, Division 2 Hazardous Locations; for Class II and Class III liquids, shall be approved for general use.

(iv) *Ventilation.* Every inside storage room shall be provided with either a gravity or a mechanical exhaust ventilation system. Such system shall be designed to provide for a complete change of air within the room at least six times per hour. If a mechanical exhaust system is used, it shall be controlled by a switch located outside of the door. The ventilating equipment and any lighting fixtures shall be operated by the same switch. A pilot light shall be installed adjacent to the switch if Class I flammable liquids are dispensed within the room. Where gravity ventilation is provided, the fresh air intake, as well as the exhaust outlet from the room, shall be on the exterior of the building in which the room is located.

(v) *Storage in inside storage rooms.* In every inside storage room there shall be maintained one clear aisle at least 3 feet wide. Containers over 30 gallons capacity shall not be stacked one upon the other. Dispensing shall be by approved pump or self-closing faucet only.

(5) *Storage inside building*—(i) *Egress.* Flammable or combustible liquids, including stock for sale, shall not be stored so as to limit use of exits, stairways, or areas normally used for the safe egress of people.

(ii) *Containers.* The storage of flammable or combustible liquids in containers or portable tanks shall comply with subdivisions (iii) through (v) of this subparagraph.

(iii) *Office occupancies.* Storage shall be prohibited except that which is required for maintenance and operation of building and operation of equipment. Such storage shall be kept in closed metal containers stored in a storage cabinet or in safety cans or in an inside storage room not having a door that opens into that portion of the building used by the public.

(iv) *Mercantile occupancies and other retail stores.*

(*a*)–(*d*) [Reserved]

(*e*) Leaking containers shall be removed to a storage room or taken to a safe location outside the building and the contents transferred to an undamaged container.

(v) *General purpose public warehouses.* Storage shall be in accordance with Table H–14 or H–15 and in buildings or in portions of such buildings cut off by standard firewalls. Material creating no fire exposure hazard to the flammable or combustible liquids may be stored in the same area.

TABLE H–14—INDOOR CONTAINER STORAGE

Class liquid	Storage level	Gallons	
		Protected storage maximum per pile	Unprotected storage maximum per pile
A	Ground and upper floors	2,750	660
B	Basement	Not permitted	Not permitted
	Ground and upper floors	5,500	1,375
C	Basement	Not permitted	Not permitted
	Ground and upper floors	16,500	4,125

TABLE H–14—INDOOR CONTAINER STORAGE—Continued

Class liquid	Storage level	Gallons	
		Protected storage maximum per pile	Unprotected storage maximum per pile
	Basement	Not permitted	Not permitted
II	Ground and upper floors	16,500	4,125
	Basement	5,500	Not permitted
III	Ground and upper floors	55,000	13,750
	Basement	8,250	Not permitted

NOTE 1: When 2 or more classes of materials are stored in a single pile, the maximum gallonage permitted in that pile shall be the smallest of the 2 or more separate maximum gallonages.
NOTE 2: Aisles shall be provided so that no container is more than 12 ft. from an aisle. Main aisles shall be at least 3 ft. wide and side aisles at least 4 ft. wide.
NOTE 3: Each pile shall be separated from each other by at least 4 ft.
(Numbers in parentheses indicate corresponding number of 55-gal. drums.)

TABLE H–15—INDOOR PORTABLE TANK STORAGE

Class liquid	Storage level	Gallons	
		Protected storage maximum per pile	Unprotected storage maximum per pile
IA	Ground and upper floors	Not permitted	Not permitted
	Basement	Not permitted	Not permitted
IB	Ground and upper floors	20,000	2,000
	Basement	Not permitted	Not permitted
IC	Ground and upper floors	40,000	5,500
	Basement	Not permitted	Not permitted
II	Ground and upper floors	40,000	5,500
	Basement	20,000	Not permitted
III	Ground and upper floors	60,000	22,000
	Basement	20,000	Not permitted

NOTE 1: When 1 or more classes of materials are stored in a single pile, the maximum gallonage permitted in that pile shall be the smallest of the 2 or more separate maximum gallonages.
NOTE 2: Aisles shall be provided so that no portable tank is more than 12 ft. from an aisle. Main aisles shall be at least 8 ft. wide and side aisles at least 4 ft. wide.
NOTE 3: Each pile shall be separated from each other by at least 4 ft.

(vi) *Flammable and combustible liquid warehouses or storage buildings.* (*a*) If the storage building is located 50 feet or less from a building or line of adjoining property that may be built upon, the exposing wall shall be a blank wall having a fire-resistance rating of at least 2 hours.

(*b*) The total quantity of liquids within a building shall not be restricted, but the arrangement of storage shall comply with Table H–14 or H–15.

(*c*) Containers in piles shall be separated by pallets or dunnage where necessary to provide stability and to prevent excessive stress on container walls.

(*d*) Portable tanks stored over one tier high shall be designed to nest securely, without dunnage, and adequate materials handing equipment shall be available to handle tanks safely at the upper tier level.

(*e*) No pile shall be closer than 3 feet to the nearest beam, chord, girder, or other obstruction, and shall be 3 feet below sprinkler deflectors or discharge orifices of water spray, or other overhead fire protection systems.

(*f*) Aisles of at least 3 feet wide shall be provided where necessary for reasons of access to doors, windows or standpipe connections.

(6) *Storage outside buildings*—(i) *General.* Storage outside buildings shall be in accordance with Table H–16 or H–17, and subdivisions (ii) and (iv) of this subparagraph.

TABLE H–16—OUTDOOR CONTAINER STORAGE

1—Class	2—Maximum per pile	3—Distance between piles	4—Distance to property line that can be built upon	5—Distance to street, alley, public way
	gallons	feet	feet	feet
IA	1,100	5	20	10
IB	2,200	5	20	10
IC	4,400	5	20	10
II	8,800	5	10	5
III	22,000	5	10	5

NOTE 1: When 2 or more classes of materials are stored in a single pile, the maximum gallonage in that pile shall be the smallest of the 2 or more separate gallonages.
NOTE 2: Within 200 ft. of each container, there shall be a 12-ft. wide access way to permit approach of fire control apparatus.
NOTE 3: The distances listed apply to properties that have protection for exposures as defined. If there are exposures, and such protection for exposures does not exist, the distances in column 4 shall be doubled.
NOTE 4: When total quantity stored does not exceed 50 percent of maximum per pile, the distances in columns 4 and 5 may be reduced 50 percent, but not less than 3 ft.

(ii) *Maximum storage.* A maximum of 1,100 gallons of flammable or combustible liquids may be located adjacent to buildings located on the same premises and under the same management provided the provisions of subdivisions (*a*) and (*b*) of this subdivision are complied with.

(*a*) [Reserved]

(*b*) Where quantity stored exceeds 1,100 gallons, or provisions of subdivision (a) of this subdivision cannot be met, a minimum distance of 10 feet between buildings and nearest container of flammable or combustible liquid shall be maintained.

(iii) *Spill containment.* The storage area shall be graded in a manner to divert possible spills away from buildings or other exposures or shall be surrounded by a curb at least 6 inches high. When curbs are used, provisions shall be made for draining of accumulations of ground or rain water or spills of flammable or combustible liquids. Drains shall terminate at a safe location and shall be accessible to operation under fire conditions.

(iv) *Security.* The storage area shall be protected against tampering or trespassers where necessary and shall be kept free of weeds, debris and other combustible material not necessary to the storage.

(7) *Fire control*—(i) *Extinguishers.* Suitable fire control devices, such as small hose or portable fire extinguishers, shall be available at locations where flammable or combustible liquids are stored.

TABLE H–17—OUTDOOR PORTABLE TANK STORAGE

1—Class	2—Maximum per pile	3—Distance between piles	4—Distance to property line that can be built upon	5—Distance to street, alley, public way
	gallon	feet	feet	feet
IA	2,200	5	20	10
IB	4,400	5	20	10
IC	8,800	5	20	10
II	17,600	5	10	5
III	44,000	5	10	5

NOTE 1: When 2 or more classes of materials are stored in a single pile, the maximum gallonage in that pile shall be the smallest of the 2 or more separate gallonages.
NOTE 2: Within 200 ft. of each portable tank, there shall be a 12-ft. wide access way to permit approach of fire control apparatus.
NOTE 3: The distances listed apply to properties that have protection for exposures as defined. If there are exposures, and such protection for exposures does not exist, the distances in column 4 shall be doubled.
NOTE 4: When total quantity stored does not exceed 50 percent of maximum per pile, the distances in columns 4 and 5 may be reduced 50 percent, but not less than 3 ft.

(*a*) At least one portable fire extinguisher having a rating of not less than 12–B units shall be located outside of, but not more than 10 feet from, the door opening into any room used for storage.

(*b*) At least one portable fire extinguisher having a rating of not less than 12–B units must be located not less than 10 feet, nor more than 25 feet, from any Class I or Class II liquid storage area located outside of a storage room but inside a building.

(ii) *Sprinklers.* When sprinklers are provided, they shall be installed in accordance with § 1910.159.

(iii) *Open flames and smoking.* Open flames and smoking shall not be permitted in flammable or combustible liquid storage areas.

(iv) *Water reactive materials.* Materials which will react with water shall not be stored in the same room with flammable or combustible liquids.

(e) *Industrial plants*—(1) *Scope*—(i) *Application.* This paragraph shall apply to those industrial plants where:

(*a*) The use of flammable or combustible liquids is incidental to the principal business, or

(*b*) Where flammable or combustible liquids are handled or used only in unit physical operations such as mixing, drying, evaporating, filtering, distillation, and similar operations which do not involve chemical reaction. This paragraph shall not apply to chemical plants, refineries or distilleries.

(ii) *Exceptions.* Where portions of such plants involve chemical reactions such as oxidation, reduction, halogenation, hydrogenation, alkylation, polymerization, and other chemical processes, those portions of the plant shall be in accordance with paragraph (h) of this section.

(2) *Incidental storage or use of flammable and combustible liquids*—(i) *Application.* This subparagraph shall be applicable to those portions of an industrial plant where the use and handling of flammable or combustible liquids is only incidental to the principal business, such as automobile assembly, construction of electronic equipment, furniture manufacturing, or other similar activities.

(ii) *Containers.* Flammable or combustible liquids shall be stored in tanks or closed containers.

(*a*) Except as provided in subdivisions (*b*) and (*c*) of this subdivision, all storage shall comply with paragraph (d) (3) or (4) of this section.

(*b*) The quantity of liquid that may be located outside of an inside storage room or storage cabinet in a building or in any one fire area of a building shall not exceed:

(*1*) 25 gallons of Class IA liquids in containers

(*2*) 120 gallons of Class IB, IC, II, or III liquids in containers

(*3*) 660 gallons of Class IB, IC, II, or III liquids in a single portable tank.

(*c*) Where large quantities of flammable or combustible liquids are necessary, storage may be in tanks which shall comply with the applicable requirements of paragraph (b) of this section.

(iii) *Separation and protection.* Areas in which flammable or combustible liquids are transferred from one tank or container to another container shall be separated from other operations in the building by adequate distance or by construction having adequate fire resistance. Drainage or other means shall be provided to control spills. Adequate natural or mechanical ventilation shall be provided.

(iv) *Handling liquids at point of final use.* (*a*) Flammable liquids shall be kept in covered containers when not actually in use.

(*b*) Where flammable or combustible liquids are used or handled, except in closed containers, means shall be provided to dispose promptly and safely of leakage or spills.

(*c*) Class I liquids may be used only where there are no open flames or other sources of ignition within the possible path of vapor travel.

(*d*) Flammable or combustible liquids shall be drawn from or transferred into vessels, containers, or portable tanks within a building only through a closed piping system, from safety cans, by means of a device drawing through the top, or from a container or portable tanks by gravity through an approved self-closing valve. Transferring by means of air pressure on the container or portable tanks shall be prohibited.

(3) *Unit physical operations*—(i) *Application.* This subparagraph shall be applicable in those portions of industrial plants where flammable or combustible liquids are handled or used in unit physical operations such as mixing, drying, evaporating, filtering, distillation, and similar operations which do not involve chemical change. Examples are plants compounding cosmetics, pharmaceuticals, solvents, cleaning fluids, insecticides, and similar types of activities.

(ii) *Location.* Industrial plants shall be located so that each building or unit of equipment is accessible from at least one side for firefighting and fire control purposes. Buildings shall be located with respect to lines of adjoining property which may be built upon as set forth in paragraph (h)(2) (i) and (ii) of this section except that the blank wall referred to in paragraph (h)(2)(ii) of this section shall have a fire resistance rating of at least 2 hours.

(iii) *Chemical processes.* Areas where unstable liquids are handled or small scale unit chemical processes are carried on shall be separated from the remainder of the plant by a fire wall of 2-hour minimum fire resistance rating.

(iv) *Drainage.* (*a*) Emergency drainage systems shall be provided to direct flammable or combustible liquid leakage and fire protection water to a safe location. This may require curbs, scuppers, or special drainage systems to control the spread of fire; see paragraph (b)(2)(vii)(*b*) of this section.

(*b*) Emergency drainage systems, if connected to public sewers or discharged into public waterways, shall be equipped with traps or separator.

(v) *Ventilation.* (*a*) Areas as defined in subdivision (i) of this subparagraph using Class I liquids shall be ventilated at a rate of not less than 1 cubic foot per minute per square foot of solid floor area. This shall be accomplished by natural or mechanical ventilation with discharge or exhaust to a safe location outside of the building. Provision shall be made for introduction of makeup air in such a manner as not to short circuit the ventilation. Ventilation shall be arranged to include all floor areas or pits where flammable vapors may collect.

(*b*) Equipment used in a building and the ventilation of the building shall be designed so as to limit flammable vapor-air mixtures under normal operating conditions to the interior of equipment, and to not more than 5 feet from equipment which exposes Class I liquids to the air. Examples of such equipment are dispensing stations, open centrifuges, plate and frame filters, open vacuum filters, and surfaces of open equipment.

(vi) *Storage and handling.* The storage, transfer, and handling of liquid shall comply with paragraph (h)(4) of this section.

(4) *Tank vehicle and tank car loading and unloading.* (i) Tank vehicle and tank car loading or unloading facilities shall be separated from aboveground tanks, warehouses, other plant buildings or nearest line of adjoining property which may be built upon by a distance of 25 feet for Class I liquids and 15 feet for Class II and Class III liquids measured from the nearest position of any fill stem. Buildings for pumps or shelters for personnel may be a part of the facility. Operations of the facility shall comply with the appropriate portions of paragraph (f)(3) of this section.

(ii) [Reserved]

(5) *Fire control*—(i) *Portable and special equipment.* Portable fire extinguishment and control equipment shall be provided in such quantities and types as are needed for the special hazards of operation and storage.

(ii) *Water supply.* Water shall be available in volume and at adequate pressure to supply water hose streams, foam-producing equipment, automatic sprinklers, or water spray systems as the need is indicated by the special hazards of operation, dispensing and storage.

(iii) *Special extinguishers.* Special extinguishing equipment such as that utilizing foam, inert gas, or dry chemical shall be provided as the need is indicated by the special hazards of operation dispensing and storage.

(iv) *Special hazards.* Where the need is indicated by special hazards of operation, flammable or combustible liquid processing equipment, major piping, and supporting steel shall be protected by approved water spray systems, deluge systems, approved fire-resistant

coatings, insulation, or any combination of these.

(v) *Maintenance.* All plant fire protection facilities shall be adequately maintained and periodically inspected and tested to make sure they are always in satisfactory operating condition, and they will serve their purpose in time of emergency.

(6) *Sources of ignition*—(i) *General.* Adequate precautions shall be taken to prevent the ignition of flammable vapors. Sources of ignition include but are not limited to open flames; lightning; smoking; cutting and welding; hot surfaces; frictional heat; static, electrical, and mechanical sparks; spontaneous ignition, including heat-producing chemical reactions; and radiant heat.

(ii) *Grounding.* Class I liquids shall not be dispensed into containers unless the nozzle and container are electrically interconnected. Where the metallic floorplate on which the container stands while filling is electrically connected to the fill stem or where the fill stem is bonded to the container during filling operations by means of a bond wire, the provisions of this section shall be deemed to have been complied with.

(7) *Electrical*—(i) *Equipment.* (*a*) All electrical wiring and equipment shall be installed according to the requirements of Subpart S of this part.

(*b*) Locations where flammable vapor-air mixtures may exist under normal operations shall be classified Class I, Division 1 according to the requirements of Subpart S of this part. For those pieces of equipment installed in accordance with subparagraph (3)(v)(*b*) of this paragraph, the Division 1 area shall extend 5 feet in all directions from all points of vapor liberation. All areas within pits shall be classified Division 1 if any part of the pit is within a Division 1 or 2 classified area, unless the pit is provided with mechanical ventilation.

(*c*) Locations where flammable vapor-air mixtures may exist under abnormal conditions and for a distance beyond Division 1 locations shall be classified Division 2 according to the requirements of Subpart S of this part. These locations include an area within 20 feet horizontally, 3 feet vertically beyond a Division 1 area, and up to 3 feet above floor or grade level within 25 feet, if indoors, or 10 feet if outdoors, from any pump, bleeder, withdrawal fitting, meter, or similar device handling Class I liquids. Pits provided with adequate mechanical ventilation within a Division 1 or 2 area shall be classified Division 2. If Class II or Class III liquids only are handled, then ordinary electrical equipment is satisfactory though care shall be used in locating electrical apparatus to prevent hot metal from falling into open equipment.

(*d*) Where the provisions of subdivisions (*a*), (*b*), and (*c*), of this subdivision require the installation of electrical equipment suitable for Class I, Division 1 or Division 2 locations, ordinary electrical equipment including switchgear may be used if installed in a room or enclosure which is maintained under positive pressure with respect to the hazardous area. Ventilation makeup air shall be uncontaminated by flammable vapors.

(8) *Repairs to equipment.* Hot work, such as welding or cutting operations, use of spark-producing power tools, and chipping operations shall be permitted only under supervision of an individual in responsible charge. The individual in responsible charge shall make an inspection of the area to be sure that it is safe for the work to be done and that safe procedures will be followed for the work specified.

(9) *Housekeeping*—(i) *General.* Maintenance and operating practices shall be in accordance with established procedures which will tend to control leakage and prevent the accidental escape of flammable or combustible liquids. Spills shall be cleaned up promptly.

(ii) *Access.* Adequate aisles shall be maintained for unobstructed movement of personnel and so that fire protection equipment can be brought to bear on any part of flammable or combustible liquid storage, use, or any unit physical operation.

(iii) *Waste and residue.* Combustible waste material and residues in a building or unit operating area shall be kept to a minimum, stored in covered metal receptacles and disposed of daily.

(iv) *Clear zone.* Ground area around buildings and unit operating areas shall be kept free of weeds, trash, or

other unnecessary combustible materials.

(f) *Bulk plants*—(1) *Storage*—(i) *Class I liquids.* Class I liquids shall be stored in closed containers, or in storage tanks above ground outside of buildings, or underground in accordance with paragraph (b) of this section.

(ii) *Class II and III liquids.* Class II and Class III liquids shall be stored in containers, or in tanks within buildings or above ground outside of buildings, or underground in accordance with paragraph (b) of this section.

(iii) *Piling containers.* Containers of flammable or combustible liquids when piled one upon the other shall be separated by dunnage sufficient to provide stability and to prevent excessive stress on container walls. The height of the pile shall be consistent with the stability and strength of containers.

(2) *Buildings*—(i) *Exits.* Rooms in which flammable or combustible liquids are stored or handled by pumps shall have exit facilities arranged to prevent occupants from being trapped in the event of fire.

(ii) *Heating.* Rooms in which Class I liquids are stored or handled shall be heated only by means not constituting a source of ignition, such as steam or hot water. Rooms containing heating appliances involving sources of ignition shall be located and arranged to prevent entry of flammable vapors.

(iii) *Ventilation.* (*a*) Ventilation shall be provided for all rooms, buildings, or enclosures in which Class I liquids are pumped or dispensed. Design of ventilation systems shall take into account the relatively high specific gravity of the vapors. Ventilation may be provided by adequate openings in outside walls at floor level unobstructed except by louvers or coarse screens. Where natural ventilation is inadequate, mechanical ventilation shall be provided.

(*b*) Class I liquids shall not be stored or handled within a building having a basement or pit into which flammable vapors may travel, unless such area is provided with ventilation designed to prevent the accumulation of flammable vapors therein.

(*c*) Containers of Class I liquids shall not be drawn from or filled within buildings unless provision is made to prevent the accumulation of flammable vapors in hazardous concentrations. Where mechanical ventilation is required, it shall be kept in operation while flammable liquids are being handled.

(3) *Loading and unloading facilities*—(i) *Separation.* Tank vehicle and tank car loading or unloading facilities shall be separated from aboveground tanks, warehouses, other plant buildings or nearest line of adjoining property that may be built upon by a distance of 25 feet for Class I liquids and 15 feet for Class II and Class III liquids measured from the nearest position of any fill spout. Buildings for pumps or shelters for personnel may be a part of the facility.

(ii) *Class restriction.* Equipment such as piping, pumps, and meters used for the transfer of Class I liquids between storage tanks and the fill stem of the loading rack shall not be used for the transfer of Class II or Class III liquids.

(iii) *Valves.* Valves used for the final control for filling tank vehicles shall be of the self-closing type and manually held open except where automatic means are provided for shutting off the flow when the vehicle is full or after filling of a preset amount.

(iv) *Static protection.* (*a*) Bonding facilities for protection against static sparks during the loading of tank vehicles through open domes shall be provided:

(*1*) Where Class I liquids are loaded, or

(*2*) Where Class II or Class III liquids are loaded into vehicles which may contain vapors from previous cargoes of Class I liquids.

(*b*) Protection as required in (*a*) of this subdivision (iv) shall consist of a metallic bond wire permanently electrically connected to the fill stem or to some part of the rack structure in electrical contact with the fill stem. The free end of such wire shall be provided with a clamp or equivalent device for convenient attachment to some metallic part in electrical contact with the cargo tank of the tank vehicle.

(*c*) Such bonding connection shall be made fast to the vehicle or tank before dome covers are raised and shall remain in place until filling is completed and all dome covers have been closed and secured.

(*d*) Bonding as specified in (*a*), (*b*), and (*c*) of this subdivision is not required:

(*1*) Where vehicles are loaded exclusively with products not having a static accumulating tendency, such as asphalt, most crude oils, residual oils, and water soluble liquids;

(*2*) Where no Class I liquids are handled at the loading facility and the tank vehicles loaded are used exclusively for Class II and Class III liquids; and

(*3*) Where vehicles are loaded or unloaded through closed bottom or top connections.

(*e*) Filling through open domes into the tanks of tank vehicles or tank cars, that contain vapor-air mixtures within the flammable range or where the liquid being filled can form such a mixture, shall be by means of a downspout which extends near the bottom of the tank. This precaution is not required when loading liquids which are non-accumulators of static charges.

(v) *Stray currents.* Tank car loading facilities where Class I liquids are loaded through open domes shall be protected against stray currents by bonding the pipe to at least one rail and to the rack structure if of metal. Multiple lines entering the rack area shall be electrically bonded together. In addition, in areas where excessive stray currents are known to exist, all pipe entering the rack area shall be provided with insulating sections to electrically isolate the rack piping from the pipelines. No bonding between the tank car and the rack or piping is required during either loading or unloading of Class II or III liquids.

(vi) *Container filling facilities.* Class I liquids shall not be dispensed into containers unless the nozzle and container are electrically interconnected. Where the metallic floorplate on which the container stands while filling is electrically connected to the fill stem or where the fill stem is bonded to the container during filling operations by means of a bond wire, the provisions of this section shall be deemed to have been complied with.

(4) *Wharves*—(i) *Definition, application.* The term wharf shall mean any wharf, pier, bulkhead, or other structure over or contiguous to navigable water used in conjunction with a bulk plant, the primary function of which is the transfer of flammable or combustible liquid cargo in bulk between the bulk plant and any tank vessel, ship, barge, lighter boat, or other mobile floating craft; and this subparagraph shall apply to all such installations except Marine Service Stations as covered in paragraph (g) of this section.

(ii)–(iii) [Reserved]

(iv) *Design and construction.* Substructure and deck shall be substantially designed for the use intended. Deck may employ any material which will afford the desired combination of flexibility, resistance to shock, durability, strength, and fire resistance. Heavy timber construction is acceptable.

(v) [Reserved]

(vi) *Pumps.* Loading pumps capable of building up pressures in excess of the safe working pressure of cargo hose or loading arms shall be provided with bypasses, relief valves, or other arrangement to protect the loading facilities against excessive pressure. Relief devices shall be tested at not more than yearly intervals to determine that they function satisfactorily at the pressure at which they are set.

(vii) *Hoses and couplings.* All pressure hoses and couplings shall be inspected at intervals appropriate to the service. The hose and couplings shall be tested with the hose extended and using the ''inservice maximum operating pressures.'' Any hose showing material deteriorations, signs of leakage, or weakness in its carcass or at the couplings shall be withdrawn from service and repaired or discarded.

(viii) *Piping and fittings.* Piping, valves, and fittings shall be in accordance with paragraph (c) of this section, with the following exceptions and additions:

(*a*) Flexibility of piping shall be assured by appropriate layout and arrangement of piping supports so that motion of the wharf structure resulting from wave action, currents, tides, or the mooring of vessels will not subject the pipe to repeated strain beyond the elastic limit.

(*b*) Pipe joints depending upon the friction characteristics of combustible materials or grooving of pipe ends for

mechanical continuity of piping shall not be used.

(*c*) Swivel joints may be used in piping to which hoses are connected, and for articulated swivel-joint transfer systems, provided that the design is such that the mechanical strength of the joint will not be impaired if the packing material should fail, as by exposure to fire.

(*d*) Piping systems shall contain a sufficient number of valves to operate the system properly and to control the flow of liquid in normal operation and in the event of physical damage.

(*e*) In addition to the requirements of subdivision (*d*) of this subdivision, each line conveying flammable liquids leading to a wharf shall be provided with a readily accessible block valve located on shore near the approach to the wharf and outside of any diked area. Where more than one line is involved, the valves shall be grouped in one location.

(*f*) Means of easy access shall be provided for cargo line valves located below the wharf deck.

(*g*) Pipelines on flammable or combustible liquids wharves shall be adequately bonded and grounded. If excessive stray currents are encountered, insulating joints shall be installed. Bonding and grounding connections on all pipelines shall be located on wharfside of hose-riser insulating flanges, if used, and shall be accessible for inspection.

(*h*) Hose or articulated swivel-joint pipe connections used for cargo transfer shall be capable of accommodating the combined effects of change in draft and maximum tidal range, and mooring lines shall be kept adjusted to prevent the surge of the vessel from placing stress on the cargo transfer system.

(*i*) Hose shall be supported so as to avoid kinking and damage from chafing.

(ix) *Fire protection.* Suitable portable fire extinguishers with a rating of not less than 12–BC shall be located within 75 feet of those portions of the facility where fires are likely to occur, such as hose connections, pumps, and separator tanks.

(*a*) Where piped water is available, ready-connected fire hose in size appropriate for the water supply shall be provided so that manifolds where connections are made and broken can be reached by at least one hose stream.

(*b*) Material shall not be placed on wharves in such a manner as to obstruct access to firefighting equipment, or important pipeline control valves.

(*c*) Where the wharf is accessible to vehicle traffic, an unobstructed roadway to the shore end of the wharf shall be maintained for access of firefighting apparatus.

(x) *Operations control.* Loading or discharging shall not commence until the wharf superintendent and officer in charge of the tank vessel agree that the tank vessel is properly moored and all connections are properly made. Mechanical work shall not be performed on the wharf during cargo transfer, except under special authorization based on a review of the area involved, methods to be employed, and precautions necessary.

(5) *Electrical equipment*—(i) *Application.* This subparagraph shall apply to areas where Class I liquids are stored or handled. For areas where Class II or Class III liquids only are stored or handled, the electrical equipment may be installed in accordance with the provisions of Subpart S of this part, for ordinary locations.

(ii) *Conformance.* All electrical equipment and wiring shall be of a type specified by and shall be installed in accordance with Subpart S of this part.

(iii) *Classification.* So far as it applies Table H–18 shall be used to delineate and classify hazardous areas for the purpose of installation of electrical equipment under normal circumstances. In Table H–18 a classified area shall not extend beyond an unpierced wall, roof, or other solid partition. The area classifications listed shall be based on the premise that the installation meets the applicable requirements of this section in all respects.

(6) *Sources of ignition.* Class I liquids shall not be handled, drawn, or dispensed where flammable vapors may reach a source of ignition. Smoking shall be prohibited except in designated localities. ''No Smoking'' signs shall be conspicuously posted where hazard from flammable liquid vapors is normally present.

(7) *Drainage and waste disposal.* Provision shall be made to prevent flammable or combustible liquids which may be spilled at loading or unloading points from entering public sewers and drainage systems, or natural waterways. Connection to such sewers, drains, or waterways by which flammable or combustible liquids might enter shall be provided with separator boxes or other approved means whereby such entry is precluded. Crankcase drainings and flammable or combustible liquids shall not be dumped into sewers, but shall be stored in tanks or tight drums outside of any building until removed from the premises.

(8) *Fire control.* Suitable fire-control devices, such as small hose or portable fire extinguishers, shall be available to locations where fires are likely to occur. Additional fire-control equipment may be required where a tank of more than 50,000 gallons individual capacity contains Class I liquids and where an unusual exposure hazard exists from surrounding property. Such additional fire-control equipment shall be sufficient to extinguish a fire in the largest tank. The design and amount of such equipment shall be in accordance with approved engineering standards.

(g) *Service stations*—(1) *Storage and handling*—(i) *General provisions.* (*a*) Liquids shall be stored in approved closed containers not exceeding 60 gallons capacity, in tanks located underground, in tanks in special enclosures as described in paragraph (g)(i) of this section, or in aboveground tanks as provided for in paragraphs (g)(4)(ii), (*b*), (*c*) and (*d*) of this section.

(*b*) Aboveground tanks, located in an adjoining bulk plant, may be connected by piping to service station underground tanks if, in addition to valves at aboveground tanks, a valve is also installed within control of service station personnel.

(*c*) Apparatus dispensing Class I liquids into the fuel tanks of motor vehicles of the public shall not be located at a bulk plant unless separated by a fence or similar barrier from the area in which bulk operations are conducted.

(*d*) [Reserved]

(*e*) The provisions of paragraph (g)(1)(i)(*a*) of this section shall not prohibit the dispensing of flammable liquids in the open from a tank vehicle to a motor vehicle. Such dispensing shall be permitted provided:

(*1*) The tank vehicle complies with the requirements covered in the Standard on Tank Vehicles for Flammable Liquids, NFPA 385–1966.

(*2*) The dispensing is done on premises not open to the public.

(*3*) [Reserved]

(*4*) The dispensing hose does not exceed 50 feet in length.

(*5*) The dispensing nozzle is a listed automatic-closing type without a latchopen device.

(*f*) Class I liquids shall not be stored or handled within a building having a basement or pit into which flammable vapors may travel, unless such area is provided with ventilation designed to prevent the accumulation of flammable vapors therein.

(*g*) [Reserved]

TABLE H–18—ELECTRICAL EQUIPMENT HAZARDOUS AREAS—BULK PLANTS

Location	Class I Group D division	Extent of classified area
Tank vehicle and tank car: [1]		
Loading through open dome	1	Within 3 feet of edge of dome, extending in all directions.
	2	Area between 3 feet and 5 feet from edge of dome, extending in all directions.
Loading through bottom connections with atmospheric venting.	1	Within 3 feet of point of venting to atmosphere extending in all directions.
	2	Area between 3 feet and 5 feet from point of venting to atmosphere, extending in all directions. Also up to 18 inches above grade within a horizontal radius of 10 feet from point of loading connection.
Loading through closed dome with atmospheric venting.	1	Within 3 feet of open end of vent, extending in all directions.
	2	Area between 3 feet and 5 feet from open end of vent, extending in all directions. Also within 3 feet of edge of dome, extending in all directions.

TABLE H–18—ELECTRICAL EQUIPMENT HAZARDOUS AREAS—BULK PLANTS—Continued

Location	Class I Group D division	Extent of classified area
Loading through closed dome with vapor recovery.	2	Within 3 feet of point of connection of both fill and vapor lines, extending in all directions.
Bottom loading with vapor recovery or any bottom unloading.	2	Within 3 feet of point of connections extending in all directions. Also up to 18 inches above grade with in a horizontal radius of 10 feet from point of connection.
Drum and container filling:		
Outdoors, or indoors with adequate ventilation	1	Within 3 feet of vent and fill opening, extending in all directions.
	2	Area between 3 feet and 5 feet from vent or fill opening, extending in all directions. Also up to 18 inches above floor or grade level within a horizontal radius of 10 feet from vent or fill opening.
Outdoors, or indoors with adequate ventilation	1	Within 3 feet of vent and fill opening, extending in all directions.
	2	Area between 3 feet and 5 feet from vent or fill opening, extending in all directions. Also up to 18 inches above floor or grade level within a horizontal radius of 10 feet from vent or fill opening.
Tank—Aboveground:		
Shell, ends, or roof and dike area	2	Within 10 feet from shell, ends, or roof of tank, Area inside dikes to level of top of dike.
Vent	1	Within 5 feet of open end of vent, extending in all directions.
	2	Area between 5 feet and 10 feet from open end of vent, extending in all directions.
Floating roof	1	Area above the roof and within the shell.
Pits:		
Without mechanical ventilation	1	Entire area within pit if any part is within a Division 1 or 2 classified area.
With mechanical ventilation	2	Entire area within pit if any part is within a Division 1 or 2 classified area.
Containing valves, fittings or piping, and not within a Division 1 or 2 classified area.	2	Entire pit.
Pumps, bleeders, withdrawal fittings, meters and similar devices:		
Indoors	2	Within 5 feet of any edge of such devices, extending in all directions. Also up to 3 feet above floor or grade level within 25 feet horizontally from any edge of such devices.
Outdoors	2	Within 3 feet of any edge of such devices, extending in all directions. Also up to 18 inches above grade level within 10 feet horizontally from any edge of such devices.
Storage and repair garage for tank vehicles	1	All pits or spaces below floor level.
	2	Area up to 18 inches above floor or grade level for entire storage or repair garage.
Drainage ditches, separators, impounding basins.	2	Area up to 18 inches above ditch, separator or basin. Also up to 18 inches above grade within 15 feet horizontally from any edge.
Garages for other than tank vehicles	(2)	If there is any opening to these rooms within the extent of an outdoor classified area, the entire room shall be classified the same as the area classification at the point of the opening.
Outdoor drum storage	(2)	
Indoor warehousing where there is no flammable liquid transfer.	(2)	If there is any opening to these rooms within the extent of an indoor classified are, the room shall be classified the same as if the wall, curb or partition did not exist.
Office and rest rooms	(2)	

[1] When classifying the extent of the area, consideration shall be given to the fact that tank cars or tank vehicles may be spotted at varying points. Therefore, the extremities of the loading or unloading positions shall be used.
[2] Ordinary.

(ii) *Special enclosures.* (*a*) When installation of tanks in accordance with paragraph (b)(3) of this section is impractical because of property or building limitations, tanks for flammable or combustible liquids may be installed in buildings if properly enclosed.

(*b*) The enclosure shall be substantially liquid and vaportight without backfill. Sides, top, and bottom of the enclosure shall be of reinforced concrete at least 6 inches thick, with openings for inspection through the top only. Tank connections shall be so

piped or closed that neither vapors nor liquid can escape into the enclosed space. Means shall be provided whereby portable equipment may be employed to discharge to the outside any liquid or vapors which might accumulate should leakage occur.

(iii) *Inside buildings.* (*a*) Except where stored in tanks as provided in subdivision (ii) of this subparagraph, no Class I liquids shall be stored within any service station building except in closed containers of aggregate capacity not exceeding 60 gallons. One container not exceeding 60 gallons capacity equipped with an approved pump is permitted.

(*b*) Class I liquids may be transferred from one container to another in lubrication or service rooms of a service station building provided the electrical installation complies with Table H–19 and provided that any heating equipment complies with subparagraph (6) of this paragraph.

(*c*) Class II and Class III liquids may be stored and dispensed inside service station buildings from tanks of not more than 120 gallons capacity each.

(iv) [Reserved]

(v) *Dispensing into portable containers.* No delivery of any Class I liquids shall be made into portable containers unless the container is constructed of metal, has a tight closure with screwed or spring cover, and is fitted with a spout or so designed that the contents can be poured without spilling.

(2) [Reserved]

(3) *Dispensing systems*—(i) *Location.* Dispensing devices at automotive service stations shall be so located that all parts of the vehicle being served will be on the premises of the service station.

(ii) *Inside location.* Approved dispensing units may be located inside of buildings. The dispensing area shall be separated from other areas in an approved manner. The dispensing unit and its piping shall be mounted either on a concrete island or protected against collision damage by suitable means and shall be located in a position where it cannot be struck by a vehicle descending a ramp or other slope out of control. The dispensing area shall be provided with an approved mechanical or gravity ventilation system. When dispensing units are located below grade, only approved mechanical ventilation shall be used and the entire dispensing area shall be protected by an approved automatic sprinkler system. Ventilating systems shall be electrically interlocked with gasoline dispensing units so that the dispensing units cannot be operated unless the ventilating fan motors are energized.

(iii) *Emergency power cutoff.* A clearly identified and easily accessible switch(es) or a circuit breaker(s) shall be provided at a location remote from dispensing devices, including remote pumping systems, to shut off the power to all dispensing devices in the event of an emergency.

(iv) *Dispensing units.* (*a*) Class I liquids shall be transferred from tanks by means of fixed pumps so designed and equipped as to allow control of the flow and to prevent leakage or accidental discharge.

(*b*)(*1*) Only listed devices may be used for dispensing Class I liquids. No such device may be used if it shows evidence of having been dismantled.

(*2*) Every dispensing device for Class I liquids installed after December 31, 1978, shall contain evidence of listing so placed that any attempt to dismantle the device will result in damage to such evidence, visible without disassembly or dismounting of the nozzle.

(*c*) Class I liquids shall not be dispensed by pressure from drums, barrels, and similar containers. Approved pumps taking suction through the top of the container or approved self-closing faucets shall be used.

(*d*) The dispensing units, except those attached to containers, shall be mounted either on a concrete island or protected against collision damage by suitable means.

(v) *Remote pumping systems.*

(*a*) This subdivision shall apply to systems for dispensing Class I liquids where such liquids are transferred from storage to individual or multiple dispensing units by pumps located elsewhere than at the dispensing units.

(*b*) Pumps shall be designed or equipped so that no part of the system will be subjected to pressures above its allowable working pressure. Pumps installed above grade, outside of buildings, shall be located not less than 10

feet from lines of adjoining property which may be built upon, and not less than 5 feet from any building opening. When an outside pump location is impractical, pumps may be installed inside of buildings, as provided for dispensers in subdivision (ii) of this subparagraph, or in pits as provided in subdivision (*c*) of this subdivision. Pumps shall be substantially anchored and protected against physical damage by vehicles.

(*c*) Pits for subsurface pumps or piping manifolds of submersible pumps shall withstand the external forces to which they may be subjected without damage to the pump, tank, or piping. The pit shall be no larger than necessary for inspection and maintenance and shall be provided with a fitted cover.

(*d*) A control shall be provided that will permit the pump to operate only when a dispensing nozzle is removed from its bracket on the dispensing unit and the switch on this dispensing unit is manually actuated. This control shall also stop the pump when all nozzles have been returned to their brackets.

(*e*) An approved impact valve, incorporating a fusible link, designed to close automatically in the event of severe impact or fire exposure shall be properly installed in the dispensing supply line at the base of each individual dispensing device.

(*f*) Testing. After the completion of the installation, including any paving, that section of the pressure piping system between the pump discharge and the connection for the dispensing facility shall be tested for at least 30 minutes at the maximum operating pressure of the system. Such tests shall be repeated at 5-year intervals thereafter.

(vi) *Delivery nozzles.* (*a*) A listed manual or automatic-closing type hose nozzle valve shall be provided on dispensers used for the dispensing of Class I liquids.

(*b*) Manual-closing type valves shall be held open manually during dispensing. Automatic-closing type valves may be used in conjunction with an approved latch-open device.

(4) *Marine service stations*—(i) *Dispensing.* (*a*) The dispensing area shall be located away from other structures so as to provide room for safe ingress and egress of craft to be fueled. Dispensing units shall in all cases be at least 20 feet from any activity involving fixed sources of ignition.

(*b*) Dispensing shall be by approved dispensing units with or without integral pumps and may be located on open piers, wharves, or floating docks or on shore or on piers of the solid fill type.

(*c*) Dispensing nozzles shall be automatic-closing without a hold-open latch.

(ii) *Tanks and pumps.* (*a*) Tanks, and pumps not integral with the dispensing unit, shall be on shore or on a pier of the solid fill type, except as provided in paragraphs (g)(4)(ii) (*b*) and (*c*) of this section.

(*b*) Where shore location would require excessively long supply lines to dispensers, tanks may be installed on a pier provided that applicable portions of paragraph (b) of this section relative to spacing, diking, and piping are complied with and the quantity so stored does not exceed 1,100 gallons aggregate capacity.

(*c*) Shore tanks supplying marine service stations may be located above ground, where rock ledges or high water table make underground tanks impractical.

(*d*) Where tanks are at an elevation which would produce gravity head on the dispensing unit, the tank outlet shall be equipped with a pressure control valve positioned adjacent to and outside the tank block valve specified in paragraph (b)(2)(ix)(*b*) of this section, so adjusted that liquid cannot flow by gravity from the tank in case of piping or hose failure.

(iii) *Piping.* (*a*) Piping between shore tanks and dispensing units shall be as described in paragraph (*c*) of this section, except that, where dispensing is from a floating structure, suitable lengths of oil-resistant flexible hose may be employed between the shore piping and the piping on the floating structure as made necessary by change in water level or shoreline.

TABLE H–19—ELECTRICAL EQUIPMENT HAZARDOUS AREAS—SERVICE STATIONS

Location	Class I Group D division	Extent of classified area
Underground tank:		
Fill opening	1	Any pit, box or space below grade level, any part of which is within the Division 1 or 2 classified area.
	2	Up to 18 inches above grade level within a horizontal radius of 10 feet from a loose fill connection and within a horizontal radius of 5 feet from a tight fill connection.
Vent—Discharging upward	1	Within 3 feet of open end of vent, extending in all directions.
	2	Area between 3 feet and 5 feet of open end of vent, extending in all directions.
Dispenser:		
Pits	1	Any pit, box or space below grade level, any part of which is within the Division 1 or 2 classified area.
Dispenser enclosure	1	The area 4 feet vertically above base within the enclosure and 18 inches horizontally in all directions.
Outdoor	2	Up to 18 inches above grade level within 20 feet horizontally of any edge of enclosure.
Indoor:		
With mechanical ventilation	2	Up to 18 inches above grade or floor level within 20 feet horizontally of any edge of enclosure.
With gravity ventilation	2	Up to 18 inches above grade or floor level within 25 feet horizontally of any edge of enclosure.
Remote pump—Outdoor	1	Any pit, box or space below grade level if any part is within a horizontal distance of 10 feet from any edge of pump.
	2	Within 3 feet of any edge of pump, extending in all directions. Also up to 18 inches above grade level within 10 feet horizontally from any edge of pump.
Remote pump—Indoor	1	Entire area within any pit.
	2	Within 5 feet of any edge of pump, extending in all directions. Also up to 3 feet above floor or grade level within 25 feet horizontally from any edge of pump.
Lubrication or service room	1	Entire area within any pit.
	2	Area up to 18 inches above floor or grade level within entire lubrication room.
Dispenser for Class I liquids	2	Within 3 feet of any fill or dispensing point, extending in all directions.
Special enclosure inside building per § 1910.–106(f)(1)(ii).	1	Entire enclosure.
Sales, storage and rest rooms	([1])	If there is any opening to these rooms within the extent of a Division 1 area, the entire room shall be classified as Division 1.

[1] Ordinary.

(*b*) A readily accessible valve to shut off the supply from shore shall be provided in each pipeline at or near the approach to the pier and at the shore end of each pipeline adjacent to the point where flexible hose is attached.

(*c*) Piping shall be located so as to be protected from physical damage.

(*d*) Piping handling Class I liquids shall be grounded to control stray currents.

(5) *Electrical equipment*—(i) *Application*. This subparagraph shall apply to areas where Class I liquids are stored or handled. For areas where Class II or Class III liquids are stored or handled the electrical equipment may be installed in accordance with the provisions of subpart S of this part, for ordinary locations.

(ii) All electrical equipment and wiring shall be of a type specified by and shall be installed in accordance with subpart S of this part.

(iii) So far as it applies. Table H–19 shall be used to delineate and classify hazardous areas for the purpose of installation of electrical equipment under normal circumstances. A classified area shall not extend beyond an unpierced wall, roof, or other solid partition.

(iv) The area classifications listed shall be based on the assumption that the installation meets the applicable requirements of this section in all respects.

(6) *Heating equipment*—(i) *Conformance.* Heating equipment shall be installed as provided in paragraphs (g)(6)(ii) through (v) of this section.

(ii) *Application.* Heating equipment may be installed in the conventional manner in an area except as provided in paragraph (g)(6) (iii), (iv), or (v) of this section.

(iii) *Special room.* Heating equipment may be installed in a special room separated from an area classified by Table H–19 by walls having a fire resistance rating of at least 1 hour and without any openings in the walls within 8 feet of the floor into an area classified in Table H–19. This room shall not be used for combustible storage and all air for combustion purposes shall come from outside the building.

(iv) *Work areas.* Heating equipment using gas or oil fuel may be installed in the lubrication, sales, or service room where there is no dispensing or transferring of Class I liquids provided the bottom of the combustion chamber is at least 18 inches above the floor and the heating equipment is protected from physical damage by vehicles. Heating equipment using gas or oil fuel listed for use in garages may be installed in the lubrication or service room where Class I liquids are dispensed provided the equipment is installed at least 8 feet above the floor.

(v) *Electric heat.* Electrical heating equipment shall conform to paragraph (g)(5) of this section.

(7) *Drainage and waste disposal.* Provision shall be made in the area where Class I liquids are dispensed to prevent spilled liquids from flowing into the interior of service station buildings. Such provision may be by grading driveways, raising door sills, or other equally effective means. Crankcase drainings and flammable or combustible liquids shall not be dumped into sewers but shall be stored in tanks or drums outside of any building until removed from the premises.

(8) *Sources of ignition.* In addition to the previous restrictions of this paragraph, the following shall apply: There shall be no smoking or open flames in the areas used for fueling, servicing fuel systems for internal combustion engines, receiving or dispensing of flammable or combustible liquids. Conspicuous and legible signs prohibiting smoking shall be posted within sight of the customer being served. The motors of all equipment being fueled shall be shut off during the fueling operation.

(9) *Fire control.* Each service station shall be provided with at least one fire extinguisher having a minimum approved classification of 6 B, C, located so that an extinguisher, will be within 75 feet of each pump, dispenser, underground fill pipe opening, and lubrication or service room.

(h) *Processing plants*—(1) *Scope.* This paragraph shall apply to those plants or buildings which contain chemical operations such as oxidation, reduction, halogenation, hydrogenation, alkylation, polymerization, and other chemical processes but shall not apply to chemical plants, refineries or distillleries.

(2) *Location*—(i) *Classification.* The location of each processing vessel shall be based upon its flammable or combustible liquid capacity.

(ii) [Reserved]

(3) *Processing building*—(i) *Construction.* (*a*) Processing buildings shall be of fire-resistance or noncombustible construction, except heavy timber construction with load-bearing walls may be permitted for plants utilizing only stable Class II or Class III liquids. Except as provided in paragraph (h)(2)(ii) of this section or in the case of explosion resistant walls used in conjunction with explosion relieving facilities, see paragraph (h)(3)(iv) of this section, load-bearing walls are prohibited. Buildings shall be without basements or covered pits.

(*b*) Areas shall have adequate exit facilities arranged to prevent occupants from being trapped in the event of fire. Exits shall not be exposed by the drainage facilities described in paragraph (h)(ii) of this section.

(ii) *Drainage.* (*a*) Emergency drainage systems shall be provided to direct flammable or combustible liquid leakage and fire protection water to a safe location. This may require curbs, scuppers, or special drainage systems to control the spread of fire, see paragraph (b)(2)(vii)(*b*) of this section.

(*b*) Emergency drainage systems, if connected to public sewers or discharged into public waterways, shall be equipped with traps or separators.

(iii) *Ventilation.* (*a*) Enclosed processing buildings shall be ventilated at a rate of not less than 1 cubic foot per minute per square foot of solid floor area. This shall be accomplished by natural or mechanical ventilation with discharge or exhaust to a safe location outside of the building. Provisions shall be made for introduction of makeup air in such a manner as not to short circuit the ventilation. Ventilation shall be arranged to include all floor areas or pits where flammable vapors may collect.

(*b*) Equipment used in a building and the ventilation of the building shall be designed so as to limit flammable vapor-air mixtures under normal operating conditions to the interior of equipment, and to not more than 5 feet from equipment which exposes Class I liquids to the air. Examples of such equipment are dispensing stations, open centrifuges, plate and frame filters, open vacuum filters, and surfaces of open equipment.

(iv) *Explosion relief.* Areas where Class IA or unstable liquids are processed shall have explosion venting through one or more of the following methods:

(*a*) Open air construction.

(*b*) Lightweight walls and roof.

(*c*) Lightweight wall panels and roof hatches.

(*d*) Windows of explosion venting type.

(4) *Liquid handling*—(i) *Storage.* (*a*) The storage of flammable or combustible liquids in tanks shall be in accordance with the applicable provisions of paragraph (b) of this section.

(*b*) If the storage of flammable or combustible liquids in outside aboveground or underground tanks is not practical because of temperature or production considerations, tanks may be permitted inside of buildings or structures in accordance with the applicable provisions of paragraph (b) of this section.

(*c*) Storage tanks inside of buildings shall be permitted only in areas at or above grade which have adequate drainage and are separated from the processing area by construction having a fire resistance rating of at least 2 hours.

(*d*) The storage of flammable or combustible liquids in containers shall be in accordance with the applicable provisions of paragraph (d) of this section.

(ii) *Piping, valves, and fittings.* (*a*) Piping, valves, and fittings shall be in accordance with paragraph (c) of this section.

(*b*) Approved flexible connectors may be used where vibration exists or where frequent movement is necessary. Approved hose may be used at transfer stations.

(*c*) Piping containing flammable or combustible liquids shall be identified.

(iii) *Transfer.* (*a*) The transfer of large quantities of flammable or combustible liquids shall be through piping by means of pumps or water displacement. Except as required in process equipment, gravity flow shall not be used. The use of compressed air as a transferring medium is prohibited.

(*b*) Positive displacement pumps shall be provided with pressure relief discharging back to the tank or to pump suction.

(iv) *Equipment.* (*a*) Equipment shall be designed and arranged to prevent the unintentional escape of liquids and vapors and to minimize the quantity escaping in the event of accidental release.

(*b*) Where the vapor space of equipment is usually within the flammable range, the probability of explosion damage to the equipment can be limited by inerting, by providing an explosion suppression system, or by designing the equipment to contain the peak explosion pressure which may be modified by explosion relief. Where the special hazards of operation, sources of ignition, or exposures indicate a need, consideration shall be given to providing protection by one or more of the above means.

(5) *Tank vehicle and tank car loading and unloading.* Tank vehicle and tank car loading or unloading facilities shall be separated from aboveground tanks, warehouses, other plant buildings, or nearest line of adjoining property which may be built upon by a distance of 25 feet for Class I liquids and 15 feet for Class II and Class III liquids measured from the nearest position of any

fill stem. Buildings for pumps or shelters for personnel may be a part of the facility. Operations of the facility shall comply with the appropriate portions of paragraph (f)(3) of this section.

(6) *Fire control*—(i) *Portable extinguishers.* Approved portable fire extinguishers of appropriate size, type, and number shall be provided.

(ii) *Other controls.* Where the special hazards of operation or exposure indicate a need, the following fire control provision shall be provided.

(*a*) A reliable water supply shall be available in pressure and quantity adequate to meet the probable fire demands.

(*b*) Hydrants shall be provided in accordance with accepted good practice.

(*c*) Hose connected to a source of water shall be installed so that all vessels, pumps, and other equipment containing flammable or combustible liquids can be reached with at least one hose stream. Nozzles that are capable of discharging a water spray shall be provided.

(*d*) Processing plants shall be protected by an approved automatic sprinkler system or equivalent extinguishing system. If special extinguishing systems including but not limited to those employing foam, carbon dioxide, or dry chemical are provided, approved equipment shall be used and installed in an approved manner.

(iii) *Alarm systems.* An approved means for prompt notification of fire to those within the plant and any public fire department available shall be provided. It may be advisable to connect the plant system with the public system where public fire alarm system is available.

(iv) *Maintenance.* All plant fire protection facilities shall be adequately maintained and periodically inspected and tested to make sure they are always in satisfactory operating condition and that they will serve their purpose in time of emergency.

(7) *Sources of ignition*—(i) *General.* (*a*) Precautions shall be taken to prevent the ignition of flammable vapors. Sources of ignition include but are not limited to open flames; lightning; smoking; cutting and welding; hot surfaces; frictional heat; static, electrical, and mechanical sparks; spontaneous ignition, including heat-producing chemical reactions; and radiant heat.

(*b*) Class I liquids shall not be dispensed into containers unless the nozzle and container are electrically interconnected. Where the metallic floorplate on which the container stands while filling is electrically connected to the fill stem or where the fill stem is bonded to the container during filling operations by means of a bond wire, the provisions of this section shall be deemed to have been complied with.

(ii) *Maintenance and repair.* (*a*) When necessary to do maintenance work in a flammable or combustible liquid processing area, the work shall be authorized by a responsible representative of the employer.

(*b*) Hot work, such as welding or cutting operations, use of spark-producing power tools, and chipping operations shall be permitted only under supervision of an individual in responsible charge who shall make an inspection of the area to be sure that it is safe for the work to be done and that safe procedures will be followed for the work specified.

(iii) *Electrical.* (*a*) All electric wiring and equipment shall be installed in accordance with subpart S of this part.

(*b*) Locations where flammable vapor-air mixtures may exist under normal operations shall be classified Class I, Division 1 according to the requirements of subpart S of this part. For those pieces of equipment installed in accordance with paragraph (h)(3)(iii)(*b*) of this section, the Division 1 area shall extend 5 feet in all directions from all points of vapor liberation. All areas within pits shall be classified Division 1 if any part of the pit is within a Division 1 or 2 classified area, unless the pit is provided with mechanical ventilation.

(*c*) Locations where flammable vapor-air mixtures may exist under abnormal conditions and for a distance beyond Division 1 locations shall be classified Division 2 according to the requirements of subpart S of this part. These locations include an area within 20 feet horizontally, 3 feet vertically beyond a Division 1 area, and up to 3 feet above

floor or grade level within 25 feet, if indoors, or 10 feet if outdoors, from any pump, bleeder, withdrawal fitting, meter, or similar device handling Class I liquids. Pits provided with adequate mechanical ventilation within a Division 1 or 2 area shall be classified Division 2. If Class II or Class III liquids only are handled, then ordinary electrical equipment is satisfactory though care shall be used in locating electrical apparatus to prevent hot metal from falling into open equipment.

(*d*) Where the provisions of paragraphs (h)(7)(iii) (*a*), (*b*), and (*c*) of this section require the installation of explosion-proof equipment, ordinary electrical equipment including switchgear may be used if installed in a room or enclosure which is maintained under positive pressure with respect to the hazardous area. Ventilation makeup air shall be uncontaminated by flammable vapors.

(8) *Housekeeping*—(i) *General.* Maintenance and operating practices shall be in accordance with established procedures which will tend to control leakage and prevent the accidental escape of flammable or combustible liquids. Spills shall be cleaned up promptly.

(ii) *Access.* Adequate aisles shall be maintained for unobstructed movement of personnel and so that fire protection equipment can be brought to bear on any part of the processing equipment.

(iii) *Waste and residues.* Combustible waste material and residues in a building or operating area shall be kept to a minimum, stored in closed metal waste cans, and disposed of daily.

(iv) *Clear zone.* Ground area around buildings and operating areas shall be kept free of tall grass, weeds, trash, or other combustible materials.

(i) *Refineries, chemical plants, and distilleries*—(1) *Storage tanks.* Flammable or combustible liquids shall be stored in tanks, in containers, or in portable tanks. Tanks shall be installed in accordance with paragraph (b) of this section. Tanks for the storage of flammable or combustible liquids in tank farms and in locations other than process areas shall be located in accordance with paragraph (b)(2) (i) and (ii) of this section.

(2) *Wharves.* Wharves handling flammable or combustible liquids shall be in accordance with paragraph (f)(4) of this section.

(3) *Fired and unfired pressure vessels*—(i) *Fired vessels.* Fired pressure vessels shall be constructed in accordance with the Code for Fired Pressure Vessels, Section I of the ASME Boiler and Pressure Vessel Code—1968.

(ii) Unfired vessels shall be constructed in accordance with the Code for Unfired Pressure Vessels, Section VIII of the ASME Boiler and Pressure Vessel Code—1968.

(4) *Location of process units.* Process units shall be located so that they are accessible from at least one side for the purpose of fire control.

(5) *Fire control*—(i) *Portable equipment.* Portable fire extinguishment and control equipment shall be provided in such quantities and types as are needed for the special hazards of operation and storage.

(ii) *Water supply.* Water shall be available in volume and at adequate pressure to supply water hose streams, foam producing equipment, automatic sprinklers, or water spray systems as the need is indicated by the special hazards of operation and storage.

(iii) *Special equipment.* Special extinguishing equipment such as that utilizing foam, inert gas, or dry chemical shall be provided as the need is indicated by the special hazards of operation and storage.

(j) *Scope.* This section applies to the handling, storage, and use of flammable and combustible liquids with a flashpoint below 200 °F. This section does not apply to:

(1) Bulk transportation of flammable and combustible liquids;

(2) Storage, handling, and use of fuel oil tanks and containers connected with oil burning equipment;

(3) Storage of flammable and combustible liquids on farms;

(4) Liquids without flashpoints that may be flammable under some conditions, such as certain halogenated hydrocarbons and mixtures containing halogenated hydrocarbons;

(5) Mists, sprays, or foams, except flammable aerosols covered in paragraph (d) of this section; or

(6) Installations made in accordance with requirements of the following standards that are incorporated by reference as specified in § 1910.6:

(i) National Fire Protection Association Standard for Drycleaning Plants, NFPA No. 32–1970;

(ii) National Fire Protection Association Standard for the Manufacture of Organic Coatings, NFPA No. 35–1970;

(iii) National Fire Protection Association Standard for Solvent Extraction Plants, NFPA No. 36–1967; or

(iv) National Fire Protection Association Standard for the Installation and Use of Stationary Combustion Engines and Gas Turbines, NFPA No. 37–1970.

[39 FR 23502, June 27, 1974, as amended at 40 FR 3982, Jan. 27, 1975; 40 FR 23743, June 2, 1975; 43 FR 49746, Oct. 24, 1978; 43 FR 51759, Nov. 7, 1978; 47 FR 39164, Sept. 7, 1982; 51 FR 34560, Sept. 29, 1986; 53 FR 12121, Apr. 12, 1988; 55 FR 32015, Aug. 6, 1990; 61 FR 9237, Mar. 7, 1996; 70 FR 53929, Sept. 13, 2005]

§ 1910.107 Spray finishing using flammable and combustible materials.

(a) *Definitions applicable to this section*—(1) *Aerated solid powders.* Aerated powders shall mean any powdered material used as a coating material which shall be fluidized within a container by passing air uniformly from below. It is common practice to fluidize such materials to form a fluidized powder bed and then dip the part to be coated into the bed in a manner similar to that used in liquid dipping. Such beds are also used as sources for powder spray operations.

(2) *Spraying area.* Any area in which dangerous quantities of flammable vapors or mists, or combustible residues, dusts, or deposits are present due to the operation of spraying processes.

(3) *Spray booth.* A power-ventilated structure provided to enclose or accommodate a spraying operation to confine and limit the escape of spray, vapor, and residue, and to safely conduct or direct them to an exhaust system.

(4) *Waterwash spray booth.* A spray booth equipped with a water washing system designed to minimize dusts or residues entering exhaust ducts and to permit the recovery of overspray finishing material.

(5) *Dry spray booth.* A spray booth not equipped with a water washing system as described in subparagraph (4) of this paragraph. A dry spray booth may be equipped with (i) distribution or baffle plates to promote an even flow of air through the booth or cause the deposit of overspray before it enters the exhaust duct; or (ii) overspray dry filters to minimize dusts; or (iii) overspray dry filters to minimize dusts or residues entering exhaust ducts; or (iv) overspray dry filter rolls designed to minimize dusts or residues entering exhaust ducts; or (v) where dry powders are being sprayed, with powder collection systems so arranged in the exhaust to capture oversprayed material.

(6) *Fluidized bed.* A container holding powder coating material which is aerated from below so as to form an air-supported expanded cloud of such material through which the preheated object to be coated is immersed and transported.

(7) *Electrostatic fluidized bed.* A container holding powder coating material which is aerated from below so as to form an air-supported expanded cloud of such material which is electrically charged with a charge opposite to the charge of the object to be coated; such object is transported, through the container immediately above the charged and aerated materials in order to be coated.

(8) *Approved.* Shall mean approved and listed by a nationally recognized testing laboratory. Refer to § 1910.7 for definition of nationally recognized testing laboratory.

(9) *Listed.* See ''approved'' in § 1910.107(a)(8).

(b) *Spray booths*—(1) *Construction.* Spray booths shall be substantially constructed of steel, securely and rigidly supported, or of concrete or masonry except that aluminum or other substantial noncombustible material may be used for intermittent or low volume spraying. Spray booths shall be designed to sweep air currents toward the exhaust outlet.

(2) *Interiors.* The interior surfaces of spray booths shall be smooth and continuous without edges and otherwise designed to prevent pocketing of residues and facilitate cleaning and washing without injury.

(3) *Floors.* The floor surface of a spray booth and operator's working area, if

this subpart, except as described in §82.112.

(5) In the case of any substance designated as a class I or class II substance after February 11, 1993, the prohibitions in paragraphs (a)(1)(i), (a)(2)(i), and (a)(3)(i) of this section shall be applicable one year after the designation of such substance as a class I or class II substance unless otherwise specified in the designation.

Subpart F—Recycling and Emissions Reduction

SOURCE: 58 FR 28712, May 14, 1993, unless otherwise noted.

§82.150 Purpose and scope.

(a) The purpose of this subpart is to reduce emissions of class I and class II refrigerants and their substitutes to the lowest achievable level by maximizing the recapture and recycling of such refrigerants during the service, maintenance, repair, and disposal of appliances and restricting the sale of refrigerants consisting in whole or in part of a class I and class II ODS in accordance with Title VI of the Clean Air Act.

(b) This subpart applies to any person servicing, maintaining, or repairing appliances. This subpart also applies to persons disposing of appliances, including small appliances and motor vehicle air conditioners. In addition, this subpart applies to refrigerant reclaimers, technician certifying programs, appliance owners and operators, manufacturers of appliances, manufacturers of recycling and recovery equipment, approved recycling and recovery equipment testing organizations, persons selling class I or class II refrigerants or offering class I or class II refrigerants for sale, and persons purchasing class I or class II refrigerants.

[69 FR 11978, Mar. 12, 2004]

§82.152 Definitions.

Appliance means any device which contains and uses a refrigerant and which is used for household or commercial purposes, including any air conditioner, refrigerator, chiller, or freezer.

Apprentice means any person who is currently registered as an apprentice in service, maintenance, repair, or disposal of appliances with the U.S. Department of Labor's Bureau of Apprenticeship and Training (or a State Apprenticeship Council recognized by the Bureau of Apprenticeship and Training). If more than two years have elapsed since the person first registered as an apprentice with the Bureau of Apprenticeship and Training (or a State Apprenticeship Council recognized by the Bureau of Apprenticeship and Training), the person shall not be considered an apprentice.

Approved equipment testing organization means any organization which has applied for and received approval from the Administrator pursuant to §82.160.

Certified refrigerant recovery or recycling equipment means equipment manufactured before November 15, 1993, that meets the standards in §82.158(c), (e), or (g); equipment certified by an approved equipment testing organization to meet the standards in §82.158(b), (d), or (f); or equipment certified pursuant to §82.36(a).

Commercial refrigeration means, for the purposes of §82.156(i), the refrigeration appliances utilized in the retail food and cold storage warehouse sectors. Retail food includes the refrigeration equipment found in supermarkets, convenience stores, restaurants and other food service establishments. Cold storage includes the equipment used to store meat, produce, dairy products, and other perishable goods. All of the equipment contains large refrigerant charges, typically over 75 pounds.

Critical component means, for the purposes of §82.156(i), a component without which industrial process refrigeration equipment 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 appliance to be unsafe.

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

Disposal means the process leading to and including:

more than 1.5% of the refrigerant received by them.

(j) Effective November 15, 1993, no person may sell or distribute, or offer for sale or distribution, any appliances, except small appliances, unless such equipment is equipped with a servicing aperture to facilitate the removal of refrigerant at servicing and disposal.

(k) Effective November 15, 1993, no person may sell or distribute, or offer for sale or distribution any small appliance unless such equipment is equipped with a process stub to facilitate the removal of refrigerant at servicing and disposal.

(l) No technician training or testing program may issue certificates pursuant to §82.161 unless the program complies with all of the standards of §82.161 and appendix D, and has been granted approval.

(m) No person may sell or distribute, or offer for sale or distribution, any substance that consists in whole or in part of a class I or class II substance for use as a refrigerant to any person unless:

(1) The buyer has been certified as a Type I, Type II, Type III, or Universal technician pursuant to §82.161;

(2) The buyer complies with §82.166(b) and employs at least one technician who is certified as a Type I, Type II, Type III, or Universal technician in accordance with §82.161;

(3) The buyer has been certified in accordance with 40 CFR part 82, subpart B and the refrigerant is either R–12 or an approved substitute consisting wholly or in part of a class I or class II substance for use in motor vehicle air conditioners in accordance with 40 CFR part 82, subpart G;

(4) The buyer complies with §82.166 (b) and employs at least one technician who is certified in accordance with 40 CFR part 82, subpart B, and the refrigerant is either R–12 or an approved substitute consisting wholly or in part of a class I or class II substance for use in motor vehicle air conditioners pursuant to 40 CFR part 82, subpart G. Nothing in this provision shall be construed to relieve persons of the requirements of §82.34(b) or §82.42 (b);

(5) The refrigerant is sold only for eventual resale to certified technicians or to appliance manufacturers (*e.g.*, sold by a manufacturer to a wholesaler, sold by a technician to a reclaimer);

(6) The refrigerant is sold to an appliance manufacturer;

(7) The refrigerant is contained in an appliance with a fully assembled refrigerant circuit; or

(8) The refrigerant is charged into an appliance by a certified technician or an apprentice during maintenance, service, or repair of the appliance.

(n) It is a violation of this subpart to accept a signed statement pursuant to §82.156(f)(2) if the person knew or had reason to know that such a signed statement is false.

(o) Rules stayed for consideration. Not withstanding any other provisions of this subpart, the effectiveness of 40 CFR 82.154(m), only as it applies to refrigerant contained in appliances without fully assembled refrigerant circuits, is stayed from April 27, 1995, until EPA takes final action on its reconsideration of these provisions. EPA will publish any such final action in the FEDERAL REGISTER.

(p) No person may manufacture or import one-time expansion devices that contain other than exempted refrigerants.

[58 FR 28712, May 14, 1993, as amended at 59 FR 42956, Aug. 19, 1994; 59 FR 55926, Nov. 9, 1994; 60 FR 14610, Mar. 17, 1995; 60 FR 24680, May 9, 1995; 61 FR 7726, Feb. 29, 1996; 61 FR 68508, Dec. 27, 1996; 68 FR 43806, July 24, 2003; 69 FR 11979, Mar. 12, 2004; 70 FR 19278, Apr. 13, 2005]

§82.156 Required practices.

(a) All persons disposing of appliances, except for small appliances, MVACs, and MVAC-like appliances must evacuate the refrigerant, including all the liquid refrigerant, in the entire unit to a recovery or recycling machine certified pursuant to §82.158. All persons opening appliances except for MVACs and MVAC-like appliances for maintenance, service, or repair must evacuate the refrigerant, including all the liquid refrigerant (except as provided in paragraph (a)(2)(i)(B) of this section), in either the entire unit or the part to be serviced (if the latter can be isolated) to a system receiver (*e.g.*, the remaining portions of the appliance, or a specific vessel within the appliance) or a recovery or recycling

machine certified pursuant to § 82.158. A technician must verify that the applicable level of evacuation has been reached in the appliance or the part before it is opened.

(1) Persons opening appliances except for small appliances, MVACs, and MVAC-like appliances for maintenance, service, or repair must evacuate to the levels in table 1 before opening the appliance, unless

(i) Evacuation of the appliance to the atmosphere is not to be performed after completion of the maintenance, service, or repair, and the maintenance, service, or repair is not major as defined at § 82.152; or

(ii) Due to leaks in the appliance, evacuation to the levels in table 1 is not attainable, or would substantially contaminate the refrigerant being recovered; or

(iii) The recycling or recovery equipment was certified pursuant to § 82.158(b)(2). In any of these cases, the requirements of § 82.156(a)(2) must be followed.

(2)(i) If evacuation of the appliance to the atmosphere is not to be performed after completion of the maintenance, service, or repair, and if the maintenance, service, or repair is not major as defined at § 82.152, the appliance must:

(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 a pressure no higher than 0 psig before it is opened if it is a low-pressure appliance. Persons must cover openings when isolation is not possible. Persons pressurizing low-pressure appliances that use refrigerants with boiling points at or below 85 degrees Fahrenheit at 29.9 inches of mercury (standard atmospheric pressure), (*e.g.* R–11 and R–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.*, R–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) For the purposes of oil changes, be evacuated or pressurized to a pressure no higher than 5 psig, before it is opened; or drain the oil into a system receiver to be evacuated or pressurized to a pressure no higher than 5 psig.

(ii) If, due to leaks in the appliance, evacuation to the levels in table 1 is not attainable, or would substantially contaminate the refrigerant being recovered, persons opening the appliance must:

(A) Isolate leaking from non-leaking components wherever possible;

(B) Evacuate non-leaking components to be opened to the levels specified in table 1; and

(C) Evacuate leaking components to be opened to the lowest level that can be attained without substantially contaminating the refrigerant. In no case shall this level exceed 0 psig.

(iii) If the recycling or recovery equipment was certified pursuant to § 82.158(b)(2), technicians must follow the manufacturer's directions for achieving the required recovery efficiency.

(3) Persons disposing of appliances except for small appliances, MVACs, and MVAC-like appliances, must evacuate to the levels in table 1 unless, due to leaks in the appliance, evacuation to the levels in table 1 is not attainable, or would substantially contaminate the refrigerant being recovered. If, due to leaks in the appliance, evacuation to the levels in table 1 is not attainable, or would substantially contaminate the refrigerant being recovered, persons disposing of the appliance must:

(i) Isolate leaking from non-leaking components wherever possible;

(ii) Evacuate non-leaking components to the levels specified in table 1; and

(iii) Evacuate leaking components to the lowest level that can be attained without substantially contaminating the refrigerant. In no case shall this level exceed 0 psig.

TABLE 1—REQUIRED LEVELS OF EVACUATION FOR APPLIANCES
[Except for small appliances, MVACs, and MVAC-like appliances]

Type of appliance	Inches of Hg vacuum (relative to standard atmospheric pressure of 29.9 inches Hg)	
	Using recovery or recycling equipment manufactured or imported before November 15, 1993	Using recovery or recycling equipment manufactured or imported on or after November 15, 1993
Very high-pressure appliance	0	0
High-pressure appliance, or isolated component of such appliance, normally containing less than 200 pounds of refrigerant.	0	0
High-pressure appliance, or isolated component of such appliance, normally containing 200 pounds or more of refrigerant.	4	10
Medium-pressure appliance, or isolated component of such appliance, normally containing less than 200 pounds of refrigerant.	4	10
Medium-pressure appliance, or isolated component of such appliance, normally containing 200 pounds or more of refrigerant.	4	15
Low-pressure appliance	25	25 mm Hg absolute

(4) Persons opening small appliances for maintenance, service, or repair must:

(i) When using recycling and recovery equipment manufactured before November 15, 1993, recover 80% of the refrigerant in the small appliance; or

(ii) When using recycling or recovery equipment manufactured on or after November 15, 1993, recover 90% of the refrigerant in the appliance when the compressor in the appliance is operating, or 80% of the refrigerant in the appliance when the compressor in the appliance is not operating; or

(iii) Evacuate the small appliance to four inches of mercury vacuum.

(5) Persons opening MVAC-like appliances for maintenance, service, or repair may do so only while properly using, as defined at § 82.32(e), recycling or recovery equipment certified pursuant to § 82.158 (f) or (g), as applicable.

(b) All persons opening appliances except for small appliances, MVACs, and MVAC-like appliances for maintenance, service, or repair and all persons disposing of appliances except small appliances, MVACs, and MVAC-like appliances must have at least one piece of certified, self-contained recovery or recycling equipment available at their place of business. Persons who maintain, service, repair, or dispose of only appliances that they own and that contain pump-out units are exempt from this requirement. This exemption does not relieve such persons from other applicable requirements of this section.

(c) System-dependent equipment shall not be used with appliances normally containing more than 15 pounds of refrigerant, unless the system-dependent equipment is permanently attached to the appliance as a pump-out unit.

(d) All recovery or recycling equipment shall be used in accordance with the manufacturer's directions unless such directions conflict with the requirements of this subpart.

(e) Refrigerant may be returned to the appliance from which it is recovered or to another appliance owned by the same person without being recycled or reclaimed, unless the appliance is an MVAC or MVAC-like appliance.

(f) Effective July 13, 1993, persons who take the final step in the disposal process (including but not limited to scrap recyclers and landfill operators) of a small appliance, room air conditioning, MVACs, or MVAC-like appliances must either:

(1) Recover any remaining refrigerant from the appliance in accordance with paragraph (g) or (h) of this section, as applicable; or

(2) Verify that the refrigerant has been evacuated from the appliance or shipment of appliances previously. Such verification must include a signed statement from the person from

whom the appliance or shipment of appliances is obtained that all refrigerant that had not leaked previously has been recovered from the appliance or shipment of appliances in accordance with paragraph (g) or (h) of this section, as applicable. This statement must include the name and address of the person who recovered the refrigerant and the date the refrigerant was recovered or a contract that refrigerant will be removed prior to delivery.

(3) Persons complying with paragraph (f)(2) of this section must notify suppliers of appliances that refrigerant must be properly removed before delivery of the items to the facility. The form of this notification may be warning signs, letters to suppliers, or other equivalent means.

(g) All persons recovering refrigerant from MVACs and MVAC-like appliances for purposes of disposal of these appliances must reduce the system pressure to or below 102 mm of mercury vacuum, using equipment that meets the standards set forth in § 82.158(l).

(h) All persons recovering the refrigerant from small appliances for purposes of disposal of these appliances must either:

(1) Recover 90% of the refrigerant in the appliance when the compressor in the appliance is operating, or 80% of the refrigerant in the appliance when the compressor in the appliance is not operating; or

(2) Evacuate the small appliance to four inches of mercury vacuum.

(i)(1) Owners or operators of commercial refrigeration equipment normally containing more than 50 pounds of refrigerant must have leaks repaired in accordance with paragraph (i)(9) of this section, if the appliance is leaking at a rate such that the loss of refrigerant will exceed 35 percent of the total charge during a 12-month period, except as described in paragraphs (i)(6), (i)(8), and (i)(10) 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 percent.

(i) If the owners or operators of the federally-owned commercial refrigerant appliances determine that the leaks cannot be repaired in accordance with paragraph (i)(9) of this section and that an extension in accordance with the requirements discussed in this paragraph (i)(1)(i) of this section apply, they must document all repair efforts, and notify EPA of their inability to comply within the 30-day repair requirement, and the reason for the inability must be submitted to EPA in accordance with § 82.166(n). Such notification must be made within 30 days of discovering the leaks. EPA will determine if the extension requested in accordance with the requirements discussed in paragraph (i)(1)(i) of this section is justified. If the extension is not justified, EPA will notify the owner/operator within 30 days of receipt of the notification.

(ii) Owners or operators of federally-owned commercial refrigeration equipment may have more than 30 days to repair leaks if the refrigeration appliance is located in an area subject to radiological contamination or where the shutting down of the appliance will directly lead to radiological contamination. Only the additional time needed to conduct and complete repairs in a safe working environment will be permitted.

(iii) Owners or operators of federally-owned commercial refrigeration equipment requesting or who are granted time extensions under this paragraph must comply with paragraphs (i)(3) and (i)(4) of this section.

(2) The owners or operators of industrial process refrigeration equipment normally containing more than 50 pounds of refrigerant must have leaks repaired if the appliance 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), (i)(7) and (i)(10) of this section, and paragraphs (i)(2)(i) and (i)(2)(ii) of this section. Repairs must bring annual leak rates to below 35 percent during a 12-month period. If the owners or operators of the industrial process refrigeration equipment determine that the leak rate cannot be brought to below 35 percent during a 12-month period within 30 days (or 120 days, where an industrial process shutdown in accordance with paragraph (i)(2)(ii) of this section is required,) and

in accordance with paragraph (i)(9) of this section, and that an extension in accordance with the requirements discussed in this paragraph apply, the owners or operators of the appliance must document all repair efforts, and notify EPA of the reason for the inability in accordance with §82.166(n) within 30 days of making this determination. Owners or operators who obtain an extension pursuant to this section or elect to utilize the additional time provided in paragraph (i)(2)(i) of this section, must conduct all necessary leak repairs, if any, that do not require any additional time beyond the initial 30 or 120 days.

(i) The owners or operators of industrial process refrigeration equipment are permitted more than 30 days (or 120 days where an industrial process shutdown in accordance with paragraph (i)(2)(ii) of this section is required) to repair leaks, if the necessary parts are unavailable or if requirements of other applicable federal, state, or local regulations make a repair within 30 or 120 days impossible. Only the additional time needed to receive delivery of the necessary parts or to comply with the pertinent regulations will be permitted.

(ii) Owners or operators of industrial process refrigeration equipment will have a 120-day repair period, rather than a 30-day repair period, to repair leaks in instances where an industrial process shutdown is needed to repair a leak or leaks from industrial process refrigeration equipment.

(3) Owners or operators of industrial process refrigeration equipment and owners or operators of federally-owned commercial refrigeration equipment or of federally-owned comfort cooling appliances who are granted additional time under paragraphs (i)(1) or (i)(5) of this section, must have repairs performed in a manner that sound professional judgment indicates will bring the leak rate below the applicable allowable leak rate. When an industrial process shutdown has occurred or when repairs have been made while an appliance is mothballed, the owners or operators shall conduct an initial verification test at the conclusion of the repairs and a follow-up verification test. The follow-up verification test shall be conducted within 30 days of completing the repairs or within 30 days of bringing the appliance back on-line, if taken off-line, but no sooner than when the appliance has achieved normal operating characteristics and conditions. When repairs have been conducted without an industrial process shutdown or system mothballing, an initial verification test shall be conducted at the conclusion of the repairs, and a follow-up verification test shall be conducted within 30 days of the initial verification test. In all cases, the follow-up verification test shall be conducted at normal operating characteristics and conditions, unless sound professional judgment indicates that tests performed at normal operating characteristics and conditions will produce less reliable results, in which case the follow-up verification test shall be conducted at or near the normal operating pressure where practicable, and at or near the normal operating temperature where practicable.

(i) If the owners or operators of industrial process refrigeration equipment takes the appliance off-line, or if the owners or operators of federally-owned commercial refrigeration or of federally-owned comfort cooling appliances who are granted additional time under paragraphs (i)(1) or (i)(5) of this section take the appliance off-line, they cannot bring the appliance back on-line until an initial verification test indicates that the repairs undertaken in accordance with paragraphs (i)(1)(i), (ii), (iii), or (i)(2)(i) and (ii), or (5)(i), (ii), and (iii) of this section have been successfully completed, demonstrating the leak or leaks are repaired. The owners or operators of the industrial process refrigeration equipment, federally-owned commercial refrigeration appliances, or federally-owned comfort cooling appliances are exempted from this requirement only where the owners or operators will retrofit or retire the industrial process refrigeration equipment, federally-owned commercial refrigeration appliance, or federally-owned comfort cooling appliance in accordance with paragraph (i)(6) of this section. Under this exemption, the

owner or operators may bring the industrial process refrigeration equipment, federally-owned commercial refrigeration appliance, or federally-owned comfort cooling appliance back on-line without successful completion of an initial verification test.

(ii) If the follow-up verification test indicates that the repairs to industrial process refrigeration equipment, federally-owned commercial refrigeration equipment, or federally-owned comfort cooling appliances have not been successful, the owner or operator must retrofit or retire the equipment in accordance with paragraph (i)(6) and any such longer time period as may apply under paragraphs (i)(7)(i), (ii) and (iii) or (i)(8)(i) and (ii) of this section. The owners and operators of the industrial process refrigeration equipment, federally-owned commercial refrigeration equipment, or federally-owned comfort cooling appliances are relieved of this requirement if the conditions of paragraphs (i)(3)(iv) and/or (i)(3)(v) of this section are met.

(iii) The owner or operator of industrial process refrigeration equipment that fails a follow-up verification test must notify EPA within 30 days of the failed follow-up verification test in accordance with § 82.166(n).

(iv) The owner or operator is relieved of the obligation to retrofit or replace the industrial process refrigeration equipment as discussed in paragraph (i)(6) of this section if second repair efforts to fix the same leaks that were the subject of the first repair efforts are successfully completed within 30 days or 120 days where an industrial process shutdown is required, after the initial failed follow-up verification test. The second repair efforts are subject to the same verification requirements of paragraphs (i)(3), (i)(3) (i) and (ii) of this section. The owner or operator is required to notify EPA within 30 days of the successful follow-up verification test in accordance with § 82.166(n) and the owner or operator is no longer subject to the obligation to retrofit or replace the appliance that arose as a consequence of the initial failure to verify that the leak repair efforts were successful.

(v) The owner or operator of industrial process refrigeration equipment is relieved of the obligation to retrofit or replace the equipment in accordance with paragraph (i)(6) of this section if within 180 days of the initial failed follow-up verification test, the owner or operator establishes that the appliance's annual leak rate does not exceed the applicable allowable annual leak rate, in accordance with paragraph (i)(4) of this section. If the appliance's owner or operator establishes that the appliance's annual leak rate does not exceed the applicable allowable annual leak rate, the owner or operator is required to notify EPA within 30 days of that determination in accordance with § 82.166(n) and the owner or operator would no longer be subject to the obligation to retrofit or replace the equipment that arose as a consequence of the initial failure to verify that the leak repair efforts were successful.

(4) In the case of a failed follow-up verification test subject to paragraph (i)(3)(v) of this section, the determination of whether industrial process refrigeration equipment has an annual leak rate that exceeds the applicable allowable annual leak rate will be made in accordance with parameters identified by the owner or operator in its notice to EPA regarding the failure of the initial follow-up verification test, if those parameters are acceptable to EPA; otherwise by parameters selected by EPA. The determination must be based on the full charge for the affected industrial process refrigeration equipment. The leak rate determination parameters in the owner's or operator's notice will be considered acceptable unless EPA notifies the owners or operators within 30 days of receipt of the notice. Where EPA does not accept the parameters identified by the owner or operator in its notice, EPA will not provide additional time beyond the additional time permitted in paragraph (i)(3)(v) of this section unless specifically stated in the parameters selected by EPA.

(5) Owners or operators of comfort cooling appliances normally containing more than 50 pounds of refrigerant and not covered by paragraph (i)(1) or (i)(2) of this section must have leaks repaired in accordance with paragraph (i)(9) of this section if the appliance is leaking at a rate such that the loss of

refrigerant will exceed 15 percent of the total charge during a 12-month period, except as described in paragraphs (i)(6), (i)(8) and (i)(10) of this section and paragraphs (i)(5)(i), (i)(5)(ii) and (i)(5)(iii) of this section. Repairs must bring the annual leak rate to below 15 percent.

(i) If the owners or operators of federally-owned comfort-cooling appliances determine that the leaks cannot be repaired in accordance with paragraph (i)(9) of this section and that an extension in accordance with the requirements discussed in paragraph (i)(5) of this section apply, they must document all repair efforts, and notify EPA of their inability to comply within the 30-day repair requirement, and the reason for the inability must be submitted to EPA in accordance with §82.166(n). Such notification must be made within 30 days of discovering that leak repair efforts cannot be completed within 30 days.

(ii) Owners or operators of federally-owned comfort-cooling appliances may have more than 30 days to repair leaks where the refrigeration appliance is located in an area subject to radiological contamination or where the shutting down of the appliance will directly lead to radiological contamination. Only the additional time needed to conduct and complete work in a safe environment will be permitted.

(iii) Owners or operators of federally-owned comfort-cooling appliances requesting, or who are granted, time extensions under this paragraph must comply with paragraphs (i)(3) and (i)(4) of this section.

(6) Owners or operators are not required to repair leaks as provided in paragraphs (i)(1), (i)(2), and (i)(5) of this section if, within 30 days of discovering a leak greater than the applicable allowable leak rate, or within 30 days of a failed follow-up verification test, or after making good faith efforts to repair the leaks as described in paragraph (i)(6)(i) of this section, they develop a one-year retrofit or retirement plan for the leaking appliance. Owners or operators who decide to retrofit the appliance must use a refrigerant or substitute with a lower or equivalent ozone-depleting potential than the previous refrigerant and must include such a change in the retrofit plan. Owners or operators who retire and replace the appliance must replace the appliance with an appliance that uses a refrigerant or substitute with a lower or equivalent ozone-depleting potential and must include such a change in the retirement plan. The retrofit or retirement plan (or a legible copy) must be kept at the site of the appliance. The original plan must be made available for EPA inspection upon request. The plan must be dated, and all work performed in accordance with the plan must be completed within one year of the plan's date, except as described in paragraphs (i)(6)(i), (i)(7), and (i)(8) of this section. Owners or operators are temporarily relieved of this obligation if the appliance has undergone system mothballing as defined in §82.152.

(i) If the owner or operator has made good faith efforts to repair leaks from the appliance in accordance with paragraphs (i)(1), (i)(2), or (i)(5) of this section and has decided prior to completing a follow-up verification test, to retrofit or retire the appliance in accordance with paragraph (i)(6) of this section, the owner or operator must develop a retrofit or retirement plan within 30 days of the decision to retrofit or retire the appliance. The owner or operator must complete the retrofit or retirement of the appliance within one year and 30 days of when the owner or operator discovered that the leak rate exceeded the applicable allowable leak rate, except as provided in paragraphs (i)(7) and (i)(8) of this section.

(ii) In all cases, subject to paragraph (i)(6)(i) of this section, the written plan shall be prepared no later than 30 days after the owner or operator has determined to proceed with retrofitting or retiring the appliance. All reports required under §82.166(o) shall be due at the time specified in the paragraph imposing the specific reporting requirement, or no later than 30 days after the decision to retrofit or retire the appliance, whichever is later.

(iii) In cases where the owner or operator of industrial process refrigeration equipment has made good faith efforts to retrofit or retire industrial process refrigeration equipment prior to August 8, 1995, and where these efforts are not complete, the owner or operator

must develop a retrofit or retirement plan that will complete the retrofit or retirement of the affected appliance by August 8, 1996. This plan (or a legible copy) must be kept at the site of the appliance. The original must be made available for EPA inspection upon request. Where the conditions of paragraphs (i)(7) and (i)(8) of this section apply, and where the length of time necessary to complete the work is beyond August 8, 1996, all records must be submitted to EPA in accordance with § 82.166(o), as well as maintained on-site.

(7) The owners or operators of industrial process refrigeration equipment will be allowed additional time to complete the retrofit or retirement of industrial process refrigeration equipment if the conditions described in paragraphs (i)(7)(i) or (i)(7)(ii) of this section are met. The owners or operators of industrial process refrigeration equipment will be allowed additional time beyond the additional time provided in paragraph (i)(7)(ii) of this section if the conditions described in paragraph (i)(7)(iii) of this section are met.

(i) Additional time, to the extent reasonably necessary will be allowed for retrofitting or retiring industrial process refrigeration equipment due to delays occasioned by the requirements of other applicable federal, state, or local laws or regulations, or due to the unavailability of a suitable replacement refrigerant with a lower ozone depletion potential. If these circumstances apply, the owner or operator of the facility must notify EPA within six months after the 30-day period following the discovery of an exceedance of the 35 percent leak rate. Records necessary to allow EPA to determine that these provisions apply and the length of time necessary to complete the work must be submitted to EPA in accordance with § 82.166(o), as well as maintained on-site. EPA will notify the owner or operator of its determination within 60 days of receipt the submittal.

(ii) An additional one-year period beyond the initial one-year retrofit period is allowed for industrial process refrigeration equipment where the following criteria are met:

(A) The new or the retrofitted industrial process refrigerant equipment is custom-built;

(B) The supplier of the appliance or one or more of its critical components has quoted a delivery time of more than 30 weeks from when the order is placed;

(C) The owner or operator notifies EPA within six months of the expiration of the 30-day period following the discovery of an exceedance of the 35 percent leak rate to identify the owner or operator, describe the appliance involved, explain why more than one year is needed, and demonstrate that the first two criteria are met in accordance with § 82.166(o); and

(D) The owner or operator maintains records that are adequate to allow a determination that the criteria are met.

(iii) The owners or operators of industrial process refrigeration equipment may request additional time to complete retrofitting or retiring industrial process refrigeration equipment beyond the additional one-year period if needed and where the initial additional one year was granted in accordance with paragraph (i)(7)(ii) of this section. The request shall be submitted to EPA before the end of the ninth month of the first additional year and shall include revisions of information required under § 82.166(o). Unless EPA objects to this request submitted in accordance with § 82.166(o) within 30 days of receipt, it shall be deemed approved.

(8) Owners or operators of federally-owned commercial or comfort-cooling appliances will be allowed an additional year to complete the retrofit or retirement of the appliances if the conditions described in paragraph (i)(8)(i) of this section are met, and will be allowed one year beyond the additional year if the conditions in paragraph (i)(8)(ii) of this section are met.

(i) Up to one additional one-year period beyond the initial one-year retrofit period is allowed for such equipment where the following criteria are met:

(A) Due to complications presented by the federal agency appropriations and/or procurement process, a delivery time of more than 30 weeks from the beginning of the official procurement

process is quoted, or where the appliance is located in an area subject to radiological contamination and creating a safe working environment will require more than 30 weeks;

(B) The operator notifies EPA within six months of the expiration of the 30-day period following the discovery of an exceedance of the applicable allowable annual leak rate to identify the operator, describe the appliance involved, explain why more than one year is needed, and demonstrate that the first criterion is met in accordance with §82.166(o); and

(C) The operator maintains records adequate to allow a determination that the criteria are met.

(ii) The owners or operators of federally-owned commercial or comfort-cooling appliances may request additional time to complete retrofitting, replacement or retiring such appliances beyond the additional one-year period if needed and where the initial additional one year was granted in accordance with paragraph (i)(8)(i) of this section. The request shall be submitted to EPA before the end of the ninth month of the first additional year and shall include revisions of information earlier submitted as required under §82.166(o). Unless EPA objects to this request submitted in accordance with §82.166(o) within 30 days of receipt, it shall be deemed approved.

(9) Owners or operators must repair leaks pursuant to paragraphs (i)(1), (i)(2) and (i)(5) of this section within 30 days after discovery, or within 30 days after when the leaks should have been discovered if the owners intentionally shielded themselves from information which would have revealed a leak, unless granted additional time pursuant to §82.156(i).

(10) The amount of time for owners and operators to complete repairs, retrofit plans or retrofits/replacements/retirements under paragraphs (i)(1), (i)(2), (i)(5), (i)(6), (i)(7), (i)(8), and (i)(9) of this section is temporarily suspended at the time an appliance is mothballed as defined in §82.152. The time for owners and operators to complete repairs, retrofit plans, or retrofits/replacements will resume on the day the appliance is brought back online and is no longer considered mothballed. All initial and follow-up verification tests must be performed in accordance with paragraphs (i)(3), (i)(3)(i), and (i)(3)(ii) of this section.

(11) In calculating annual leak rates, purged refrigerant that is destroyed at a verifiable destruction efficiency of 98 percent or greater will not be counted toward the leak rate. Owners or operators destroying purged refrigerants must maintain information as set forth in §82.166(p)(1) and submit to EPA, within 60 days after the first time such exclusion is used by that facility, information set forth in §82.166(p)(2).

[58 FR 28712, May 14, 1993, as amended at 59 FR 42956, 42962, Aug. 19, 1994; 59 FR 55926, Nov. 9, 1994; 60 FR 40440, Aug. 8, 1995; 68 FR 43807, July 24, 2003; 69 FR 11979, Mar. 12, 2004; 70 FR 1991, Jan. 11, 2005]

§82.158 Standards for recycling and recovery equipment.

(a) Effective September 22, 2003, all manufacturers and importers of recycling and recovery equipment intended for use during the maintenance, service, or repair of appliances except MVACs and MVAC-like appliances or during the disposal of appliances except small appliances, MVACs, and MVAC-like appliances, shall have had such equipment certified by an approved equipment testing organization to meet the applicable requirements in paragraph (b)(1), (b)(2), or (d) of this section. All manufacturers and importers of recycling and recovery equipment intended for use during the maintenance, service, or repair of MVAC-like appliances shall have had such equipment certified pursuant to §82.36(a).

(b) Equipment manufactured or imported on or after November 15, 1993 and before September 22, 2003, for use during the maintenance, service, or repair of appliances except small appliances, MVACs, and MVAC-like appliances or during the disposal of appliances except small appliances, MVACs, and MVAC-like appliances must be certified by an approved equipment testing organization to meet the requirements of paragraph (b)(1) of this section and the following requirements below. Equipment manufactured or imported on or after September 22, 2003,

(d) Dispose of wastes from the reclamation process in accordance with all applicable laws and regulations.

(e) The data elements for certification are as follows:

(1) The name and address of the reclaimer;

(2) A list of equipment used to reprocess and analyze the refrigerant; and

(3) The owner or a responsible officer of the reclaimer must sign the certification stating that the refrigerant will be reprocessed to all of the specifications in Appendix A of this subpart (based on ARI Standard 700–1995, *Specification for Fluorocarbons and Other Refrigerants*) that are applicable to that refrigerant, that the refrigerant's conformance to these specifications will be verified using the analytical methodology prescribed in Appendix A (which includes the primary methodologies included in the appendix to the ARI Standard 700–1995), that no more than 1.5 percent of the refrigerant will be released during the reclamation process, that wastes from the reclamation process will be properly disposed of, that the owner or responsible officer of the reclaimer will maintain records and submit reports in accordance with § 82.166(g) and (h), and that the information given is true and correct. The certification should be sent to the following address: U.S. Environmental Protection Agency; Global Programs Division (6205J); 1200 Pennsylvania Avenue, NW., Washington, DC 20460; Attn: Section 608 Recycling Program Manager—Reclaimer Certification.

(f) Certificates are not transferable. In the event of a change in ownership of an entity which reclaims refrigerant, the new owner of the entity shall certify within 30 days of the change of ownership pursuant to this section.

(g) Failure to abide by any of the provisions of this subpart may result in revocation or suspension of the certification of the reclaimer in accordance with § 82.169. In such cases, the Administrator or her or his designated representative shall give notice to the organization setting forth the basis for her or his determination.

[58 FR 28712, May 14, 1993, as amended at 59 FR 42957, 42962, Aug. 19, 1994; 59 FR 55927, Nov. 9, 1994; 68 FR 43809, July 24, 2003; 69 FR 11980, Mar. 12, 2004]

§ 82.166 Reporting and recordkeeping requirements.

(a) All persons who sell or distribute or offer to sell or distribute any refrigerant must retain invoices that indicate the name of the purchaser, the date of sale, and the quantity of refrigerant purchased.

(b) Purchasers of refrigerant who employ certified technicians may provide evidence that at least one technician is properly certified to the wholesaler who sells them refrigerant; the wholesaler must then keep this information on file and may sell refrigerant to the purchaser or his authorized representative even if such purchaser or authorized representative is not a properly certified technician. In such cases, the purchaser must notify the wholesaler in the event that the purchaser no longer employs at least one properly certified technician. The wholesaler is then prohibited from selling refrigerants to the purchaser until such time as the purchaser employs at least one properly certified technician. At that time, the purchaser must provide new evidence that at least one technician is properly certified.

(c) Approved equipment testing organizations must maintain records of equipment testing and performance and a list of equipment that meets EPA requirements. A list of all certified equipment shall be submitted to EPA within 30 days of the organization's approval by EPA and annually at the end of each calendar year thereafter.

(d) Approved equipment testing organizations shall submit to EPA within 30 days of the certification of a new model line of recycling or recovery equipment the name of the manufacturer and the name and/or serial number of the model line.

(e) Approved equipment testing organizations shall notify EPA if retests of equipment or inspections of manufacturing facilities conducted pursuant to

§82.158(j) show that a previously certified model line fails to meet EPA requirements. Such notification must be received within thirty days of the retest or inspection.

(f) Programs certifying technicians must maintain records in accordance with section (g) of appendix D of this subpart.

(g) Reclaimers must maintain records of the names and addresses of persons sending them material for reclamation and the quantity of the material (the combined mass of refrigerant and contaminants) sent to them for reclamation. Such records shall be maintained on a transactional basis.

(h) Reclaimers must maintain records of the quantity of material sent to them for reclamation, the mass of refrigerant reclaimed, and the mass of waste products. Reclaimers must report this information to the Administrator annually within 30 days of the end of the calendar year.

(i) Persons disposing of small appliances, MVACs, and MVAC-like appliances must maintain copies of signed statements obtained pursuant to §82.156(f)(2).

(j) Persons servicing appliances normally containing 50 or more pounds of refrigerant must provide the owner/operator of such appliances with an invoice or other documentation, which indicates the amount of refrigerant added to the appliance.

(k) Owners/operators of appliances normally containing 50 or more pounds of refrigerant must keep servicing records documenting the date and type of service, as well as the quantity of refrigerant added. The owner/operator must keep records of refrigerant purchased and added to such appliances in cases where owners add their own refrigerant. Such records should indicate the date(s) when refrigerant is added.

(l) Technicians certified under §82.161 must keep a copy of their certificate at their place of business.

(m) All records required to be maintained pursuant to this section must be kept for a minimum of three years unless otherwise indicated. Entities that dispose of appliances must keep these records on-site.

(n) The owners or operators of appliances must maintain on-site and report to EPA Headquarters at the address listed in §82.160 the information specified in paragraphs (n)(1), (n)(2), and (n)(3) of this section, within the timelines specified under §82.156 (i)(1), (i)(2), (i)(3) and (i)(5) where such reporting or recordkeeping is required. This information must be relevant to the affected appliance.

(1) An initial report to EPA under §82.156(i)(1)(i), (i)(2), or (i)(5)(i) regarding why more than 30 days are needed to complete repairs must include: Identification of the facility; the leak rate; the method used to determine the leak rate and full charge; the date a leak rate above the applicable leak rate was discovered; the location of leak(s) to the extent determined to date; any repair work that has been completed thus far and the date that work was completed; the reasons why more than 30 days are needed to complete the work and an estimate of when the work will be completed. If changes from the original estimate of when work will be completed result in extending the completion date from the date submitted to EPA, the reasons for these changes must be documented and submitted to EPA within 30 days of discovering the need for such a change.

(2) If the owners or operators intend to establish that the appliance's leak rate does not exceed the applicable allowable leak rate in accordance with §82.156(i)(3)(v), the owner or operator must submit a plan to fix other outstanding leaks for which repairs are planned but not yet completed to achieve a rate below the applicable allowable leak rate. A plan to fix other outstanding leaks in accordance with §82.156(i)(3)(v) must include the following information: The identification of the facility; the leak rate; the method used to determine the leak rate and full charge; the date a leak rate above the applicable allowable leak rate was discovered; the location of leak(s) to the extent determined to date; and any repair work that has been completed thus far, including the date that work was completed. Upon completion of the repair efforts described in the plan, a second report must be submitted that includes the date the owner or operator submitted the initial report concerning the need for additional time beyond the

30 days and notification of the owner or operator's determination that the leak rate no longer exceeds the applicable allowable leak rate. This second report must be submitted within 30 days of determining that the leak rate no longer exceeds the applicable allowable leak rate.

(3) Owners or operators must maintain records of the dates, types, and results of all initial and follow-up verification tests performed under § 82.156(i)(3). Owners or operators must submit this information to EPA within 30 days after conducting each test only where required under § 82.156 (i)(1), (i)(2), (i)(3) and (i)(5). These reports must also include: Identification and physical address of the facility; the leak rate; the method used to determine the leak rate and full charge; the date a leak rate above the applicable allowable leak rate was discovered; the location of leak(s) to the extent determined to date; and any repair work that has been completed thus far and the date that work was completed. Submitted reports must be dated and include the name of the owner or operator of the appliance, and must be signed by an authorized company official.

(o) The owners or operators of appliances must maintain on-site and report to EPA at the address specified in § 82.160 the following information where such reporting and recordkeeping is required and in the timelines specified in § 82.156 (i)(7) and (i)(8), in accordance with § 82.156 (i)(7) and (i)(8). This information must be relevant to the affected appliance and must include:

(1) The identification of the industrial process facility;

(2) The leak rate;

(3) The method used to determine the leak rate and full charge;

(4) The date a leak rate above the applicable allowable rate was discovered.

(5) The location of leaks(s) to the extent determined to date;

(6) Any repair work that has been completed thus far and the date that work was completed;

(7) A plan to complete the retrofit or retirement of the system;

(8) The reasons why more than one year is necessary to retrofit or retire the system;

(9) The date of notification to EPA; and

(10) An estimate of when retrofit or retirement work will be completed. If the estimated date of completion changes from the original estimate and results in extending the date of completion, the owner or operator must submit to EPA the new estimated date of completion and documentation of the reason for the change within 30 days of discovering the need for the change, and must retain a dated copy of this submission.

(p)(1) Owners or operators who wish to exclude purged refrigerants that are destroyed from annual leak rate calculations must maintain records on-site to support the amount of refrigerant claimed as sent for destruction. Records shall be based on a monitoring strategy that provides reliable data to demonstrate that the amount of refrigerant claimed to have been destroyed is not greater than the amount of refrigerant actually purged and destroyed and that the 98 percent or greater destruction efficiency is met. Records shall include flow rate, quantity or concentration of the refrigerant in the vent stream, and periods of purge flow.

(2) Owners or operators who wish to exclude purged refrigerants that are destroyed from annual leak rate calculations must maintain on-site and make available to EPA upon request the following information after the first time the exclusion is utilized by the facility:

(i) The identification of the facility and a contact person, including the address and telephone number;

(ii) A general description of the refrigerant appliance, focusing on aspects of the appliance relevant to the purging of refrigerant and subsequent destruction;

(iii) A description of the methods used to determine the quantity of refrigerant sent for destruction and type of records that are being kept by the owners or operators where the appliance is located;

(iv) The frequency of monitoring and data-recording; and

(v) A description of the control device, and its destruction efficiency.

This information must also be included, where applicable, in any reporting requirements required for compliance with the leak repair and retrofit requirements for industrial process refrigeration equipment, as set forth in paragraphs (n) and (o) of this section.

(q) Owners or operators choosing to determine the full charge as defined in §82.152 of an affected appliance by using an established range or using that methodology in combination with other methods for determining the full charge as defined in §82.152 must maintain the following information:

(1) The identification of the owner or operator of the appliance;

(2) The location of the appliance;

(3) The original range for the full charge of the appliance, its midpoint, and how the range was determined;

(4) Any and all revisions of the full charge range and how they were determined; and

(5) The dates such revisions occurred.

[58 FR 28712, May 14, 1993, as amended at 59 FR 42957, Aug. 19, 1994; 60 FR 40443, Aug. 8, 1995; 69 FR 11981, Mar. 12, 2004; 70 FR 1992, Jan. 11, 2005]

§82.169 Suspension and revocation procedures.

(a) Failure to abide by any of the provisions of this subpart may result in the revocation or suspension of the approval to certify technicians (under §82.161), approval to act as a recovery/recycling equipment testing organization (under §82.160), or reclaimer certification (under §82.164), hereafter referred to as the ''organization.'' In such cases, the Administrator or her or his designated representative shall give notice of an impending suspension to the person or organization setting forth the facts or conduct that provide the basis for the revocation or suspension.

(b) Any organization that has received notice of an impending suspension or revocation may choose to request a hearing and must file that request in writing within 30 days of the date of the Agency's notice at the address listed in §82.160 and shall set forth their objections to the revocation or suspension and data to support the objections.

(c) If the Agency does not receive a written request for a hearing within 30 days of the date of the Agency's notice, the revocation will become effective upon the date specified in the notice of an impending suspension.

(d) If after review of the request and supporting data, the Administrator or her or his designated representative finds that the request raises a substantial factual issue, she or he shall provide the organization with a hearing.

(e) After granting a request for a hearing the Administrator or her or his designated representative shall designate a Presiding Officer for the hearing.

(f) The hearing shall be held as soon as practicable at a time and place determined by the Administrator, the designated representative, or the Presiding Officer.

(g) The Administrator or her or his designated representative may, at his or her discretion, direct that all argument and presentation of evidence be concluded within a specified period established by the Administrator or her or his designated representative. Said period may be no less than 30 days from the date that the first written offer of a hearing is made to the applicant. To expedite proceedings, the Administrator or her or his designated representative may direct that the decision of the Presiding Officer (who need not be the Administrator) shall be the final EPA decision.

(h) Upon appointment pursuant to paragraph (e) of this section, the Presiding Officer will establish a hearing file. The file shall consist of the following:

(1) The notice issued by the Administrator under §82.169(a);

(2) the request for a hearing and the supporting data submitted therewith;

(3) all documents relating to the request for certification and all documents submitted therewith; and

(4) correspondence and other data material to the hearing.

(i) The hearing file will be available for inspection by the petitioner at the office of the Presiding Officer.

(j) An applicant may appear in person or may be represented by counsel or by any other duly authorized representative.

and located in a single geographical oil or gas field operated by a single operator.

Regional Administrator means the Regional Administrator of the Environmental Protection Agency, in and for the Region in which the facility is located.

Repair means any work necessary to maintain or restore a container to a condition suitable for safe operation, other than that necessary for ordinary, day-to-day maintenance to maintain the functional integrity of the container and that does not weaken the container.

Spill Prevention, Control, and Countermeasure Plan; SPCC Plan, or Plan means the document required by §112.3 that details the equipment, workforce, procedures, and steps to prevent, control, and provide adequate countermeasures to a discharge.

Storage capacity of a container means the shell capacity of the container.

Transportation-related and non-transportation-related, as applied to an onshore or offshore facility, are defined in the Memorandum of Understanding between the Secretary of Transportation and the Administrator of the Environmental Protection Agency, dated November 24, 1971, (Appendix A of this part).

United States means the States, the District of Columbia, the Commonwealth of Puerto Rico, the Commonwealth of the Northern Mariana Islands, Guam, American Samoa, the U.S. Virgin Islands, and the Pacific Island Governments.

Vegetable oil means a non-petroleum oil or fat of vegetable origin, including but not limited to oils and fats derived from plant seeds, nuts, fruits, and kernels.

Vessel means every description of watercraft or other artificial contrivance used, or capable of being used, as a means of transportation on water, other than a public vessel.

Wetlands means those areas that are inundated or saturated by surface or groundwater at a frequency or duration sufficient to support, and that under normal circumstances do support, a prevalence of vegetation typically adapted for life in saturated soil conditions. Wetlands generally include playa lakes, swamps, marshes, bogs, and similar areas such as sloughs, prairie potholes, wet meadows, prairie river overflows, mudflats, and natural ponds.

Worst case discharge for an onshore non-transportation-related facility means the largest foreseeable discharge in adverse weather conditions as determined using the worksheets in Appendix D to this part.

[67 FR 47140, July 17, 2002, as amended at 71 FR 77290, Dec. 26, 2006]

§112.3 Requirement to prepare and implement a Spill Prevention, Control, and Countermeasure Plan.

The owner or operator of an onshore or offshore facility subject to this section must prepare a Spill Prevention, Control, and Countermeasure Plan (hereafter ''SPCC Plan'' or ''Plan),'' in writing, and in accordance with §112.7, and any other applicable section of this part.

(a)(1) If your onshore or offshore facility was in operation on or before August 16, 2002, you must maintain your Plan, but most amend it, if necessary to ensure compliance with this part, and implement the Plan no later than July 1, 2009. If your onshore or offshore facility becomes operational after August 16, 2002, through July 1, 2009, and could reasonably be expected to have a discharge as described in §112.1(b), you must prepare and implement a Plan on or before July 1, 2009.

(2) If your onshore facility is a farm as defined in §112.2, the compliance date described in paragraph (a)(1) of this section is delayed until the effective date of a rule establishing SPCC requirements specifically for farms or otherwise establishes dates by which farms must comply with the provisions of this part.

(b)(1) If you are the owner or operator of an onshore or offshore facility that becomes operational after July 1, 2009, and could reasonably be expected to have a discharge as described in §112.1(b), you must prepare and implement a Plan before you begin operations.

(2) If your onshore facility meets the definition of farm in §112.2, the compliance date described in paragraph (b)(1) of this section is delayed until the effective date of a rule establishing

SPCC requirements specifically for farms or otherwise establishes dates by which farms must comply with the provisions of this part.

(c) If you are the owner or operator of an onshore or offshore mobile facility, such as an onshore drilling or workover rig, barge mounted offshore drilling or workover rig, or portable fueling facility, you must prepare, implement, and maintain a facility Plan as required by this section. You must maintain your Plan, but must amend and implement it, if necessary to ensure compliance with this part, on or before July 1, 2009. If your onshore or offshore mobile facility becomes operational after July 1, 2009, and could reasonably be expected to have a discharge as described in §112.1(b), you must prepare and implement a Plan before you begin operations. This provision does not require that you prepare a new Plan each time you move the facility to a new site. The Plan may be a general Plan. When you move the mobile or portable facility, you must locate and install it using the discharge prevention practices outlined in the Plan for the facility. The Plan is applicable only while the facility is in a fixed (non-transportation) operating mode.

(d) Except as provided in §112.6, a licensed Professional Engineer must review and certify a Plan for it to be effective to satisfy the requirements of this part.

(1) By means of this certification the Professional Engineer attests:

(i) That he is familiar with the requirements of this part ;

(ii) That he or his agent has visited and examined the facility;

(iii) That the Plan has been prepared in accordance with good engineering practice, including consideration of applicable industry standards, and with the requirements of this part;

(iv) That procedures for required inspections and testing have been established; and

(v) That the Plan is adequate for the facility.

(2) Such certification shall in no way relieve the owner or operator of a facility of his duty to prepare and fully implement such Plan in accordance with the requirements of this part.

(e) If you are the owner or operator of a facility for which a Plan is required under this section, you must:

(1) Maintain a complete copy of the Plan at the facility if the facility is normally attended at least four hours per day, or at the nearest field office if the facility is not so attended, and

(2) Have the Plan available to the Regional Administrator for on-site review during normal working hours.

(f) *Extension of time.* (1) The Regional Administrator may authorize an extension of time for the preparation and full implementation of a Plan, or any amendment thereto, beyond the time permitted for the preparation, implementation, or amendment of a Plan under this part, when he finds that the owner or operator of a facility subject to this section, cannot fully comply with the requirements as a result of either nonavailability of qualified personnel, or delays in construction or equipment delivery beyond the control and without the fault of such owner or operator or his agents or employees.

(2) If you are an owner or operator seeking an extension of time under paragraph (f)(1) of this section, you may submit a written extension request to the Regional Administrator. Your request must include:

(i) A full explanation of the cause for any such delay and the specific aspects of the Plan affected by the delay;

(ii) A full discussion of actions being taken or contemplated to minimize or mitigate such delay; and

(iii) A proposed time schedule for the implementation of any corrective actions being taken or contemplated, including interim dates for completion of tests or studies, installation and operation of any necessary equipment, or other preventive measures. In addition you may present additional oral or written statements in support of your extension request.

(3) The submission of a written extension request under paragraph (f)(2) of this section does not relieve you of your obligation to comply with the requirements of this part. The Regional Administrator may request a copy of your Plan to evaluate the extension request. When the Regional Administrator authorizes an extension of time

for particular equipment or other specific aspects of the Plan, such extension does not affect your obligation to comply with the requirements related to other equipment or other specific aspects of the Plan for which the Regional Administrator has not expressly authorized an extension.

(g) *Qualified Facilities.* The owner or operator of a qualified facility as defined in this subparagraph may self-certify his or her facility's Plan, as provided in § 112.6. A qualified facility is one that:

(1) Has an aggregate aboveground storage capacity of 10,000 gallons or less; and

(2) Has had no single discharge as described in § 112.1(b) exceeding 1,000 U.S. gallons or no two discharges as described in § 112.1(b) each exceeding 42 U.S. gallons within any twelve month period in the three years prior to the SPCC Plan self-certification date, or since becoming subject to this part if the facility has been in operation for less than three years (other than discharges as described in § 112.1(b) that are the result of natural disasters, acts of war, or terrorism).

[67 FR 47140, July 17, 2002, as amended at 68 FR 1351, Jan. 9, 2003; 68 FR 18894, Apr. 17, 2003; 69 FR 48798, Aug. 11, 2004; 71 FR 8466, Feb. 17, 2006; 71 FR 77290, Dec. 26, 2006; 72 FR 27447, May 16, 2007]

§ 112.4 Amendment of Spill Prevention, Control, and Countermeasure Plan by Regional Administrator.

If you are the owner or operator of a facility subject to this part, you must:

(a) Notwithstanding compliance with § 112.3, whenever your facility has discharged more than 1,000 U.S. gallons of oil in a single discharge as described in § 112.1(b), or discharged more than 42 U.S. gallons of oil in each of two discharges as described in § 112.1(b), occurring within any twelve month period, submit the following information to the Regional Administrator within 60 days from the time the facility becomes subject to this section:

(1) Name of the facility;

(2) Your name;

(3) Location of the facility;

(4) Maximum storage or handling capacity of the facility and normal daily throughput;

(5) Corrective action and countermeasures you have taken, including a description of equipment repairs and replacements;

(6) An adequate description of the facility, including maps, flow diagrams, and topographical maps, as necessary;

(7) The cause of such discharge as described in § 112.1(b), including a failure analysis of the system or subsystem in which the failure occurred;

(8) Additional preventive measures you have taken or contemplated to minimize the possibility of recurrence; and

(9) Such other information as the Regional Administrator may reasonably require pertinent to the Plan or discharge.

(b) Take no action under this section until it applies to your facility. This section does not apply until the expiration of the time permitted for the initial preparation and implementation of the Plan under § 112.3, but not including any amendments to the Plan.

(c) Send to the appropriate agency or agencies in charge of oil pollution control activities in the State in which the facility is located a complete copy of all information you provided to the Regional Administrator under paragraph (a) of this section. Upon receipt of the information such State agency or agencies may conduct a review and make recommendations to the Regional Administrator as to further procedures, methods, equipment, and other requirements necessary to prevent and to contain discharges from your facility.

(d) Amend your Plan, if after review by the Regional Administrator of the information you submit under paragraph (a) of this section, or submission of information to EPA by the State agency under paragraph (c) of this section, or after on-site review of your Plan, the Regional Administrator requires that you do so. The Regional Administrator may require you to amend your Plan if he finds that it does not meet the requirements of this part or that amendment is necessary to prevent and contain discharges from your facility.

(e) Act in accordance with this paragraph when the Regional Administrator proposes by certified mail or by personal delivery that you amend your

SPCC Plan. If the owner or operator is a corporation, he must also notify by mail the registered agent of such corporation, if any and if known, in the State in which the facility is located. The Regional Administrator must specify the terms of such proposed amendment. Within 30 days from receipt of such notice, you may submit written information, views, and arguments on the proposed amendment. After considering all relevant material presented, the Regional Administrator must either notify you of any amendment required or rescind the notice. You must amend your Plan as required within 30 days after such notice, unless the Regional Administrator, for good cause, specifies another effective date. You must implement the amended Plan as soon as possible, but not later than six months after you amend your Plan, unless the Regional Administrator specifies another date.

(f) If you appeal a decision made by the Regional Administrator requiring an amendment to an SPCC Plan, send the appeal to the EPA Administrator in writing within 30 days of receipt of the notice from the Regional Administrator requiring the amendment under paragraph (e) of this section. You must send a complete copy of the appeal to the Regional Administrator at the time you make the appeal. The appeal must contain a clear and concise statement of the issues and points of fact in the case. It may also contain additional information from you, or from any other person. The EPA Administrator may request additional information from you, or from any other person. The EPA Administrator must render a decision within 60 days of receiving the appeal and must notify you of his decision.

§112.5 Amendment of Spill Prevention, Control, and Countermeasure Plan by owners or operators.

If you are the owner or operator of a facility subject to this part, you must:

(a) Amend the SPCC Plan for your facility in accordance with the general requirements in §112.7, and with any specific section of this part applicable to your facility, when there is a change in the facility design, construction, operation, or maintenance that materially affects its potential for a discharge as described in §112.1(b). Examples of changes that may require amendment of the Plan include, but are not limited to: commissioning or decommissioning containers; replacement, reconstruction, or movement of containers; reconstruction, replacement, or installation of piping systems; construction or demolition that might alter secondary containment structures; changes of product or service; or revision of standard operation or maintenance procedures at a facility. An amendment made under this section must be prepared within six months, and implemented as soon as possible, but not later than six months following preparation of the amendment.

(b) Notwithstanding compliance with paragraph (a) of this section, complete a review and evaluation of the SPCC Plan at least once every five years from the date your facility becomes subject to this part; or, if your facility was in operation on or before August 16, 2002, five years from the date your last review was required under this part. As a result of this review and evaluation, you must amend your SPCC Plan within six months of the review to include more effective prevention and control technology if the technology has been field-proven at the time of the review and will significantly reduce the likelihood of a discharge as described in §112.1(b) from the facility. You must implement any amendment as soon as possible, but not later than six months following preparation of any amendment. You must document your completion of the review and evaluation, and must sign a statement as to whether you will amend the Plan, either at the beginning or end of the Plan or in a log or an appendix to the Plan. The following words will suffice, ''I have completed review and evaluation of the SPCC Plan for (name of facility) on (date), and will (will not) amend the Plan as a result.''

(c) Except as provided in §112.6, have a Professional Engineer certify any technical amendments to your Plan in accordance with §112.3(d).

[67 FR 47140, July 17, 2002, as amended at 71 FR 77291, Dec. 26, 2006]

and design (such as containers that are: shop built, skid-mounted, elevated, equipped with a liner, double walled, or partially buried). Examples of these integrity tests include, but are not limited to: visual inspection, hydrostatic testing, radiographic testing, ultrasonic testing, acoustic emissions testing, or other systems of non-destructive testing. You must keep comparison records and you must also inspect the container's supports and foundations. In addition, you must frequently inspect the outside of the container for signs of deterioration, discharges, or accumulation of oil inside diked areas. Records of inspections and tests kept under usual and customary business practices satisfy the recordkeeping requirements of this paragraph.

(d) *Professional Engineer Certification of Portions of a Qualified Facility's Self-certified Plan.* As described in paragraph (c) of this section, the facility owner or operator may not self-certify alternative measures allowed under §112.7(a)(2) or (d), that are included in the facility's Plan. Such measures must be reviewed and certified, in writing, by a licensed Professional Engineer as follows:

(1) For each alternative measure allowed under §112.7(a)(2), the Plan must be accompanied by a written statement by a Professional Engineer that states the reason for nonconformance and describes the alternative method and how it provides equivalent environmental protection in accordance with §112.7(a)(2). For each determination of impracticability of secondary containment pursuant to §112.7(d), the Plan must clearly explain why secondary containment measures are not practicable at this facility and provide the alternative measures required in §112.7(d) in lieu of secondary containment.

(2) By certifying each measure allowed under §112.7(a)(2) and (d), the Professional Engineer attests:

(i) That he is familiar with the requirements of this part;

(ii) That he or his agent has visited and examined the facility; and

(iii) That the alternative method of environmental equivalence in accordance with §112.7(a)(2) or the determination of impracticability and alternative measures in accordance with §112.7(d) is consistent with good engineering practice, including consideration of applicable industry standards, and with the requirements of this part.

(3) The review and certification by the Professional Engineer under this paragraph is limited to the alternative method which achieves equivalent environmental protection pursuant to §112.7(a)(2) or to the impracticability determination and measures in lieu of secondary containment pursuant to §112.7(d).

[71 FR 77291, Dec. 26, 2006]

§112.7 General requirements for Spill Prevention, Control, and Countermeasure Plans.

If you are the owner or operator of a facility subject to this part you must prepare a Plan in accordance with good engineering practices. The Plan must have the full approval of management at a level of authority to commit the necessary resources to fully implement the Plan. You must prepare the Plan in writing. If you do not follow the sequence specified in this section for the Plan, you must prepare an equivalent Plan acceptable to the Regional Administrator that meets all of the applicable requirements listed in this part, and you must supplement it with a section cross-referencing the location of requirements listed in this part and the equivalent requirements in the other prevention plan. If the Plan calls for additional facilities or procedures, methods, or equipment not yet fully operational, you must discuss these items in separate paragraphs, and must explain separately the details of installation and operational start-up. As detailed elsewhere in this section, you must also:

(a)(1) Include a discussion of your facility's conformance with the requirements listed in this part.

(2) Comply with all applicable requirements listed in this part. Except as provided in §112.6, your Plan may deviate from the requirements in paragraphs (g), (h)(2) and (3), and (i) of this section and the requirements in subparts B and C of this part, except the secondary containment requirements in paragraphs (c) and (h)(1) of this section, and §§112.8(c)(2), 112.8(c)(11),

112.9(c)(2), 112.10(c), 112.12(c)(2), and 112.12(c)(11), where applicable to a specific facility, if you provide equivalent environmental protection by some other means of spill prevention, control, or countermeasure. Where your Plan does not conform to the applicable requirements in paragraphs (g), (h)(2) and (3), and (i) of this section, or the requirements of subparts B and C of this part, except the secondary containment requirements in paragraph (c) and (h)(1) of this section, and §§ 112.8(c)(2), 112.8(c)(11), 112.9(c)(2), 112.10(c), 112.12(c)(2), and 112.12(c)(11), you must state the reasons for nonconformance in your Plan and describe in detail alternate methods and how you will achieve equivalent environmental protection. If the Regional Administrator determines that the measures described in your Plan do not provide equivalent environmental protection, he may require that you amend your Plan, following the procedures in § 112.4(d) and (e).

(3) Describe in your Plan the physical layout of the facility and include a facility diagram, which must mark the location and contents of each container. The facility diagram must include completely buried tanks that are otherwise exempted from the requirements of this part under § 112.1(d)(4). The facility diagram must also include all transfer stations and connecting pipes. You must also address in your Plan:

(i) The type of oil in each container and its storage capacity;

(ii) Discharge prevention measures including procedures for routine handling of products (loading, unloading, and facility transfers, etc.);

(iii) Discharge or drainage controls such as secondary containment around containers and other structures, equipment, and procedures for the control of a discharge;

(iv) Countermeasures for discharge discovery, response, and cleanup (both the facility's capability and those that might be required of a contractor);

(v) Methods of disposal of recovered materials in accordance with applicable legal requirements; and

(vi) Contact list and phone numbers for the facility response coordinator, National Response Center, cleanup contractors with whom you have an agreement for response, and all appropriate Federal, State, and local agencies who must be contacted in case of a discharge as described in § 112.1(b).

(4) Unless you have submitted a response plan under § 112.20, provide information and procedures in your Plan to enable a person reporting a discharge as described in § 112.1(b) to relate information on the exact address or location and phone number of the facility; the date and time of the discharge, the type of material discharged; estimates of the total quantity discharged; estimates of the quantity discharged as described in § 112.1(b); the source of the discharge; a description of all affected media; the cause of the discharge; any damages or injuries caused by the discharge; actions being used to stop, remove, and mitigate the effects of the discharge; whether an evacuation may be needed; and, the names of individuals and/or organizations who have also been contacted.

(5) Unless you have submitted a response plan under § 112.20, organize portions of the Plan describing procedures you will use when a discharge occurs in a way that will make them readily usable in an emergency, and include appropriate supporting material as appendices.

(b) Where experience indicates a reasonable potential for equipment failure (such as loading or unloading equipment, tank overflow, rupture, or leakage, or any other equipment known to be a source of a discharge), include in your Plan a prediction of the direction, rate of flow, and total quantity of oil which could be discharged from the facility as a result of each type of major equipment failure.

(c) Provide appropriate containment and/or diversionary structures or equipment to prevent a discharge as described in § 112.1(b), except as provided in paragraph (k) of this section for qualified oil-filled operational equipment. The entire containment system, including walls and floor, must be capable of containing oil and must be constructed so that any discharge from a primary containment system, such as a tank or pipe, will not escape the containment system before cleanup

occurs. At a minimum, you must use one of the following prevention systems or its equivalent:

(1) For onshore facilities:

(i) Dikes, berms, or retaining walls sufficiently impervious to contain oil;

(ii) Curbing;

(iii) Culverting, gutters, or other drainage systems;

(iv) Weirs, booms, or other barriers;

(v) Spill diversion ponds;

(vi) Retention ponds; or

(vii) Sorbent materials.

(2) For offshore facilities:

(i) Curbing or drip pans; or

(ii) Sumps and collection systems.

(d) Provided your Plan is certified by a licensed Professional Engineer under §112.3(d), or, in the case of a qualified facility that meets the criteria in §112.3(g), the relevant sections of your Plan are certified by a licensed Professional Engineer under §112.6(d), if you determine that the installation of any of the structures or pieces of equipment listed in paragraphs (c) and (h)(1) of this section, and §§112.8(c)(2), 112.8(c)(11), 112.9(c)(2), 112.10(c), 112.12(c)(2), and 112.12(c)(11) to prevent a discharge as described in §112.1(b) from any onshore or offshore facility is not practicable, you must clearly explain in your Plan why such measures are not practicable; for bulk storage containers, conduct both periodic integrity testing of the containers and periodic integrity and leak testing of the valves and piping; and, unless you have submitted a response plan under §112.20, provide in your Plan the following:

(1) An oil spill contingency plan following the provisions of part 109 of this chapter.

(2) A written commitment of manpower, equipment, and materials required to expeditiously control and remove any quantity of oil discharged that may be harmful.

(e) *Inspections, tests, and records.* Conduct inspections and tests required by this part in accordance with written procedures that you or the certifying engineer develop for the facility. You must keep these written procedures and a record of the inspections and tests, signed by the appropriate supervisor or inspector, with the SPCC Plan for a period of three years. Records of inspections and tests kept under usual and customary business practices will suffice for purposes of this paragraph.

(f) *Personnel, training, and discharge prevention procedures.* (1) At a minimum, train your oil-handling personnel in the operation and maintenance of equipment to prevent discharges; discharge procedure protocols; applicable pollution control laws, rules, and regulations; general facility operations; and, the contents of the facility SPCC Plan.

(2) Designate a person at each applicable facility who is accountable for discharge prevention and who reports to facility management.

(3) Schedule and conduct discharge prevention briefings for your oil-handling personnel at least once a year to assure adequate understanding of the SPCC Plan for that facility. Such briefings must highlight and describe known discharges as described in §112.1(b) or failures, malfunctioning components, and any recently developed precautionary measures.

(g) *Security (excluding oil production facilities).* (1) Fully fence each facility handling, processing, or storing oil, and lock and/or guard entrance gates when the facility is not in production or is unattended.

(2) Ensure that the master flow and drain valves and any other valves permitting direct outward flow of the container's contents to the surface have adequate security measures so that they remain in the closed position when in non-operating or non-standby status.

(3) Lock the starter control on each oil pump in the "off" position and locate it at a site accessible only to authorized personnel when the pump is in a non-operating or non-standby status.

(4) Securely cap or blank-flange the loading/unloading connections of oil pipelines or facility piping when not in service or when in standby service for an extended time. This security practice also applies to piping that is emptied of liquid content either by draining or by inert gas pressure.

(5) Provide facility lighting commensurate with the type and location of the facility that will assist in the:

(i) Discovery of discharges occurring during hours of darkness, both by operating personnel, if present, and by non-operating personnel (the general public, local police, etc.); and

(ii) Prevention of discharges occurring through acts of vandalism.

(h) *Facility tank car and tank truck loading/unloading rack (excluding offshore facilities).* (1) Where loading/unloading area drainage does not flow into a catchment basin or treatment facility designed to handle discharges, use a quick drainage system for tank car or tank truck loading and unloading areas. You must design any containment system to hold at least the maximum capacity of any single compartment of a tank car or tank truck loaded or unloaded at the facility.

(2) Provide an interlocked warning light or physical barrier system, warning signs, wheel chocks, or vehicle break interlock system in loading/unloading areas to prevent vehicles from departing before complete disconnection of flexible or fixed oil transfer lines.

(3) Prior to filling and departure of any tank car or tank truck, closely inspect for discharges the lowermost drain and all outlets of such vehicles, and if necessary, ensure that they are tightened, adjusted, or replaced to prevent liquid discharge while in transit.

(i) If a field-constructed aboveground container undergoes a repair, alteration, reconstruction, or a change in service that might affect the risk of a discharge or failure due to brittle fracture or other catastrophe, or has discharged oil or failed due to brittle fracture failure or other catastrophe, evaluate the container for risk of discharge or failure due to brittle fracture or other catastrophe, and as necessary, take appropriate action.

(j) In addition to the minimal prevention standards listed under this section, include in your Plan a complete discussion of conformance with the applicable requirements and other effective discharge prevention and containment procedures listed in this part or any applicable more stringent State rules, regulations, and guidelines.

(k) *Qualified Oil-filled Operational Equipment.* The owner or operator of a facility with oil-filled operational equipment that meets the qualification criteria in paragraph (k)(1) of this subsection may choose to implement for this qualified oil-filled operational equipment the alternate requirements as described in paragraph (k)(2) of this sub-section in lieu of general secondary containment required in paragraph (c) of this section.

(1) *Qualification Criteria—Reportable Discharge History:* The owner or operator of a facility that has had no single discharge as described in §112.1(b) from any oil-filled operational equipment exceeding 1,000 U.S. gallons or no two discharges as described in §112.1(b) from any oil-filled operational equipment each exceeding 42 U.S. gallons within any twelve month period in the three years prior to the SPCC Plan certification date, or since becoming subject to this part if the facility has been in operation for less than three years (other than oil discharges as described in §112.1(b) that are the result of natural disasters, acts of war or terrorism); and

(2) *Alternative Requirements to General Secondary Containment.* If secondary containment is not provided for qualified oil-filled operational equipment pursuant to paragraph (c) of this section, the owner or operator of a facility with qualified oil-filled operational equipment must:

(i) Establish and document the facility procedures for inspections or a monitoring program to detect equipment failure and/or a discharge; and

(ii) Unless you have submitted a response plan under §112.20, provide in your Plan the following:

(A) An oil spill contingency plan following the provisions of part 109 of this chapter.

(B) A written commitment of manpower, equipment, and materials required to expeditiously control and remove any quantity of oil discharged that may be harmful.

[67 FR 47140, July 17, 2002, as amended at 71 FR 77292, Dec. 26, 2006]

Subpart B—Requirements for Petroleum Oils and Non-Petroleum Oils, Except Animal Fats and Oils and Greases, and Fish and Marine Mammal Oils; and Vegetable Oils (Including Oils from Seeds, Nuts, Fruits, and Kernels)

SOURCE: 67 FR 47146, July 17, 2002, unless otherwise noted.

§112.8 Spill Prevention, Control, and Countermeasure Plan requirements for onshore facilities (excluding production facilities).

If you are the owner or operator of an onshore facility (excluding a production facility), you must:

(a) Meet the general requirements for the Plan listed under §112.7, and the specific discharge prevention and containment procedures listed in this section.

(b) *Facility drainage.* (1) Restrain drainage from diked storage areas by valves to prevent a discharge into the drainage system or facility effluent treatment system, except where facility systems are designed to control such discharge. You may empty diked areas by pumps or ejectors; however, you must manually activate these pumps or ejectors and must inspect the condition of the accumulation before starting, to ensure no oil will be discharged.

(2) Use valves of manual, open-and-closed design, for the drainage of diked areas. You may not use flapper-type drain valves to drain diked areas. If your facility drainage drains directly into a watercourse and not into an on-site wastewater treatment plant, you must inspect and may drain uncontaminated retained stormwater, as provided in paragraphs (c)(3)(ii), (iii), and (iv) of this section.

(3) Design facility drainage systems from undiked areas with a potential for a discharge (such as where piping is located outside containment walls or where tank truck discharges may occur outside the loading area) to flow into ponds, lagoons, or catchment basins designed to retain oil or return it to the facility. You must not locate catchment basins in areas subject to periodic flooding.

(4) If facility drainage is not engineered as in paragraph (b)(3) of this section, equip the final discharge of all ditches inside the facility with a diversion system that would, in the event of an uncontrolled discharge, retain oil in the facility.

(5) Where drainage waters are treated in more than one treatment unit and such treatment is continuous, and pump transfer is needed, provide two ''lift'' pumps and permanently install at least one of the pumps. Whatever techniques you use, you must engineer facility drainage systems to prevent a discharge as described in §112.1(b) in case there is an equipment failure or human error at the facility.

(c) *Bulk storage containers.* (1) Not use a container for the storage of oil unless its material and construction are compatible with the material stored and conditions of storage such as pressure and temperature.

(2) Construct all bulk storage tank installations (except mobile refuelers) so that you provide a secondary means of containment for the entire capacity of the largest single container and sufficient freeboard to contain precipitation. You must ensure that diked areas are sufficiently impervious to contain discharged oil. Dikes, containment curbs, and pits are commonly employed for this purpose. You may also use an alternative system consisting of a drainage trench enclosure that must be arranged so that any discharge will terminate and be safely confined in a facility catchment basin or holding pond.

(3) Not allow drainage of uncontaminated rainwater from the diked area into a storm drain or discharge of an effluent into an open watercourse, lake, or pond, bypassing the facility treatment system unless you:

(i) Normally keep the bypass valve sealed closed.

(ii) Inspect the retained rainwater to ensure that its presence will not cause a discharge as described in §112.1(b).

(iii) Open the bypass valve and reseal it following drainage under responsible supervision; and

(iv) Keep adequate records of such events, for example, any records required under permits issued in accordance with §§122.41(j)(2) and 122.41(m)(3) of this chapter.

(4) Protect any completely buried metallic storage tank installed on or after January 10, 1974 from corrosion by coatings or cathodic protection compatible with local soil conditions. You must regularly leak test such completely buried metallic storage tanks.

(5) Not use partially buried or bunkered metallic tanks for the storage of oil, unless you protect the buried section of the tank from corrosion. You must protect partially buried and bunkered tanks from corrosion by coatings or cathodic protection compatible with local soil conditions.

(6) Test each aboveground container for integrity on a regular schedule, and whenever you make material repairs. The frequency of and type of testing must take into account container size and design (such as floating roof, skid-mounted, elevated, or partially buried). You must combine visual inspection with another testing technique such as hydrostatic testing, radiographic testing, ultrasonic testing, acoustic emissions testing, or another system of non-destructive shell testing. You must keep comparison records and you must also inspect the container's supports and foundations. In addition, you must frequently inspect the outside of the container for signs of deterioration, discharges, or accumulation of oil inside diked areas. Records of inspections and tests kept under usual and customary business practices will suffice for purposes of this paragraph.

(7) Control leakage through defective internal heating coils by monitoring the steam return and exhaust lines for contamination from internal heating coils that discharge into an open watercourse, or pass the steam return or exhaust lines through a settling tank, skimmer, or other separation or retention system.

(8) Engineer or update each container installation in accordance with good engineering practice to avoid discharges. You must provide at least one of the following devices:

(i) High liquid level alarms with an audible or visual signal at a constantly attended operation or surveillance station. In smaller facilities an audible air vent may suffice.

(ii) High liquid level pump cutoff devices set to stop flow at a predetermined container content level.

(iii) Direct audible or code signal communication between the container gauger and the pumping station.

(iv) A fast response system for determining the liquid level of each bulk storage container such as digital computers, telepulse, or direct vision gauges. If you use this alternative, a person must be present to monitor gauges and the overall filling of bulk storage containers.

(v) You must regularly test liquid level sensing devices to ensure proper operation.

(9) Observe effluent treatment facilities frequently enough to detect possible system upsets that could cause a discharge as described in §112.1(b).

(10) Promptly correct visible discharges which result in a loss of oil from the container, including but not limited to seams, gaskets, piping, pumps, valves, rivets, and bolts. You must promptly remove any accumulations of oil in diked areas.

(11) Position or locate mobile or portable oil storage containers to prevent a discharge as described in §112.1(b). Except for mobile refuelers, you must furnish a secondary means of containment, such as a dike or catchment basin, sufficient to contain the capacity of the largest single compartment or container with sufficient freeboard to contain precipitation.

(d) *Facility transfer operations, pumping, and facility process.* (1) Provide buried piping that is installed or replaced on or after August 16, 2002, with a protective wrapping and coating. You must also cathodically protect such buried piping installations or otherwise satisfy the corrosion protection standards for piping in part 280 of this chapter or a State program approved under part 281 of this chapter. If a section of buried line is exposed for any reason, you must carefully inspect it for deterioration. If you find corrosion damage,

you must undertake additional examination and corrective action as indicated by the magnitude of the damage.

(2) Cap or blank-flange the terminal connection at the transfer point and mark it as to origin when piping is not in service or is in standby service for an extended time.

(3) Properly design pipe supports to minimize abrasion and corrosion and allow for expansion and contraction.

(4) Regularly inspect all aboveground valves, piping, and appurtenances. During the inspection you must assess the general condition of items, such as flange joints, expansion joints, valve glands and bodies, catch pans, pipeline supports, locking of valves, and metal surfaces. You must also conduct integrity and leak testing of buried piping at the time of installation, modification, construction, relocation, or replacement.

(5) Warn all vehicles entering the facility to be sure that no vehicle will endanger aboveground piping or other oil transfer operations.

[67 FR 47146, July 17, 2002, as amended at 71 FR 77293, Dec. 26, 2006]

§112.9 Spill Prevention, Control, and Countermeasure Plan requirements for onshore oil production facilities.

If you are the owner or operator of an onshore production facility, you must:

(a) Meet the general requirements for the Plan listed under §112.7, and the specific discharge prevention and containment procedures listed under this section.

(b) *Oil production facility drainage.* (1) At tank batteries and separation and treating areas where there is a reasonable possibility of a discharge as described in §112.1(b), close and seal at all times drains of dikes or drains of equivalent measures required under §112.7(c)(1), except when draining uncontaminated rainwater. Prior to drainage, you must inspect the diked area and take action as provided in §112.8(c)(3)(ii), (iii), and (iv). You must remove accumulated oil on the rainwater and return it to storage or dispose of it in accordance with legally approved methods.

(2) Inspect at regularly scheduled intervals field drainage systems (such as drainage ditches or road ditches), and oil traps, sumps, or skimmers, for an accumulation of oil that may have resulted from any small discharge. You must promptly remove any accumulations of oil.

(c) *Oil production facility bulk storage containers.* (1) Not use a container for the storage of oil unless its material and construction are compatible with the material stored and the conditions of storage.

(2) Provide all tank battery, separation, and treating facility installations with a secondary means of containment for the entire capacity of the largest single container and sufficient freeboard to contain precipitation. You must safely confine drainage from undiked areas in a catchment basin or holding pond.

(3) Periodically and upon a regular schedule visually inspect each container of oil for deterioration and maintenance needs, including the foundation and support of each container that is on or above the surface of the ground.

(4) Engineer or update new and old tank battery installations in accordance with good engineering practice to prevent discharges. You must provide at least one of the following:

(i) Container capacity adequate to assure that a container will not overfill if a pumper/gauger is delayed in making regularly scheduled rounds.

(ii) Overflow equalizing lines between containers so that a full container can overflow to an adjacent container.

(iii) Vacuum protection adequate to prevent container collapse during a pipeline run or other transfer of oil from the container.

(iv) High level sensors to generate and transmit an alarm signal to the computer where the facility is subject to a computer production control system.

(d) *Facility transfer operations, oil production facility.* (1) Periodically and upon a regular schedule inspect all aboveground valves and piping associated with transfer operations for the general condition of flange joints, valve glands and bodies, drip pans, pipe supports, pumping well polish rod stuffing boxes, bleeder and gauge valves, and other such items.

authorization to regulate that particular waste as hazardous, the generator must assure that the designated facility agrees to sign and return the manifest to the generator, and that any out-of-state transporter signs and forwards the manifest to the designated facility.

NOTE: See § 263.20(e) and (f) for special provisions for rail or water (bulk shipment) transporters.

[45 FR 33142, May 19, 1980, as amended at 45 FR 86973, Dec. 31, 1980; 55 FR 2354, Jan. 23, 1990]

§ 262.27 Waste minimization certification.

A generator who initiates a shipment of hazardous waste must certify to one of the following statements in Item 15 of the uniform hazardous waste manifest:

(a) ''I am a large quantity generator. I have a program in place to reduce the volume and toxicity of waste generated to the degree I have determined to be economically practicable and I have selected the practicable method of treatment, storage, or disposal currently available to me which minimizes the present and future threat to human health and the environment;'' or

(b) ''I am a small quantity generator. I have made a good faith effort to minimize my waste generation and select the best waste management method that is available to me and that I can afford.''

[70 FR 10817, Mar. 4, 2005]

Subpart C—Pre-Transport Requirements

§ 262.30 Packaging.

Before transporting hazardous waste or offering hazardous waste for transportation off-site, a generator must package the waste in accordance with the applicable Department of Transportation regulations on packaging under 49 CFR parts 173, 178, and 179.

§ 262.31 Labeling.

Before transporting or offering hazardous waste for transportation off-site, a generator must label each package in accordance with the applicable Department of Transportation regulations on hazardous materials under 49 CFR part 172.

§ 262.32 Marking.

(a) Before transporting or offering hazardous waste for transportation off-site, a generator must mark each package of hazardous waste in accordance with the applicable Department of Transportation regulations on hazardous materials under 49 CFR part 172;

(b) Before transporting hazardous waste or offering hazardous waste for transportation off-site, a generator must mark each container of 119 gallons or less used in such transportation with the following words and information in accordance with the requirements of 49 CFR 172.304:

HAZARDOUS WASTE—Federal Law Prohibits Improper Disposal. If found, contact the nearest police or public safety authority or the U.S. Environmental Protection Agency.
Generator's Name and Address _____.
Generator's EPA Identification Number _____.
Manifest Tracking Number _____.

[45 FR 33142, May 19, 1980, as amended at 70 FR 10817, Mar. 4, 2005]

§ 262.33 Placarding.

Before transporting hazardous waste or offering hazardous waste for transportation off-site, a generator must placard or offer the initial transporter the appropriate placards according to Department of Transportation regulations for hazardous materials under 49 CFR part 172, subpart F.

[70 FR 35037, June 16, 2005]

§ 262.34 Accumulation time.

(a) Except as provided in paragraphs (d), (e), and (f) of this section, a generator may accumulate hazardous waste on-site for 90 days or less without a permit or without having interim status, provided that:

(1) The waste is placed:

(i) In containers and the generator complies with the applicable requirements of subparts I, AA, BB, and CC of 40 CFR part 265; and/or

(ii) In tanks and the generator complies with the applicable requirements of subparts J, AA, BB, and CC of 40 CFR part 265 except §§ 265.197(c) and 265.200; and/or

(iii) On drip pads and the generator complies with subpart W of 40 CFR part 265 and maintains the following records at the facility:

(A) A description of procedures that will be followed to ensure that all wastes are removed from the drip pad and associated collection system at least once every 90 days; and

(B) Documentation of each waste removal, including the quantity of waste removed from the drip pad and the sump or collection system and the date and time of removal; and/or

(iv) In containment buildings and the generator complies with subpart DD of 40 CFR part 265, has placed its professional engineer certification that the building complies with the design standards specified in 40 CFR 265.1101 in the facility's operating record no later than 60 days after the date of initial operation of the unit. After February 18, 1993, PE certification will be required prior to operation of the unit. The owner or operator shall maintain the following records at the facility:

(A) A written description of procedures to ensure that each waste volume remains in the unit for no more than 90 days, a written description of the waste generation and management practices for the facility showing that they are consistent with respecting the 90 day limit, and documentation that the procedures are complied with; or

(B) Documentation that the unit is emptied at least once every 90 days.

In addition, such a generator is exempt from all the requirements in subparts G and H of 40 CFR part 265, except for §§ 265.111 and 265.114.

(2) The date upon which each period of accumulation begins is clearly marked and visible for inspection on each container;

(3) While being accumulated on-site, each container and tank is labeled or marked clearly with the words, ''Hazardous Waste''; and

(4) The generator complies with the requirements for owners or operators in Subparts C and D in 40 CFR part 265, with § 265.16, and with 40 CFR 268.7(a)(5).

(b) A generator who accumulates hazardous waste for more than 90 days is an operator of a storage facility and is subject to the requirements of 40 CFR parts 264 and 265 and the permit requirements of 40 CFR part 270 unless he has been granted an extension to the 90-day period. Such extension may be granted by EPA if hazardous wastes must remain on-site for longer than 90 days due to unforeseen, temporary, and uncontrollable circumstances. An extension of up to 30 days may be granted at the discretion of the Regional Administrator on a case-by-case basis.

(c)(1) A generator may accumulate as much as 55 gallons of hazardous waste or one quart of acutely hazardous waste listed in § 261.33(e) in containers at or near any point of generation where wastes initially accumulate, which is under the control of the operator of the process generating the waste, without a permit or interim status and without complying with paragraph (a) of this section provided he:

(i) Complies with §§ 265.171, 265.172, and 265.173(a) of this chapter; and

(ii) Marks his containers either with the words ''Hazardous Waste'' or with other words that identify the contents of the containers.

(2) A generator who accumulates either hazardous waste or acutely hazardous waste listed in § 261.33(e) in excess of the amounts listed in paragraph (c)(1) of this section at or near any point of generation must, with respect to that amount of excess waste, comply within three days with paragraph (a) of this section or other applicable provisions of this chapter. During the three day period the generator must continue to comply with paragraphs (c)(1)(i) through (ii) of this section. The generator must mark the container holding the excess accumulation of hazardous waste with the date the excess amount began accumulating.

(d) A generator who generates greater than 100 kilograms but less than 1000 kilograms of hazardous waste in a calendar month may accumulate hazardous waste on-site for 180 days or less without a permit or without having interim status provided that:

(1) The quantity of waste accumulated on-site never exceeds 6000 kilograms;

(2) The generator complies with the requirements of subpart I of part 265 of this chapter, except for §§ 265.176 and 265.178;

(3) The generator complies with the requirements of § 265.201 in subpart J of part 265;

(4) The generator complies with the requirements of paragraphs (a)(2) and (a)(3) of this section, the requirements of subpart C of part 265, the requirements of 40 CFR 268.7(a)(5); and

(5) The generator complies with the following requirements:

(i) At all times there must be at least one employee either on the premises or on call (*i.e.*, available to respond to an emergency by reaching the facility within a short period of time) with the responsibility for coordinating all emergency response measures specified in paragraph (d)(5)(iv) of this section. This employee is the emergency coordinator.

(ii) The generator must post the following information next to the telephone:

(A) The name and telephone number of the emergency coordinator;

(B) Location of fire extinguishers and spill control material, and, if present, fire alarm; and

(C) The telephone number of the fire department, unless the facility has a direct alarm.

(iii) The generator must ensure that all employees are thoroughly familiar with proper waste handling and emergency procedures, relevant to their responsibilities during normal facility operations and emergencies;

(iv) The emergency coordinator or his designee must respond to any emergencies that arise. The applicable responses are as follows:

(A) In the event of a fire, call the fire department or attempt to extinguish it using a fire extinguisher;

(B) In the event of a spill, contain the flow of hazardous waste to the extent possible, and as soon as is practicable, clean up the hazardous waste and any contaminated materials or soil;

(C) In the event of a fire, explosion, or other release which could threaten human health outside the facility or when the generator has knowledge that a spill has reached surface water, the generator must immediately notify the National Response Center (using their 24-hour toll free number 800/424–8802). The report must include the following information:

(*1*) The name, address, and U.S. EPA Identification Number of the generator;

(*2*) Date, time, and type of incident (e.g., spill or fire);

(*3*) Quantity and type of hazardous waste involved in the incident;

(*4*) Extent of injuries, if any; and

(*5*) Estimated quantity and disposition of recovered materials, if any.

(e) A generator who generates greater than 100 kilograms but less than 1000 kilograms of hazardous waste in a calendar month and who must transport his waste, or offer his waste for transportation, over a distance of 200 miles or more for off-site treatment, storage or disposal may accumulate hazardous waste on-site for 270 days or less without a permit or without having interim status provided that he complies with the requirements of paragraph (d) of this section.

(f) A generator who generates greater than 100 kilograms but less than 1000 kilograms of hazardous waste in a calendar month and who accumulates hazardous waste in quantities exceeding 6000 kg or accumulates hazardous waste for more than 180 days (or for more than 270 days if he must transport his waste, or offer his waste for transportation, over a distance of 200 miles or more) is an operator of a storage facility and is subject to the requirements of 40 CFR parts 264 and 265 and the permit requirements of 40 CFR part 270 unless he has been granted an extension to the 180-day (or 270-day if applicable) period. Such extension may be granted by EPA if hazardous wastes must remain on-site for longer than 180 days (or 270 days if applicable) due to unforeseen, temporary, and uncontrollable circumstances. An extension of up to 30 days may be granted at the discretion of the Regional Administrator on a case-by-case basis.

(g) A generator who generates 1,000 kilograms or greater of hazardous waste per calendar month who also generates wastewater treatment sludges from electroplating operations that meet the listing description for the RCRA hazardous waste code F006, may accumulate F006 waste on-site for more than 90 days, but not more than 180 days without a permit or without having interim status provided that:

(1) The generator has implemented pollution prevention practices that reduce the amount of any hazardous substances, pollutants or contaminants entering F006 or otherwise released to the environment prior to its recycling;

(2) The F006 waste is legitimately recycled through metals recovery;

(3) No more than 20,000 kilograms of F006 waste is accumulated on-site at any one time; and

(4) The F006 waste is managed in accordance with the following:

(i) The F006 waste is placed:

(A) In containers and the generator complies with the applicable requirements of subparts I, AA, BB, and CC of 40 CFR part 265; and/or

(B) In tanks and the generator complies with the applicable requirements of subparts J, AA, BB, and CC of 40 CFR part 265, except §§265.197(c) and 265.200; and/or

(C) In containment buildings and the generator complies with subpart DD of 40 CFR part 265, and has placed its professional engineer certification that the building complies with the design standards specified in 40 CFR 265.1101 in the facility's operating record prior to operation of the unit. The owner or operator must maintain the following records at the facility:

(*1*) A written description of procedures to ensure that the F006 waste remains in the unit for no more than 180 days, a written description of the waste generation and management practices for the facility showing that they are consistent with the 180-day limit, and documentation that the generator is complying with the procedures; or

(*2*) Documentation that the unit is emptied at least once every 180 days.

(ii) In addition, such a generator is exempt from all the requirements in subparts G and H of 40 CFR part 265, except for §§265.111 and 265.114.

(iii) The date upon which each period of accumulation begins is clearly marked and visible for inspection on each container;

(iv) While being accumulated on-site, each container and tank is labeled or marked clearly with the words, ''Hazardous Waste;'' and

(v) The generator complies with the requirements for owners or operators in subparts C and D in 40 CFR part 265, with 40 CFR 265.16, and with 40 CFR 268.7(a)(5).

(h) A generator who generates 1,000 kilograms or greater of hazardous waste per calendar month who also generates wastewater treatment sludges from electroplating operations that meet the listing description for the RCRA hazardous waste code F006, and who must transport this waste, or offer this waste for transportation, over a distance of 200 miles or more for off-site metals recovery, may accumulate F006 waste on-site for more than 90 days, but not more than 270 days without a permit or without having interim status if the generator complies with the requirements of paragraphs (g)(1) through (g)(4) of this section.

(i) A generator accumulating F006 in accordance with paragraphs (g) and (h) of this section who accumulates F006 waste on-site for more than 180 days (or for more than 270 days if the generator must transport this waste, or offer this waste for transportation, over a distance of 200 miles or more), or who accumulates more than 20,000 kilograms of F006 waste on-site is an operator of a storage facility and is subject to the requirements of 40 CFR parts 264 and 265 and the permit requirements of 40 CFR part 270 unless the generator has been granted an extension to the 180-day (or 270-day if applicable) period or an exception to the 20,000 kilogram accumulation limit. Such extensions and exceptions may be granted by EPA if F006 waste must remain on-site for longer than 180 days (or 270 days if applicable) or if more than 20,000 kilograms of F006 waste must remain on-site due to unforeseen, temporary, and uncontrollable circumstances. An extension of up to 30 days or an exception to the accumulation limit may be granted at the discretion of the Regional Administrator on a case-by-case basis.

(j) A member of the Performance Track Program who generates 1000 kg or greater of hazardous waste per month (or one kilogram or more of acute hazardous waste) may accumulate hazardous waste on-site without a permit or interim status for an extended period of time, provided that:

(1) The generator accumulates the hazardous waste for no more than 180

days, or for no more than 270 days if the generator must transport the waste (or offer the waste for transport) more than 200 miles from the generating facility; and

(2) The generator first notifies the Regional Administrator and the Director of the authorized State in writing of its intent to begin accumulation of hazardous waste for extended time periods under the provisions of this section. Such advance notice must include:

(i) Name and EPA ID number of the facility, and specification of when the facility will begin accumulation of hazardous wastes for extended periods of time in accordance with this section; and

(ii) A description of the types of hazardous wastes that will be accumulated for extended periods of time, and the units that will be used for such extended accumulation; and

(iii) A Statement that the facility has made all changes to its operations, procedures, including emergency preparedness procedures, and equipment, including equipment needed for emergency preparedness, that will be necessary to accommodate extended time periods for accumulating hazardous wastes; and

(iv) If the generator intends to accumulate hazardous wastes on-site for up to 270 days, a certification that a facility that is permitted (or operating under interim status) under part 270 of this chapter to receive these wastes is not available within 200 miles of the generating facility; and

(3) The waste is managed in:

(i) Containers, in accordance with the applicable requirements of subparts I, AA, BB, and CC of 40 CFR part 265 and 40 CFR 264.175; or

(ii) Tanks, in accordance with the applicable requirements of subparts J, AA, BB, and CC of 40 CFR part 265, except for §§ 265.197(c) and 265.200; or

(iii) Drip pads, in accordance with subpart W of 40 CFR part 265; or

(iv) Containment buildings, in accordance with subpart DD of 40 CFR part 265; and

(4) The quantity of hazardous waste that is accumulated for extended time periods at the facility does not exceed 30,000 kg; and

(5) The generator maintains the following records at the facility for each unit used for extended accumulation times:

(i) A written description of procedures to ensure that each waste volume remains in the unit for no more than 180 days (or 270 days, as applicable), a description of the waste generation and management practices at the facility showing that they are consistent with the extended accumulation time limit, and documentation that the procedures are complied with; or

(ii) Documentation that the unit is emptied at least once every 180 days (or 270 days, if applicable); and

(6) Each container or tank that is used for extended accumulation time periods is labeled or marked clearly with the words ''Hazardous Waste,'' and for each container the date upon which each period of accumulation begins is clearly marked and visible for inspection; and

(7) The generator complies with the requirements for owners and operators in 40 CFR part 265, with § 265.16, and with § 268.7(a)(5). In addition, such a generator is exempt from all the requirements in subparts G and H of part 265, except for §§ 265.111 and 265.114; and

(8) The generator has implemented pollution prevention practices that reduce the amount of any hazardous substances, pollutants, or contaminants released to the environment prior to its recycling, treatment, or disposal; and

(9) The generator includes the following with its Performance Track Annual Performance Report, which must be submitted to the Regional Administrator and the Director of the authorized State:

(i) Information on the total quantity of each hazardous waste generated at the facility that has been managed in the previous year according to extended accumulation time periods; and

(ii) Information for the previous year on the number of off-site shipments of hazardous wastes generated at the facility, the types and locations of destination facilities, how the wastes were managed at the destination facilities (e.g., recycling, treatment, storage, or disposal), and what changes in on-site or off-site waste management practices

have occurred as a result of extended accumulation times or other pollution prevention provisions of this section; and

(iii) Information for the previous year on any hazardous waste spills or accidents occurring at extended accumulation units at the facility, or during off-site transport of accumulated wastes; and

(iv) If the generator intends to accumulate hazardous wastes on-site for up to 270 days, a certification that a facility that is permitted (or operating under interim status) under part 270 of this chapter to receive these wastes is not available within 200 miles of the generating facility; and

(k) If hazardous wastes must remain on-site at a Performance Track member facility for longer than 180 days (or 270 days, if applicable) due to unforseen, temporary, and uncontrollable circumstances, an extension to the extended accumulation time period of up to 30 days may be granted at the discretion of the Regional Administrator on a case-by-case basis.

(1) If a generator who is a member of the Performance Track Program withdraws from the Performance Track Program, or if the Regional Administrator terminates a generator's membership, the generator must return to compliance with all otherwise applicable hazardous waste regulations as soon as possible, but no later than six months after the date of withdrawal or termination.

(m) A generator who sends a shipment of hazardous waste to a designated facility with the understanding that the designated facility can accept and manage the waste and later receives that shipment back as a rejected load or residue in accordance with the manifest discrepancy provisions of §264.72 or §265.72 of this chapter may accumulate the returned waste on-site in accordance with paragraphs (a) and (b) or (d), (e) and (f) of this section, depending on the amount of hazardous waste on-site in that calendar month. Upon receipt of the returned shipment, the generator must:

(1) Sign Item 18c of the manifest, if the transporter returned the shipment using the original manifest; or

(2) Sign Item 20 of the manifest, if the transporter returned the shipment using a new manifest.

[47 FR 1251, Jan. 11, 1982, as amended at 48 FR 14294, Apr. 1, 1983; 49 FR 49571, Dec. 20, 1984; 51 FR 10175, Mar. 24, 1986; 51 FR 25472, July 14, 1986; 55 FR 22684, June 1, 1990; 55 FR 50483, Dec. 6, 1990; 56 FR 3877, Jan. 31, 1991; 56 FR 30195, July 1, 1991; 57 FR 37264, Aug. 18, 1992; 59 FR 62926, Dec. 6, 1994; 61 FR 4911, Feb. 9, 1996; 61 FR 59950, Nov. 25, 1996; 64 FR 3388, Jan. 21, 1999; 64 FR 25414, May 11, 1999; 64 FR 56471, Oct. 20, 1999; 65 FR 12397, Mar. 8, 2000; 69 FR 21753, Apr. 22, 2004; 69 FR 62224, Oct. 25, 2004; 70 FR 10817, Mar. 4, 2005; 71 FR 40271, July 14, 2006]

Subpart D—Recordkeeping and Reporting

§262.40 Recordkeeping.

(a) A generator must keep a copy of each manifest signed in accordance with §262.23(a) for three years or until he receives a signed copy from the designated facility which received the waste. This signed copy must be retained as a record for at least three years from the date the waste was accepted by the initial transporter.

(b) A generator must keep a copy of each Biennial Report and Exception Report for a period of at least three years from the due date of the report.

(c) A generator must keep records of any test results, waste analyses, or other determinations made in accordance with §262.11 for at least three years from the date that the waste was last sent to on-site or off-site treatment, storage, or disposal.

(d) The periods or retention referred to in this section are extended automatically during the course of any unresolved enforcement action regarding the regulated activity or as requested by the Administrator.

[45 FR 33142, May 19, 1980, as amended at 48 FR 3981, Jan. 28, 1983]

§262.41 Biennial report.

(a) A generator who ships any hazardous waste off-site to a treatment, storage or disposal facility within the United States must prepare and submit a single copy of a Biennial Report to the Regional Administrator by March 1 of each even numbered year. The Biennial Report must be submitted on EPA

owner or operator may satisfy the requirements of this subpart by use of both the State's assurance *and* additional financial mechanisms as specified in this subpart. The amount of funds available through the State and Federal mechanisms must at least equal the amount required by this subpart.

Subpart I—Use and Management of Containers

§ 265.170 Applicability.

The regulations in this subpart apply to owners and operators of all hazardous waste facilities that store containers of hazardous waste, except as § 265.1 provides otherwise.

§ 265.171 Condition of containers.

If a container holding hazardous waste is not in good condition, or if it begins to leak, the owner or operator must transfer the hazardous waste from this container to a container that is in good condition, or manage the waste in some other way that complies with the requirements of this part.

§ 265.172 Compatibility of waste with container.

The owner or operator must use a container made of or lined with materials which will not react with, and are otherwise compatible with, the hazardous waste to be stored, so that the ability of the container to contain the waste is not impaired.

§ 265.173 Management of containers.

(a) A container holding hazardous waste must always be closed during storage, except when it is necessary to add or remove waste.

(b) A container holding hazardous waste must not be opened, handled, or stored in a manner which may rupture the container or cause it to leak.

[*Comment:* Re-use of containers in transportation is governed by U.S. Department of Transportation regulations, including those set forth in 49 CFR 173.28.]

[45 FR 33232, May 19, 1980, as amended at 45 FR 78529, Nov. 25, 1980]

§ 265.174 Inspections.

At least weekly, the owner or operator must inspect areas where containers are stored, except for Performance Track member facilities, that must conduct inspections at least once each month, upon approval by the Director. To apply for reduced inspection frequency, the Performance Track member facility must follow the procedures described in § 265.15(b)(5) of this part. The owner or operator must look for leaking containers and for deterioration of containers caused by corrosion or other factors.

[Comment: See § 265.171 for remedial action required if deterioration or leaks are detected.]

[71 FR 16910, Apr. 4, 2006, as amended at 71 FR 40275, July 14, 2006]

§ 265.175 [Reserved]

§ 265.176 Special requirements for ignitable or reactive waste.

Containers holding ignitable or reactive waste must be located at least 15 meters (50 feet) from the facility's property line.

[*Comment:* See § 265.17(a) for additional requirements.]

§ 265.177 Special requirements for incompatible wastes.

(a) Incompatible wastes, or incompatible wastes and materials, (see appendix V for examples) must not be placed in the same container, unless § 265.17(b) is complied with.

(b) Hazardous waste must not be placed in an unwashed container that previously held an incompatible waste or material (see appendix V for examples), unless § 265.17(b) is complied with.

(c) A storage container holding a hazardous waste that is incompatible with any waste or other materials stored nearby in other containers, piles, open tanks, or surface impoundments must be separated from the other materials or protected from them by means of a dike, berm, wall, or other device.

[*Comment:* The purpose of this is to prevent fires, explosions, gaseous emissions, leaching, or other discharge of hazardous waste or hazardous waste constituents which could result from the mixing of incompatible

containing ampules that have been removed from these temperature control devices in compliance with the requirements of 40 CFR 273.13(c)(2) or 273.33(c)(2).

Universal Waste means any of the following hazardous wastes that are subject to the universal waste requirements of this part 273:

(1) Batteries as described in § 273.2;

(2) Pesticides as described in § 273.3;

(3) Mercury-containing equipment as described in § 273.4; and

(4) Lamps as described in § 273.5.

Universal Waste Handler:

(a) Means:

(1) A generator (as defined in this section) of universal waste; or

(2) The owner or operator of a facility, including all contiguous property, that receives universal waste from other universal waste handlers, accumulates universal waste, and sends universal waste to another universal waste handler, to a destination facility, or to a foreign destination.

(b) Does not mean:

(1) A person who treats (except under the provisions of 40 CFR 273.13 (a) or (c), or 273.33 (a) or (c)), disposes of, or recycles universal waste; or

(2) A person engaged in the off-site transportation of universal waste by air, rail, highway, or water, including a universal waste transfer facility.

Universal Waste Transfer Facility means any transportation-related facility including loading docks, parking areas, storage areas and other similar areas where shipments of universal waste are held during the normal course of transportation for ten days or less.

Universal Waste Transporter means a person engaged in the off-site transportation of universal waste by air, rail, highway, or water.

[60 FR 25542, May 11, 1995, as amended at 63 FR 71230, Dec. 24, 1998. Redesignated and amended at 64 FR 36488, 36489, July 6, 1999; 70 FR 45521, Aug. 5, 2005; 71 FR 40280, July 14, 2006]

Subpart B—Standards for Small Quantity Handlers of Universal Waste

§ 273.10 Applicability.

This subpart applies to small quantity handlers of universal waste (as defined in 40 CFR 273.9).

[64 FR 36489, July 6, 1999]

§ 273.11 Prohibitions.

A small quantity handler of universal waste is:

(a) Prohibited from disposing of universal waste; and

(b) Prohibited from diluting or treating universal waste, except by responding to releases as provided in 40 CFR 273.17; or by managing specific wastes as provided in 40 CFR 273.13.

§ 273.12 Notification.

A small quantity handler of universal waste is not required to notify EPA of universal waste handling activities.

§ 273.13 Waste management.

(a) *Universal waste batteries*. A small quantity handler of universal waste must manage universal waste batteries in a way that prevents releases of any universal waste or component of a universal waste to the environment, as follows:

(1) A small quantity handler of universal waste must contain any universal waste battery that shows evidence of leakage, spillage, or damage that could cause leakage under reasonably foreseeable conditions in a container. The container must be closed, structurally sound, compatible with the contents of the battery, and must lack evidence of leakage, spillage, or damage that could cause leakage under reasonably foreseeable conditions.

(2) A small quantity handler of universal waste may conduct the following activities as long as the casing of each individual battery cell is not breached and remains intact and closed (except that cells may be opened to remove electrolyte but must be immediately closed after removal):

(i) Sorting batteries by type;

(ii) Mixing battery types in one container;

(iii) Discharging batteries so as to remove the electric charge;

(iv) Regenerating used batteries;

(v) Disassembling batteries or battery packs into individual batteries or cells;

(vi) Removing batteries from consumer products; or

(vii) Removing electrolyte from batteries.

(3) A small quantity handler of universal waste who removes electrolyte from batteries, or who generates other solid waste (e.g., battery pack materials, discarded consumer products) as a result of the activities listed above, must determine whether the electrolyte and/or other solid waste exhibit a characteristic of hazardous waste identified in 40 CFR part 261, subpart C.

(i) If the electrolyte and/or other solid waste exhibit a characteristic of hazardous waste, it is subject to all applicable requirements of 40 CFR parts 260 through 272. The handler is considered the generator of the hazardous electrolyte and/or other waste and is subject to 40 CFR part 262.

(ii) If the electrolyte or other solid waste is not hazardous, the handler may manage the waste in any way that is in compliance with applicable federal, state or local solid waste regulations.

(b) *Universal waste pesticides*. A small quantity handler of universal waste must manage universal waste pesticides in a way that prevents releases of any universal waste or component of a universal waste to the environment. The universal waste pesticides must be contained in one or more of the following:

(1) A container that remains closed, structurally sound, compatible with the pesticide, and that lacks evidence of leakage, spillage, or damage that could cause leakage under reasonably foreseeable conditions; or

(2) A container that does not meet the requirements of paragraph (b)(1) of this Section, provided that the unacceptable container is overpacked in a container that does meet the requirements of paragraph (b)(1) of this Section; or

(3) A tank that meets the requirements of 40 CFR part 265 subpart J, except for 40 CFR 265.197(c), 265.200, and 265.201; or

(4) A transport vehicle or vessel that is closed, structurally sound, compatible with the pesticide, and that lacks evidence of leakage, spillage, or damage that could cause leakage under reasonably foreseeable conditions.

(c) *Mercury-containing equipment*. A small quantity handler of universal waste must manage universal waste mercury-containing equipment in a way that prevents releases of any universal waste or component of a universal waste to the environment, as follows:

(1) A small quantity handler of universal waste must place in a container any universal waste mercury-containing equipment with non-contained elemental mercury or that shows evidence of leakage, spillage, or damage that could cause leakage under reasonably foreseeable conditions. The container must be closed, structurally sound, compatible with the contents of the device, must lack evidence of leakage, spillage, or damage that could cause leakage under reasonably foreseeable conditions, and must be reasonably designed to prevent the escape of mercury into the environment by volatilization or any other means.

(2) A small quantity handler of universal waste may remove mercury-containing ampules from universal waste mercury-containing equipment provided the handler:

(i) Removes and manages the ampules in a manner designed to prevent breakage of the ampules;

(ii) Removes the ampules only over or in a containment device (*e.g.*, tray or pan sufficient to collect and contain any mercury released from an ampule in case of breakage);

(iii) Ensures that a mercury clean-up system is readily available to immediately transfer any mercury resulting from spills or leaks from broken ampules from that containment device to a container that meets the requirements of 40 CFR 262.34;

(iv) Immediately transfers any mercury resulting from spills or leaks from broken ampules from the containment device to a container that meets the requirements of 40 CFR 262.34;

(v) Ensures that the area in which ampules are removed is well ventilated and monitored to ensure compliance with applicable OSHA exposure levels for mercury;

(vi) Ensures that employees removing ampules are thoroughly familiar with proper waste mercury handling and emergency procedures, including transfer of mercury from containment devices to appropriate containers;

(vii) Stores removed ampules in closed, non-leaking containers that are in good condition;

(viii) Packs removed ampules in the container with packing materials adequate to prevent breakage during storage, handling, and transportation;

(3) A small quantity handler of universal waste mercury-containing equipment that does not contain an ampule may remove the open original housing holding the mercury from universal waste mercury-containing equipment provided the handler:

(i) Immediately seals the original housing holding the mercury with an air-tight seal to prevent the release of any mercury to the environment; and

(ii) Follows all requirements for removing ampules and managing removed ampules under paragraph (c)(2) of this section; and

(4) (i) A small quantity handler of universal waste who removes mercury-containing ampules from mercury-containing equipment or seals mercury from mercury-containing equipment in its original housing must determine whether the following exhibit a characteristic of hazardous waste identified in 40 CFR part 261, subpart C:

(A) Mercury or clean-up residues resulting from spills or leaks and/or

(B) Other solid waste generated as a result of the removal of mercury-containing ampules or housings (*e.g.*, the remaining mercury-containing device).

(ii) If the mercury, residues, and/or other solid waste exhibits a characteristic of hazardous waste, it must be managed in compliance with all applicable requirements of 40 CFR parts 260 through 272. The handler is considered the generator of the mercury, residues, and/or other waste and must manage it in compliance with 40 CFR part 262.

(iii) If the mercury, residues, and/or other solid waste is not hazardous, the handler may manage the waste in any way that is in compliance with applicable federal, state or local solid waste regulations.

(d) *Lamps*. A small quantity handler of universal waste must manage lamps in a way that prevents releases of any universal waste or component of a universal waste to the environment, as follows:

(1) A small quantity handler of universal waste must contain any lamp in containers or packages that are structurally sound, adequate to prevent breakage, and compatible with the contents of the lamps. Such containers and packages must remain closed and must lack evidence of leakage, spillage or damage that could cause leakage under reasonably foreseeable conditions.

(2) A small quantity handler of universal waste must immediately clean up and place in a container any lamp that is broken and must place in a container any lamp that shows evidence of breakage, leakage, or damage that could cause the release of mercury or other hazardous constituents to the environment. Containers must be closed, structurally sound, compatible with the contents of the lamps and must lack evidence of leakage, spillage or damage that could cause leakage or releases of mercury or other hazardous constituents to the environment under reasonably foreseeable conditions.

[60 FR 25542, May 11, 1995, as amended at 64 FR 36489, July 6, 1999; 70 FR 45521, Aug. 5, 2005; 71 FR 40280, July 14, 2006]

§ 273.14 Labeling/marking.

A small quantity handler of universal waste must label or mark the universal waste to identify the type of universal waste as specified below:

(a) Universal waste batteries (i.e., each battery), or a container in which the batteries are contained, must be labeled or marked clearly with any one of the following phrases: ''Universal Waste—Battery(ies),'' or ''Waste Battery(ies),'' or ''Used Battery(ies);''

(b) A container, (or multiple container package unit), tank, transport vehicle or vessel in which recalled universal waste pesticides as described in

40 CFR 273.3(a)(1) are contained must be labeled or marked clearly with:

(1) The label that was on or accompanied the product as sold or distributed; and

(2) The words ''Universal Waste-Pesticide(s)'' or ''Waste-Pesticide(s);''

(c) A container, tank, or transport vehicle or vessel in which unused pesticide products as described in 40 CFR 273.3(a)(2) are contained must be labeled or marked clearly with:

(1)(i) The label that was on the product when purchased, if still legible;

(ii) If using the labels described in paragraph (c)(1)(i) of this section is not feasible, the appropriate label as required under the Department of Transportation regulation 49 CFR part 172;

(iii) If using the labels described in paragraphs (c)(1) (i) and (ii) of this section is not feasible, another label prescribed or designated by the waste pesticide collection program administered or recognized by a state; and

(2) The words ''Universal Waste-Pesticide(s)'' or ''Waste-Pesticide(s).''

(d)(1) Universal waste mercury-containing equipment (*i.e.*, each device), or a container in which the equipment is contained, must be labeled or marked clearly with any of the following phrases: ''Universal Waste—Mercury Containing Equipment,'' ''Waste Mercury-Containing Equipment,'' or ''Used Mercury-Containing Equipment.''

(2) A universal waste mercury-containing thermostat or container containing only universal waste mercury-containing thermostats may be labeled or marked clearly with any of the following phrases: ''Universal Waste—Mercury Thermostat(s),'' ''Waste Mercury Thermostat(s),'' or ''Used Mercury Thermostat(s).''

(e) Each lamp or a container or package in which such lamps are contained must be labeled or marked clearly with one of the following phrases: ''Universal Waste—Lamp(s),'' or ''Waste Lamp(s),'' or ''Used Lamp(s)''.

[60 FR 25542, May 11, 1995, as amended at 64 FR 36489, July 6, 1999; 70 FR 45521, Aug. 5, 2005; 71 FR 40280, July 14, 2006]

§273.15 Accumulation time limits.

(a) A small quantity handler of universal waste may accumulate universal waste for no longer than one year from the date the universal waste is generated, or received from another handler, unless the requirements of paragraph (b) of this section are met.

(b) A small quantity handler of universal waste may accumulate universal waste for longer than one year from the date the universal waste is generated, or received from another handler, if such activity is solely for the purpose of accumulation of such quantities of universal waste as necessary to facilitate proper recovery, treatment, or disposal. However, the handler bears the burden of proving that such activity is solely for the purpose of accumulation of such quantities of universal waste as necessary to facilitate proper recovery, treatment, or disposal.

(c) A small quantity handler of universal waste who accumulates universal waste must be able to demonstrate the length of time that the universal waste has been accumulated from the date it becomes a waste or is received. The handler may make this demonstration by:

(1) Placing the universal waste in a container and marking or labeling the container with the earliest date that any universal waste in the container became a waste or was received;

(2) Marking or labeling each individual item of universal waste (e.g., each battery or thermostat) with the date it became a waste or was received;

(3) Maintaining an inventory system on-site that identifies the date each universal waste became a waste or was received;

(4) Maintaining an inventory system on-site that identifies the earliest date that any universal waste in a group of universal waste items or a group of containers of universal waste became a waste or was received;

(5) Placing the universal waste in a specific accumulation area and identifying the earliest date that any universal waste in the area became a waste or was received; or

(6) Any other method which clearly demonstrates the length of time that the universal waste has been accumulated from the date it becomes a waste or is received.

Material Safety Data Sheet or *MSDS* means the sheet required to be developed under §1910.1200(g) of Title 29 of the Code of Federal Regulations.

Person means any individual, trust, firm, joint stock company, corporation (including a government corporation), partnership, association, State, municipality, commission, political subdivision of State, or interstate body.

Present in the same form and concentration as a product packaged for distribution and use by the general public means a substance packaged in a similar manner and present in the same concentration as the substance when packaged for use by the general public, whether or not it is intended for distribution to the general public or used for the same purpose as when it is packaged for use by the general public.

State means any State of United States, the District of Columbia, the Commonwealth of Puerto Rico, Guam, American Samoa, the United States Virgin Islands, the Northern Mariana Islands, and any other territory or possession over which the United States has jurisdiction and Indian Country.

TPQ means the threshold planning quantity for an extremely hazardous substance as defined in 40 CFR part 355.

[52 FR 38364, Oct. 15, 1987, as amended at 55 FR 30645, July 26, 1990]

§ 370.5 Penalties.

(a) *MSDA reporting*. Any person other than a governmental entity who violates any requirement of §370.21 shall be liable for civil and administrative penalties of not more than $10,000 for each violation.

(b) *Inventory reporting*. Any person other than a governmental entity who violates any requirement of §370.25 shall be liable for civil and administrative penalties of not more than $25,000 for each violation.

(c) *Continuing violations*. Each day a violation described in paragraph (a) or (b) of this section continues shall constitute a separate violation.

Subpart B—Reporting Requirements

§ 370.20 Applicability.

(a) *General*. The requirements of this subpart apply to any facility that is required to prepare or have available a material safety data sheet (MSDS) for a hazardous chemical under the Occupational Safety and Health Act of 1970 and regulations promulgated under that Act.

(b) *Minimum threshold levels*. Except as provided in paragraph (b)(5) of this section, the minimum threshold level for reporting under this subpart shall be as specified in paragraphs (b)(1), (b)(2), (b)(3) and (b)(4) of this section:

(1) The minimum threshold for reporting for extremely hazardous substances is 500 pounds (or 227 kgs—approximately 55 gallons) or the TPQ, whichever is lower.

(2) The minimum threshold for reporting for gasoline (all grades combined) that was in tank(s) entirely underground, at a retail gas station that was in compliance at all times during the preceding calendar year with all applicable Underground Storage Tank (UST) requirements (40 CFR part 280 or requirements of the state UST program approved by the Agency under 40 CFR part 281), is 75,000 gallons (or approximately 283,900 liters). For purposes of this part, retail gas station means a retail facility engaged in selling gasoline and/or diesel fuel principally to the public, for motor vehicle use on land.

(3) The minimum threshold for reporting for diesel fuel (all grades combined) that was in tank(s) entirely underground, at a retail gas station that was in compliance at all times during the preceding calendar year with all applicable UST requirements (40 CFR part 280 or requirements of the state UST program approved by the Agency under 40 CFR part 281), is 100,000 gallons (or approximately 378,500 liters).

(4) The minimum threshold for reporting for all other hazardous chemicals is 10,000 pounds (or 4,540 kgs.)

(5) The minimum threshold for reporting in response to requests for submission of an MSDS or a Tier II form under §§370.21(d) and 370.25(c) of this part shall be zero.

(c) *MSDS reporting*. The owner or operator of a facility subject to this subpart shall submit an MSDS on or before October 17, 1990 (or within three months after the facility first becomes subject to this subpart), for all hazardous chemicals present at the facility at any one time in amounts equal to or greater than their thresholds.

(d) *Inventory reporting*. The owner or operator of a facility subject to this subpart shall submit the Tier I form (or Tier II form) on or before March 1, 1991 (or March 1 of the first year after the facility first becomes subject to this subpart), and annually thereafter, covering all hazardous chemicals present at a facility at any one time during the preceding calendar year in amounts equal to or greater than their thresholds.

[64 FR 7047, Feb. 11, 1999]

§370.21 MSDS reporting.

(a) *Basic requirement*. The owner or operator of a facility subject to this subpart shall submit an MSDS for each hazardous chemical present at the facility according to the minimum threshold schedule provided in paragraph (b) of §370.20 to the committee, the commission, and the fire department with jurisdiction over the facility.

(b) *Alternative reporting*. In lieu of the submission of an MSDS for each hazardous chemical under paragraph (a) of this section, the owner or operator may submit the following:

(1) A list of the hazardous chemicals for which the MSDS is required, grouped by hazard category as defined under §370.2 of this part;

(2) The chemical or common name of each hazardous chemical as provided on the MSDS; and

(3) Except for reporting of mixtures under §370.28(a)(2), any hazardous component of each hazardous chemical as provided on the MSDS.

(c) *Supplemental reporting*. (1) The owner or operator of a facility that has submitted an MSDS under this section shall provide a revised MSDS to the committee, the commission, and the fire department with jurisdiction over the facility within three months after discovery of significant new information concerning the hazardous chemical for which the MSDS was submitted.

(2) After October 17, 1987, the owner or operator of a facility subject to this section shall submit an MSDS for a hazardous chemical pursuant to paragraph (a) of this section or a list pursuant to paragraph (b) of this section within three months after the owner or operator is first required to prepare or have available the MSDS or after a hazardous chemical requiring an MSDS becomes present in an amount exceeding the threshold established in §370.20(b).

(d) *Submission of MSDS upon request*. The owner or operator of a facility that has not submitted the MSDS for a hazardous chemical present at the facility shall submit the MSDS for any such hazardous chemical to the committee upon its request. The MSDS shall be submitted within 30 days of the receipt of such request.

§370.25 Inventory reporting.

(a) *Basic requirement*. The owner or operator of a facility subject to this subpart shall submit an inventory form to the commission, the committee, and the fire department with jurisdiction over the facility. The inventory form containing Tier I information on hazardous chemicals present at the facility during the preceding calendar year above the threshold levels established in §370.20(b) shall be submitted on or before March 1 of each year, beginning in 1988.

(b) *Alternative reporting*. With respect to any specific hazardous chemical at the facility, the owner or operator may submit a Tier II form in lieu of the Tier I information.

(c) *Submission of Tier II information*. The owner or operator of a facility subject to this section shall submit the Tier II form to the commission, committee, or the fire department having jurisdiction over the facility upon request of such persons. The Tier II form shall be submitted within 30 days of the receipt of each request.

(d) *Fire department inspection*. The owner or operator of a facility that has submitted an inventory form under

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Part II

The President

Executive Order 13423—Strengthening Federal Environmental, Energy, and Transportation Management

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Title 3—

The President

Executive Order 13423 of January 24, 2007

Strengthening Federal Environmental, Energy, and Transportation Management

By the authority vested in me as President by the Constitution and the laws of the United States of America, and to strengthen the environmental, energy, and transportation management of Federal agencies, it is hereby ordered as follows:

Section 1. *Policy.* It is the policy of the United States that Federal agencies conduct their environmental, transportation, and energy-related activities under the law in support of their respective missions in an environmentally, economically and fiscally sound, integrated, continuously improving, efficient, and sustainable manner.

Sec. 2. *Goals for Agencies.* In implementing the policy set forth in section 1 of this order, the head of each agency shall:

(a) improve energy efficiency and reduce greenhouse gas emissions of the agency, through reduction of energy intensity by (i) 3 percent annually through the end of fiscal year 2015, or (ii) 30 percent by the end of fiscal year 2015, relative to the baseline of the agency's energy use in fiscal year 2003;

(b) ensure that (i) at least half of the statutorily required renewable energy consumed by the agency in a fiscal year comes from new renewable sources, and (ii) to the extent feasible, the agency implements renewable energy generation projects on agency property for agency use;

(c) beginning in FY 2008, reduce water consumption intensity, relative to the baseline of the agency's water consumption in fiscal year 2007, through life-cycle cost-effective measures by 2 percent annually through the end of fiscal year 2015 or 16 percent by the end of fiscal year 2015;

(d) require in agency acquisitions of goods and services (i) use of sustainable environmental practices, including acquisition of biobased, environmentally preferable, energy-efficient, water-efficient, and recycled-content products, and (ii) use of paper of at least 30 percent post-consumer fiber content;

(e) ensure that the agency (i) reduces the quantity of toxic and hazardous chemicals and materials acquired, used, or disposed of by the agency, (ii) increases diversion of solid waste as appropriate, and (iii) maintains cost-effective waste prevention and recycling programs in its facilities;

(f) ensure that (i) new construction and major renovation of agency buildings comply with the *Guiding Principles for Federal Leadership in High Performance and Sustainable Buildings set forth in the Federal Leadership in High Performance and Sustainable Buildings Memorandum of Understanding (2006)*, and (ii) 15 percent of the existing Federal capital asset building inventory of the agency as of the end of fiscal year 2015 incorporates the sustainable practices in the Guiding Principles;

(g) ensure that, if the agency operates a fleet of at least 20 motor vehicles, the agency, relative to agency baselines for fiscal year 2005, (i) reduces the fleet's total consumption of petroleum products by 2 percent annually through the end of fiscal year 2015, (ii) increases the total fuel consumption that is non-petroleum-based by 10 percent annually, and (iii) uses plug-in hybrid (PIH) vehicles when PIH vehicles are commercially available at

a cost reasonably comparable, on the basis of life-cycle cost, to non-PIH vehicles; and

(h) ensure that the agency (i) when acquiring an electronic product to meet its requirements, meets at least 95 percent of those requirements with an Electronic Product Environmental Assessment Tool (EPEAT)-registered electronic product, unless there is no EPEAT standard for such product, (ii) enables the Energy Star feature on agency computers and monitors, (iii) establishes and implements policies to extend the useful life of agency electronic equipment, and (iv) uses environmentally sound practices with respect to disposition of agency electronic equipment that has reached the end of its useful life.

Sec. 3. *Duties of Heads of Agencies.* In implementing the policy set forth in section 1 of this order, the head of each agency shall:

(a) implement within the agency sustainable practices for (i) energy efficiency, greenhouse gas emissions avoidance or reduction, and petroleum products use reduction, (ii) renewable energy, including bioenergy, (iii) water conservation, (iv) acquisition, (v) pollution and waste prevention and recycling, (vi) reduction or elimination of acquisition and use of toxic or hazardous chemicals, (vii) high performance construction, lease, operation, and maintenance of buildings, (viii) vehicle fleet management, and (ix) electronic equipment management;

(b) implement within the agency environmental management systems (EMS) at all appropriate organizational levels to ensure (i) use of EMS as the primary management approach for addressing environmental aspects of internal agency operations and activities, including environmental aspects of energy and transportation functions, (ii) establishment of agency objectives and targets to ensure implementation of this order, and (iii) collection, analysis, and reporting of information to measure performance in the implementation of this order;

(c) establish within the agency programs for (i) environmental management training, (ii) environmental compliance review and audit, and (iii) leadership awards to recognize outstanding environmental, energy, or transportation management performance in the agency;

(d) within 30 days after the date of this order (i) designate a senior civilian officer of the United States, compensated annually in an amount at or above the amount payable at level IV of the Executive Schedule, to be responsible for implementation of this order within the agency, (ii) report such designation to the Director of the Office of Management and Budget and the Chairman of the Council on Environmental Quality, and (iii) assign the designated official the authority and duty to (A) monitor and report to the head of the agency on agency activities to carry out subsections (a) and (b) of this section, and (B) perform such other duties relating to the implementation of this order within the agency as the head of the agency deems appropriate;

(e) ensure that contracts entered into after the date of this order for contractor operation of government-owned facilities or vehicles require the contractor to comply with the provisions of this order with respect to such facilities or vehicles to the same extent as the agency would be required to comply if the agency operated the facilities or vehicles;

(f) ensure that agreements, permits, leases, licenses, or other legally-binding obligations between the agency and a tenant or concessionaire entered into after the date of this order require, to the extent the head of the agency determines appropriate, that the tenant or concessionaire take actions relating to matters within the scope of the contract that facilitate the agency's compliance with this order;

(g) provide reports on agency implementation of this order to the Chairman of the Council on such schedule and in such format as the Chairman of the Council may require; and

(h) provide information and assistance to the Director of the Office of Management and Budget, the Chairman of the Council, and the Federal Environmental Executive.

Sec. 4. *Additional Duties of the Chairman of the Council on Environmental Quality*. In implementing the policy set forth in section 1 of this order, the Chairman of the Council on Environmental Quality:

(a) (i) shall establish a Steering Committee on Strengthening Federal Environmental, Energy, and Transportation Management to advise the Director of the Office of Management and Budget and the Chairman of the Council on the performance of their functions under this order that shall consist exclusively of (A) the Federal Environmental Executive, who shall chair, convene and preside at meetings of, determine the agenda of, and direct the work of, the Steering Committee, and (B) the senior officials designated under section 3(d)(i) of this order, and (ii) may establish subcommittees of the Steering Committee, to assist the Steering Committee in developing the advice of the Steering Committee on particular subjects;

(b) may, after consultation with the Director of the Office of Management and Budget and the Steering Committee, issue instructions to implement this order, other than instructions within the authority of the Director to issue under section 5 of this order; and

(c) shall administer a presidential leadership award program to recognize exceptional and outstanding environmental, energy, or transportation management performance and excellence in agency efforts to implement this order.

Sec. 5. *Duties of the Director of the Office of Management and Budget*. In implementing the policy set forth in section 1 of this order, the Director of the Office of Management and Budget shall, after consultation with the Chairman of the Council and the Steering Committee, issue instructions to the heads of agencies concerning:

(a) periodic evaluation of agency implementation of this order;

(b) budget and appropriations matters relating to implementation of this order;

(c) implementation of section 2(d) of this order; and

(d) amendments of the Federal Acquisition Regulation as necessary to implement this order.

Sec. 6. *Duties of the Federal Environmental Executive*. A Federal Environmental Executive designated by the President shall head the Office of the Federal Environmental Executive, which shall be maintained in the Environmental Protection Agency for funding and administrative purposes. In implementing the policy set forth in section 1 of this order, the Federal Environmental Executive shall:

(a) monitor, and advise the Chairman of the Council on, performance by agencies of functions assigned by sections 2 and 3 of this order;

(b) submit a report to the President, through the Chairman of the Council, not less often than once every 2 years, on the activities of agencies to implement this order; and

(c) advise the Chairman of the Council on the Chairman's exercise of authority granted by subsection 4(c) of this order.

Sec. 7. *Limitations*. (a) This order shall apply to an agency with respect to the activities, personnel, resources, and facilities of the agency that are located within the United States. The head of an agency may provide that this order shall apply in whole or in part with respect to the activities, personnel, resources, and facilities of the agency that are not located within the United States, if the head of the agency determines that such application is in the interest of the United States.

(b) The head of an agency shall manage activities, personnel, resources, and facilities of the agency that are not located within the United States, and with respect to which the head of the agency has not made a determination under subsection (a) of this section, in a manner consistent with the policy set forth in section 1 of this order to the extent the head of the agency determines practicable.

Sec. 8. *Exemption Authority.* (a) The Director of National Intelligence may exempt an intelligence activity of the United States, and related personnel, resources, and facilities, from the provisions of this order, other than this subsection and section 10, to the extent the Director determines necessary to protect intelligence sources and methods from unauthorized disclosure.

(b) The head of an agency may exempt law enforcement activities of that agency, and related personnel, resources, and facilities, from the provisions of this order, other than this subsection and section 10, to the extent the head of an agency determines necessary to protect undercover operations from unauthorized disclosure.

(c) (i) The head of an agency may exempt law enforcement, protective, emergency response, or military tactical vehicle fleets of that agency from the provisions of this order, other than this subsection and section 10.

(ii) Heads of agencies shall manage fleets to which paragraph (i) of this subsection refers in a manner consistent with the policy set forth in section 1 of this order to the extent they determine practicable.

(d) The head of an agency may submit to the President, through the Chairman of the Council, a request for an exemption of an agency activity, and related personnel, resources, and facilities, from this order.

Sec. 9. *Definitions.* As used in this order:

(a) ''agency'' means an executive agency as defined in section 105 of title 5, United States Code, excluding the Government Accountability Office;

(b) ''Chairman of the Council'' means the Chairman of the Council on Environmental Quality, including in the Chairman's capacity as Director of the Office of Environmental Quality;

(c) ''Council'' means the Council on Environmental Quality;

(d) ''environmental'' means environmental aspects of internal agency operations and activities, including those environmental aspects related to energy and transportation functions;

(e) ''greenhouse gases'' means carbon dioxide, methane, nitrous oxide, hydrofluorocarbons, perfluorocarbons, and sulfur hexafluoride;

(f) ''life-cycle cost-effective'' means the life-cycle costs of a product, project, or measure are estimated to be equal to or less than the base case (i.e., current or standard practice or product);

(g) ''new renewable sources'' means sources of renewable energy placed into service after January 1, 1999;

(h) ''renewable energy'' means energy produced by solar, wind, biomass, landfill gas, ocean (including tidal, wave, current and thermal), geothermal, municipal solid waste, or new hydroelectric generation capacity achieved from increased efficiency or additions of new capacity at an existing hydroelectric project;

(i) ''energy intensity'' means energy consumption per square foot of building space, including industrial or laboratory facilities;

(j) ''Steering Committee'' means the Steering Committee on Strengthening Federal Environmental, Energy, and Transportation Management established under subsection 4(b) of this order;

(k) ''sustainable'' means to create and maintain conditions, under which humans and nature can exist in productive harmony, that permit fulfilling

the social, economic, and other requirements of present and future generations of Americans; and

(l) ''United States'' when used in a geographical sense, means the fifty states, the District of Columbia, the Commonwealth of Puerto Rico, Guam, American Samoa, the United States Virgin Islands, and the Northern Mariana Islands, and associated territorial waters and airspace.

Sec. 10. *General Provisions.* (a) This order shall be implemented in a manner consistent with applicable law and subject to the availability of appropriations.

(b) Nothing in this order shall be construed to impair or otherwise affect the functions of the Director of the Office of Management and Budget relating to budget, administrative, or legislative proposals.

(c) This order is intended only to improve the internal management of the Federal Government and is not intended to, and does not, create any right or benefit, substantive or procedural, enforceable at law or in equity by a party against the United States, its departments, agencies, instrumentalities, entities, officers, employees or agents, or any other person.

Sec. 11. *Revocations; Conforming Provisions.* (a) The following are revoked:

(i) Executive Order 13101 of September 14, 1998;

(ii) Executive Order 13123 of June 3, 1999;

(iii) Executive Order 13134 of August 12, 1999, as amended;

(iv) Executive Order 13148 of April 21, 2000; and

(v) Executive Order 13149 of April 21, 2000.

(b) In light of subsection 317(e) of the National Defense Authorization Act for Fiscal Year 2002 (Public Law 107–107), not later than January 1 of each year through and including 2010, the Secretary of Defense shall submit to the Senate and the House of Representatives a report regarding progress made toward achieving the energy efficiency goals of the Department of Defense.

(c) Section 3(b)(vi) of Executive Order 13327 of February 4, 2004, is amended by striking ''Executive Order 13148 of April 21, 2000'' and inserting in lieu thereof ''other executive orders''.

THE WHITE HOUSE,
January 24, 2007.

[FR Doc. 07–374
Filed 1–25–07; 8:50 am]
Billing code 3195–01–P

IV Pennsylvania-Specific Rules

The following citations were used to support the findings based on Pennsylvania-specific regulations. The citations are listed in numeric order.

CHAPTER 245. ADMINISTRATION OF THE STORAGE TANK AND SPILL PREVENTION PROGRAM

Subchap.		Sec.
A.	GENERAL PROVISIONS	245.1
B.	CERTIFICATION PROGRAM FOR INSTALLERS AND INSPECTORS OF STORAGE TANKS AND STORAGE TANK FACILITIES	245.101
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D.	CORRECTIVE ACTION PROCESS FOR OWNERS AND OPERATORS OF STORAGE TANKS AND STORAGE TANK FACILITIES AND OTHER RESPONSIBLE PARTIES	245.301
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G.	SIMPLIFIED PROGRAM FOR SMALL ABOVEGROUND STORAGE TANKS	245.601
H.	FINANCIAL RESPONSIBILITY REQUIREMENTS FOR OWNERS AND OPERATORS OF UNDERGROUND STORAGE TANKS AND STORAGE TANK FACILITIES	245.701

Authority

The provisions of this Chapter 245 issued under the act of The Clean Streams Law (35 P. S. §§ 691.1—691.1001); the Storage Tank and Spill Prevention Act (35 P. S. §§ 6021.101—6021.2104); and section 1920-A of The Administrative Code of 1929 (71 P. S. § 510-20); amended under sections 106, 301(a)(5) and 501(a)(5) of the Storage Tank and Spill Prevention Act (35 P. S. §§ 6021.106, 6021.301(a)(5) and 6021.501(a)(5)); section 5(b)(1) of The Clean Streams Law (35 P. S. § 691.5(b)(1)); and section 105(a) of the Solid Waste Management Act (35 P. S. § 6018.105(a)); and section 1920-A of The Administrative Code of 1929 (71 P. S. § 510-20), unless otherwise noted.

Source

The provisions of this Chapter 245 adopted September 20, 1991, effective September 21, 1991, 21 Pa.B. 4345, unless otherwise noted.

Cross References

This chapter cited in 25 Pa. Code § 250.707 (relating to statistical tests); 25 Pa. Code § 253.3 (relating to scope); 25 Pa. Code § 298.21 (relating to hazardous waste mixing); 25 Pa. Code § 298.45 (relating to waste oil storage at transfer facilities); 25 Pa. Code § 298.54 (relating to waste oil management); and 25 Pa. Code § 298.64 (relating to waste oil storage).

Subchapter A. GENERAL PROVISIONS

GENERAL

Sec.
245.1. Definitions.
245.2. General.

TANK HANDLING ACTIVITIES

245.21. Tank handling and inspection requirements.

TIGHTNESS TESTING ACTIVITIES

245.31. Underground storage tank tightness testing requirements.

GENERAL

§ 245.1. Definitions.

The following words and terms, when used in this chapter, have the following meanings, unless the context clearly indicates otherwise:

ASNT—The American Society of Nondestructive Testing.

Aboveground field constructed metallic storage tank—An aboveground storage tank that is manufactured from either ferrous or nonferrous metals and has final assembly completed at the job site. The term does not include associated piping.

Aboveground manufactured metallic storage tank—An aboveground storage tank that is manufactured from either ferrous or nonferrous metals and is completely fabricated and assembled in the shop prior to shipping. The term does not include piping.

Aboveground nonmetallic storage tank—An aboveground storage tank that is manufactured from nonmetallic materials; for example, fiberglass reinforced plastic, composites, plastics, and the like, and is completely fabricated and primarily assembled in the shop prior to shipping. The tank may require some additional final assembly at the job site. The term does not include associated piping.

Aboveground storage tank—One or a combination of stationary tanks with a capacity in excess of 250 gallons, including underground pipes and dispensing systems connected thereto within the emergency containment area, which is or was used to contain an accumulation of regulated substances, and the volume of which, including the volume of piping within the storage tank facility, is greater than 90% above the surface of the ground. The term includes tanks

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which can be visually inspected, from the exterior, in an underground area. The term does not include the following, or pipes connected thereto:

(i) A tank of 1,100 gallons or less capacity used for storing motor fuel for noncommercial purposes or motor oil.

(ii) A tank used for storing heating oil for consumptive use on the premises where stored.

(iii) A pipeline facility, including gathering lines, regulated under:

(A) The Natural Gas Pipeline Safety Act of 1968 (49 U.S.C.A. App. §§ 1671—1687).

(B) The Hazardous Liquid Pipeline Safety Act of 1979 (49 U.S.C.A. §§ 2001—2015).

(C) An interstate or intrastate pipeline facility regulated under State laws comparable to the provisions of law referred to in clause (A) or (B).

(iv) A surface impoundment, pit, pond or lagoon.

(v) A stormwater or wastewater collection system.

(vi) A flow-through process tank, including, but not limited to, a pressure vessel and oil and water separators.

(vii) A nonstationary tank liquid trap or associated gathering lines directly related to oil and gas production or gathering operations.

(viii) Tanks which are used to store brines, crude oil, drilling or frac fluids and similar substances or materials and are directly related to the exploration, development or production of crude oil or natural gas regulated under the Oil and Gas Act (58 P. S. §§ 601.101—601.605).

(ix) Tanks regulated under the Surface Mining Conservation and Reclamation Act (52 P. S. §§ 1396.1—1396.31).

(x) Tanks used for the storage of products which are regulated under the Federal Food, Drug and Cosmetic Act (21 U.S.C.A. §§ 301—392).

(xi) Tanks regulated under the Solid Waste Management Act (35 P. S. §§ 6018.101—6018.1003), including, but not limited to, piping, tanks, collection and treatment systems used for leachate, methane gas and methane gas condensate management.

(xii) A tank of 1,100 gallons or less in capacity located on a farm used solely to store or contain substances that are used to facilitate the production of crops, livestock and livestock products on the farm.

(xiii) Tanks which are used to store propane gas.

(xiv) Tanks containing radioactive materials or coolants that are regulated under the Atomic Energy Act of 1954 (42 U.S.C.A. §§ 2011—2297).

(xv) Tanks regulated under the act of May 2, 1929 (P. L. 1513, No. 451), known as the Boiler Reglation Law (35 P. S. §§ 1301—1500).

(xvi) Equipment or machinery that contains regulated substances for operational purposes such as hydraulic lift tanks and electrical equipment tanks.

(xvii) A tank that contains a de minimis concentration of regulated substances.

(xviii) An emergency spill or overflow containment tank that is expeditiously emptied after use.

(xix) Other tanks excluded by regulations promulgated under the act.

Act—The Storage Tank and Spill Prevention Act (35 P. S. §§ 6021.101—6021.2104).

Actively involved—To perform or to conduct direct onsite supervision or oversight of the minimum number of qualifying activities in § 245.111 or § 245.113 (relating to certified installer experience and qualifications; and certified inspector experience and qualifications) for renewal of installer or inspector certification in each applicable category, within the period in § 245.114(a)(3) (relating to renewal and amendment of certification).

Adjacent—Next to or contiguous with.

Affect or *diminish*—In the context of water supplies, the term has the following meaning: To cause or contribute to a measurable increase in the concentration of one or more contaminants in a water supply above background levels, or to cause or contribute to a decrease in the quantity of the water supply.

Ancillary equipment—Electrical, vapor recovery, access or other systems and devices, including, but not limited to, devices, such as piping, fittings, flanges, valves and pumps used to distribute, meter, monitor or control the flow of regulated substances to or from a storage tank system.

Aquifer—A geologic formation, group of formations or part of a formation capable of a sustainable yield of significant amount of water to a well or spring.

Background—The concentration of a regulated substance determined by appropriate statistical methods that is present at the site, but is not related to the release of regulated substance at the site.

Beneath the surface of the ground—Beneath the ground surface or otherwise covered with earthen materials.

CERCLA—The Comprehensive Environmental Response, Compensation, and Liability Act of 1980 (42 U.S.C.A. §§ 9601—9675).

Cathodic protection—A technique to prevent corrosion of a metal surface by making that surface the cathode of an electrochemical cell.

Cathodic protection tester—A person who can demonstrate an understanding of the principles and measurements of common type of cathodic protection systems as applied to buried or submerged metal piping and tank systems. At a minimum, the person shall have education and experience in soil resistivity, stray current, structure to soil potential and component electrical isolation measurements of buried metal piping and tank systems.

Certified company—An entity, including, but not limited to, a sole proprietorship, a partnership or a corporation, which is authorized by this title to conduct tank handling activities, tightness testing activities or inspection activities using certified installers or certified inspectors, or both.

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Certified inspector—A person certified by the Department to conduct inspections of tanks or storage tank facilities and who may conduct environmental audits. A certified inspector may not be an employe of a tank owner.

Certified installer—A person certified by the Department to install, modify or remove storage tanks. A certified installer may be an employe of a tank owner.

Change-in-service—One of the following:

(i) Continued use of a storage tank system to store an unregulated substance.

(ii) Continued use of a storage tank system in a manner which would exempt the system from the definition of aboveground storage tank or underground storage tank.

Clean Streams Law—The Clean Streams Law (35 P. S. §§ 691.1—691.1001).

Cleanup or *remediation*—To clean up, mitigate, correct, abate, minimize, eliminate, control or prevent a release of a regulated substance into the environment to protect the present or future public health, safety, welfare or the environment, including preliminary actions to study or assess the release.

Coax vapor recovery—The use of a coaxial fitting to provide Stage I vapor recovery; one orifice for the conveyance of the product to the tank and a second, concentric orifice for venting the tank to the delivery vehicle.

Combination of tanks—Tanks connected together at a manifold in a manner that they act as a single unit; tank capacity for a combination of tanks is the sum of the individual tank capacities.

Compatible—The ability of two or more substances to maintain their respective physical and chemical properties upon contact with one another for the design life of the tank system under conditions likely to be encountered in the tank system.

Connected piping—All piping including valves, elbows, joints, flanges and flexible connectors attached to a tank system through which regulated substances flow. For the purpose of determining how much piping is connected toany individual tank system, the piping that joins two regulated systems should be allocated equally between them.

Consumptive use—The term means, with respect to heating oil, that which is consumed on the premises.

Contaminant—A regulated substance released into the environment.

Containment structure or facility—Anything built, installed or established which comes in contact with regulated substances that are spilled, leaked, emitted, discharged, escaped, leached or disposed from a storage tank or storage tank system. The term includes, but is not limited to, a vault, dike, wall, building or secondary containment structure around an underground or aboveground storage tank, or any rock or other fill material placed around an underground storage tank.

Corrective action—

(i) The term includes the following:

(A) Containing, assessing or investigating a release.

(B) Removing a release or material affected by a release.

(C) Taking measures to prevent, mitigate, abate or remedy releases, pollution and potential for pollution, nuisances and damages to the public health, safety or welfare, including, but not limited to, the following:

(I) Waters of this Commonwealth, including surface water and groundwater.

(II) Public and private property.

(III) Shorelines, beaches, water columns and bottom sediments.

(IV) Soils and other affected property, including wildlife and other natural resources.

(D) Taking actions to prevent, abate, mitigate or respond to a violation of the act that threatens public health or the environment.

(E) Temporarily or permanently relocating residents, providing alternative water supplies or undertaking an exposure assessment.

(ii) The term does not include the cost of routine inspections, routine investigations and permit activities not associated with a release.

Corrosion expert—A person who, by reason of thorough knowledge of the physical sciences and the principles of engineering and mathematics acquired by a professional education and related practical experience, is qualified to engage in the practice of corrosion control on buried or submerged metal piping systems and metal tanks. The person shall be accredited or certified as being qualified by the National Association of Corrosion Engineers or be a registered professional engineer who has education and experience in corrosion control of buried or submerged metal piping systems and metal tanks.

Corrosion protection—The protection of metal from deterioration. The deterioration may be due to a natural electrochemical reaction between the metal and the soil or other electrolyte, or because of stray direct currents.

De minimis—With regard to products containing regulated substances, the term applies when the regulated substance is of insufficient concentration to be required to appear on a Material Safety Data Sheet (MSDS). The term does not apply to section 507 of the act (35 P. S. § 6021.507) as it pertains to site contamination.

Dielectric material—A material that does not conduct direct electrical current. Dielectric coatings are used to electrically isolate tank systems from the surrounding soils. Dielectric bushings are used to electrically isolate portions of the tank system for example, tank from piping.

Electrical equipment—Equipment that contains dielectric fluid that is necessary for the operation of equipment such as transformers and buried electrical cable.

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Emergency containment—A containment structure which serves to convey, capture and contain the total volume of an anticipated release of regulated substance from an aboveground or underground storage tank system and which is expeditiously emptied.

Environmental audit—Activities which may be conducted by a certified inspector to evaluate the storage tank system or storage tank facility site, equipment and records to determine evidence of an actual or possible release of regulated substance.

Environmental media—Soil, sediment, surface water, groundwater, bedrock and air.

Excavation zone—The volume containing the tank system and backfill material bounded by the ground surface, walls and floor of the pit and trenches into which the underground storage tank system is placed at the time of installation.

Exempt underground storage tank—An underground storage tank which has been exempted by regulation from participation in USTIF.

Existing underground storage tank system—An underground storage tank system used to contain an accumulation of regulated substances or for which installation has commenced on or before December 22, 1988. Installation is considered to have commenced if the following apply:

(i) The owner or operator has obtained the Federal, State and local approvals or permits necessary to begin physical construction of the site or installation of the tank system.

(ii) One of the following apply:

(A) A continuous onsite physical construction or installation program has begun.

(B) The owner or operator has entered into contractual obligations, which cannot be cancelled or modified without substantial loss, for physical construction at the site or installation of the tank system to be completed within a reasonable time.

Exposure assessment—An assessment to determine the extent of exposure of, or potential for exposure of, individuals, the biological community and all other natural resources to releases from a storage tank based on, but not limited to, the following:

(i) The nature and extent of contamination and the existence of or potential for pathways of human exposure, including groundwater or surface water contamination, air emissions, soil contamination and food chain contamination.

(ii) The size of the community within the likely pathways of exposure.

(iii) The comparison of expected human exposure levels to the short-term and long-term health effects associated with identified contaminants.

Farm—Land used for the production for commercial purposes of crops, livestock and livestock products, including the processing or retail marketing of these crops, livestock or livestock products if more than 50% of these pro-

cessed or merchandized products are produced by the farm operator. The phrase ''Crops, livestock and livestock products'' includes, but is not limited to:

(i) Field crops, including corn, wheat, oats, rye, barley, hay, potatoes and dry beans.

(ii) Fruits, including apples, peaches, grapes, cherries and berries.

(iii) Vegetables, including tomatoes, snap beans, cabbage, carrots, beets, onions and mushrooms.

(iv) Horticultural specialties, including nursery stock, ornamental shrubs, ornamental trees and flowers.

(v) Livestock and livestock products, including cattle, sheep, hogs, goats, horses, poultry, furbearing animals, milk, eggs and furs.

(vi) Aquatic plants and animals and their by-products.

Free product—A regulated substance that is present as a separate phase liquid; that is, liquid not dissolved in water.

Free product recovery—The removal of free product.

Gathering lines—A pipeline, equipment, facility or building used in the transportation of oil or gas during oil or gas production or gathering operations.

Groundwater—Water below the land surface in a zone of saturation.

Hazardous substance storage tank system—A storage tank system that contains a hazardous substance defined in section 101(14) of CERCLA (42 U.S.C.A. § 101(14)). The term does not include a storage tank system that contains a substance regulated as a hazardous waste under Subtitle C of CERCLA, or mixture of the substances and petroleum, and which is not a petroleum system.

Heating oil—Petroleum that is No. 1, No. 2, No. 4-light, No. 4-heavy, No. 5-light, No. 5-heavy and No. 6 technical grades of fuel oil; other residual fuel oils (including Navy Special Fuel Oil and Bunker C); and other fuels when used as substitutes for one of these fuel oils. Heating oil is typically used in the operation of heating equipment, boilers or furnaces.

Highly hazardous substance tank—A storage tank of greater than 1,100 gallons capacity which contains reportable quantities of substances with CERCLA reportable release quantity of 10 pounds or less, as identified by 40 CFR Part 302 (relating to designation, reportable quantities, and notification).

Hydraulic lift tank—A tank holding hydraulic fluid for a closed loop mechanical system that uses compressed air or hydraulic fluid to operate lifts, elevators and other similar devices.

In-service inspection—A scheduled aboveground storage tank external inspection to determine tank system serviceability and compliance with requirements in this chapter and applicable industry standards. This inspection shall be conducted by a Department-certified aboveground storage tank inspector. The tank system may be in operation during this inspection.

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Inspection activities—Activities to inspect all or a part of a storage tank system or storage tank facility. These activities include, but are not limited to, evaluation of:

(i) Storage tank system structural integrity.

(ii) Construction and major modification.

(iii) Facility operation.

Install—Activities to construct, reconstruct or erect to put into service a storage tank, a storage tank system or storage tank facility.

Interim certification—Certification granted by the Department on an interim basis under section 108 of the act (35 P. S. § 6021.108) to installers and inspectors of storage tank systems or storage tank facilities.

Intrafacility piping—A common piping system serving more than one storage tank system within a storage tank facility.

Large aboveground storage tank—An aboveground storage tank having a capacity greater than 21,000 gallons.

Large aboveground storage tank facility—An aboveground storage tank facility with greater than 21,000 gallons total aboveground storage capacity.

Liquid trap—Sumps, well cellars and other traps used in association with oil and gas production, gathering and extraction operations (including gas production plants), for the purpose of collecting oil, water and other liquids. The liquid traps may temporarily collect liquids for subsequent disposition or reinjection into a production or pipeline stream, or may collect and separate liquids from a gas stream.

Maintenance—The normal operational upkeep to prevent a storage tank system or storage tank facility from releasing regulated substances if the activity involved is not a major modification or minor modification.

Major modification—

(i) An activity to upgrade, repair, refurbish or restore all or any part of an existing storage tank system or storage tank facility which:

(A) Alters the design of that storage tank system or storage tank facility.

(B) May affect the integrity of that storage tank system or storage tank facility.

(ii) The term includes an activity directly affecting the tank portion of the storage tank system or an activity directly affecting an underground component of the storage tank system.

Minor modification—

(i) An activity to upgrade, repair, refurbish or restore all or part of an existing storage tank system or storage tank facility which does not alter the design of that storage tank system or storage tank facility, but, which may effect the integrity of that storage tank system or storage tank facility.

(ii) The term does not include an activity directly affecting the tank portion of the storage tank system or an activity directly affecting an underground component of the storage tank system.

Modify—To conduct an activity that constitutes a major modification or a minor modification.

Monitoring system—A system capable of detecting releases in connection with an aboveground or underground storage tank.

Motor fuel—Petroleum or a petroleum-based substance that is motor gasoline, aviation gasoline, No. 1 or No. 2 diesel fuel or any grade of gasohol, and is typically used in the operation of an internal combustion engine.

Motor oil—A petroleum product used to lubricate the internal parts of an engine. The term includes lubricating and operational fluids for the mechanical components associated with the engine, including any hydraulic, transmission, gear or braking systems.

New facility—A storage tank facility which did not exist prior to August 5, 1989.

New underground storage tank system—An underground storage tank system that will be used to contain an accumulation of regulated substances and for which installation has commenced after December 22, 1988. (See the definition of ''existing underground storage tank system.'')

Noncommercial purposes—The term means, with respect to motor fuel, motor fuel not for resale.

OSHA—Occupational Safety and Health Administration—The agency established under the Occupational Safety and Health Act of 1970 (29 U.S.C.A. §§ 651—678).

On the premises where stored—With respect to heating oil, the term means tank systems located on the same property where the stored heating oil is used.

Operational life—The period beginning when installation of the tank system has commenced until the time the tank system is properly closed.

Operator—A person who manages, supervises, alters, controls or has responsibility for the operation of a storage tank.

Out-of-service inspection—A scheduled aboveground storage tank inspection that encompasses both internal and external examination to determine tank system serviceability and compliance with requirements in this chapter and applicable industry standards. This inspection shall be conducted by a Department-certified aboveground storage tank inspector. The tank system may not be in operation during this inspection.

Overfill—A release that occurs when a tank is filled beyond its capacity.

Owner—Includes the following:

(i) In the case of a storage tank in use on August 7, 1989 or brought into use after August 7, 1989, a person who owns or has an ownership interest in a storage tank used for the storage, containment, use or dispensing of regulated substances.

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(ii) In the case of an aboveground storage tank in use before August 7, 1989, but which was no longer in use on August 7, 1989, a person who owned the aboveground tank immediately before the discontinuance of its use as well as a person who meets the definition in subparagraph (i).

(iii) In the case of an underground storage tank, the owner of an underground storage tank holding regulated substances on or after November 8, 1984, and the owner of an underground storage tank at the time all regulated substances were removed when removal occurred prior to November 8, 1984.

Permanently affixed—Not able to be moved from its resting place by design or which is connected to real property by piping or other structure.

Permanent water supply—A well, interconnection with a public water supply, extension of a public water supply, similar water supply or a treatment system, determined by the Department to be capable of restoring the water supply to the quantity and quality of the original unaffected water supply.

Person—An individual, partnership, corporation, association, joint venture, consortium, institution, trust, firm, joint-stock company, cooperative enterprise, municipality, municipal authority, Federal Government or agency, Commonwealth Department, agency, board, commission or authority, or other legal entity which is recognized by law as the subject of rights and duties. In provisions of the act prescribing a fine, imprisonment or penalty, or a combination thereof. The term includes the officers and directors of a corporation or other legal entity having officers and directors.

Petroleum system—A storage tank system that primarily contains petroleum, and may contain additives or other regulated substances. The term includes systems containing motor fuels, jet fuels, distillate fuel oils, residual fuel oils, lubricants, petroleum solvents and used oils.

Pipe or *piping*—A hollow cylinder or tubular conduit that is constructed of nonearthen materials. The terms include the associated fittings such as unions, elbows, tees and flexible joints.

Pipeline facilities (including gathering lines)—New and existing pipe rights-of-way and associated equipment, facilities or buildings.

Potential to be affected—In the context of water supplies, a water supply that, by virtue of its location with respect to a release of regulated substances, is reasonably likely to be impacted by that release, based on an evaluation of the known physical and hydrogeologic environment in which the release occurred and the fate and transport properties of the contaminants released.

Pressure vessel—A vessel used in industrial processes designed to withstand pressures above 15 psig.

Process vessel—A vessel in industrial or commercial operation in which, during use, there is a mechanical, physical or chemical change of the contained substances taking place. The industrial or commercial process may include, but is not limited to, mixing, separating, chemically altering, dehydrating, extract-

ing, refining or polishing of the substances in the tank. The term does not include tanks used only to store substances prior to sale or to store feedstock prior to additional processing.

Property—A parcel of land defined by the metes and bounds set forth in the deed for that land.

Public water system—A system which provides water to the public for human consumption which has at least 15 service connections or regularly serves an average of at least 25 individuals daily at least 60 days out of the year. The term includes collection, treatment, storage and distribution facilities under control of the operator of the system and used in connection with the system. The term includes collection or pretreatment storage facilities not under control of the operator which are used in connection with the system. The term also includes a system which provides for bottling or bulk hauling for human consumption. Water for human consumption includes water that is used for drinking, bathing and showering, cooking, dishwashing or maintaining oral hygiene.

Reconstruction—The work necessary to reassemble a storage tank that has been dismantled and relocated to a new site.

Regulated substance—

(i) An element, compound, mixture, solution or substance that, when released into the environment, may present substantial danger to the public health, welfare or the environment which is one of the following:

(A) A substance defined as a hazardous substance in section 101(14) of the Comprehensive Environmental Response, Compensation, and Liability Act of 1980 (42 U.S.C.A. § 9601) but not including a substance regulated as a hazardous waste under Subtitle C of the Resource Conservation and Recovery Act of 1976 (42 U.S.C.A. §§ 6921—6931).

(B) Petroleum, including crude oil or a fraction thereof and hydrocarbons which are liquid at standard conditions of temperature and pressure (60°F and 14.7 pounds per square inch absolute), including, but not limited to, oil, petroleum, fuel oil, oil sludge, oil refuse, oil mixed with other nonhazardous wastes and crude oils, gasoline and kerosene.

(C) Other substances determined by the Department by regulation whose containment, storage, use or dispensing may present a hazard to the public health and safety or the environment, but not including gaseous substances used exclusively for the administration of medical care.

(ii) The term does not include the storage or use of animal waste in normal agricultural practices.

Release—Spilling, leaking, emitting, discharging, escaping, leaching or disposing from a storage tank into surface waters and groundwaters of this Commonwealth or soils or subsurface soils in an amount equal to or greater than the reportable released quantity determined under section 102 of the Comprehensive Environmental Response, Compensation, and Liability Act of 1980 (42

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U.S.C.A. § 9602), and regulations promulgated thereunder, or an amount equal to or greater than a discharge as defined in section 311 of the Federal Water Pollution Control Act (33 U.S.C.A. § 1321) and regulations promulgated thereunder. The term also includes spilling, leaking, emitting, discharging, escaping, leaching or disposing from a storage tank into a containment structure or facility that poses an immediate threat of contamination of the soils, subsurface soils, surface water or groundwater.

Release detection—The determination, through a method or combination of methods, whether a release of a regulated substance has occurred from a storage tank into the environment or into the interstitial space between the storage tank and its secondary containment around it.

Remediation standard—The background, Statewide health or site-specific standard, or any combination thereof, as provided for in the Land Recycling and Environmental Remediation Standards Act (35 P. S. §§ 6026.101—6026.909).

Removal—Activities involving removal of storage tank system components, ancillary equipment and appurtenances. The term includes removal from service activities when a storage tank or storage tank system is removed, but excludes site assessment activities.

Removal from service—The term includes the following:

(i) Activities related to rendering an underground storage tank system permanently unserviceable. Activities include the oversight of the proper draining and cleaning of the storage tank system of product liquids, vapors, accumulated sludges or solids, and completing one of the following:

(A) Leaving the storage tank system in the ground and filling the tank with inert, solid material.

(B) Dismantling or removing the storage tank system from the tank site.

(ii) Discontinued use, abandonment, closure in place and permanent closure but does not include temporary closure as those terms are used in the act.

(iii) Site assessment activities required under Subchapter E (relating to technical standards for underground storage tanks) and applicable State law, which are the responsibility of owners and operators, but are not conducted by certified installers or inspectors.

Reportable release—A quantity or an unknown quantity of regulated substance released to or posing an immediate threat to surface water, groundwater, bedrock, soil or sediment. The term does not include the following, if the owner or operator has control over the release, the release is completely contained and, within 24 hours of the release, the total volume of the release is recovered or removed in the corrective action:

(i) A release to the interstitial space of a double-walled aboveground or underground storage tank.

(ii) A release of petroleum to an aboveground surface that is less than 25 gallons.

(iii) A release of a hazardous substance to an aboveground surface that is less than its reportable quantity under the Comprehensive Environmental Response, Compensation, and Liability Act of 1980 (42 U.S.C.A. §§ 9601—9675) and 40 CFR Part 302 (relating to designation, reportable quantities, and notification).

Residential tank—A tank located on property used primarily for dwelling purposes.

Responsible party—A person who is responsible or liable for corrective action under the act. The term includes: the owner or operator of a storage tank; the landowner or occupier; a person who on or after August 5, 1990, knowingly sold, distributed, deposited or filled an underground storage tank regulated by the act which never held a valid registration, with a regulated substance; and a person who on or after August 5, 1990, knowingly sold, distributed, deposited or filled an unregistered aboveground storage tank regulated by the act, with a regulated substance, prior to the discovery of the release.

Risk assessment—A process to quantify the risk posed by exposure of a human or ecological receptor to regulated substances. The term includes baseline risk assessment, development of site-specific standards and risk assessment of the remedial alternatives.

SARA—The Superfund Amendments and Reauthorization Act of 1986, the act of October 17, 1986 (Pub.L. No. 99-499, 101 Stat. 1613).

Secondary containment—An additional layer of impervious material creating a space in which a release of a regulated substance from a storage tank may be detected before it enters the environment.

Sediment—Solid fragmental material that originates from weathering of rocks and is transported or deposited by air, water or ice, or that accumulates by other natural agents, such as chemical precipitation from solution or secretion by organisms, and that forms in layers on the earth's surface at ordinary temperatures in a loose, unconsolidated form. The term includes sand, gravel, silt, mud, till, loess and alluvium.

Septic tank—A watertight covered receptacle designed to receive or process, through liquid separation or biological digestion, the sewage discharged from a building sewer.

Site—For purposes of § 245.303(c) and (d) (relating to general requirements), the term means the property which includes the storage tank facility. For other purposes, the term means the extent of contamination originating within the property boundaries and all areas in close proximity to the contamination necessary for the implementation of remedial activities to be conducted.

Small aboveground storage tank—An aboveground storage tank having a capacity equal to or less than 21,000 gallons.

Soil—Unconsolidated materials above bedrock.

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Solid Waste Management Act—The Solid Waste Management Act (35 P. S. §§ 6018.101—6018.1003).

Spill prevention response plan—Emergency plans and procedures developed by an aboveground storage tank or tank facility owner, operator, or both, for response to an accident or spill on the facility by facility personnel or contractors.

Stationary tank—An aboveground storage tank that is permanently affixed to the real property on which the tank is located.

Storage tank—An aboveground or underground storage tank which is used for the storage of a regulated substance.

Storage tank facility—One or more stationary tanks, including associated intrafacility pipelines, fixtures, monitoring devices and other equipment. A facility may include aboveground tanks, underground tanks or a combination of both. For the purposes of the act and this part, the associated intrafacility pipelines, fixtures, monitoring devices and other equipment for an aboveground storage tank shall be that which lies within the emergency containment area. The term storage tank facility does not encompass portions of a facility that do not contain storage tank systems.

Storage tank system—An underground or aboveground storage tank, associated underground or aboveground piping directly serving that storage tank, and one or more of the following which are directly associated with that storage tank:

(i) Ancillary equipment.

(ii) Foundation.

(iii) Containment structure or facility.

(iv) Corrosion protection system.

(v) Release detection system.

(vi) Spill and overfill protection system.

Stormwater or *wastewater collection system*—Piping, pumps, conduits and other equipment necessary to collect and transport the flow of surface water runoff resulting from precipitation or domestic, commercial or industrial wastewater to and from retention areas or the areas where treatment is designated to occur. The collection of stormwater and wastewater does not include treatment except where incidental to conveyance.

Substantial modification—An activity to construct, refurbish, restore or remove from service an existing storage tank, piping or storage tank facility which alters the physical construction or integrity of the storage tank or storage tank facility.

Surface impoundment—A natural topographic depression, manmade excavation or diked area formed primarily of earthen materials, although it may be lined with man-made materials, that is not an injection well.

Survey—For purposes of § 245.303(d), the term means a study to establish background for surface water, groundwater, soil and sediment prior to the use of a storage tank facility.

Tank—A stationary device designed to contain an accumulation of regulated substances and constructed of nonearthen materials, for example, concrete, steel or plastic that provide structural support.

Tank handling activities—Activities to install, modify or remove all or part of a storage tank system or storage tank facility. The term does not include maintenance activities.

Temporary water supply—Bottled water, a water tank supplied by a bulk water hauling system and similar water supplies in quantities sufficient to accommodate normal usage.

Third party liability—Liability of an owner or operator of an underground storage tank to a person for bodily injury or property damage, or both, arising from or caused by a sudden or nonsudden release of a regulated substance from the underground storage tank.

Tightness testing activities—Testing activities which are designed and intended to detect leaks when performing precision tests, volumetric and non-volumetric tests on underground storage tanks.

USTIB—Underground Storage Tank Indemnification Board—The Board established under section 703 of the act (35 P. S. § 6021.703), and authorized to carry out the powers and duties described in section 705 of the act (35 P. S. § 6021.705).

USTIF—Underground Storage Tank Indemnification Fund—The Fund established under section 704 of the act (35 P. S. § 6021.704), for the purpose of making payments to the owner or operator of an underground storage tank who incurs corrective action liability or third party liability caused by a sudden or nonsudden release from an underground storage tank.

USTIF deductible—The portion of liability incurred by an owner or operator of an underground storage tank for corrective action or for third party liability, within the limits of liability for USTIF coverage, which is the responsibility of the owner or operator and which is not indemnified by USTIF coverage. The USTIF deductible amount is established or revised by USTIB in accordance with section 705(c) of the act.

Underground area—An underground room, such as a basement, cellar, shaft or vault, providing enough space for physical inspection of the exterior of the tank situated on or above the surface of the floor.

Underground field constructed storage tank—An underground storage tank that is manufactured from metallic or nonmetallic materials and has final assembly completed at the job site. The term does not include associated piping.

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Underground manufactured storage tank—An underground storage tank that is manufactured from metallic or nonmetallic materials and is completely fabricated and assembled in the shop prior to shipping. The term does not include associated piping.

Underground storage tank—One or a combination of tanks (including underground pipes connected thereto) which are used to contain an accumulation of regulated substances, and the volume of which (including the volume of underground pipes connected thereto) is 10% or more beneath the surface of the ground. The term does not include:

(i) Farm or residential tanks of 1,100 gallons or less capacity used for storing motor fuel for noncommercial purposes.

(ii) Tanks used for storing heating oil for consumptive use on the premises where stored unless they are specifically required to be regulated by Federal law.

(iii) A septic or other subsurface sewage treatment tank.

(iv) A pipeline facility (including gathering lines) regulated under:

(A) The Natural Gas Pipeline Safety Act of 1968.

(B) The Hazardous Liquid Pipeline Safety Act of 1979.

(v) An interstate or intrastate pipeline facility regulated under State laws comparable to the provisions of law in subparagraph (iv).

(vi) Surface impoundments, pits, ponds or lagoons.

(vii) Stormwater or wastewater collection systems.

(viii) Flow-through process tanks.

(ix) Liquid traps or associated gathering lines directly related to oil or gas production and gathering operations.

(x) Storage tanks situated in an underground area (such as a basement, cellar, mine working, drift, shaft or tunnel) if the tank is situated upon or above the surface of the floor.

(xi) Tanks regulated under the Solid Waste Management Act, including, but not limited to, piping, tanks, collection and treatment systems used for leachate, methane gas and methane gas condensate management, except for tanks subject to 40 CFR Part 280 (relating to technical standards and corrective action requirements for owners and operators of underground storage tanks (UST)).

(xii) An underground storage tank system with capacity of 110 gallons or less.

(xiii) Tanks containing radioactive materials or coolants that are regulated under The Atomic Energy Act of 1954 (42 U.S.C.A. §§ 2011—2297).

(xiv) A wastewater treatment tank system.

(xv) Equipment or machinery that contains regulated substances for operational purposes such as hydraulic lift tanks and electrical equipment tanks.

(xvi) An underground storage tank system that contains a de minimis concentration of regulated substances.

(xvii) An emergency spill or overflow containment underground storage tank system that is expeditiously emptied after use.

(xviii) An underground storage tank system that is part of an emergency generator system at nuclear power generation facilities regulated by the Nuclear Regulatory Commission under 10 CFR Part 50, Appendix A (relating to general design criteria for nuclear power plants).

(xix) Other tanks excluded by policy or regulations promulgated under the act.

Underground storage tank system—An underground storage tank, connected piping and ancillary equipment and containment system.

Underground vault—A structure which is beneath the surface of the ground and is designed specifically to contain an aboveground storage tank.

Unregistered storage tank—A storage tank, regulated under the act, which does not hold a current, valid registration.

Upgrade—The addition or retrofit of some systems such as cathodic protection, lining or spill and overfill controls to improve the ability of a storage tank system to prevent the release of product.

Wastewater treatment tank—A tank that is designed to receive and treat an influent wastewater through physical, chemical or biological methods.

Water supply—Existing, designated or planned sources of water or facilities or systems for the supply of water for human consumption or for agricultural, commercial, industrial or other legitimate use, protected by the applicable water supply provisions of § 93.3 (relating to protected water uses).

Source

The provisions of this § 245.1 amended December 23, 1994, effective December 24, 1994, 24 Pa.B. 6515; amended September 27, 1996, effective September 28, 1996, 26 Pa.B. 4735; amended October 10, 1997, effective October 11, 1997, 27 Pa.B. 5341; amended February 27, 1998, effective October 11, 1997, 28 Pa.B. 1135; amended November 30, 2001, effective December 1, 2001, 31 Pa.B. 6615; corrected November 29, 2002, effective February 2, 2002, 32 Pa.B. 5883. Immediately preceding text appears at serial pages (285706) to (285723).

Cross References

This section cited in 25 Pa. Code § 245.403 (relating to applicability); 25 Pa. Code § 298.1 (relating to definitions); and 25 Pa. Code § 977.4 (relating to definitions).

§ 245.2. General.

(a) A person may not install, construct, erect, modify, operate or remove from service all or part of a storage tank system or storage tank facility in a manner that violates the act, this part or applicable Federal regulations adopted under the Resource Conservation and Recovery Act of 1976 (42 U.S.C.A. §§ 6901—6987).

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This chapter incorporates by reference the Federal regulations in 40 CFR Part 280, Subpart I (relating to lender liability).

(b) Whenever industry codes are specified in this chapter, the latest edition shall be used. When industry codes are updated, facilities installed to previously existing standards prior to the update will not automatically be required to be upgraded to meet the new standard. The requirements of this chapter shall govern in the event of a conflict between the requirements of this chapter and an applicable industry standard.

(c) A person may not install a storage tank system regulated under the act unless the system does the following:

(1) Will prevent releases due to corrosion or structural failure for the operational life of the system.

(2) Is protected against corrosion and designed in a manner to prevent the release or threatened release of any stored substance.

(3) Is constructed or lined with material that is compatible with the stored substance.

Source

The provisions of this § 245.2 amended September 27, 1996, effective September 28, 1996, 26 Pa.B. 4735; amended October 10, 1997, effective October 11, 1997, 27 Pa.B. 5341. Immediately preceding text appears at serial pages (228313) to (228314).

Cross References

This section cited in 25 Pa. Code § 245.425 (relating to reuse of removed tanks); 25 Pa. Code § 245.501 (relating to purpose); and 25 Pa. Code § 245.601 (relating to purpose).

TANK HANDLING ACTIVITIES

§ 245.21. Tank handling and inspection requirements.

(a) Tank handling activities shall be conducted by a certified installer except in the case of modification to an aboveground nonmetallic storage tank, which may be modified by the tank manufacturer. Storage tank facility owners and operators may not use persons who are not Department certified to conduct tank handling activities except as noted in this subsection.

(b) Tank handling activities conducted on all field constructed storage tanks and tank handling activities conducted on all aboveground storage tanks having a capacity greater than 21,000 gallons shall be inspected by a certified inspector, except in the case of a minor modification or removal from service.

(c) The operation of storage tank facilities shall be inspected by a certified inspector. The frequency of inspection shall be based on:

(1) The age of the storage tank systems located at the storage tank facility.

(2) The type of regulated substances contained in the storage tank systems located at the storage tank facility.

(3) The distance of the storage tank facility from public and private surface water and groundwater supplies.

(4) The total capacity of the storage tank systems located at the storage tank facility.

(5) The geologic conditions at the storage tank facility.

(6) Whether the storage tank facility, owner or operator has violated the act or the regulations promulgated thereunder.

(7) Whether the storage tank facility has storage tank systems which are periodically taken out of service.

(8) Whether there is suspected contamination at the storage tank facility.

(9) The level of quality control maintained at the storage tank facility.

(d) Storage tank facilities shall also be inspected upon written notification from the Department or as required by permit.

Source

The provisions of this § 245.21 amended September 27, 1996, effective September 28, 1996, 26 Pa.B. 4735. Immediately preceding text appears at serial pages (206964) to (206965).

Cross References

This section cited in 25 Pa. Code § 245.423 (relating to registration requirements).

TIGHTNESS TESTING ACTIVITIES

§ 245.31. Underground storage tank tightness testing requirements.

(a) Tightness testing activities shall be conducted by a Department certified underground tightness testing (UTT) installer, except when performed by an owner or operator using installed automatic tank gauging or monitoring equipment.

(b) Tightness testing is required to be conducted when it is:

(1) Used as a method of release (leak) detection as prescribed in §§ 245.442(1) and 245.443(1) (relating to requirements for petroleum underground storage tank system; and requirements for hazardous substance underground storage tank systems).

(2) Used to complete the installation of a new single wall constructed underground storage tank. The testing is an integral part of the installation process.

(3) Used in conjunction with cathodic protection upgrading as prescribed in § 245.422(b)(2)(iii) or (v) (relating to upgrading of existing underground storage tank systems).

(4) Used to test tanks repaired in response to a release as prescribed in § 245.434(5) (relating to repairs allowed).

(5) Otherwise required by the Department.

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(c) Tightness testing shall be conducted in accordance with equipment manufacturer's written instructions and using the recommended written practices, procedures and established test method protocols developed by the sources in § 245.132(a)(1) (relating to standards of performance).

(d) A failed valid tightness test will, regardless of the test method, constitute a suspected release, except as provided in § 245.304(b) (relating to investigation of suspected releases). A failed valid tightness test conducted as part of an investigation of a suspected release constitutes a confirmed release.

(e) A written test report shall be provided to the tank owner as documentation of test results. The test methodology, a certification that the test meets the requirements of § 245.444(3) (relating to methods of release detection for tanks) and sufficient test data, which were used to conclude that the tank passed or failed the tightness test, shall be included in the test report.

Source

The provisions of this § 245.31 adopted September 27, 1996, effective September 28, 1996, 26 Pa.B. 4735; amended October 10, 1997, effective October 11, 1997, 27 Pa.B. 5341. Immediately preceding text appears at serial pages (228315) and (220641).

Cross References

This section cited in 25 Pa. Code § 245.102 (relating to requirement for certification).

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Subchapter B. CERTIFICATION PROGRAM FOR INSTALLERS AND INSPECTORS OF STORAGE TANKS AND STORAGE TANK FACILITIES

GENERAL CERTIFICATION REQUIREMENTS

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Cross References

This subchapter cited in 25 Pa. Code § 245.212 (relating to minimum requirements for obtaining a permit-by-rule); 25 Pa. Code § 245.222 (relating to application requirements); and 25 Pa. Code § 245.232 (relating to general requirements).

GENERAL CERTIFICATION REQUIREMENTS

§ 245.101. Purpose.

This chapter establishes a certification program for installers and inspectors of storage tank systems and storage tank facilities and companies that employ installers or inspectors, and establishes standards of performance for certified installers, certified inspectors and certified companies.

§ 245.102. Requirement for certification.

(a) A person may not conduct tank handling or tightness testing activities unless that person holds a current installer certification issued by the Department for the applicable certification category as indicated in § 245.110 (relating to certification of installers), except as provided in § 245.31 (relating to underground storage tank tightness testing requirements). Except as provided in § 245.103 (relating to phase-in from interim certification), installer certification will only be issued by the Department to a person who:

(1) Possesses minimum experience and qualifications as provided under § 245.111 (relating to certified installer experience and qualifications).

(2) Achieves a passing grade on a certification examination administered or approved by the Department for one or more of the certified installer categories described in § 245.110 for which the person is requesting certification.

(3) Submits an accurate and complete application.

(4) Is not found to be in violation of the act or this chapter and has not had a certification revoked by the Department under § 245.109 (relating to revocation of certification).

(b) A person may not conduct inspection activities at a storage tank system or storage tank facility required by the Department under the act and this part unless that person holds a current inspector certification issued by the Department for the applicable inspector certification category. Except as provided in § 245.103, inspector certification will only be issued by the Department to a person who:

(1) Possesses minimum experience and qualifications as provided under § 245.113 (relating to certified inspector experience and qualifications).

(2) Achieves a passing grade on a certification examination administered or approved by the Department for one or more of the certified inspector categories described in § 245.112 (relating to certification of inspectors) for which the person is requesting certification.

(3) Submits an accurate and complete application.

(4) Is not found to be in violation of the act or this chapter and has not had a certification revoked by the Department under § 245.109.

(c) Certified installers and certified inspectors shall successfully complete additional periodic training and testing administered or approved by the Department to maintain their certification. Successful completion means attendance at

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all sessions of training and attainment of the minimum passing grade established by the Department in the approval of the training course under § 245.141 (relating to training approval), for all sections of all qualifying tests given as part of the training program.

(d) After March 23, 1992, a certified installer or certified inspector may not perform tank handling or inspection activities as an employe of a company unless the company holds a valid certification issued by the Department under this chapter.

Source

The provisions of this § 245.102 amended September 27, 1996, effective September 28, 1996, 26 Pa.B. 4735. Immediately preceding text appears at serial pages (206966) to (206967).

Cross References

This section cited in 25 Pa. Code § 245.104 (relating to application for installer or inspector certification).

§ 245.103. Phase-in from interim certification.

(a) The Department may issue an installer certification or inspector certification on a temporary basis for the applicable certification category to any person who meets the minimum experience requirements under § 245.111 or § 245.113 (relating to certified installer experience and qualifications; and certified inspector experience and qualifications).

(b) A person certified as an installer or inspector on an interim basis under section 108 of the act (35 P. S. § 6021.108) who meets the minimum experience and qualification requirements under § 245.111 or § 245.113 may request temporary installer certification or temporary inspector certification on or before January 21, 1992. Failure to be granted temporary installer certification or temporary inspector certification on or before March 23, 1992, will result in revocation of interim certification.

(c) To be granted permanent installer certification or permanent inspector certification, a person who obtains temporary installer certification or temporary inspector certification under this section, shall, on or before September 21, 1994, achieve a passing grade on a certification examination administered or approved by the Department for one or more of the certified installer or inspector categories described in § 245.110 or § 245.112 (relating to certification of installers; and certification of inspectors). Failure to achieve a passing grade within this time will result in expiration of the temporary installer certification or temporary inspector certification.

(d) If the EQB deletes or consolidates certification categories or amends qualifications for certification prior to the expiration date of an installer or inspector's permanent certification, the permanent certification may still be used until the expiration date of the certification.

Source

The provisions of this § 245.103 adopted September 20, 1991, effective September 21, 1991, 21 Pa.B. 4345; corrected September 27, 1991, effective September 21, 1991, 21 Pa.B. 4405; amended April 23, 1993, effective April 24, 1993, 23 Pa.B. 1949; amended September 27, 1996, effective September 28, 1996, 26 Pa.B. 4735. Immediately preceding text appears at serial pages (206967) to (206968).

Cross References

This section cited in 25 Pa. Code § 245.102 (relating to requirement for certification); 25 Pa. Code § 245.104 (relating to application for installer or inspector certification); and 25 Pa. Code § 245.114 (relating to renewal and amendment of certification).

§ 245.104. Application for installer or inspector certification.

(a) The applicant shall be a natural person.

(b) An application for installer or inspector certification shall be submitted to the Department on forms provided by the Department and shall contain the following information:

(1) Evidence that the applicant has the certification prerequisites contained in § 245.111 or § 245.113 (relating to certified installer experience and qualifications; and certified inspector experience and qualifications).

(2) The applicant's name, address and telephone number.

(3) Other information necessary for a determination of whether the issuance of a certification conforms to the act and this chapter.

(c) An application for certification shall be received by the Department no later than 120 days prior to the announced date of the certification examination.

(d) An application shall be complete upon submission.

(e) An applicant meeting the requirements of §§ 245.102(a)(4) or (b)(4) and 245.103 (relating to requirement for certification; and phase-in from interim certification) will be granted admission to the certification examinations for which the applicant has requested certification and is qualified.

Cross References

This section cited in 25 Pa. Code § 245.107 (relating to reciprocity).

§ 245.105. Certification examinations.

(a) The Department will establish separate administrative and technical content for the examinations and the standards and criteria against which they will be evaluated to be used in determining the fitness of candidates for certification as certified installers or certified inspectors under the categories established by this chapter.

(b) The Department will schedule a date and location for the examinations for certified installer and certified inspector at least once in each calendar year.

(c) Only applicants who have been authorized by the Department, in accordance with this chapter, to take an examination will be admitted to an examina-

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tion or issued a certification as a result of passing an examination. Authorization to take an examination will be based on compliance with the requirements of this chapter.

(d) To receive a passing grade on the examinations, the applicant for certification shall achieve a minimum score of 90% on each technical section and a minimum score of 80% on the administrative section of the examination.

(e) An applicant who fails two examinations for the same certification may not retake the examination until the applicant has successfully completed a training program that is administered or approved by the Department and focuses on those areas of the examination in which the applicant is deficient. Successful completion means attendance at all sessions of training and attainment of the minimum passing grade established by the Department in the approval of the training course under § 245.141 (relating to training approval), for all sections of all qualifying tests given as part of the training program.

Source

The provisions of this § 245.105 amended September 27, 1996, effective September 28, 1996, 26 Pa.B. 4735. Immediately preceding text appears at serial pages (206968) to (206969).

Cross References

This section cited in 25 Pa. Code § 245.114 (relating to renewal and amendment of certification).

§ 245.106. Conflict of interest.

(a) Except as provided in subsection (b), a certified inspector may not be one or more of the following:

(1) An employe of the tank owner.

(2) A certified installer on the same tank handling activity for which he is a certified inspector.

(3) An employe of a company that employs a certified installer on the same tank handling activity for which he is a certified inspector, when the tank handling activity is performed on a field constructed storage tank. This prohibition extends to a company that owns, or is owned by, the employer, in whole or in part.

(b) A certified inspector who is a certified installer may conduct a tank handling activity to correct a deficiency identified by the same certified individual or company during an inspection of the operation of a storage tank facility. Notwithstanding this exception, subsection (a)(2) still prohibits a certified inspector from subsequently inspecting a tank handling activity which the certified inspector conducted to correct a deficiency noted in an inspection of the operation of a storage tank facility.

Source

The provisions of this § 245.106 amended December 23, 1994, effective December 24, 1994, 24 Pa.B. 6515. Immediately preceding text appears at serial page (162556).

§ 245.107. Reciprocity.

(a) A person holding a valid certification issued under the law of another state, territory or the District of Columbia may be issued a certificate in a classification equivalent to the classification of the certification issued by the other state, territory or District of Columbia, if the person proves to the satisfaction of the Department that he is competent to conduct activities in the classification for which certification is being requested. In making its determination, the Department will consider the following:

(1) That the other certification was issued as a result of the passing of an examination equivalent in technical content to that given by the Department for that classification.

(2) That the applicant can be shown to have complied with the laws and requirements of the state, territory or District of Columbia, issuing the other certification in conducting activities for which the other certification was issued.

(3) That the applicant meets the experience and qualification requirements of this chapter for the category of certification being requested.

(4) The applicant achieves a passing grade on all administrative sections of the certification examination required by this chapter for the category of certification being requested.

(b) The applicant shall submit an application for certification to the Department in accordance with § 245.104 (relating to application for installer or inspector certification).

§ 245.108. Suspension of certification.

(a) The Department may suspend the certification of a certified installer or certified inspector for good cause which includes, but is not limited to:

(1) A violation of the act or this part.

(2) Incompetency on the part of the certified installer or certified inspector as evidenced by errors in conducting duties and activities for which the certification in question was issued.

(3) Failure to successfully complete a training program required by the Department.

(4) In the case of a certified inspector's failure to:

(i) Inform the owner or operator and the Department of conditions or procedures that are not in accordance with the manufacturer's technical and procedural specifications for installation, construction, modification or operation of the storage tank system or storage tank facility.

(ii) Conduct, review or observe a test or inspection activity required by the act or this part.

(iii) Submit reports of inspection activities to the Department within 60 days of conducting the inspection activities.

(5) In the case of a certified installer's failure to:

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(i) Be present during tank handling activities at the storage tank system or storage tank facility as required by the act and this part.

(ii) Conduct tank handling activities in accordance with the requirements of the act and this part.

(iii) Submit tank handling reports and activities to the Department within 60 days of conducting the tank handling activities.

(6) Working as a certified installer or certified inspector in a certification category for which the person has failed to obtain certification.

(7) Failure to meet one or more of the standards for performance in § 245.132 (relating to standards of performance).

(8) Submission of false information to the Department.

(9) A violation of The Clean Streams Law or the Solid Waste Management Act or regulations promulgated under those statutes by the certified individual which results in the following:

(i) Causes pollution, causes a threat of pollution or causes harm to the public health, safety or welfare.

(ii) Occurs as a result of the certified individual conducting activities related to the installation, modification, removal or inspection of storage tank systems.

(b) The suspension of a certification in a single category shall prevent the person from engaging in activities in all categories of certification.

(c) The Department may require that the person successfully complete a special training program sponsored or approved by the Department designed to strengthen the specific weakness in the certified installer's or certified inspector's duties, as required under the act or this part identified in the suspension order. Successful completion means attendance at all sessions of training and attainment of the minimum passing grade established by the Department in the approval of the training course under § 245.141 (relating to training approval), for all sections of all qualifying tests given as part of the training program.

(d) A certified installer or certified inspector shall surrender certification documents to the Department upon notification of suspension.

(e) The Department may reinstate the certification if:

(1) The cause for the suspension has been removed.

(2) The person is competent to execute duties and responsibilities for which certification was issued.

Source

The provisions of this § 245.108 amended September 27, 1996, effective September 28, 1996, 26 Pa.B. 4735. Immediately preceding text appears at serial pages (206970) to (206971).

Cross References

This section cited in 25 Pa. Code § 245.109 (relating to revocation of certification).

§ 245.109. Revocation of certification.

(a) The Department may revoke the certification of a certified installer or certified inspector if the certified installer or certified inspector has done one or more of the following:

(1) Demonstrated a willful disregard of, or willful or repeated violations of the act or regulations promulgated thereunder or this part.

(2) Willfully submitted false information to the Department.

(3) Committed an act requiring suspension under § 245.108 (relating to suspension of certification) after having certification suspended previously.

(b) The revocation of a certification in a single category shall prevent the person from engaging in activities in all categories of certification.

(c) A certified installer or certified inspector shall surrender certification documents to the Department upon notification of revocation.

Source

The provisions of this § 245.109 amended September 27, 1996, effective September 28, 1996, 26 Pa.B. 4735. Immediately preceding text appears at serial page (206971).

Cross References

This section cited in 25 Pa. Code § 245.102 (relating to requirement for certification).

§ 245.110. Certification of installers.

(a) An installer certification authorizes the person to whom it is issued to conduct tank handling activities or tightness testing activities pertaining to storage tank systems or storage tank facilities in one or more of the categories in subsection (b).

(b) Installer certifications may be issued for the following categories:

(1) *Underground storage tank system-installation and modification {UMX}.* Installation and modification of underground storage tanks and storage tank systems including, but not limited to, the tank and all associated ancillary equipment, appurtenances, corrosion protection systems, structural components and foundations. This category also includes conducting preinstallation air pressure tests for underground storage tank systems.

(2) *Underground storage tank-removal {UMR}.* Removal from service of underground storage tank systems or storage tank facilities.

(3) *Underground storage tank-tightness tester {UTT}.* Tightness testing activities involved in conducting and interpreting results of volumetric and nonvolumetric tests on underground storage tank systems or storage tank facilities.

(4) *Aboveground manufactured metallic storage tank-installation and modification {AMMX}.* Installation and modification of aboveground manufac-

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tured metallic storage tanks or storage tank systems, including, but not limited to, the tank and all associated ancillary equipment, appurtenances and corrosion protection systems. This category also covers foundations and structural components when they are designed by an engineer qualified in civil construction or when installing small aboveground UL-labeled tanks with manufacturer's installed self-containment or diking systems.

(5) *Aboveground nonmetallic storage tank-installation and modification {AMNX}.* Installation and modification of aboveground nonmetallic storage tanks or storage tank systems, including, but not limited to, the tank and all associated ancillary equipment and appurtenances. This category also covers foundations and structural components when they are designed by an engineer qualified in civil construction or as specified by the tank manufacturer.

(6) *Aboveground manufactured storage tank-removal {AMR}.* Removal from service of aboveground manufactured storage tank systems or storage tank facilities.

(7) *Aboveground field constructed metallic storage tank-installation, modification and removal {AFMX}.* Installation, modification and removal of aboveground field constructed metallic storage tanks and corrosion protection systems.

(8) *Aboveground field constructed storage tank-removal {AFR}.* Removal from service of aboveground field constructed storage tank systems or storage tank facilities.

(9) *Aboveground storage tank mechanical-installation, modification and removal {AMEX}.* Installation, modification and removal of tank related mechanical appurtenances, including, but not limited to, valves, fill piping, suction piping, foam system piping, pumps, corrosion protection systems, release detection systems, and spill and overfill prevention systems that are components of an aboveground storage tank system or storage tank facility.

(10) *Aboveground storage tank-civil {ACVL}.* Installation and modification of tank related structural components, including, but not limited to, foundations, dike walls, field grading, above and below grade vaults, pump supports, pipe supports, corrosion protection systems and drainage systems associated with an aboveground storage tank system or storage tank facility.

(11) *Storage tank-liner {TL}.* Activities involved in installing internal linings for underground and aboveground storage tank systems or storage tank facilities.

Source

The provisions of this § 245.110 amended September 27, 1996, effective September 28, 1996, 26 Pa.B. 4735. Immediately preceding text appears at serial pages (206972) to (206974).

Cross References

This section cited in 25 Pa. Code § 245.102 (relating to requirement for certification); 25 Pa. Code § 245.103 (relating to phase-in from interim certification); and 25 Pa. Code § 977.19 (relating to certified company fees).

§ 245.111. Certified installer experience and qualifications.

(a) An applicant shall meet the following minimum experience or education requirements, or both, and have completed the required number of activities in the appropriate category for an installer certification:

Category	*Total Experience or Education plus Experience*	*Total Number of Activities Completed*
UMX	2 years, or college degree and 1 year	15 installations
UMR	2 years, or college degree and 1 year	15 removals
UTT	Department approved training with testing equipment manufacturer's certification	
AMMX	2 years, or college degree and 1 year	15 installations
	or	
	UMX Certification	None
	or	
	AFMX Certification	None
AMNX	2 years, or college degree and 1 year	15 which may be installations or major modifications
AMR	2 years, or college degree and 1 year	15 removals
	or	
	UMR Certification	None
	or	
	AFR Certification	None
AFMX	3 years, or college degree and 2 years	20 which may be installations or major modifications
AFR	2 years, or college degree and 1 year	15 removals

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Category	*Total Experience or Education plus Experience*	*Total Number of Activities Completed*
AMEX	3 years, or college degree and 2 years	20 (10 installations and 10 modifications)
ACVL	3 years, or college degree and 2 years	20 (10 installations and 10 modifications)
TL	2 years	15 tank linings

(b) The total number of activities completed required by subsection (a) shall have been completed within the 7-year period immediately prior to submitting the application for certification. The activities shall have been completed in compliance with Federal and State requirements and the applicant shall have had substantial personal involvement at the storage tank site in the activities. Noncertified individuals may work at the site but the certified installer is directly responsible to assure that the activities are conducted properly. This work qualifies toward the total number of activities completed requirements.

(c) A college degree being substituted for experience shall be in civil engineering, mechanical engineering, environmental engineering, petroleum engineering, chemical engineering, structural engineering or geotechnical engineering.

(d) The total experience requirement for underground storage tank-tightness tester {UTT} shall be demonstrated through the submission of proof of successful completion of a training program sponsored or approved by the Department and possession of a current equipment manufacturer's certification for a specific method of testing. The Department's UTT certification is limited to the specific method of testing included in the equipment manufacturer's certification. Successful completion means attendance at all sessions of training and attainment of the minimum passing grade established by the Department in the approval of the training course under § 245.141 (relating to training approval), for all sections of all qualifying tests given as part of the training course.

(e) Except for UTT, the total experience requirement is experience gained working at a storage tank site while working towards the Total Number of Activities Completed requirement.

(f) In the category for aboveground field constructed metallic storage tank {AFMX}, for installation or reconstruction activities involving tanks greater than 90 feet in diameter, each activity shall count as two installations for purposes of meeting the total number of activities requirement.

(g) Six months experience may be accredited to an installer applicant who successfully completes a Department approved training program applicable to the certification category being requested. The 6 months experience shall be accred-

ited to the total years of experience required by subsection (a), except for applicants who are substituting a college degree for experience.

Source

The provisions of this § 245.111 amended December 23, 1994, effective December 24, 1994, 24 Pa.B. 6515; corrected January 6, 1995, effective December 24, 1994, 25 Pa.B. 17; amended September 27, 1996, effective September 28, 1996, 26 Pa.B. 4735. Immediately preceding text appears at serial pages (206974) to (206976).

Cross References

This section cited in 25 Pa. Code § 245.1 (relating to definitions); 25 Pa. Code § 245.102 (relating to requirement for certification); 25 Pa. Code § 245.103 (relating to phase-in from interim certification); and 25 Pa. Code § 245.104 (relating to application for installer or inspector certification).

§ 245.112. Certification of inspectors.

(a) An inspector certification authorizes the person to whom it is issued to conduct inspection activities for storage tank systems and storage tank facilities in one or more of the categories in subsection (b).

(b) Inspector certifications may be issued for the following categories:

(1) IUM underground storage tank systems and storage tank facilities.

(2) IAM aboveground manufactured storage tank systems and storage tank facilities.

(3) IAF aboveground field constructed storage tank systems and storage tank facilities.

Source

The provisions of this § 245.112 amended September 27, 1996, effective September 28, 1996, 26 Pa.B. 4735. Immediately preceding text appears at serial page (206977).

Cross References

This section cited in 25 Pa. Code § 245.102 (relating to requirement for certification); and 25 Pa. Code § 245.103 (relating to phase-in from interim certification).

§ 245.113. Certified inspector experience and qualifications.

(a) An applicant shall meet the following minimum experience or education requirements, or both, and have completed the required number of activities in the appropriate category of an inspector certification:

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Category	*Total Experience and Qualification or Education plus Experience*	*Total Number of Activities Completed*
IUM	1. 4 years, or college degree and 2 years 2. Department approved tank tightness testing familiarization course or UTT certification	20 (10 installations and 10 major modifications) or (20 operations inspections for certification renewal applicants)
	or	
	IAM certification and Department approved tank tightness testing familiarization course or UTT certification	None
IAM	1. 4 years, or college degree and 2 years 2. Nondestructive testing level 2 certification using current ASNT recommended practice (SNT-TC-1A) or Department approved aboveground tank inspector training course or API 653 Certification	20 (which may be any combination of installations, major modifications or service inspections)
	or	
	IAF Certification	None
IAF	1. 4 years, or college degree and 2 years 2. Nondestructive testing level 2 certification using current ASNT recommended practice (SNT-TC-1A) or Department approved API 653 training course or API 653 certification.	20 (which may be any combination of installations, major modifications or inspections under API 653 standards)

(b) The total number of activities completed required by subsection (a) shall have been completed within the 7-year period immediately prior to submitting the application for certification. The activities shall have been completed in compliance with Federal and State requirements and the applicant shall have had substantial personal involvement at the storage tank site in the activities.

(c) A college degree being substituted for experience shall be in civil engineering, mechanical engineering, environmental engineering, petroleum engineering, chemical engineering, structural engineering, geotechnical engineering, hydrology, geology or environmental studies.

(d) The total number of activities completed required by subsection (a) may be met through the conducting of tank handling or inspection activities. Noncertified individuals may work at the site but the certified inspector is directly responsible to assure that the activities are conducted properly. This work qualifies toward the total number of activities completed requirements.

(e) The total experience requirement is experience gained working at a storage tank site while working towards the total number of activities completed requirement.

(f) When conducting an aboveground storage tank structural integrity inspection on an aboveground field constructed metallic storage tank, the Department certified inspector shall also possess API Standard 653 (Tank Inspection, Repair, Alteration and Reconstruction Certification).

Source

The provisions of this § 245.113 amended December 23, 1994, effective December 24, 1994, 24 Pa.B. 6515; amended September 27, 1996, effective September 28, 1996, 26 Pa.B. 4735. Immediately preceding text appears at serial pages (206977) to (206979).

Cross References

This section cited in 25 Pa. Code § 245.1 (relating to definitions); 25 Pa. Code § 245.102 (relating to requirement for certification); 25 Pa. Code § 245.103 (relating to phase-in from interim certification); and 25 Pa. Code § 245.104 (relating to application for installer or inspector certification).

§ 245.114. Renewal and amendment of certification.

(a) Except as provided in § 245.103 (relating to phase-in from interim certification), certification shall be for 3 years from the date of issuance unless suspended or revoked. The date of certification expiration for amended certification applications shall coincide with the expiration dates of other certification categories for which the same certification examination modules were administered and passing grades were received. An applicant for renewal shall:

(1) Submit a completed application for renewal to the Department at least 120 days prior to the renewal date.

(2) Successfully complete training programs which may be required by the Department. Successful completion means attendance at all sessions of training and attainment of the minimum passing grade established by the Department in the approval of the training course under § 245.141 (relating to training approval) for all sections of all qualifying tests given as part of the training course.

(3) Have been actively involved in tank handling or inspection activities in each individually certified category during the previous 3-year period immedi-

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ately prior to submitting the renewal application for certification or take the technical module examinations again for all inactive certification categories and achieve a passing grade as described in § 245.105(d) (relating to certification examinations).

(b) A certified installer or certified inspector shall notify the Department and seek amendment of the certification from the Department whenever:

(1) There is a change in the information provided in the application for the certification. This request shall be made within 14 days from the date of a change in information.

(2) The certified installer or certified inspector wishes to conduct tank handling or inspection activities in installer or inspector certification categories other than those approved by the Department as set forth on the certification.

(3) The certified installer or certified inspector wishes to eliminate installer or inspector certification categories from the certification.

(4) The EQB amends certification categories or qualification requirements and establishes a phase-in period for the new requirements.

(c) Certified installers or certified inspectors required to amend their certifications in accordance with subsection (b)(1) or (3) shall apply for amendment on a form provided by the Department.

(d) Certified installers or certified inspectors required to amend their certifications in accordance with subsection (b)(2) shall comply with the applicable requirements of this chapter related to application, experience, qualifications and examination.

Source

The provisions of this § 245.114 amended September 27, 1996, effective September 28, 1996, 26 Pa.B. 4735. Immediately preceding text appears at serial page (206979).

Cross References

This section cited in 25 Pa. Code § 245.1 (relating to definitions).

COMPANY CERTIFICATION

§ 245.121. Certification of companies.

After March 23, 1992 a company may not perform or employ a certified installer or certified inspector to perform tank handling or inspection activities unless the company holds a valid certification issued by the Department under this chapter and the company verifies that the certified installer or certified inspector holds a valid certification issued under this chapter for the appropriate category.

Source

The provisions of this § 245.121 adopted September 20, 1991, effective September 21, 1991, 21 Pa.B. 4345; corrected September 27, 1991, effective September 21, 1991, 21 Pa.B. 4405.

§ 245.122. Applications for company certification.

(a) Applications for certification shall be submitted to the Department on forms provided by the Department and shall include information that will enable the Department to determine if issuance of the certification shall conform to the requirements of the act and this chapter. The following information shall be included:

(1) The full name, address and telephone number of the company.

(2) The names held by the company within the previous 7 years.

(3) A summary of the previous tank handling and inspection activities performed by the company and the officers of the company over the 7-year period immediately preceding the application.

(4) Identification of industry or government licenses or certifications held by the company and the officers of the company relating to underground or aboveground storage tanks.

(5) The names and certification numbers of all certified installers and certified inspectors employed by the company.

(6) A statement signed by a person authorized to bind the company certifying that the company:

(i) Has obtained a copy of the act and this chapter.

(ii) Will comply with the act and this chapter and will direct the employes, principals and agents of the company to perform tank handling and inspection activities in a manner that is consistent with the act and this chapter.

(7) Other information necessary for a determination whether the issuance of a certification conforms to the requirements of the act and this chapter.

(b) Applications shall be complete upon submission.

§ 245.123. Suspension of company certification.

(a) The Department may suspend the certification of a certified company for good cause, which includes, but is not limited to:

(1) A violation of the act or this chapter by the company or a certified installer or certified inspector employed by the company.

(2) Incompetency on the part of the company as evidenced by errors in executing duties and responsibilities for which the certification was issued.

(3) Failure to meet one or more of the standards of performance in § 245.132 (relating to standards of performance).

(4) A violation of The Clean Streams Law or the Solid Waste Management Act or regulations promulgated thereunder by the company or a certified installer or a certified inspector employed by the company which results in the following:

(i) Causes pollution, causes a threat of pollution or causes harm to the public health, safety or welfare.

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(ii) Occurs while conducting activities related to the installation, modification, removal from service or inspection of storage tank systems.

(5) Withholding from a certified installer or certified inspector, individual correspondence or certification documents issued by the Department.

(b) The Department may reinstate the certification if the following apply:

(1) The certified company and certified installers and certified inspectors employed by the certified company are competent to execute the duties and responsibilities for which certification was issued.

(2) The cause for the suspension has been removed.

(c) Suspension of a certification by the Department shall prevent a company from conducting tank handling or inspection activities during the suspension.

Source

The provisions of this § 245.123 amended September 27, 1996, effective September 28, 1996, 26 Pa.B. 4735. Immediately preceding text appears at serial page (206981).

§ 245.124. Revocation of company certification.

(a) The Department may revoke the certification of a certified company for one or more of the following conditions:

(1) A willful disregard for, or willful or repeated violations of the act or this chapter.

(2) The certification of an installer or inspector employed by the company is revoked.

(3) There has been a prior suspension of the certification.

(b) Revocation of a certification by the Department shall prevent a company from conducting tank handling or inspection activities.

§ 245.125. Renewal and amendment of company certification.

(a) Company certification shall be for 3 years from the date of issuance unless suspended or revoked before that date. An applicant for renewal shall submit a completed application for renewal to the Department at least 120 days prior to the renewal date.

(b) A certified company shall notify the Department and file an amendment to its company certification on a form approved by the Department whenever there is a change in the information provided in the application for the certification.

STANDARDS FOR PERFORMANCE

§ 245.131. Validity of certification.

A certificate will not be valid if it is obtained through fraud, deceit or the submission of inaccurate data or qualifications.

§ 245.132. Standards of performance.

(a) Certified companies, certified installers and certified inspectors shall:

(1) Maintain manufacturers, American Society of Nondestructive Testing (ASNT), American Petroleum Institute (API), American Society of Mechanical Engineers (ASME), Underwriters Laboratory (UL), Petroleum Equipment Institute (PEI), EPA and Department technical and administrative specifications and manuals which pertain to the categories for which certification was issued. This material is available from the following sources:

(i) American Society of Nondestructive Testing, 1711 Arlingate Lane, Post Office Box 28518, Columbus, Ohio 43228-0518.

(ii) American Petroleum Institute, 2535 One Main Place, Dallas, TX 75202-3904.

(iii) American Society of Mechanical Engineers, 345 East 47th Street, New York, NY 10017.

(iv) Underwriters Laboratory, Suite 400, 818 Eighteenth Street, N.W., Washington D.C. 20006.

(v) Petroleum Equipment Institute, Post Office Box 2380, Tulsa, Oklahoma 74101.

(vi) Environmental Protection Agency, Region III, UST/LUST Section (3HW63), 841 Chestnut Building, Philadelphia, Pennsylvania 19107.

(vii) Department of Environmental Protection, Division of Storage Tanks, 400 Market Street, Post Office Box 8762, Harrisburg, Pennsylvania 17105-8762.

(2) Complete and file with the Department on a form provided by the Department a certification that the tank handling activity or inspection activity conducted by the certified installer or certified inspector meets the requirements of the act and this part.

(3) Maintain complete records of tank handling and inspection activities for a minimum of 10 years.

(4) Report to the Department a release of a regulated substance or confirmed or suspected contamination of soil, surface or groundwater from regulated substances observed while performing services as a certified installer or certified inspector. This notification shall be submitted to the Department in writing within 48 hours of observing suspected or confirmed contamination on a form provided by the Department. If the notification is being submitted because of a failed valid tightness test, a copy of the test results shall also be provided to the Department with the notification report. When there is a reportable release, the notification may be submitted jointly by the owner, operator, certified installer and certified inspector. In this instance, the written notification report shall be submitted to the Department, at the appropriate regional office, in accordance with § 245.305 (relating to reporting releases).

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(5) Perform certified installer or certified inspector activities so that there is no release of regulated substances or contamination of soil, surface or groundwater caused by regulated substances from a storage tank system or storage tank facility.

(6) Not affix the certified installer's or certified inspector's signature or certification number to documentation concerning the installation or inspection of a component of a storage tank system project or to documentation concerning tank handling or inspection activity, unless:

(i) The storage tank system project was accomplished by the certified installer or under the installer's direct, onsite supervision and control.

(ii) Inspection activities were conducted on the storage tank system project by the certified inspector, or under the inspector's direct, onsite supervision and control and as required by the act and this chapter and the certified inspector was present at the site during the conducting of inspection activities on the storage tank system project and as required by the act and this chapter.

(7) Not certify to an owner or operator that a storage tank system project or component thereof is complete unless it complies with the act or this chapter.

(8) Adhere to equipment manufacturer's instructions, accepted industry standards and applicable industry codes of practice when performing tank handling, tightness testing or inspection activities.

(b) A certified installer or certified inspector shall display his certificate upon request.

Source

The provisions of this § 245.132 amended December 23, 1994, effective December 24, 1994, 24 Pa.B. 6515; amended September 27, 1996, effective September 28, 1996, 26 Pa.B. 4735. Immediately preceding text appears at serial pages (206982) to (206983).

Cross References

This section cited in 25 Pa. Code § 245.31 (relating to underground storage tank tightness testing requirements); 25 Pa. Code § 245.108 (relating to suspension of certification); and 25 Pa. Code § 245.123 (relating to suspension of company certification).

TRAINING APPROVAL

§ 245.141. Training approval.

(a) Providers of training for which approval is required under this chapter shall, at least 120 days prior to the scheduled date of the training program, request approval from the Department for the training program.

(b) An application for approval shall include the following information:

(1) The name and address of the person offering the training.

(2) The title of the course.

(3) The name, title, affiliation and professional background of each course instructor and a detailed outline of the course which includes a description of the subject matter to be presented, the order of presentation and the amount of time scheduled for the presentation.

(4) A narrative describing the preparation and administration of a test to be given at the conclusion of the course. This test shall test the participant's knowledge of the technical, administrative and legal requirements related to the subject matter of the course. The narrative shall also describe a procedure for conducting and grading of the test that assures careful monitoring and expeditious transmission of test results to the applicant and the Department.

(c) Training approval shall be for 3 years from the date of issuance. An applicant for renewal shall submit a completed application for renewal to the Department at least 120 days prior to the renewal date.

Cross References

This section cited in 25 Pa. Code § 245.102 (relating to requirement for certification); 25 Pa. Code § 245.105 (relating to certification examinations); 25 Pa. Code § 245.108 (relating to supervision of certification); 25 Pa. Code § 245.111 (relating to certified installer experience and qualifications); and 25 Pa. Code § 245.114 (relating to renewal and amendment to certification).

Subchapter C. PERMITTING OF UNDERGROUND AND ABOVEGROUND STORAGE TANK SYSTEMS AND FACILITIES

GENERAL

Sec.
245.201. Scope.
245.202. Public records and confidential information.
245.203. General requirements for permits.
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PERMITS-BY-RULE

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SITE SPECIFIC INSTALLATION PERMITS

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245.233. Mapping requirements.
245.234. Siting requirements.
245.235. Environmental assessment.
245.236. Public notice.
245.237. Public hearings.

Source

The provisions of this Subchapter C adopted October 10, 1997, effective October 11, 1997, 27 Pa.B. 5341, unless otherwise noted.

Cross References

This subchapter cited in 25 Pa. Code § 245.424 (relating to standards for new field constructed tank systems); 25 Pa. Code § 245.516 (relating to recordkeeping requirements); and 25 Pa. Code § 245.615 (relating to recordkeeping requirements).

GENERAL

§ 245.201. Scope.

This subchapter specifies procedures and rules for the permitting of aboveground and underground storage tank systems and facilities. Compliance with the permitting requirements in this subchapter does not relieve a permitee from the obligation to comply with other Federal, State or local requirements.

§ 245.202. Public records and confidential information.

(a) Except as provided in subsection (b), records, reports or other information submitted to the Department under this subchapter will be made available to the public for inspection or copying during regular business hours.

(b) The Department may, upon request, designate records, reports or other information as confidential when the person providing the information demonstrates the following:

(1) The information contains trade secret processes, operations, style of work or apparatus of a person or is otherwise confidential business information.

(2) The information is not emission, discharge or testing data or other information that relates to public health, safety, welfare or the environment.

(c) When submitting information under this subchapter, a person shall designate the information which the person believes is confidential or shall submit that information separately from other information being submitted.

(d) Information which the Department determines to be confidential under this section will not be made available to the public.

(e) This section does not prevent the disclosure of information submitted to the Department as part of a general or site specific permit application which meets one of the following:

(1) The Department is required to make the information available to the public as part of the permit application information.

(2) The Department determines that it is necessary to disclose the information during any comment period necessary to obtain informed public comment on the permit application.

§ 245.203. General requirements for permits.

(a) Except as provided in subsections (b)—(d), a person may not operate an aboveground or underground storage tank system or storage tank facility, or install a storage tank system or facility covered by § 245.231 (relating to scope), unless the person has first applied for and obtained a permit for the activity from the Department under this subchapter.

(b) A person is not required to submit an application for a permit if the storage tank system is subject to a permit-by-rule, if the person maintains and operates the storage tank system in compliance with the standards and requirements of the Department under the act and this chapter. Failure to comply with standards could result in administrative or other Departmental actions against the storage tank owner/operator.

(c) A person may continue to operate an existing storage tank system for its intended use until the Department notifies the person to submit a permit application under this subchapter, if the person maintains and operates the storage tank system in compliance with the act and this chapter.

(d) Operation of existing storage tank systems will be allowed to continue until the Department takes final action on the permit application requested in subsection (c).

(e) Operating permits will be renewed automatically on an annual basis concurrent with registration. There will be no additional fee or paperwork required beyond the registration requirements.

§ 245.204. Form of application.

(a) Applications for a permit under this subchapter shall be submitted to the Department in writing, on forms provided by the Department.

(b) The information in the application shall be current, presented concisely and supported by appropriate references to technical and other written material available to the Department.

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§ 245.205. Verification of application.

An application for a general or site specific permit shall be verified by a responsible official of the applicant with a statement that the information contained in the application is true and correct to the best of the official's information and belief.

PERMITS-BY-RULE

§ 245.211. Scope.

The following storage tank systems are subject to permit-by-rule for operation:

(1) Aboveground storage tank systems with a capacity less than or equal to 21,000 gallons, except highly hazardous substance storage tank systems.

(2) Underground manufactured storage tank systems storing petroleum.

Cross References

This section cited in 25 Pa. Code § 245.212 (relating to minimum requirements for obtaining a permit-by-rule); and 25 Pa. Code § 245.221 (relating to scope).

§ 245.212. Minimum requirements for obtaining a permit-by-rule.

(a) A storage tank system listed in § 245.211 (relating to scope) shall be deemed to have a permit-by-rule for operation if the following conditions are met:

(1) The storage tank system is properly registered.

(2) Tank handling and inspection activities are performed by Department certified individuals, as specified in Subchapter B (relating to certification program for installers and inspectors of storage tanks and storage tank facilities).

(3) If necessary, the corrective action process regulations in Subchapter D (relating to corrective action process for owners and operators of storage tanks and storage tank facilities and other responsible parties) are followed.

(4) The storage tank system meets the applicable technical, administrative and operational requirements for underground tank systems specified in Subchapter E (relating to technical standards for underground storage tanks) or for aboveground tank systems specified in Subchapter G (relating to simplified program for small aboveground storage tanks).

(5) The owner of an underground storage tank system has met the applicable financial responsibility requirements of Subchapter H (relating to financial responsibility requirements for owners and operators of underground storage tanks and storage tank facilities).

(6) If required, the owner submits a current Spill Prevention and Response Plan that meets the Department's requirement under Chapter 9 of the act (35 P. S. §§ 6021.901—6021.904).

(b) The owner/operator of a storage tank system who causes or allows violations of the act, regulations thereunder, an order of the Department, or a condition of a permit issued under the act is subject to administrative or other actions including suspension, modification or revocation of the permit.

GENERAL OPERATING PERMITS

§ 245.221. Scope.

Storage tank systems not covered by § 245.211 (relating to scope) are subject to general operating permits.

§ 245.222. Application requirements.

Applications for a general operating permit shall be submitted on a Department form. The application shall certify the following:

(1) General requirements for all storage tank systems are as follows:

(i) The storage tank system is properly registered.

(ii) Tank handling and inspection activities are performed by Department certified individuals, as specified in Subchapter B (relating to certification program for installers and inspectors of storage tanks and storage tank facilities).

(iii) The storage tank system is in compliance with applicable administrative, technical and operational requirements as specified in Subchapter E or Subchapter F (relating to technical standards for underground storage tanks; and technical standards for aboveground storage tanks and facilities).

(2) In addition to the requirements of paragraph (1), an owner of an underground storage tank system shall meet the applicable financial responsibility requirements of Subchapter H (relating to financial responsibility requirements for owners and operators of underground storage tanks and storage tank facilities).

(3) In addition to the requirements of paragraph (1), an owner of an aboveground storage tank system shall meet the following requirements:

(i) A current Spill Prevention Response Plan, that is in compliance with Chapter 9 of the act (35 P. S. §§ 6021.901—6021.904), is filed with the Department.

(ii) For new tanks, proof that an appropriate tightness test of the aboveground tank system has been completed.

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SITE SPECIFIC INSTALLATION PERMITS

§ 245.231. Scope.

(a) Site specific installation permits are required prior to the construction, reconstruction or installation of one or more of the following:

(1) New aboveground storage tank systems with a capacity greater than 21,000 gallons at an existing large aboveground storage tank facility.

(2) New large aboveground storage tank facilities.

(b) Site specific installation permits meeting the requirements in §§ 245.232(a)(1) and (2) and 245.236 (relating to general requirements; and public notice) are required prior to the construction, reconstruction or installation of one or more of the following:

(1) New underground field constructed storage tank systems.

(2) New underground highly hazardous substance tanks.

(3) New small aboveground highly hazardous substance tanks.

(c) If the facility owner or operator can demonstrate that, on October 11, 1997, either construction has commenced or the owner/operator has entered into contractual agreements for construction of a new storage tank or facility covered by this section, the requirements of this section will not apply.

Cross References

This section cited in 25 Pa. Code § 245.203 (relating to general requirements for permits).

§ 245.232. General requirements.

(a) Applicants for site-specific permits shall provide the following:

(1) Certification that the tank handling and inspection activities will be performed by Department certified individuals, as specified in Subchapter B (relating to certification program for installers and inspectors of storage tanks and storage tank facilities).

(2) Certification that the storage tank system will be in compliance with applicable administrative, technical and operational requirements as specified in Subchapters E—G (relating to technical standards for underground storage tanks; technical standards for aboveground storage tanks and facilities; and simplified program for small aboveground storage tanks).

(3) The information required by §§ 245.233 and 245.234 (relating to mapping requirements; and siting requirements).

(4) The environmental assessment required by § 245.235 (relating to environmental assessment).

(b) In addition to the items required by subsection (a), owners of aboveground storage tank systems or facilities required to apply for a site specific permit shall include:

(1) A current Spill Prevention Response Plan that is in compliance with Chapter 9 of the act (35 P. S. §§ 6021.901—6021.904).

(2) Proof of notification to the municipality and county prior to submitting the application for a site specific installation permit under section 1101(a) of the act (35 P. S. § 6021.1101(a)) and § 245.236 (relating to public notice). Acceptable proof of notification includes, but is not limited to, copies of letters sent to the affected municipality and county and legal notices published in a newspaper of general circulation in the area where the project is proposed.

Cross References

This section cited in 25 Pa. Code § 245.231 (relating to scope).

§ 245.233. Mapping requirements.

(a) A site-specific permit application shall contain maps and plans of the proposed storage tank system or facility site showing the following:

(1) The boundaries for the proposed facility site.

(2) The location and names of public roads within or adjacent to the proposed facility site.

(3) The location of proposed monitoring wells.

(4) The municipality and county.

(5) The elevation and location of test borings and core samples.

(6) The ownership, if known, location and extent of known workings of active, inactive and abandoned underground mines including mine openings within the proposed permit site.

(7) Streams, lakes or surface watercourses located on or adjacent to the proposed permit site.

(8) The location and ownership of public or private groundwater supplies within 2,500 feet of the proposed permit site.

(9) Sufficient slope measurements to adequately represent the existing land surface configuration of the proposed permit site.

(b) Maps, plans and cross sections required by this section shall be accurately surveyed and on a scale satisfactory to the Department, not less than 1 inch to 400 feet and in a manner satisfactory to the Department. The maps, plans and cross sections shall be prepared by a Pennsylvania registered professional engineer, Pennsylvania registered land surveyor or Pennsylvania registered professional geologist with assistance from experts in related fields.

Cross References

This section cited in 25 Pa. Code § 245.232 (relating to general requirements).

§ 245.234. Siting requirements.

(a) The Department will not issue a site specific storage tank system or facility installation permit if:

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(1) The installation of tank systems and facilities is proposed on 100-year floodplains or a larger area that the flood of record has inundated unless the industrial use on the proposed site was in existence as of August 5, 1989.

(2) The installation of tank systems and facilities is proposed in wetlands in a manner inconsistent with Chapter 105 (relating to dam safety and waterway management).

(b) The applicant shall provide the following additional information if appropriate:

(1) Over areas underlain by carbonate bedrock, the applicant shall provide information and analysis to the Department which assesses the prevalence of solution channels and the potential for sinkholes at the facility site.

(2) If any part of a proposed facility has been previously mined by deep mining methods, the applicant shall provide the results of an engineering study of the proposed site by a Pennsylvania registered professional engineer or Pennsylvania registered professional geologist. The study shall be detailed enough to assess the potential for and degree of surface subsidence. The study shall also include methods which have been used or will be used to stabilize the surface. The applicant shall provide assurance that minerals providing surface support will not be mined as long as the facility stores regulated substances.

Cross References

This section cited in 25 Pa. Code § 245.232 (relating to general requirements).

§ 245.235. Environmental assessment.

(a) An application for a site specific permit shall include an environmental assessment on a form prescribed by the Department.

(b) An environmental assessment in a permit application shall include detailed analysis of the potential impact of the proposed facility on the environment, public health and public safety, including air quality, water quality, threatened or endangered species and water uses. The applicant shall consider environmental features such as recreational river corridors, State and Federal parks, historic and archaeological sites, National wildlife refuges, State and Federal natural areas, prime farmland, wetlands, special protection watersheds designated under Chapter 93 (relating to water quality standards), public water supplies and other features deemed appropriate by the Department or the applicant.

(c) The Department, after consultation with appropriate governmental agencies and potentially affected persons, will evaluate the assessment provided under subsection (a) to determine whether the proposed operation has the potential to cause environmental harm. If the Department determines that the proposed operation has that potential, it will notify the applicant in writing.

(d) If the Department or the applicant determines that the proposed operation may cause environmental harm, the applicant shall provide the Department with a written explanation of how it plans to mitigate the potential harm.

Cross References

This section cited in 25 Pa. Code § 245.232 (relating to general requirements).

§ 245.236. Public notice.

The owner of a proposed new large aboveground storage tank facility or proposed aboveground storage tank system with greater than 21,000 gallons capacity or proposed new highly hazardous substance tank shall provide written notice to the local municipality and county in which the proposed aboveground system or facility is to be located prior to submitting a permit application.

Cross References

This section cited in 25 Pa. Code § 245.231 (relating to scope); and 25 Pa. Code § 245.232 (relating to general requirements).

§ 245.237. Public hearings.

Upon submission to the Department of a permit application to construct a new large aboveground storage tank facility or a new highly hazardous substance storage tank system, the Department may hold a public hearing in the municipality or county in which the aboveground storage tank facility or highly hazardous substance tank system is proposed to be located.

Subchapter D. CORRECTIVE ACTION PROCESS FOR OWNERS AND OPERATORS OF STORAGE TANKS AND STORAGE TANK FACILITIES AND OTHER RESPONSIBLE PARTIES

Sec.

245.301. Purpose.
245.302. Scope.
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245.305. Reporting releases.
245.306. Interim remedial actions.
245.307. Affected or diminished water supplies.
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245.312. Remedial action.
245.313. Remedial action completion report.
245.314. Professional seals.

Source

The provisions of this Subchapter D adopted August 20, 1993, effective August 21, 1993, 23 Pa.B. 4033, unless otherwise noted.

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Cross References

This subchapter cited in 25 Pa. Code § 245.212 (relating to minimum requirements for obtaining a permit-by-rule); 25 Pa. Code § 245.431 (relating to spill and overfill control); 25 Pa. Code § 245.441 (relating to general requirements for underground storage tank systems); 25 Pa. Code § 245.422 (relating to upgrading of existing underground storage tank systems); 25 Pa. Code § 245.451 (relating to temporary closure); 25 Pa. Code § 245.453 (relating to assessing the site at closure or change-in-service); 25 Pa. Code § 245.561 (relating to permanent closure or change-in-service); 25 Pa. Code § 245.613 (relating to monitoring standards); 25 Pa. Code § 298.22 (relating to waste oil storage); 25 Pa. Code § 298.45 (relating to waste oil storage at transfer facility); and 25 Pa. Code § 298.64 (relating to waste oil storage).

§ 245.301. Purpose.

This subchapter establishes release reporting, release confirmation and corrective action requirements for owners and operators of storage tanks and storage tank facilities and other responsible parties.

§ 245.302. Scope.

This subchapter applies to releases of regulated substances from storage tanks regulated under the act.

§ 245.303. General requirements.

(a) For a corrective action required by this subchapter, the Department may do one or more of the following:

(1) Direct or order the responsible party to perform the corrective action.

(2) Perform the corrective action.

(3) Direct that the corrective action be performed by a third party.

(4) Seek other appropriate administrative or court ordered relief.

(b) For a corrective action required by this subchapter, the Department may collect or recover, from the responsible party, the Department's costs and expenses involved in taking corrective action in accordance with this subchapter, authorizing a third party to take corrective action under this subchapter and initiating cost recovery actions under this subchapter. The Department may collect the amount in the same manner as civil penalties are collected under section 1307(b) of the act (35 P. S. § 6021.1307(b)).

(c) For corrective actions required by this subchapter, it will be presumed as a rebuttable presumption of law in civil and administrative proceedings that a person who owns or operates an aboveground or underground storage tank is liable, without proof of fault, negligence or causation, for damage, contamination or pollution within 2,500 feet of the perimeter of the site of a storage tank containing or which contained a regulated substance of the type which caused the damage, contamination or pollution. The presumption may be overcome by clear and convincing evidence that the person so charged did not contribute to the damage, contamination or pollution.

(d) To overcome the presumption of liability established in subsection (c), the owner or operator shall affirmatively prove, by clear and convincing evidence, one of the following:

(1) The damage, contamination or pollution existed prior to the use of a storage tank at the facility to contain an accumulation of regulated substances, as determined by surveys of the site and within 2,500 feet of the perimeter of the storage tank or facility.

(2) An adjacent landowner refused to allow the owner or operator of a storage tank at a new facility access to property within 2,500 feet of the perimeter of a storage tank facility to conduct a survey.

(3) The damage, contamination or pollution was not within 2,500 feet of the perimeter of a storage tank.

(4) The owner or operator did not contribute to the damage, contamination or pollution.

(e) The Department may waive or combine one or more of the requirements of this subchapter based on:

(1) The nature, extent, type, volume or complexity of the release.

(2) The general characteristics of the site and the regulated substances which were released.

(3) The corrective action which occurred subsequent to the release.

(f) The Department's acceptance or approval of an interim remedial action, site characterization, site characterization report, remedial action plan, remedial action or remedial action completion report, does not constitute and may not be construed as a release from civil or criminal liability in an administrative, civil or criminal proceeding.

Cross References

This section cited in 25 Pa. Code § 245.1 (relating to definitions); 25 Pa. Code § 245.310 (relating to site characterization report); 25 Pa. Code § 245.311 (relating to remedial action plan); and 25 Pa. Code § 245.313 (relating to remedial action completion report).

§ 245.304. Investigation of suspected releases.

(a) The owner or operator of storage tanks and storage tank facilities shall initiate and complete an investigation of an indication of a release of a regulated substance as soon as practicable, but no later than 7 days after the indication of a release. An indication of a release includes one or more of the following conditions:

(1) The presence of a regulated substance or an unusual level of vapors from a regulated substance of unknown origin, at a storage tank facility.

(2) Evidence of a regulated substance or vapors in soils, basements, sewer lines, utility lines, surface water or groundwater in the surrounding area.

(3) Unusual operating conditions, indicative of a release, such as the erratic behavior of product dispensing equipment.

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(4) The sudden or unexpected loss of a regulated substance from a storage tank, or the unexplained presence of water in a storage tank.

(5) Test, sampling or monitoring results from a release detection method which indicate a release.

(6) The discovery of holes in a storage tank during activities such as inspection, repair or removal from service.

(7) Other events, conditions or results which may indicate a release.

(b) The investigation required by subsection (a) shall include a sufficient number of the procedures outlined in this subsection and be sufficiently detailed to confirm whether a release of a regulated substance has occurred. The owner or operator shall investigate the indication of a release by one or more of the following procedures:

(1) A check of product dispensing or other similar equipment.

(2) A check of release detection monitoring devices.

(3) A check of inventory records to detect discrepancies.

(4) A visual inspection of the storage tank or the area immediately surrounding the storage tank.

(5) Testing of the storage tank for tightness or structural soundness.

(6) Sampling and analysis of soil or groundwater.

(7) Other investigation procedures which may be necessary to determine whether a release of a regulated substance has occurred.

(c) If the investigation confirms that a reportable release has occurred, the owner or operator shall report the release in accordance with § 245.305 (relating to reporting releases) and initiate corrective action.

(d) If the investigation confirms that a nonreportable release has occurred, the owner or operator shall take necessary corrective actions to completely recover or remove the regulated substance which was released.

(e) If the investigation confirms that a release has not occurred, further investigation by the owner or operator is not required.

Source

The provisions of this § 245.304 amended November 30, 2001, effective December 1, 2001, 31 Pa.B. 6615. Immediately preceding text appears at serial pages (280168) and (234707).

Cross References

This section cited in 25 Pa. Code § 245.31 (relating to underground storage tank tightness testing requirements); 25 Pa. Code § 245.306 (relating to interim remedial actions); 25 Pa. Code § 245.309 (relating to site characterization); 25 Pa. Code § 245.444 (relating to methods of release detection for tanks); 25 Pa. Code § 245.614 (relating to requirements for closure); and 25 Pa. Code § 977.34 (relating to claims reporting).

§ 245.305. Reporting releases.

(a) The owner or operator of storage tanks and storage tank facilities shall notify the appropriate regional office of the Department as soon as practicable, but no later than 24 hours, after the confirmation of a reportable release.

(b) Upon the occurrence of a confirmed, nonreportable release, the owner or operator shall take necessary corrective actions to completely recover or remove the regulated substance which was released.

(c) The notice required by subsection (a) shall be by telephone and describe, to the extent of information available, the regulated substance involved, the quantity of the regulated substance involved, when the release occurred, where the release occurred, the affected environmental media, relevant, available information concerning impacts to water supplies, buildings or to sewer or other utility lines and interim remedial actions planned, initiated or completed.

(d) Within 15 days of the notice required by subsection (a), the owner or operator shall provide written notification to the Department and to each municipality in which the reportable release occurred, and each municipality where that release has impacted environmental media or water supplies, buildings or sewer or other utility lines.

(e) The owner or operator shall provide written notification to the Department and each impacted municipality of new impacts to environmental media or water supplies, buildings, or sewer or other utility lines discovered after the initial written notification required by subsection (d). Written notification under this subsection shall be made within 15 days of the discovery of the new impact.

(f) Written notification required by this section shall contain the same information as required by subsection (c).

(g) If the Department determines that a release poses an immediate threat to public health and safety, the Department may evaluate and implement reasonable procedures to provide the public with appropriate information about the situation which may, at a minimum, include a summary of the details surrounding the release and its impacts in a newspaper of general circulation serving the area in which the impacts are occurring.

(h) Upon the occurrence of a reportable release at the aboveground storage tank, the owner or operator of aboveground storage tank facilities with a capacity greater than 21,000 gallons shall immediately notify the county emergency management agency, the Pennsylvania Emergency Management Agency and the Department. Downstream water companies, downstream municipalities and downstream industrial users within 20 miles of an aboveground storage tank facility located adjacent to surface waters shall be notified on a priority basis based on the proximity of the release by the owner or operator or the agent of the owner or operator within 2 hours of a release which enters a water supply or which threatens the water supply of downstream users. If the owner or operator or an agent fails to notify or is incapable of notifying downstream water users,

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the county emergency management agency shall make the required notification. This notification shall be done in accordance with section 904 of the act (35 P. S. § 6021.904).

(i) The owner or operator of storage tanks and storage tank facilities shall immediately notify the local fire authority where fire, explosion or safety hazards exist at the site.

Source

The provisions of this § 245.305 amended November 30, 2001, effective December 1, 2001, 31 Pa.B. 6615. Immediately preceding text appears at serial pages (234707) to (234708).

Cross References

This section cited in 25 Pa. Code § 245.132 (relating to standards of performance); 25 Pa. Code § 245.304 (relating to investigation of suspected releases); 25 Pa. Code § 245.310 (relating to site characterization report); 25 Pa. Code § 245.435 (relating to reporting and recordkeeping); 25 Pa. Code § 245.516 (relating to recordkeeping requirements); 25 Pa. Code § 245.614 (relating to requirements for closure); and 25 Pa. Code § 977.34 (relating to claims reporting).

§ 245.306. Interim remedial actions.

(a) Upon confirming that a release has occurred in accordance with § 245.304 (relating to investigation of suspected releases) or after a release from a storage tank is identified in another manner, the responsible party shall immediately initiate the following interim remedial actions necessary to prevent or address an immediate threat to human health or the environment while initiating, as necessary, one or more of the tasks identified in § 245.309(c) (relating to site characterization):

(1) Remove the regulated substance from the storage tank to prevent further release to the environment.

(2) Identify, mitigate and continue to monitor and mitigate, fire, explosion and safety hazards posed by vapors and free product.

(3) Prevent further migration of the regulated substance released from the storage tank into the environment as follows:

(i) If contaminated soil exists at the site, the interim remedial action may include excavation of the soils for treatment or disposal.

(ii) If free product is present, free product recovery shall be initiated immediately.

(4) Identify and sample affected water supplies and water supplies with the potential to be affected in a reasonable and systematic manner consistent with § 245.309(b)(1) and (4) and (c)(4), (6) and (13). The responsible party shall restore or replace an affected or diminished water supply in accordance with § 245.307 (relating to affected or diminished water supplies). The responsible party shall provide a copy of the sample results to the water supply owner and the Department within 5 days of receipt of the sample results from the laboratory.

(b) At sites where free product recovery, regulated substance removal or contaminated soil excavation is performed, the responsible party shall:

(1) Conduct recovery, removal, storage, treatment and disposal activities in a manner that prevents the spread of contamination into previously uncontaminated areas.

(2) Handle flammable products in a safe and competent manner to prevent fires or explosions.

(3) Obtain required State and local permits or approvals for treatment and disposal activities.

(4) Minimize the amount of soil and subsurface material affected by a release of a regulated substance by segregating the unaffected soil and subsurface material from the material affected by a release of a regulated substance.

(c) If free product recovery affects or diminishes the quality or quantity of a water supply, the responsible party shall restore or replace the water supply in accordance with § 245.307.

(d) Where soil and subsurface material affected by a release is removed from the site, the person removing the material shall provide to the owner, operator, landowner or other responsible party a receipt documenting acceptance of the material at a permitted treatment or disposal facility.

Source

The provisions of this § 245.306 amended November 30, 2001, effective December 1, 2001, 31 Pa.B. 6615. Immediately preceding text appears at serial pages (234708) to (234709).

Cross References

This section cited in 25 Pa. Code § 245.309 (relating to site characterization); and 25 Pa. Code § 245.310 (relating to site characterization report).

§ 245.307. Affected or diminished water supplies.

(a) A responsible party who affects or diminishes a water supply as a result of a release shall restore or replace the affected or diminished supply with an alternate source of water adequate in quantity and quality for the purposes served by the supply, at no cost to the owner of the affected or diminished water supply.

(b) Where a responsible party restores or replaces an affected or diminished water supply by providing access to a public water system regulated under the Pennsylvania Safe Drinking Water Act (35 P. S. §§ 721.1—721.17), the responsible party will not be required to pay for the quantity of water supplied to the water supply user by the public water system.

(c) A temporary water supply shall be provided as soon as practicable but not later than 48 hours after one of the following:

(1) The responsible party receives information which establishes that the responsible party has affected or diminished the water supply.

(2) The responsible party is notified by the Department that the responsible party has affected or diminished the water supply.

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(d) A permanent water supply shall be provided within 90 days, or within an alternative time frame as determined by the Department, after one of the following:

(1) The responsible party receives information which establishes that the responsible party has affected or diminished the water supply.

(2) The responsible party is notified by the Department that the responsible party has affected or diminished the water supply.

Cross References

This section cited in 25 Pa. Code § 245.306 (relating to interim remedial actions); and 25 Pa. Code § 245.309 (relating to site characterization).

§ 245.308. Onsite storage of contaminated soil.

(a) Onsite storage of contaminated soil is prohibited unless performed as part of remedial action implemented in accordance with § 245.312 (relating to remedial action) or as provided for in subsection (b).

(b) Onsite storage of contaminated soil may be performed if the soil does not present a threat to human health, safety or the environment and one of the following applies:

(1) Soil excavation is necessary to perform a removal from service.

(2) Soil excavation is performed as part of an interim remedial action.

(c) Where excavated contaminated soil is stored onsite in accordance with subsection (b), the excavated soil shall be disposed of or active treatment of the excavated soil shall be initiated, within 90 days from the first day of storage or within an alternative time frame authorized by the Department in writing.

(d) If contaminated soil is stored onsite, the responsible party shall manage the soil in accordance with applicable sections of Chapter 299, Subchapter A (relating to standards for storage of residual waste) and other applicable Department regulations. In addition to the requirements in § 299.131(a) (relating to general requirements), contaminated soil piles shall be completely and securely covered, for the duration of the storage period, with an impermeable material of sufficient strength, thickness, anchoring or weighting to prevent tearing or lifting of the cover, infiltration of precipitation or surface water runon, and exposure of the soil to the atmosphere. In addition to the requirements in § 299.115(b) (relating to nuisance control), appropriate steps shall be taken to deter public access to the storage area. This may include fencing, similar barriers, security patrols or warning signs.

(e) The Department may require immediate removal of contaminated soil if the soil is not being properly stored or managed in accordance with subsection (c) or (d), or if the Department determines that storage poses a threat to human health, safety or the environment.

§ 245.309. Site characterization.

(a) Upon confirming that a reportable release has occurred in accordance with § 245.304 (relating to investigation of suspected releases) or after a reportable release from a storage tank is identified in another manner, the responsible party shall perform a site characterization.

(b) The objectives of a site characterization are to accomplish the following:

(1) Determine whether additional interim remedial actions are necessary to abate an imminent hazard to human health or the environment.

(2) Determine whether additional site characterization work is required upon completion of an interim remedial action.

(3) Determine or confirm the sources of contamination.

(4) Provide sufficient physical data, through field investigations, to determine the regulated substances involved, and the extent of migration of those regulated substances in surface water, groundwater, soil or sediment.

(5) Determine, from measurements at the site, values for input parameters including hydraulic conductivity, source dimensions, hydraulic gradient, water table fluctuation and fraction organic carbon necessary for fate and transport analysis.

(6) Provide sufficient information to select a remediation standard.

(7) Provide sufficient information to allow for completion of a remedial action plan or a design for remedial action.

(c) The responsible party shall conduct the site characterization activities necessary to satisfy the objectives established in subsection (b). The site characterization shall include the following tasks, as necessary, based on the nature, extent, type, volume or complexity of the release:

(1) Identifying the need for and initiating additional interim remedial actions.

(2) Opening and sampling storage tanks to determine the regulated substances stored in the tanks.

(3) Tightness testing or other release detection testing and monitoring to determine the structural integrity of the storage tank.

(4) Identify and sample affected water supplies and water supplies with the potential to be affected not previously identified or sampled under § 245.306(a)(4) (relating to interim remedial actions). The responsible party shall restore or replace an affected or diminished water supply in accordance with § 245.307 (relating to affected or diminished water supplies). The responsible party shall provide a copy of the sample results to the water supply owner and the Department within 5 days of receipt of the sample results from the laboratory.

(5) Determining the location of the ecological receptors identified in § 250.311(a) (relating to evaluation of ecological receptors).

(6) A review of the site history.

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(7) A review and analysis of data from removal from service and interim remedial action activities.

(8) Using geophysical survey techniques to locate storage tanks and to determine geologic and hydrogeologic characteristics of affected hydrogeologic zones and hydrogeologic zones with the potential to be affected.

(9) Drilling soil borings, conducting soil gas surveys and collecting soil samples to determine soil characteristics and the horizontal and vertical extent of soil contamination.

(10) Using piezometers, well points, monitoring wells and public and private wells to:

(i) Determine the direction of groundwater flow.

(ii) Determine soil, geologic, hydrogeologic and aquifer characteristics.

(iii) Measure the horizontal extent and thickness of free product.

(iv) Sample groundwater to determine the horizontal and vertical extent of groundwater contamination.

(11) A demonstration that groundwater is not used or currently planned to be used.

(12) Sampling surface water and sediments to determine the extent of surface water and sediment contamination.

(13) Assessing potential migration pathways, including sewer lines, utility lines, wells, geologic structures and hydrogeologic conditions.

(14) Performing site surveying and topographic mapping.

(15) Developing a conceptual site model that describes the sources of contamination, fate and transport of contaminants and potential receptors.

(16) Handling and disposing of site characterization wastes.

(17) Preparing and implementing a site-specific plan for the provision of the following:

(i) Worker health and safety in accordance with OSHA requirements established at 29 CFR 1910.120 (relating to hazardous waste operations and emergency response), including health and safety policies, medical monitoring, training and refresher courses, emergency and decontamination procedures, personal protective equipment and standard work practices.

(ii) The identification, management and disposition of solid, hazardous, residual and other wastes generated as part of the site characterization.

(iii) A quality assurance/quality control program for the performance of site characterization field activities and for the accurate collection, storage, retrieval, reduction, analysis and interpretation of site characterization data.

(18) An analysis of the data collected as a result of the site characterization.

(19) Selection of a remediation standard.

(20) If the site-specific standard is selected, performance of a risk assessment in accordance with Chapter 250, Subchapter F (relating to exposure and risk determinations).

(21) Recommendation of preferred remedial action options.

(22) Recommendation for further site characterization work.

(23) Developing a conceptual design of the selected remedial action options and identifying additional investigations or pilot studies needed to design and implement a detailed remedial action plan.

(24) Additional tasks necessary to characterize the site.

Source

The provisions of this § 245.309 amended November 30, 2001, effective December 1, 2001, 31 Pa.B. 6615. Immediately preceding text appears at serial pages (234711) to (234713).

Cross References

This section cited in 25 Pa. Code § 245.306 (relating to interim remedial actions); and 25 Pa. Code § 245.310 (relating to site characterization report).

§ 245.310. Site characterization report.

(a) The responsible party shall prepare and submit to the Department within 180 days of reporting a reportable release under § 245.305(a) (relating to reporting releases), or within an alternative time frame as determined by the Department, two copies of a site characterization report which describes the activities undertaken in accordance with § 245.309 (relating to site characterization). The site characterization report shall be complete and concisely organized and shall contain the following elements, as necessary, based on the nature, extent, type, volume or complexity of the release:

(1) A narrative description of the site and the historical and current operations conducted at the site.

(2) A site map showing location of buildings, roads, storage tanks, including those removed from service or closed in place, utilities, property boundaries, topographic contours, potential receptors and other information pertinent to the site characterization.

(3) A description of natural and manmade features pertinent to the site characterization.

(4) Details of interim remedial actions conducted at the site in accordance with § 245.306 (relating to interim remedial actions). These details shall include the following, as necessary:

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(i) A description of the type and volume of the regulated substance removed from the storage tank.

(ii) A discussion of fire, explosion and safety hazards which have been identified, mitigated and monitored.

(iii) A discussion of necessary relocation of affected residents.

(iv) Where free product recovery is performed:

(A) The regulated substance released and the thickness of free product in wells, boreholes or excavations.

(B) The type of free product recovery system used.

(C) Whether a discharge has or will take place during the recovery operation and where this discharge is or will be located.

(D) The type of treatment applied to, and the effluent quality expected from, a discharge.

(E) The steps that have been or are being taken to obtain necessary permits or approvals for a discharge.

(F) The volume and disposition of the recovered free product.

(G) The date free product recovery was initiated.

(H) The date free product recovery was completed.

(v) Where excavation of contaminated soil is performed:

(A) The regulated substance released and actual volume of soil excavated.

(B) The method used to determine the existence and extent of contaminated soil.

(C) The treatment method or disposition of the excavated soil, including receipts documenting acceptance of the material at a permitted treatment or disposal facility.

(D) The date excavation was initiated.

(E) The date excavation was completed.

(F) The rationale for terminating soil excavation where the contaminated soil has not been excavated, including the volume of contaminated soil remaining in place, and a description of what steps will be taken to address the soils that remain unexcavated.

(5) The steps that have been or are being taken to restore or replace affected or diminished water supplies.

(6) A description of the type and characteristics of regulated substances involved, including quantities, physical state, concentrations, toxicity, propensity to bioaccumulate, persistence and mobility.

(7) The results of tightness testing or other release detection method used or conducted to determine the structural integrity of the storage tanks.

(8) The details of removal from service activities conducted at the site.

(9) The identification of the sources of contamination, including the actual or estimated date and quantity of release from each source.

(10) The location and description of affected water supplies and water supplies with the potential to be affected.

(11) A description of further site characterization work needed.

(12) A discussion and conclusions that demonstrate the site characterization objectives outlined in § 245.309(b) have been satisfied.

(13) The rationale, equipment, methodology and results of geophysical surveys.

(14) The location, rationale and logs of soil borings.

(15) The location, rationale, construction details, including methods and materials, and depth to groundwater of piezometers, well points and monitoring wells.

(16) Groundwater contour maps depicting groundwater flow direction at the site.

(17) A description of methods and equipment used to determine site-specific soil, geologic, hydrogeologic and aquifer properties.

(18) Sampling locations and rationale for selection of these locations.

(19) The results of a survey used to identify and sample public and private wells.

(20) Parameters analyzed for, analytical methods used and detection limits of these methods.

(21) Field and laboratory analytical results and interpretations.

(22) Contaminant distribution maps in the media and contaminant phases.

(23) A conceptual site model describing the sources of contamination, fate and transport of contaminants and potential receptors.

(24) The disposition of site characterization wastes.

(25) A copy of site-specific plans prepared and implemented for the provision of the following:

(i) Worker health and safety in accordance with OSHA requirements established at 29 CFR 1910.120 (relating to hazardous waste operations and emergency response), including health and safety policies, medical monitoring, training and refresher courses, emergency and decontamination procedures, personal protective equipment and standard work practices.

(ii) The identification, management and disposition of solid, hazardous, residual and other wastes generated as part of the site characterization.

(iii) A quality assurance/quality control program for the performance of site characterization field activities and for the accurate collection, storage, retrieval, reduction, analysis and interpretation of site characterization data.

(26) The identification of the remediation standard which has or will be attained at the site.

(27) The Department's written determination that groundwater is not used or currently planned to be used.

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(28) The impacts to ecological receptors as a result of the evaluation conducted in accordance with § 250.311 or § 250.402(d) (relating to evaluation of ecological receptors; and human health and environmental protection goals).

(29) The impacts to surface water as a result of the evaluation conducted in accordance with § 250.309 or § 250.406 (relating to MSCs for surface water; and relationship to surface water quality requirements).

(30) A discussion of the remedial action options selected to remediate the site.

(31) A risk assessment report in accordance with § 250.409 (relating to risk assessment report).

(32) A demonstration that no current or future exposure pathways exist following the procedures described in § 250.404 (relating to pathway identification and elimination).

(33) A conceptual design of the remedial action options selected.

(34) A report of additional tasks performed to characterize the site.

(b) If the responsible party determines, after completion of interim remedial actions, that further site characterization is not required, that soil is the only media of concern, and that interim remedial actions have remediated the site, the responsible party may submit a site characterization report to the Department, in lieu of the report required in subsection (a), which contains the following:

(1) A concise statement that describes the release, including information such as the amount of regulated substance that was released, the extent of contamination and interim remedial actions taken under § 245.306.

(2) Data demonstrating that the interim remedial actions have attained the Statewide health standard for the site in accordance with Chapter 250, Subchapter G (relating to demonstration of attainment).

(3) The basis for selection of the residential or nonresidential Statewide health standard.

(4) The results of the evaluation of ecological receptors conducted in accordance with § 250.311.

(5) Additional information as identified in subsection (a) necessary to fully describe the release, the extent of contamination and the interim remedial actions taken to address the release.

(c) Following submission of a complete site characterization report prepared under subsection (a), selecting the site-specific standard, or subsection (b), the Department will do one or more of the following:

(1) Review and approve the site characterization report as submitted.

(2) Review and approve the site characterization report with modifications made by the Department.

(3) Review and disapprove the site characterization report, citing deficiencies.

(4) Review and disapprove the site characterization report and direct, require or order the responsible party to perform other tasks or make modifications as prescribed by the Department.

(5) Review and disapprove the site characterization report, perform the site characterization in whole or in part and recover, in accordance with § 245.303(b) (relating to general requirements), the Department's costs and expenses involved in performing the site characterization.

(6) Review the site characterization report without further action.

(d) The Department will take one or more of the actions listed in subsection (c) within 60 days of receipt of a site characterization report meeting the requirements of subsection (b) or within 90 days of receipt of a site characterization report selecting the site-specific standard. If the Department does not respond, in writing, within the allotted time, the report shall be deemed approved, unless the responsible party and the Department agree, in writing, to an alternative time frame.

Source

The provisions of this § 245.310 amended November 30, 2001, effective December 1, 2001, 31 Pa.B. 6615. Immediately preceding text appears at serial pages (234713) to (234717).

Cross References

This section cited in 25 Pa. Code § 245.311 (relating to remedial action plans); and 25 Pa. Code § 245.435 (relating to reporting and recordkeeping).

§ 245.311. Remedial action plan.

(a) Unless a site characterization report is submitted in accordance with § 245.310(b) (relating to site characterization report), the responsible party shall prepare and submit to the Department within 45 days of submission of a site characterization report required by § 245.310(a) selecting the background or Statewide health standard, within 45 days of deemed approval or receipt of a written approval of a site characterization report selecting the site-specific standard or within an alternative time frame as determined by the Department, two copies of a remedial action plan prior to implementation of the remedial action plan. The remedial action plan shall be complete and concisely organized and shall contain the following elements, as necessary, based on the nature, extent, type, volume or complexity of the release:

(1) A brief summary of the site characterization report conclusions.

(2) A copy of the plans relating to worker health and safety, management of wastes generated and quality assurance/quality control procedures, as they relate to the remedial action, if different from the plans submitted in accordance with § 245.310(a)(27).

(3) A list of required Federal, State and local permits or approvals to conduct the remedial action.

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(4) A discussion of how the remedial action will attain the selected remediation standard for the site.

(5) The results of treatability, bench scale or pilot scale studies or other data collected to support the remedial action.

(6) Design and construction details for the remedial action, including expected effectiveness.

(7) Operation and maintenance details for the remedial action, including:

(i) A schedule including initiation and completion dates for all elements of the remedial action plan.

(ii) The expected concentrations and quantities of regulated substances in any discharge.

(iii) The disposition of the discharge.

(iv) A schedule for monitoring, sampling and site inspections.

(8) A site map showing the location of buildings, roads, property boundaries, remedial equipment locations and other information pertinent to the remedial action.

(9) A description of the media and parameters to be monitored or sampled during the remedial action.

(10) A description of the analytical methods to be utilized and an appropriate reference for each.

(11) A description of the methodology that will be utilized to demonstrate attainment of the selected remediation standard.

(12) A description of proposed postremediation care requirements.

(13) A description of additional items necessary to develop the remedial action plan.

(b) Following submission of a complete remedial action plan selecting the background or Statewide health standard, the Department will do one or more of the following:

(1) Review and approve the site characterization report and remedial action plan as submitted.

(2) Review and approve the site characterization report and remedial action plan with modifications made by the Department.

(3) Review and disapprove the site characterization report and remedial action plan, citing deficiencies.

(4) Review and disapprove the site characterization report and remedial action plan and direct, require or order the responsible party to perform other tasks or make modifications as prescribed by the Department.

(5) Review and disapprove the site characterization report and remedial action plan, prepare a remedial action plan or perform the remedial action in whole or in part, and recover, in accordance with § 245.303(b) (relating to general requirements), the Department's costs and expenses involved in preparing the remedial action plan or performing the remedial action.

(6) Review the site characterization report and remedial action plan without further action.

(c) Following submission of a complete remedial action plan selecting the site-specific standard, the Department will do one or more of the following:

(1) Review and approve the remedial action plan as submitted.

(2) Review and approve the remedial action plan with modifications made by the Department.

(3) Review and disapprove the remedial action plan, citing deficiencies.

(4) Review and disapprove the remedial action plan and direct, require or order the responsible party to perform other tasks or make modifications as prescribed by the Department.

(5) Review and disapprove the remedial action plan, prepare a remedial action plan or perform the remedial action in whole or in part, and recover, in accordance with § 245.303(b), the Department's costs and expenses involved in preparing or performing the remedial action plan.

(6) Review the remedial action plan without further action.

(d) A remedial action plan is not required and no remedy is required if the site-specific standard is chosen and no current or future exposure pathways exist.

(e) The Department will take one or more of the actions listed in subsection (b) within 60 days of receipt of a remedial action plan to attain the background or Statewide health standard, or the Department will take one or more of the actions listed in subsection (c) within 90 days of receipt of a remedial action plan to attain the site-specific standard. If the Department does not respond, in writing, within the allotted time, the report and plan or plan shall be deemed approved, unless the responsible party and the Department agree, in writing, to an alternative time frame.

(f) If the site characterization report and remedial action plan are submitted to the Department at the same time, the Department will take one or more of the actions listed in subsection (b) within 60 days of receipt of a report and plan to attain the background or Statewide health standard, or the Department will take one or more of the actions listed in subsection (c) within 90 days of receipt of a report and plan to attain the site-specific standard. If the Department does not respond, in writing, within the allotted time, the report and plan shall be deemed approved, unless the responsible party and the Department agree, in writing, to an alternative time frame.

Source

The provisions of this § 245.311 amended November 30, 2001, effective December 1, 2001, 31 Pa.B. 6615. Immediately preceding text appears at serial pages (234717) to (234718).

Cross References

This section cited in 25 Pa. Code § 245.312 (relating to remedial action); and 25 Pa. Code § 245.435 (relating to reporting and recordkeeping).

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§ 245.312. Remedial action.

(a) Upon reasonable notice by the Department to the responsible party, or upon approval of the remedial action plan by the Department, the responsible party shall implement the remedial action plan, or a portion of the remedial action plan, according to the schedule contained therein.

(b) During implementation of the remedial action plan, remedial action progress reports shall be submitted to the Department quarterly or at an alternative interval as determined by the Department.

(c) Each remedial action progress report shall provide the data generated during the reporting period and shall show the progress to date toward attainment of the selected remediation standard. Each report shall be complete and concisely organized and shall contain the following elements, as necessary, based on the nature, extent, type, volume or complexity of the release:

(1) A summary of site operations and remedial progress made during the reporting period.

(2) Data collected from monitoring and recovery wells showing depth to groundwater and thickness and horizontal extent of free product.

(3) Groundwater contour maps depicting groundwater flow direction.

(4) Quantitative analytical results from groundwater, surface water, soil and sediment sampling.

(5) Maps for all media and all phases at specified times that indicate the distribution of concentrations of regulated substances.

(6) For fate and transport analyses, the following information, in addition to that required by § 250.204(f)(5) (relating to final report):

(i) An isoconcentration map showing the configuration and concentrations of contaminants within the plume being analyzed.

(ii) Sufficient information from monitoring data to establish whether the plume is stable, shrinking or expanding.

(iii) Input parameters for the analysis and the rationale for their selection.

(iv) Figures showing the orientation of the model or analysis to the field data.

(v) Comparison and analysis of the model or mathematical output to the actual field data.

(7) Reporting period and cumulative amounts of free product recovered, groundwater treated, and soil and sediment treated or disposed.

(8) Treatment and disposal documentation for waste generated during the reporting period.

(9) Demonstration that required Federal, State and local permits and approvals are being complied with.

(10) A report of additional items necessary to describe the progress of the remedial action.

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(d) The first remedial action progress report shall be received by the Department 3 months following the date of remedial action plan implementation. The final remedial action progress report shall be submitted to the Department as part of the remedial action completion report.

(e) If during implementation of the remedial action plan the responsible party decides to change the remedial action plan, the responsible party shall prepare and submit, to the Department, a new or modified remedial action plan, to include selection of the new remediation standard, if applicable, in accordance with § 245.311 (relating to remedial action plan).

(f) If during implementation of the remedial action plan the responsible party determines that continued implementation of the remedial action plan will cause additional environmental harm, the responsible party shall suspend remedial action and notify the Department, by telephone, within 24 hours of suspension. The responsible party shall prepare and submit a new or modified remedial action plan, to include selection of the new remediation standard, if applicable, to the Department in accordance with § 245.311.

Source

The provisions of this § 245.312 amended November 30, 2001, effective December 1, 2001, 31 Pa.B. 6615. Immediately preceding text appears at serial pages (234718) to (234720).

Cross References

This section cited in 25 Pa. Code § 245.308 (relating to onsite storage of contaminated soil); and 25 Pa. Code § 245.435 (relating to reporting and recordkeeping).

§ 245.313. Remedial action completion report.

(a) When the selected remediation standard has been attained, the responsible party shall submit a remedial action completion report to the Department.

(b) The remedial action completion report shall be complete and concisely organized and shall contain the following elements, as necessary, based on the remediation standard attained:

(1) When the background standard has been attained, the remedial action completion report shall include the requirements of § 250.204(f) and (g) (relating to final report).

(2) When the Statewide health standard has been attained, the remedial action completion report shall include the requirements of § 250.312(b)—(h) (relating to final report).

(3) When the site-specific standard is attained, the remedial action completion report shall include the requirements of § 250.411(c)—(f) (relating to final report).

(4) For fate and transport analyses, the following information, in addition to that required by § 250.204(f)(5):

(i) An isoconcentration map showing the configuration and concentrations of contaminants within the plume being analyzed.

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(ii) Sufficient information from monitoring data to establish whether the plume is stable, shrinking or expanding.

(iii) Input parameters for the analysis and the rationale for their selection.

(iv) Figures showing the orientation of the model or analysis to the field data.

(v) Comparison and analysis of the model or mathematical output to the actual field data.

(c) Following submission of the remedial action completion report, the Department will do one or more of the following:

(1) Review and approve the remedial action completion report as submitted.

(2) Review and approve the remedial action completion report with modifications made by the Department.

(3) Review and disapprove the remedial action completion report, citing deficiencies.

(4) Review and disapprove the remedial action completion report and direct, require or order the responsible party to perform other tasks or make modifications as prescribed by the Department.

(5) Review and disapprove the remedial action completion report, perform the site characterization or remedial action and recover, in accordance with § 245.303(b) (relating to general requirements), the Department's costs and expenses involved in preparing the remedial action completion report.

(6) Review the remedial action completion report without further action.

(d) The Department will take one or more of the actions listed in subsection (c) within 60 days of receipt of the remedial action completion report demonstrating attainment of the background or Statewide health standard, or within 90 days of receipt of a remedial action completion report demonstrating attainment of the site-specific standard. If the Department does not respond, in writing, within the allotted time, the report shall be deemed approved, unless the responsible party and the Department agree, in writing, to an alternative time frame.

Source

The provisions of this § 245.313 amended November 30, 2001, effective December 1, 2001, 31 Pa.B. 6615. Immediately preceding text appears at serial pages (234720) to (234721).

Cross References

This section cited in 25 Pa. Code § 245.435 (relating to reporting and recordkeeping).

§ 245.314. Professional seals.

Reports submitted to satisfy this subchapter containing information or analysis that constitutes professional geologic or engineering work as defined by the Engineer, Land Surveyor and Geologist Registration Law (63 P. S. §§ 148—

158.2) shall be sealed by a professional geologist or engineer who is in compliance with the requirements of that statute.

Source

The provisions of this § 245.314 adopted November 30, 2001, effective December 1, 2001, 31 Pa.B. 6615.

Subchapter E. TECHNICAL STANDARDS FOR UNDERGROUND STORAGE TANKS

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Source

The provisions of this Chapter 245 adopted October 10, 1997, effective October 11, 1997, 27 Pa.B. 5341, unless otherwise noted.

Cross References

This subchapter cited in 25 Pa. Code § 245.1 (relating to definitions); 25 Pa. Code § 245.212 (relating to minimum requirements for obtaining a permit-by-rule); 25 Pa. Code § 245.222 (relating to application requirements); and 25 Pa. Code § 245.232 (relating to general requirements).

GENERAL

§ 245.401. Purpose.

This subchapter establishes the operational and technical requirements for underground storage tanks and underground storage tank facilities.

§ 245.402. Scope.

This subchapter applies to underground storage tanks regulated under the act and this chapter.

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§ 245.403. Applicability.

(a) *General.* The requirements of this subchapter apply to owners and operators, as well as installers and inspectors of underground storage tank systems as defined in § 245.1 (relating to definitions), except as otherwise provided in subsection (b).

(b) *Deferrals.* Sections 245.441—245.446 (relating to release detection) do not apply to an underground storage tank system that stores fuel solely for use by emergency power generators.

§ 245.404. Variances.

When unique or peculiar circumstances make compliance with this subchapter technically infeasible or unsafe, the Department may, upon written application from the owner/operator of a storage tank system subject to this subchapter, grant a variance from one or more specific provisions of this subchapter:

(1) A variance may only be granted when the storage tank system meets alternative technical standards that fully protect human health and the environment.

(2) A written application for a variance shall be submitted to the Department and provide the following information:

(i) The facility name and identification number for which the variance is sought.

(ii) The specific sections of this subchapter from which a variance is sought.

(iii) The unique or peculiar conditions which make compliance with the sections identified in subparagraph (ii) technically infeasible or unsafe.

(iv) Evidence, including plans, specifications and test results, which supports an alternative design, practice, schedule or method as being no less protective of human health and the environment than the requirements of the sections identified in subparagraph (ii).

(3) When granting the variance, the Department may impose specific conditions necessary to ensure the adequate protection of human health and the environment.

(4) The Department will provide to the applicant a written notice of approval, approval with additional conditions or denial. Granted variances will be published in the *Pennsylvania Bulletin.*

(5) The Department may not grant any variance which would result in regulatory controls less stringent than other applicable Federal or State regulations.

§ 245.405. Codes and standards.

All regulated underground storage tank systems shall comply with applicable industry codes. By policy, the Department can recognize industry codes and

practices which can be used to comply with this chapter. A list of industry codes and practices which may be used to comply with this subchapter may be obtained from the Department.

FACILITY INSPECTIONS

§ 245.411. Inspection frequency.

(a) *Inspection of tanks.* Underground storage tank owners or operators shall have their underground storage tank facility inspected by a certified inspector at the frequency established in subsections (b)—(d). The inspection shall include, but not be limited to, leak detection, assessment of the underground tank system and ancillary equipment, and release prevention measures.

(b) *Initial inspections.*

(1) Tank facilities with tank systems installed prior to December 1989, shall be inspected prior to October 11, 1999, whichever date is later.

(2) Tank systems installed after October 11, 1997, shall be inspected within 12 months of installation. If the facility ownership changes, an inspection of the facility shall be completed within the first 12 months of operation.

(3) Tank facilities not inspected in accordance with paragraph (1) or (2) shall have an initial inspection by October 11, 2002.

(c) *Subsequent facility inspections.*

(1) Subsequent facility inspections shall be conducted at least once every 5 years commencing after the last inspection, except as provided in paragraph (2).

(2) Facilities with total secondary containment of both piping and the tank shall be inspected at least once every 10 years commencing from the date of the last inspection.

(d) *Additional inspections.* Inspections in addition to those in subsections (b) and (c) may be requested in writing by the Department when the Department determines the inspections are necessary to verify compliance with this subchapter.

UNDERGROUND STORAGE TANK SYSTEMS: DESIGN, CONSTRUCTION, INSTALLATION AND NOTIFICATION

§ 245.421. Performance standards for new underground storage tank systems.

To prevent releases due to structural failure, corrosion or spills and overfills for as long as the underground storage tank system is used to store regulated substances, owners and operators of new underground storage tank systems shall ensure that the system meets the following requirements:

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(1) *Tanks.* A tank shall be properly designed and constructed. A tank or portion of a tank that is underground and routinely contains product shall be protected from corrosion in accordance with a code of practice developed by a Nationally recognized association or independent testing laboratory, using one of the following methods:

(i) The tank is constructed of fiberglass-reinforced plastic.

(ii) The tank is constructed of steel and cathodically protected in the following manner:

(A) The tank is coated with a suitable dielectric material.

(B) Field-installed cathodic protection systems are designed by a corrosion expert.

(C) Impressed current systems are designed to allow determination of current operating status as required in § 245.432(3) (relating to operation and maintenance including corrosion protection).

(D) Cathodic protection systems are operated and maintained in accordance with § 245.432.

(iii) The tank is constructed of a steel-fiberglass-reinforced-plastic composite.

(iv) The tank is constructed of metal without additional corrosion protection measures if:

(A) The tank is installed at a site that is determined by a corrosion expert not to be corrosive enough to cause it to have a release due to corrosion during its operating life.

(B) Owners and operators maintain records that demonstrate compliance with clause (A) for the remaining life of the tank.

(2) *Piping.* The piping that routinely contains regulated substances shall be protected from deterioration. Piping that is in contact with the ground shall be properly designed, constructed and protected from corrosion in accordance with a code of practice developed by a Nationally recognized association or independent testing laboratory using one of the following methods:

(i) The piping is constructed of fiberglass reinforced plastic or other noncorrodible material.

(ii) The piping is constructed of steel and cathodically protected in the following manner:

(A) The piping is coated with a suitable dielectric material.

(B) Field-installed cathodic protection systems are designed by a corrosion expert.

(C) Impressed current systems are designed to allow determination of current operating status as required in § 245.432(3).

(D) Cathodic protection systems are operated and maintained in accordance with § 245.432.

(iii) The piping is constructed of metal without additional corrosion protection measures if:

(A) The piping is installed at a site that is determined by a corrosion expert to not be corrosive enough to cause it to have a release due to corrosion during its operating life.

(B) Owners and operators maintain records that demonstrate compliance with clause (A) for the remaining life of the piping.

(3) *Spill and overfill prevention equipment.*

(i) Except as provided in subparagraph (iii), to prevent spilling and overfilling associated with product transfer to the underground storage tank system, owners and operators shall ensure that their systems have the following spill and overfill prevention equipment:

(A) Spill prevention equipment that will prevent release of product to the environment when the transfer hose is detached from the fill pipe—for example, a spill catchment basin.

(B) Overfill prevention equipment that will do one or more of the following:

(I) Automatically shut off flow into the tank when the tank is no more than 95% full.

(II) Alert the transfer operator when the tank is no more more than 90% full by restricting the flow into the tank or triggering a high-level alarm.

(III) Restrict flow 30 minutes prior to overfilling, alert the operator with a high level alarm 1 minute before overfilling, or automatically shut off flow into the tank so that none of the fittings located on top of the tank are exposed to product due to overfilling.

(ii) Bypassing overfill protection is prohibited for example, bypassing the flow vent valve with coax vapor recovery or a spill bucket drain valve is prohibited.

(iii) Owners and operators are not required to use the spill and overfill prevention equipment specified in subparagraph (i) if the underground storage tank system is filled by transfers of no more than 25 gallons at one time.

(4) *Installation.* Tanks and piping shall be properly installed and system integrity tested in accordance with a code of practice developed by a Nationally recognized association or independent testing laboratory such as API 1615 and PEI RP100, and in accordance with the manufacturer's instructions.

(5) *Certification of installation.* Owners and operators shall ensure that a certified installer has installed the tank system by providing a certification of compliance on an appropriate form provided by the Department.

Cross References

This section cited in 25 Pa. Code § 245.422 (relating to upgrading of existing underground storage tank systems); 25 Pa. Code § 245.423 (relating to registration requirements); 25 Pa. Code § 245.425 (relating to reuse of removed tanks); 25 Pa. Code § 245.435 (relating to reporting and recordkeeping); 25 Pa. Code § 245.442 (relating to requirements for petroleum underground storage tank systems); and 25 Pa. Code § 245.451 (relating to temporary closure).

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§ 245.422. Upgrading of existing underground storage tank systems.

(a) *Alternatives allowed.* By December 22, 1998, existing underground storage tank systems shall comply with one of the following requirements:

(1) New underground storage tank system performance standards under § 245.421 (relating to performance standards for new underground storage tank systems).

(2) The upgrading requirements in subsections (b)—(d).

(3) Closure requirements under §§ 245.451—245.455 (relating to out-of-service underground storage tank systems and closure), including applicable requirements for corrective action under Subchapter D (relating to corrective action process for owners and operators of storage tanks and storage tank facilities and other responsible parties).

(b) *Tank upgrading requirements.* Steel tanks shall be upgraded to meet one of the following requirements in accordance with a code of practice developed by a Nationally recognized association or independent testing laboratory:

(1) *Interior lining.* A tank may be upgraded by internal lining if the following conditions are met:

(i) The lining is installed in accordance with § 245.434 (relating to repairs allowed).

(ii) Within 10 years after lining, and every 5 years thereafter, the lined tank is internally inspected and found to be structurally sound with the lining still performing in accordance with original design specifications.

(2) *Cathodic protection.* A tank may be upgraded by cathodic protection if the cathodic protection system meets the requirements of § 245.421(1)(ii)(B)—(D) and the integrity of the tank is ensured using one or more of the following methods:

(i) The tank is internally inspected and assessed to ensure that the tank is structurally sound and free of corrosion holes prior to installing the cathodic protection system.

(ii) The tank has been installed for less than 10 years and is monitored monthly for releases in accordance with § 245.444(4)—(9) (relating to methods of release detection for tanks).

(iii) The tank has been installed for less than 10 years and is assessed for corrosion holes by conducting two tightness tests that meet the requirements of § 245.444(3). The first tightness test shall be conducted prior to installing the cathodic protection system. The second tightness test shall be conducted between 3 and 6 months following the first operation of the cathodic protection system.

(iv) The tank is installed at a site that is determined by a corrosion expert not to be corrosive enough to cause it to have a release due to corro-

sion during its operating life. Owners and operators shall maintain records that demonstrate compliance with this requirement for the remaining life of the tank.

(v) The tank is assessed for corrosion holes by a method that is determined by the Department to prevent releases in a manner that is no less protective of human health and the environment than subparagraphs (i)—(iii).

(3) *Internal lining combined with cathodic protection.* A tank may be upgraded by both internal lining and cathodic protection if the following apply:

(i) The lining is installed in accordance with the requirements of § 245.434.

(ii) The cathodic protection system meets § 245.421(1)(ii)(B)—(D).

(c) *Piping upgrading requirements.* Metal piping and fittings that routinely contain regulated substances and are in contact with the ground shall be one or more of the following:

(1) Replaced with piping meeting the requirements of new piping in § 245.421(2)(i) and (ii).

(2) Cathodically protected in accordance with a code of practice developed by a Nationally recognized association or independent testing laboratory and meets the requirements of § 245.421(2)(ii)(B)—(D).

(3) Installed at a site that is determined to not be corrosive enough to cause a release due to corrosion for the remaining operating life of the piping under § 245.421(2)(iii).

(d) *Spill and overfill prevention equipment.* To prevent spilling and overfilling associated with product transfer to the underground storage tank system, existing underground storage tank systems shall comply with new underground storage tank system spill and overfill prevention equipment requirements in § 245.421(3).

Cross References

This section cited in 25 Pa. Code § 245.31 (relating to underground storage tank tightness testing requirements); 25 Pa. Code § 245.425 (relating to reuse of removed tanks); 25 Pa. Code § 245.442 (relating to requirements for petroleum underground storage tank systems); and 25 Pa. Code § 245.451 (relating to temporary closure).

§ 245.423. Registration requirements.

(a) An underground storage tank shall be registered with the Department prior to adding a regulated substance. The owner of a tank that was in use after May 8, 1986, shall have notified the Department of the system's existence.

(b) Owners required to submit notices under subsection (a) shall provide notices to the Department for each tank they own. Owners may provide notice for several tanks using one registration form, but owners who own tanks located at more than one facility shall file a separate registration form for each separate facility.

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(c) Notices required to be submitted under subsection (a) shall provide all of the requested information on the registration form for each tank for which notice is required to be given.

(d) Owners and operators of new underground storage tank systems shall certify compliance with the following requirements in the registration form provided by the Department:

(1) Installation of tanks and piping under § 245.421(5) (relating to performance standards for new underground storage tank systems).

(2) Cathodic protection of steel tanks and piping under § 245.421(1) and (2).

(3) Financial responsibility under Subchapter H (relating to financial responsibility requirements for owners and operators of underground storage tanks and storage tank facilities).

(4) Release detection under §§ 245.442 and 245.443 (relating to requirements for petroleum underground storage tank systems; and requirements for hazardous substance underground storage tank systems).

(5) Use of a Department certified installer under § 245.21 (relating to tank handling and inspection requirements).

(e) Beginning October 24, 1988, a person who sells a tank intended to be used as an underground storage tank or a property containing an existing tank system shall notify the purchaser, in writing, of an owner's obligations under subsection (a). The following form may be used to comply with this requirement:

> Federal law (the Resource Conservation and Recovery Act) and Commonwealth law (the Storage Tank and Spill Prevention Act) require that the owner of a regulated underground storage tank notify the Pennsylvania Department of Environmental Protection of the existence of its tank.
>
> Notification for tanks brought into service after August 5, 1989, must be made prior to placing the tank system into service. Consult EPA 40 CFR Part 280 and PA Code Title 25 Chapter 245 to determine if you are affected by these laws.

(f) Every owner, including a new owner of an existing tank system, shall complete an amended registration form, provided by the Department, when one or more of the following conditions occur:

(1) Change of tank ownership—new owner only.

(2) Installation of a new tank.

(3) Closure of a tank system or component.

(4) Change in tank system service such as, but not limited to, temporary closure or change to an unregulated substance.

Cross References

This section cited in 25 Pa. Code § 245.435 (relating to reporting and recordkeeping).

§ 245.424. Standards for new field constructed tank systems.

Field constructed tanks shall meet or exceed the technical requirements of a manufactured tank containing the same regulated substance. The system shall also:

(1) Be designed by a professional engineer having training and experience in the construction of underground storage tank systems.

(2) Meet the permitting requirements of Subchapter C (relating to permitting of underground and aboveground storage tank systems and facilities).

§ 245.425. Reuse of removed tanks.

A storage tank removed from the ground may be reused as a regulated underground storage tank under the following circumstances:

(1) The tank is installed by a certified installer.

(2) The tank has been properly closed in accordance with § 245.452 (relating to permanent closure and changes-in-service).

(3) The installation meets the requirements of § 245.422 (relating to the upgrading of existing underground storage tank systems).

(4) The tank is compatible with the substance to be stored in accordance with §§ 245.2(c) and 245.433 (relating to general; and compatibility).

(5) Either the manufacturer, a person certified by the manufacturer or a registered professional engineer warrants that the tank meets the requirements of § 245.421(1) (relating to performance standards for new underground storage tank systems).

GENERAL OPERATING REQUIREMENTS

§ 245.431. Spill and overfill control.

(a) Owners and operators shall ensure that releases due to spilling or overfilling do not occur. The owner and operator shall ensure that the volume available in the tank is greater than the volume of product to be transferred to the tank before the transfer is made and that the transfer operation is monitored constantly to prevent overfilling and spilling.

(b) The owner and operator shall report, investigate and clean up spills and overfills in accordance with Subchapter D (relating to corrective action process for owners and operators of storage tanks and storage tank facilities and other responsible parties).

§ 245.432. Operation and maintenance including corrosion protection.

Owners and operators of steel underground storage tank systems with corrosion protection shall comply with the following requirements to ensure that releases

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due to corrosion are prevented for as long as the underground storage tank system is used to store regulated substances:

(1) Corrosion protection systems shall be operated and maintained to continuously provide corrosion protection to the metal components of that portion of the tank and piping that routinely contain regulated substances.

(2) Underground storage tank systems equipped with cathodic protection systems shall be inspected for proper operation by a qualified cathodic protection tester in accordance with the following requirements:

(i) *Frequency.* Cathodic protection systems shall be tested within 6 months of installation and at least every 3 years thereafter.

(ii) *Inspection criteria.* The criteria that are used to determine that cathodic protection is adequate as required by this section shall be in accordance with a code of practice developed by a Nationally recognized association.

(3) Underground storage tank systems with impressed current cathodic protection systems shall be inspected every 60 days to ensure the equipment is running properly.

(4) For underground storage tank systems using cathodic protection, records of the operation of the cathodic protection shall be maintained, in accordance with § 245.435 (relating to reporting and recordkeeping) to demonstrate compliance with the performance standards in this section. These records shall provide the following:

(i) The results of the last three inspections required in paragraph (3).

(ii) The results of testing from the last two inspections required in paragraph (2).

(5) Monitoring and observation wells shall be clearly identified using industry codes and standards, and caps shall be secured to prevent unauthorized or accidental access.

(6) Line leak detectors, sumps, measuring devices (including gauge sticks), gauges, corrosion protection, spill prevention, overfill prevention and other appurtenances whose failure could contribute to a release of product, shall be maintained in a good state of repair and shall function as designed.

Cross References

This section cited in 25 Pa. Code § 245.421 (relating to performance standards for new underground storage tank systems); 25 Pa. Code § 245.434 (relating to repairs allowed); 25 Pa. Code § 245.435 (relating to reporting and recordkeeping); 25 Pa. Code § 245.444 (relating to methods of release detection for tanks); and 25 Pa. Code § 245.451 (relating to temporary closure).

§ 245.433. Compatibility.

Owners and operators shall use an underground storage tank system, made of or lined with materials, that is compatible with the substance stored in the underground storage tank system. Owners and operators storing alcohol blends may use the following codes to comply with the requirements of this section:

(1) American Petroleum Institute Publication 1626, ''Storing and Handling Ethanol and Gasoline-Ethanol Blends at Distribution Terminals and Service Stations.''

(2) American Petroleum Institute Publication 1627, ''Storage and Handling of Gasoline-Methanol/Cosolvent Blends at Distribution Terminals and Service Stations.''

Cross References

This section cited in 25 Pa. Code § 245.425 (relating to reuse of removed tanks).

§ 245.434. Repairs allowed.

Owners and operators of underground storage tank systems shall ensure that repairs will prevent releases due to structural failure or corrosion as long as the underground storage tank system is used to store regulated substances. The repairs shall meet the following requirements:

(1) Repairs involving a tank handling activity shall be performed by or under the direct, onsite supervision and control of a certified installer.

(2) Repairs to underground storage tank systems shall be properly conducted in accordance with a code of practice developed by a Nationally recognized association or an independent testing laboratory.

(3) Repairs to fiberglass reinforced plastic tanks may be made by the manufacturer's authorized representatives, and shall be made in accordance with a code of practice developed by a Nationally recognized association or an independent testing laboratory.

(4) Metal pipe sections and fittings that have released product as a result of corrosion or other damage shall be replaced. Fiberglass pipes and fittings may be repaired; repairs shall be made in accordance with the manufacturer's specifications.

(5) Tanks and piping repaired in response to a release shall be tightness tested in accordance with §§ 245.444(3) and 245.445(2) (relating to methods of release detection for tanks; and methods of release detection for piping) prior to placing the system back into service except as provided as follows:

(i) The repaired tank is internally inspected in accordance with a code of practice developed by a Nationally recognized association or an independent testing laboratory.

(ii) The repaired portion of the underground storage tank system is monitored monthly for releases in accordance with a method specified in § 245.444(4)—(9).

(iii) Another test method is used that is determined by the Department to be at least as protective of human health and the environment as those listed in subparagraphs (i) and (ii).

(6) Within 6 months following the repair of a cathodically protected underground storage tank system, the cathodic protection system shall be tested in

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accordance with § 245.432(2) and (3) (relating to operation and maintenance including corrosion protection) to ensure that it is operating properly.

(7) Underground storage tank system owners and operators shall maintain records of each repair in response to a release for the remaining operating life of the underground storage tank system that demonstrate compliance with this section.

Cross References

This section cited in 25 Pa. Code § 245.31 (relating to underground storage tank tightness testing requirements); 25 Pa. Code § 245.422 (relating to upgrading of existing underground storage tank systems); and 25 Pa. Code § 245.435 (relating to reporting and recordkeeping).

§ 245.435. Reporting and recordkeeping.

Owners and operators of underground storage tank systems shall cooperate fully with inspections, monitoring and testing conducted by the Department, certified installers or certified inspectors, as well as requests for document submission, testing and monitoring by the owner or operator under section 107(c) of the act (35 P. S. § 6201.107(c)).

(1) *Reporting.* Owners and operators shall submit the following applicable information to the Department:

(i) Notification for underground storage tank systems (§ 245.423 (relating to registration requirements)), which includes certification of installation for new underground storage tank systems (§ 245.421(5) (relating to performance standards for new underground storage tank systems)).

(ii) Reports of confirmed, reportable releases (§ 245.305(d) (relating to reporting releases)).

(iii) A site characterization report (§ 245.310 (relating to site characterization report)).

(iv) Remedial action plans (§ 245.311 (relating to remedial action plan)), remedial action progress reports (§ 245.312 (relating to remedial action)) and remedial action completion reports (§ 245.313 (relating to remedial action completion report)).

(v) A notification before permanent closure or change-in-service (§ 245.452(a) (relating to permanent closure and changes-in-service)).

(vi) In the case of permanent closure, closure records to the Department when requested.

(2) *Recordkeeping.* Owners and operators shall maintain the following information:

(i) A corrosion expert's analysis of site corrosion potential if corrosion protection equipment is not used (§ 245.421(1)(iv) and (2)(iii)).

(ii) Documentation of operation of corrosion protection equipment (§ 245.432 (relating to operation and maintenance including corrosion protection)).

(iii) Documentation of underground storage tank system repairs in response to a release (§ 245.434(6) (relating to repairs allowed)).

(iv) Current compliance with release detection requirements (§ 245.446 (relating to release detection recordkeeping)).

(v) Results of the site investigation conducted at permanent closure or change-in-service (§ 245.455 (relating to closure records)).

(vi) A properly completed closure report (§ 245.452(f)).

(3) *Availability of records.* Owners and operators shall keep the records required at one of the following:

(i) At the underground storage tank site and immediately available for inspection by the Department and certified inspectors.

(ii) At a readily available alternative site and be provided for inspection to the Department upon request.

Cross References

This section cited in 25 Pa. Code § 245.432 (relating to operation and maintenance including corrosion protection); and 25 Pa. Code § 245.446 (relating to release detection recordkeeping).

RELEASE DETECTION

§ 245.441. General requirements for underground storage tank systems.

(a) Owners and operators of new and existing underground storage tank systems shall provide a method, or combination of methods, of release detection that:

(1) Can detect a release from any portion of the tank and the connected underground piping that routinely contains product.

(2) Is installed, calibrated, operated and maintained in accordance with the manufacturer's instructions, including routine maintenance and service checks for operability or running condition.

(3) Meets the performance requirements in § 245.444 or § 245.445 (relating to methods of release detection for tanks; and methods of release detection for piping), with any performance claims and their manner of determination described in writing by the equipment manufacturer or installer. In addition, methods used after the date shown in the following table corresponding with the specified method except for methods permanently installed prior to that date, shall be capable of detecting the leak rate or quantity specified for that method in the corresponding section of this subchapter, also shown in the table, with a probability of detection (Pd) of 0.95 and a probability of false alarm (Pfa) of 0.05.

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Method	*Section*	*Date After Which Pd/Pfa Must be Characterized*
Manual Tank Gauging	245.444(2)	December 22, 1990
Tank Tightness Testing	245.444(3)	December 22, 1990
Automatic Tank Gauging	245.444(4)	December 22, 1990
Statistical Inventory Reconciliation	245.444(8)	December 22, 1990
Automatic Line Leak Detectors	245.445(1)	September 22, 1991
Line Tightness Testing	245.445(2)	December 22, 1990

(i) Test method performance claims shall be verified by an independent third party using leak rates that are unknown to the tester.

(ii) When the EPA evaluation protocol for a method changes, the manufacturer shall reevaluate the method within 24 months of the new protocol's effective date for its continued use in this Commonwealth.

(b) When a release detection method operated in accordance with the performance standards in §§ 245.444 and § 245.445 indicates a release may have occurred, owners and operators shall investigate the suspected release in accordance with Subchapter D (relating to corrective action process for owners and operators of storage tanks and storage tank facilities and other responsible parties).

(c) Owners and operators of underground storage tank systems shall comply with the release detection requirements of this subpart by December 22 of the year listed in the following table:

SCHEDULE FOR PHASE-IN RELASE DETECTION

	Year When Release Detection is Required (by December 22 of the year indicated)				
Year System Was Installed	1989	1990	1991	1992	1993
Before 1965 or date unknown	RD	P			
1965-69		P/RD			

Year System Was Installed	*Year When Release Detection is Required (by December 22 of the year indicated)*				
	1989	1990	1991	1992	1993
1970-74		P	RD		
1975-79		P		RD	
1980-88		P			RD
New tanks (after December 22, 1988) immediately upon installation.					

P = Shall begin release detection for all pressurized piping in accordance with § 245.442(2)(i) (relating to requirements for petroleum underground storage tank systems).

RD = Shall begin release detection for tanks and suction piping in accordance with §§ 245.442(1), (2)(ii) and 245.443 (relating to requirements for petroleum underground storage tank systems; and requirements for hazardous substance underground storage tank systems).

(d) An existing tank system that cannot apply a method of release detection that complies with the requirements of this subchapter shall complete the closure procedures in §§ 245.451—245.455 (relating to out-of-service underground stor age tank systems and closure) by the date on which release detection is required for that underground storage tank system under subsection (c).

Cross References

This section cited in 25 Pa. Code § 245.403 (relating to applicability); 25 Pa. Code § 245.442 (relating to requirements for petroleum underground storage tank systems); 25 Pa. Code § 245.446 (relating to release detection recordkeeping); and 25 Pa. Code § 245.451 (relating to temporary closure).

§ 245.442. Requirements for petroleum underground storage tank systems.

Owners and operators of petroleum underground storage tank systems shall provide release detection for tanks and piping as follows:

(1) *Tanks.* Tanks shall be monitored at least every 30 days for releases using one of the methods listed in § 245.444(4)—(9) (relating to methods of release detection for tanks) except that:

(i) Underground storage tank systems that meet the performance standards in § 245.421 or § 245.422 (relating to performance standards for new underground storage tank systems; and upgrading of existing underground storage tank systems), and the monthly inventory control requirements in § 245.444(1) or (2), may use tank tightness testing (conducted in accordance

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with § 245.444(3)) at least every 5 years until December 22, 1998, or until 10 years after the tank is installed or upgraded under § 245.422(b), whichever is later.

(ii) Underground storage tank systems that do not meet the performance standards in § 245.421 or § 245.422 may use monthly inventory controls (conducted in accordance with § 245.444(1) or (2)) and annual tank tightness testing (conducted in accordance with § 245.444(3)) until December 22, 1998, when the tank shall be upgraded under § 245.422 or permanently closed under § 245.452 (relating to permanent closure and changes-in-service).

(iii) Tanks with a capacity of 550 gallons or less may use manual tank gauging, conducted in accordance with § 245.444(2).

(iv) Tanks with a capacity of 551 to 1,000 gallons using the longer test times specified may use manual tank gauging, conducted in accordance with § 245.444(2).

(2) *Piping.* Underground piping that routinely contains regulated substances shall be monitored for releases in a manner that meets one of the following requirements:

(i) *Pressurized piping.* Underground piping that conveys regulated substances under pressure shall meet the following requirements:

(A) Be equipped with an automatic line leak detector in accordance with § 245.445(1) (relating to methods of release detection for piping).

(B) Have an annual line tightness test conducted in accordance with § 245.445(2) or have monthly monitoring conducted in accordance with § 245.445(3).

(ii) *Suction piping.* Underground piping that conveys regulated substances under suction shall either have a line tightness test conducted at least every 3 years and in accordance with § 245.445(2), or use a monthly monitoring method conducted in accordance with § 245.445(3). Release detection is not required for suction piping that is designed and constructed to meet the following standards:

(A) The below grade piping operates at less than atmospheric pressure.

(B) The below grade piping is sloped so that the contents of the pipe will drain back into the storage tank if the suction is released.

(C) No more than one check valve is included in each suction line.

(D) Check valves are located directly below and as close as practical to or within the suction pump.

(E) A method is provided that allows compliance with clauses (B)—(D) to be readily determined.

Cross References

This section cited in 25 Pa. Code § 245.31 (relating to underground storage tank tightness testing requirements); 25 Pa. Code § 245.403 (relating to applicability); 25 Pa. Code § 245.423 (relating to registration requirements); 25 Pa. Code § 245.441 (relating to general requirements for underground storage tank systems); 25 Pa. Code § 245.443 (relating to requirements for hazardous substance underground storage tank systems); 25 Pa. Code § 245.444 (relating to methods of release detection for tanks); 25 Pa. Code § 245.445 (relating to methods of release detection for piping); 25 Pa. Code § 245.446 (relating to release detection recordkeeping); 25 Pa. Code § 245.451 (relating to temporary closure); and 25 Pa. Code § 252.3 (relating to scope).

§ 245.443. Requirements for hazardous substance underground storage tank systems.

Owners and operators of hazardous substance underground storage tank systems shall provide release detection that meets the following requirements:

(1) Release detection at existing underground storage tank systems shall meet the requirements for petroleum underground storage tank systems in § 245.442 (relating to requirements for petroleum underground storage tank systems). By December 22, 1998, all existing hazardous substance underground storage tank systems shall meet the release detection requirements for new systems in paragraph (2).

(2) Release detection at new hazardous substance underground storage tank systems shall meet the following requirements:

(i) Secondary containment systems.

(A) Secondary containment systems shall be designed, constructed and installed to:

(I) Contain regulated substances released from the tank system until they are detected and removed.

(II) Prevent the release of regulated substances to the environment at any time during the operational life of the underground storage tank system.

(III) Be checked for evidence of a release at least every 30 days.

(B) The provisions of § 264.193 (relating to secondary containment) may be used to comply with the requirements of this paragraph.

(ii) Double walled tanks shall be designed, constructed and installed to:

(A) Contain a release from any portion of the inner tank within the outer wall.

(B) Detect the failure of the inner wall.

(iii) External liners, including vaults, shall be designed, constructed and installed to:

(A) Contain 100% of the capacity of the largest tank within its boundary.

(B) Prevent the interference of precipitation or ground- water intrusion with the ability to contain or detect a release of regulated substances.

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(C) Surround the tank completely making it capable of preventing lateral as well as vertical migration of regulated substances.

(iv) Underground piping shall be equipped with secondary containment that satisfies the requirements of subparagraph (i) for example, trench liners, jacketing or double-walled pipe. In addition, underground piping that conveys regulated substances under pressure shall be equipped with an automatic line leak detector in accordance with § 245.445(1) (relating to methods of release detection for piping).

(v) Other methods of release detection may be used if owners and operators:

(A) Demonstrate to the Department that an alternate method can detect a release of the stored substance as effectively as any of the methods allowed in § 245.444(2)—(9) (relating to methods of release detection for tanks) can detect a release of petroleum.

(B) Provide information to the Department on effective corrective action technologies, health risks and chemical and physical properties of the stored substance, and the characteristics of the underground storage tank site.

(C) Obtain approval from the Department to use the alternate release detection method before the installation and operation of the new underground storage tank system.

Cross References

This section cited in 25 Pa. Code § 245.31 (relating to underground storage tank tightness testing requirements); 25 Pa. Code § 245.403 (relating to applicability); 25 Pa. Code § 245.423 (relating to registration requirements); 25 Pa. Code § 245.441 (relating to general requirements for underground storage tank systems); 25 Pa. Code § 245.446 (relating to release detection recordkeeping); 25 Pa. Code § 245.451 (relating to temporary closure); and 25 Pa. Code § 252.3 (relating to scope).

§ 245.444. Methods of release detection for tanks.

Each method of release detection for tanks used to meet the requirements of § 245.442 (relating to requirements for petroleum underground storage tank systems) shall be conducted in accordance with the following:

(1) *Inventory control.* Product inventory control, or another test of equivalent performance, shall be conducted monthly to detect a release of at least 1.0% of flow-through plus 130 gallons on a monthly basis in the following manner:

(i) Inventory volume measurements for regulated substance inputs, withdrawals and the amount still remaining in the tank are recorded each operating day.

(ii) The equipment used is capable of measuring the level of product over the full range of the tank's height to the nearest 1/8 of an inch.

(iii) The regulated substance inputs are reconciled with delivery receipts by measurement of the tank inventory volume before and after delivery.

(iv) Deliveries are made through a drop tube that extends to within 1 foot of the tank bottom.

(v) Product dispensing is metered and recorded within an accuracy of at least 6 cubic inches for every 5 gallons of product withdrawn.

(vi) Dispenser meters shall be calibrated.

(vii) The measurement of any water level in the bottom of the tank is made to the nearest 1/8 of an inch at least once a month.

(2) *Manual tank gauging.* Manual tank gauging shall meet the following requirements:

(i) Tank liquid level measurements are taken at the beginning and ending of a period of at least 36 hours during which no liquid is added to or removed from the tank.

(ii) Level measurements are based on an average of two consecutive stick readings at both the beginning and ending of the period.

(iii) The equipment used is capable of measuring the level of product over the full range of the tank's height to the nearest 1/8 of an inch.

(iv) A leak is suspected and subject to Subchapter D (relating to corrective action process for owners and operators of storage tanks and storage tank facilities and other responsible parties) if the variation between beginning and ending measurements exceeds the weekly or monthly standards in the following table:

Nominal Tank Capacity	*Minimum Duration of Test*	*Weekly Standard (one test)*	*Monthly Standard (average of) four tests*	*Periodic Tightness Test Required*
550 gallons or less	36 hours	10 gallons	5 gallons	No
551—1,000 gallons: 64″ diameter tank	44 hours	9 gallons	4 gallons	No
551—1,000 gallons: 48″ diameter tank	58 hours	12 gallons	6 gallons	No
551—1,000 gallons	36 hours	13 gallons	7 gallons	Yes
1,001—2,000 gallons	36 hours	26 gallons	13 gallons	Yes

(v) Only tanks of 550 gallons or less nominal capacity may use this as the sole method of release detection. Tanks of 551 to 2,000 gallons may use the method in place of manual inventory control in paragraph (1). Tanks of greater than 2,000 gallons nominal capacity may not use this method to meet the requirements of this section.

(3) *Tank tightness testing.* Tank tightness testing, or another test of equivalent performance, shall be capable of detecting a 0.1 gallon per hour leak rate from any portion of the tank that routinely contains product while accounting

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for the effects of thermal expansion or contraction of the product, vapor pockets, tank deformation, evaporation or condensation, and the location of the water table.

(4) *Automatic tank gauging.* Equipment for automatic tank gauging that tests for the loss of product and conducts inventory control shall meet one of the following requirements:

(i) The automatic product level monitor test can detect a 0.2 gallon per hour leak rate from any portion of the tank that routinely contains product.

(ii) For tank gauges installed prior to December 22, 1990, that do not meet the requirements of subparagraph (i), inventory control, or another test of equivalent performance, shall also be conducted in accordance with paragraph (1).

(5) *Vapor monitoring.* Testing or monitoring for vapors within the soil gas of the excavation zone shall meet the following requirements:

(i) The materials used as backfill are sufficiently porous—for example, gravel, sand or crushed rock—to readily allow diffusion of vapors from releases into the excavation area.

(ii) The stored regulated substance, or a tracer compound placed in the tank system, is sufficiently volatile for example, gasoline—to result in a vapor level that is detectable by the monitoring devices located in the excavation zone in the event of a release from the tank.

(iii) The measurement of vapors by the monitoring device is not rendered inoperative by the groundwater, rainfall or soil moisture or other known interferences so that a release could go undetected for more than 30 days.

(iv) The level of background contamination in the excavation zone will not interfere with the method used to detect releases from the tank.

(v) The vapor monitors are designed and operated to detect any significant increase in concentration above background of the regulated substance stored in the tank system, a component of that substance or a tracer compound placed in the tank system.

(vi) In the underground storage tank excavation zone, the site is evaluated to ensure compliance with the requirements in subparagraphs (i)—(iv) and to establish the number and positioning of monitoring wells that will detect releases within the excavation zone from any portion of the tank that routinely contains product.

(vii) Monitoring wells are clearly marked and secured to avoid unauthorized access and tampering in accordance with § 245.432(5) (relating to operation and maintenance including corrosion protection).

(6) *Groundwater monitoring.* Testing or monitoring for liquids on the groundwater shall meet the following requirements:

(i) The regulated substance stored is immiscible in water and has a specific gravity of less than one.

(ii) Groundwater is never more than 20 feet from the ground surface and the hydraulic conductivity of the soils between the underground storage tank system and the monitoring wells or devices is not less than 0.01 cm/sec—for example, the soil should consist of gravels, coarse to medium sands, coarse silts or other permeable materials.

(iii) The slotted portion of the monitoring well casing shall be designed to prevent migration of natural soils or filter pack into the well and to allow entry of regulated substances on the water table into the well under both high and low groundwater conditions.

(iv) Monitoring wells shall be sealed from the ground surface to the top of the filter pack.

(v) Monitoring wells or devices intercept the excavation zone or are as close to it as is technically feasible.

(vi) The continuous monitoring devices or manual methods used can detect the presence of at least 1/8 of an inch of free product on top of the groundwater in the monitoring wells.

(vii) Within and immediately below the underground storage tank system excavation zone, the site is evaluated to ensure compliance with subparagraphs (i)—(v) and to establish the number and positioning of monitoring wells or devices that will detect releases from any portion of the tank that routinely contains product.

(viii) Monitoring wells are clearly marked and secured to avoid unauthorized access and tampering in accordance with § 245.432(5).

(7) *Interstitial monitoring.* Interstitial monitoring between the underground storage tank system and a secondary barrier immediately around or beneath it may be used, but only if the system is designed, constructed and installed to detect a leak from any portion of the tank that routinely contains product and also meets one of the following requirements:

(i) For double-walled underground storage tank systems, the sampling or testing method can detect a release through the inner wall in any portion of the tank that routinely contains product.

(ii) For underground storage tank systems with a secondary barrier within the excavation zone, the sampling or testing method used can detect a release between the underground storage tank system and the secondary barrier.

(A) The secondary barrier around or beneath the underground storage tank system consists of artificially constructed material that is sufficiently thick and impermeable, at least 10^{-6} cm/sec for the regulated substance stored, to direct a release to the monitoring point and permit its detection.

(B) The barrier is compatible with the regulated substance stored so that a release from the underground storage tank system will not cause a deterioration of the barrier allowing a release to pass through undetected.

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(C) For cathodically protected tanks, the secondary barrier shall be installed so that it does not interfere with the proper operation of the cathodic protection system.

(D) The groundwater, soil moisture or rainfall will not render the testing or sampling method used inoperative so that a release could go undetected for more than 30 days.

(E) The site is assessed to ensure that the secondary barrier is always above the groundwater and not in a 25-year floodplain, unless the barrier and monitoring designs are for use under these conditions.

(F) Monitoring wells are clearly marked and secured to avoid unauthorized access and tampering in accordance with § 245.432(5).

(iii) For tanks with an internally fitted liner, an automated device can detect a release between the inner wall of the tank and the liner, and the liner is compatible with the substance stored.

(8) *Statistical Inventory Reconciliation (SIR).* SIR shall meet the performance standards of paragraph (9)(i) for monthly monitoring.

(i) The owner or operator shall follow the instructions of the SIR manufacturer's protocol.

(ii) A separate report for each tank monitored shall be maintained by the owner/operator in accordance with § 245.446(2) (relating to release detection recordkeeping). Each report shall meet the following requirements:

(A) Owners and operators shall have reports available within 20 days of the end of the monitored period.

(B) A valid report shall include the calculated leak rate, positive for out of tank and negative for into tank, minimum detectable leak rate (MDL), leak detection threshold, probability of detection (Pd) and probability of false alarm (Pfa) which the supplied data supports.

(C) A valid report shall also include one of the following test results:

(I) If the calculated leak rate, absolute value, is less than the leak threshold and the MDL is less than or equal to the certified performance standard (paragraph (3), paragraph (9)(i) or § 245.445(2) (relating to methods of release detection for piping)), the test result is ''pass.''

(II) If the calculated leak rate, absolute value, is greater than the leak threshold, the test result is ''fail.''

(III) If the MDL exceeds the certified performance standard and the calculated leak rate is less than the leak threshold, the test result is ''inconclusive.'' An inconclusive result is considered a suspected leak and shall be investigated in accordance with § 245.304 (relating to investigation of suspected releases).

(9) *Other methods.* Other types of release detection methods, or a combination of methods, may be used if the owner or operator can demonstrate to the Department that one of the following exists:

(i) It can detect a 0.2 gallon per hour leak rate or a release of 150 gallons within a month with a probability of detection of 0.95 and a probability of false alarm of 0.05.

(ii) It can detect a release as effectively as any of the methods allowed in paragraphs (3)—(8). In comparing methods, the Department will consider the size of release that the method can detect and the frequency and reliability with which it can be detected. If the method is approved, the owner and operator shall comply with conditions imposed by the Department on its use to ensure the protection of human health and the environment.

Source

The provisions of this § 245.444 amended November 30, 2001, effective January 1, 2001, 31 Pa.B. 6615. Immediately preceding text appears at serial pages (234739) to (234742) and (274898).

Cross References

This section cited in 25 Pa. Code § 245.31 (relating to underground storage tank tightness testing requirements); 25 Pa. Code § 245.403 (relating to applicability); 25 Pa. Code § 245.422 (relating to upgrading of existing underground storage tank systems); 25 Pa. Code § 245.434 (relating to repairs allowed); 25 Pa. Code § 245.441 (relating to general requirements for underground storage tank systems); 25 Pa. Code § 245.442 (relating to requirements for petroleum underground storage tank systems); 25 Pa. Code § 245.443 (relating to requirements for hazardous substance underground storage tank systems); 25 Pa. Code § 245.445 (relating to methods of release detection for piping); 25 Pa. Code § 245.446 (relating to release detection recordkeeping); 25 Pa. Code § 245.451 (relating to temporary closure); and 25 Pa. Code § 252.3 (relating to scope).

§ 245.445. Methods of release detection for piping.

Each method of release detection for piping used to meet the requirements of § 245.442 (relating to requirements for petroleum underground storage tank systems) shall be conducted in accordance with the following:

(1) *Automatic line leak detectors.* Methods which alert the operator to the presence of a leak by restricting or shutting off the flow of regulated substances through piping or triggering an audible or visual alarm may be used only if they detect leaks of 3 gallons per hour at 10 pounds per square inch line pressure within 1 hour. An annual test of the operation of the leak detector shall be conducted in accordance with the manufacturer's requirements.

(2) *Line tightness testing.* A periodic test of piping may be conducted only if it can detect a 0.1 gallon per hour leak rate at 1 1/2 times the operating pressure.

(3) *Applicable tank methods.* The methods in § 245.444(5)—(9) (relating to methods of release detection for tanks) may be used if they are designed to detect a release from any portion of the underground piping that routinely contains regulated substances.

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Cross References

This section cited in 25 Pa. Code § 245.403 (relating to applicability); 25 Pa. Code § 245.434 (relating to repairs allowed); 25 Pa. Code § 245.441 (relating to general requirements for underground storage tank systems); 25 Pa. Code § 245.444 (relating to methods of release detection for tanks); 25 Pa. Code § 245.446 (relating to release detection recordkeeping); 25 Pa. Code § 245.451 (relating to temporary closure); 25 Pa. Code § 252.3 (relating to scope); 25 Pa. Code § 273.275 (relating to leachate collection and storage); 25 Pa. Code § 277.275 (relating to leachate collection and storage); 25 Pa. Code § 288.455 (relating to leachate collection and storage); 25 Pa. Code § 288.555 (relating to leachate collection and storage); 25 Pa. Code § 289.455 (relating to leachate collection and storage); and 25 Pa. Code § 289.555 (relating to leachate collection and storage).

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§ 245.446. Release detection recordkeeping.

Underground storage tank system owners and operators shall maintain records in accordance with § 245.435 (relating to reporting and recordkeeping) demonstrating compliance with the applicable requirements of §§ 245.441—245.446 (relating to release detection). These records shall include the following:

(1) Written performance claims pertaining to a release detection system used, and the manner in which these claims have been justified or tested by the equipment manufacturer or installer, shall be maintained for the entire time the release detection system is in use at the facility.

(2) The results of any sampling, testing or monitoring shall be maintained for at least 1 year, except that the results of tank tightness testing conducted in accordance with § 245.444(3) (relating to methods of release detection for tanks) shall be retained until the next test is conducted.

(3) Written documentation of all calibration, maintenance and repair of release detection equipment permanently located onsite shall be maintained for at least 1 year after the servicing work is completed. Schedules of required calibration and maintenance provided by the release detection equipment manufacturer shall be retained for the entire time the equipment is in use at the facility.

Cross References

This section cited in 25 Pa. Code § 245.403 (relating to applicability); 25 Pa. Code § 245.435 (relating to reporting and recordkeeping); 25 Pa. Code § 245.444 (relating to methods of release detection for tanks); and 25 Pa. Code § 245.451 (relating to temporary closure).

OUT-OF-SERVICE UNDERGROUND STORAGE TANK SYSTEMS AND CLOSURE

§ 245.451. Temporary closure.

(a) When an underground storage tank system is temporarily closed, owners and operators shall continue operation and maintenance of corrosion protection in accordance with § 245.432 (relating to operation and maintenance including corrosion protection), and release detection in accordance with §§ 245.441—245.446 (relating to release detection). Subchapter D (relating to corrective action process for owners and operators of storage tanks and storage tank facilities and other responsible parties) shall be complied with if a release is suspected or confirmed. Release detection is not required as long as the underground storage tank system is empty. The underground storage tank system is empty when all materials have been removed using commonly employed practices so that no more than 2.5 centimeters (1 inch) of residue, or 0.3% by weight of the total capacity of the underground storage tank system, remain in the system.

(b) When an underground storage tank system is temporarily closed for 3 months or more, owners and operators shall also comply with the following requirements:

(1) Vent lines shall be open and functioning.

(2) All other lines, pumps, manways and ancillary equipment shall be capped and secure.

(c) When an underground storage tank system is temporarily closed for more than 12 months, owners and operators shall permanently close the underground storage tank system if it does not meet either performance standards in § 245.421 (relating to performance standards for new underground storage tank systems) for new underground storage tank systems or the upgrading requirements in § 245.422 (relating to upgrading of existing underground storage tank systems), except that the spill and overfill equipment requirements do not have to be met. Owners and operators shall permanently close the substandard underground storage tank systems at the end of this 12 month period in accordance with §§ 245.452—245.455, unless the Department provides an extension of the 12-month temporary closure period. Owners and operators shall complete a site assessment in accordance with § 245.453 (relating to assessing the site at closure or change-in-service) before an extension may be applied for.

Cross References

This section cited in 25 Pa. Code § 245.422 (relating to upgrading of existing underground storage tank systems); 25 Pa. Code § 245.441 (relating to general requirements for underground storage tank systems); and 25 Pa. Code § 245.451 (relating to temporary closure).

§ 245.452. Permanent closure and changes-in-service.

(a) At least 30 days before beginning either permanent closure or a change-in-service under subsections (b) (d), or within another reasonable time determined by the Department, owners and operators shall notify the Department on a form provided by the Department of their intent to permanently close or make the change-in-service, unless the action is in response to corrective action. The required assessment of the excavation zone under § 245.453 (relating to assessing the site at closure or change-in-service) shall be performed after notifying the Department but before completion of the permanent closure or a change-in-service.

(b) To permanently close a tank, owners and operators shall ensure that the tank is empty and clean in accordance with a Nationally recognized code of practice such as API 2015 by removing the liquids and accumulated sludges. Tanks taken out of service permanently shall also be either removed from the ground or filled with a nonshrinking, inert solid material.

(c) Replacement of the underground piping connected to a storage tank shall be considered a permanent closure of that part of the underground storage tank

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system. The requirements applicable to permanent closure of an underground storage tank system also apply to the permanent closure of system piping.

(d) Before a change-in-service, owners and operators shall ensure that the tank is empty and clean in accordance with a Nationally recognized code of practice such as API 2015 by removing the liquid and accumulated sludge, and conduct a site assessment in accordance with § 245.453.

(e) An amended registration shall be submitted by the owner to the Department.

(f) A properly completed closure report is required to permanently close a site, including a change-in-service. A copy of the completed closure report shall be submitted to the Department when requested.

Cross References

This section cited in 25 Pa. Code § 245.422 (relating to upgrading of existing underground storage tank systems); 25 Pa. Code § 245.425 (relating to reuse of removed tanks); 25 Pa. Code § 245.435 (relating to reporting and recordkeeping); 25 Pa. Code § 245.441 (relating to general requirements for underground storage tank systems); 25 Pa. Code § 245.442 (relating to requirements for petroleum underground storage tank systems); and 25 Pa. Code § 245.451 (relating to temporary closure).

§ 245.453. Assessing the site at closure or change-in-service.

(a) Before permanent closure or a change-in-service is completed, owners and operators shall measure for the presence of a release where contamination is most likely to be present at the underground storage tank site. Owners and operators shall sample for releases in a manner consistent with the Department, technical document entitled *Closure Requirements for Underground Storage Tank Systems*.

(b) If contaminated soils, contaminated groundwater or free product as a liquid or vapor is discovered under subsection (a), or by another manner, owners and operators shall begin corrective action in accordance with Subchapter D (relating to corrective action process for owners and operators of storage tanks and storage tank facilities and other responsible parties).

Cross References

This section cited in 25 Pa. Code § 245.422 (relating to upgrading of existing underground storage tank systems); 25 Pa. Code § 245.441 (relating to general requirements for underground storage tank systems); 25 Pa. Code § 245.451 (relating to temporary closure); 25 Pa. Code § 245.452 (relating to permanent closure and changes-in-service); and 25 Pa. Code § 245.455 (relating to closure records).

§ 245.454. Applicability to previously closed underground storage tank systems.

When directed by the Department, the owner and operator of an underground storage tank system permanently closed before December 22, 1988, shall assess the excavation zone and close the underground storage tank system in accordance

with this subchapter if the underground storage tank system is, in the judgment of the Department, posing a current or potential threat to human health and the environment.

Cross References

This section cited in 25 Pa. Code § 245.422 (relating to upgrading of existing underground storage tank systems); 25 Pa. Code § 245.441 (relating to general requirements for underground storage tank systems); and 25 Pa. Code § 245.451 (relating to temporary closure).

§ 245.455. Closure records.

Owners and operators shall maintain records in accordance with § 245.435 (relating to reporting and recordkeeping) that are capable of demonstrating compliance with closure requirements under this subchapter. The results of the excavation zone assessment required in § 245.453 (relating to assessing the site at closure or change-in-service) shall be maintained for at least 3 years after completion of permanent closure or change-in-service in one of the following ways:

(1) By the owners and operators who took the underground storage tank system out of service.

(2) By the current owners and operators of the underground storage tank system site.

(3) By mailing these records to the Department if they cannot be maintained at the closed facility.

Cross References

This section cited in 25 Pa. Code § 245.422 (relating to upgrading of existing underground storage tank systems); 25 Pa. Code § 245.441 (relating to general requirements for underground storage tank systems); and 25 Pa. Code § 245.451 (relating to temporary closure).

Subchapter F. TECHNICAL STANDARDS FOR ABOVEGROUND STORAGE TANKS AND FACILITIES

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CLOSURE AND REMOVAL FROM SERVICE REQUIREMENTS

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Source

The provisions of this Subchapter F adopted October 10, 1997, effective October 11, 1997, 27 Pa.B. 5341, unless otherwise noted.

Cross References

This subchapter cited in 25 Pa. Code § 245.222 (relating to application requirements); 25 Pa. Code § 245.232 (relating to general requirements); and 25 Pa. Code § 245.602 (relating to scope).

GENERAL

§ 245.501. Purpose.

This subchapter establishes technical standards and requirements for operations and maintenance, design, construction and installation, corrosion and deterioration prevention, release prevention and leak detection, inspection, and closure and removal from service requirements for large aboveground storage tanks and facilities regulated under the act. Regulated aboveground storage tanks are defined in § 245.1 (relating to definitions).

§ 245.502. Scope.

The standards and requirements established in this subchapter shall be applied through the use of appropriate current codes of practice developed by Nationally recognized associations such as, but not limited to, those referenced at § 245.504 (relating to referenced organizations) and through the use of manufacturer's specifications and sound engineering practices. This subchapter is not intended to supersede other State and Federal regulations or jurisdictional requirements when they are more restrictive than the requirements in this part. This subchapter does not apply to small aboveground storage tanks unless otherwise referenced in Subchapter G (relating to simplified program for small aboveground storage tanks).

§ 245.503. Variances.

When unique or peculiar circumstances make compliance with this subchapter technically infeasible or unsafe, the Department may, upon written application from the owner/operator of a storage tank system subject to this subchapter, grant a variance from one or more specific provisions of this subchapter.

(1) A variance may only be granted if the storage tank system meets alternative technical standards that fully protect human health and the environment.

(2) A written application for a variance shall be submitted to the Department and provide the following information:

(i) The facility name and identification number for which the variance is sought.

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(ii) Specific sections of this subchapter from which the variance is sought.

(iii) The unique or peculiar conditions which make compliance with the sections identified in subparagraph (ii) technically infeasible or unsafe.

(iv) Evidence, including data, plans, specifications and test results, which supports an alternative design, practice, schedule or method as being at least as protective of human health and the environment as the requirements of the sections identified in subparagraph (ii).

(3) The Department will not grant a variance which would result in regulatory controls less stringent than other applicable Federal or State regulations, such as 37 Pa. Code Part I, Subpart B (relating to flammable and combustible liquids) and 40 CFR Part 112 (relating to oil pollution prevention).

(4) When granting the variance, the Department may impose specific conditions necessary to assure that the variance will adequately protect the public health, safety or welfare and the environment.

(5) The Department will provide to the applicant a written notice of approval, approval with conditions or denial.

Cross References

This section cited in 25 Pa. Code § 245.516 (relating to recordkeeping requirements).

§ 245.504. Referenced organizations.

(a) Nationally recognized associations which are referenced throughout this subchapter are as follows:

(1) American Concrete Institute (ACI).
(2) American National Standards Institute (ANSI).
(3) American Petroleum Institute (API).
(4) American Society of Mechanical Engineers (ASME).
(5) American Society for Nondestructive Testing (ASNT).
(6) American Society for Testing and Materials (ASTM).
(7) National Association of Corrosion Engineers (NACE).
(8) National Fire Protection Association (NFPA).
(9) Petroleum Equipment Institute (PEI).
(10) Steel Structures Painting Council (SSPC).
(11) Steel Tank Institute (STI).
(12) Underwriters Laboratory (UL).

(b) Nationally recognized codes and standards shall be used in conjunction with manufacturer's specifications to comply with this subchapter. When used to meet the technical standards and requirements of this subchapter, the most current or latest edition of the codes and standards shall be applied. Other Nationally recognized codes and standards, not referenced in this part, may also be used to comply with this subchapter, when appropriate.

(c) When Nationally recognized codes and standards are updated, facilities or storage tank systems installed to previously existing standards prior to the update, will not automatically be required to be upgraded to meet the new standard.

Cross References

This section cited in 25 Pa. Code § 245.502 (relating to scope).

OPERATIONS AND MAINTENANCE

§ 245.511. General operations and maintenance.

An aboveground storage tank facility owner/operator shall implement and have onsite a written operations and maintenance plan which assures conformance with applicable safety and operational standards, compliance with applicable Federal and State regulations, and shall use appropriate work practices and procedures.

§ 245.512. Facility operations and spill response plan.

An initial Spill Prevention Response Plan (Plan) and any future updates, which address the requirements described in Chapter 9 of the act (35 P. S. §§ 6021.901— 6021.904) and this chapter, shall be submitted to the Department for aboveground storage tank facilities with an aggregate aboveground storage capacity greater than 21,000 gallons. A current copy of the Plan shall be readily available at the facility at all times.

§ 245.513. Preventive maintenance and housekeeping requirements.

(a) An aboveground storage tank facility owner/operator shall establish and implement a preventive maintenance and housekeeping program which protects the integrity of the system from degradation and protects the public health and the environment.

(b) Routine maintenance inspection procedures shall be established and implemented at each storage tank facility.

(1) An owner/operator is responsible to assure that a visual inspection is performed once every 72 hours. The visual inspection may be accomplished by or supplemented with electronic surveillance and shall include:

(i) A check of the facility to ensure that no potential hazardous environmental conditions exist. This includes a check for evidence of a release for example, spill, overflow or leakage.

(ii) A check of the containment areas for accumulation of water and a confirmation that containment drain valves are secured in a closed position when not in use. If excessive water has accumulated, it shall be drained off and disposed of in accordance with applicable State and Federal requirements.

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(2) An owner/operator is responsible to assure that a maintenance inspection of the facility and equipment is performed each month. The maintenance inspection shall include:

(i) An inspection of the tank system exterior surfaces for deterioration and maintenance deficiencies including a visual check for cracks, areas of wear, excessive settlement and deterioration of the foundation and supports.

(ii) Ancillary equipment and appurtenances shall be visually checked for operational malfunctions.

(iii) An inspection of containment and transfer areas for cracks, defects and fire hazards.

(iv) A check of overfill prevention equipment and monitoring of the leak detection system.

(v) The monthly maintenance inspection report shall be completed and signed by the individual who conducted the inspections and maintained for 1 year.

(3) An owner/operator is responsible to establish a process to assure that storage tank vents are operational and free of restrictions.

(c) Housekeeping practices shall be established and implemented in a manner that reduces the possibility of accidental spills and safety hazards to plant or facility personnel.

§ 245.514. Security.

An owner/operator is responsible to assure that appropriate security measures and procedures based on the facility location are established and implemented to protect the environment and the public. These security measures and procedures may include, but are not limited to, fencing, lighting, access control, locked entrances and securing of valves and dispensers.

§ 245.515. Labeling/marking of aboveground tank systems.

(a) An owner/operator is responsible to assure aboveground tank systems are labeled/marked in accordance with industry standards and in compliance with Federal and State requirements. Tank labels/marks shall be easily legible from outside the containment area and shall be capable of readily identifying the regulated substance stored.

(b) The owner/operator shall be capable of readily identifying the substances transferred in the regulated piping system and be able to determine flow control points, including pumps, valves and dispensers through labeling or other suitable means.

§ 245.516. Recordkeeping requirements.

(a) Owners and operators of aboveground tank facilities shall maintain required records. If records are maintained offsite, the records shall be easily obtained and provided to the Department upon request.

(b) Permanent records for new systems and available records for existing systems shall be maintained for the operational life of the tank system and retained for a minimum of 1 year after the tank system has been removed. Permanent records include the following:

(1) Original installation and modification of tank system design specifications.

(2) Any variance issued for the tank system under § 245.503 (relating to variances).

(3) The permits issued under Subchapter C (relating to permitting of underground and aboveground storage tank systems and facilities).

(4) Tank handling activity installation, relocation, reconstruction and major modification inspection results.

(5) The notices of reportable releases submitted under § 245.305 (relating to reporting releases).

(6) Applicable manufacturer's documentation for the tank system and any ancillary equipment.

(7) Third party out-of-service inspection reports.

(c) Temporary records shall be maintained as follows:

(1) The current registration certificate.

(2) The leak detection records for the past 12 months.

(3) The last two results of cathodic protection monitoring, when a cathodic protection system is in use.

(4) The routine monthly maintenance inspections for the past 12 months.

(5) The last third party in-service inspection report.

(6) A properly completed closure report and results of the site assessment conducted at permanent closure or change-in-service under § 245.561 (relating to permanent closure or change-in-service).

Cross References

This section cited in 25 Pa. Code § 245.553 (relating to out-of-service inspections).

DESIGN, CONSTRUCTION AND INSTALLATION

§ 245.521. Performance standards for aboveground storage tanks.

(a) Tank construction shall meet or exceed Nationally recognized industry association codes of practice. New tanks shall be installed in accordance with applicable codes of practice and consistent with manufacturer's or fabricator's specifications as specified in § 245.522 (relating to new aboveground tank installations and reconstructions).

(b) Tank modifications shall be in accordance with industry codes of practice as specified in § 245.524 (relating to aboveground tank modifications).

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(c) Tanks shall be protected from corrosion and deterioration as specified in §§ 245.531—245.534 (relating to corrosion and deterioration prevention).

(d) A leak monitoring system shall be installed as specified in § 245.543 (relating to leak detection requirements).

(e) A release prevention system shall be installed as specified in §§ 245.541 and 245.542 (relating to overfill prevention requirements; and containment requirements for aboveground storage tank systems).

(f) Tanks shall be tested according to industry standards before being placed in service as specified in §§ 245.522 and 245.524 (relating to new aboveground tank installations and reconstructions; and aboveground tank modifications).

(g) Tanks shall be inspected at installation, reconstruction or relocation and when a major modification is performed on a tank as specified in § 245.554 (relating to installation and modification inspections).

Cross References

This section cited in 25 Pa. Code § 245.522 (relating to new aboveground tank installations and reconstructions).

§ 245.522. New aboveground tank installations and reconstructions.

(a) Tanks shall be designed and constructed in accordance with an appropriate current code of practice developed by Nationally recognized associations such as UL, ACI, API, ASME, ASTM or NACE.

(b) Tanks shall have a stable foundation, capable of supporting the total weight of the tank when full of product without movement, rolling or unacceptable settling. The foundation shall minimize corrosion of the tank bottom and meet or exceed the specifications of the tank manufacturer. The foundation design and construction shall be based on sound engineering practices.

(c) Tanks shall be tested for tightness in accordance with current codes of practice developed by Nationally recognized associations and manufacturer's specifications. If a pneumatic test is used for manufactured (shop built) tanks, the fittings, welds, joints and connections shall be coated with a soap solution and checked for leaks. Aboveground field constructed storage tanks shall be hydrostatically tested. Deficiencies shall be remedied prior to tanks being placed into service. Hydrostatic test fluids shall be discharged or disposed of in accordance with State and Federal requirements.

(d) Reconstruction of tanks shall follow the current codes of practice developed by Nationally recognized associations. Reconstructed tanks shall be inspected and hydrostatically tested before being placed into service. Reconstructed tanks shall meet or exceed requirements specified in § 245.521 (relating to performance standards for aboveground storage tanks). Hydrostatic test fluids shall be discharged or disposed of in accordance with State and Federal requirements.

(e) Aboveground manufactured storage tanks that are relocated to another service site shall meet the performance requirements for aboveground storage tanks and shall be tested according to industry standards and inspected before being put back in service.

Cross References

This section cited in 25 Pa. Code § 245.521 (relating to performance standards for aboveground storage tanks); and 25 Pa. Code § 245.554 (relating to installation and modification inspections).

§ 245.523. Aboveground storage tanks in underground vaults.

The following requirements shall be met when an owner or operator chooses to install an aboveground storage tank in an underground vault.

(1) The vault shall completely enclose the tank. There may be no openings in the vault enclosure except those necessary for access to, inspection of, and filling, emptying and venting of the tank. The walls and floor of the vault shall be constructed of reinforced concrete at least 6 inches thick. The top, walls and floor shall be designed to withstand the anticipated loading including loading from traffic, soil and groundwater.

(2) The vault shall be compatible with the stored substance and have a permeability of less than 1×10^{-7} cm/sec for substance stored and be water tight.

(3) A tank shall be in its own vault. Adjacent vaults may share a common wall.

(4) There may be no backfill around the tank and there shall be sufficient space between the tank and the vault to allow inspection of the tank and ancillary equipment.

(5) A vault and its tank shall be suitably anchored to withstand uplifting by either water or released substance, including when the tank is empty.

(6) Connections shall be provided to permit venting of each vault to dilute, disperse and remove vapors prior to personnel entering the vault.

(7) A vault shall be equipped with a continuous leak detection system capable of detecting vapors and liquids including water. The detection system shall activate an alarm that automatically shuts down the dispensing system if a release occurs.

(8) A vault shall have a means for personnel entry. The entry point shall have a warning sign indicating the need for procedures for safe entry into a confined space. An entry point shall be secured against unauthorized entry and vandalism.

(9) A suitable means to admit a fire suppression agent shall be provided for each vault.

(10) Tanks and ancillary equipment shall be installed, maintained and inspected in accordance with the requirements for aboveground storage tanks in this subchapter.

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Cross References

This section cited in 25 Pa. Code § 245.612 (relating to performance and design standards).

§ 245.524. Aboveground tank modifications.

(a) Modifications shall be designed and implemented in accordance with current codes of practice developed by Nationally recognized associations such as API, ACI, ASME, ASTM or UL.

(b) Modifications shall be performed in accordance with Nationally recognized codes and manufacturer's specifications or a professional engineer's design requirements.

(c) Aboveground tanks which are modified shall be inspected and tested according to industry standards before being put in service when a major modification has been performed on the tank shell, tank roof or tank bottom. Deficiencies shall be remedied before being returned to service.

Cross References

This section cited in 25 Pa. Code § 245.521 (relating to performance standards for aboveground storage tanks); and 25 Pa. Code § 245.554 (relating to installation and modification inspections).

§ 245.525. Ancillary equipment for aboveground storage tanks.

(a) Ancillary equipment shall be designed and installed in accordance with Nationally recognized codes of practice and manufacturer's specifications such as API, ASME, ASTM, UL, PEI or ANSI. Ancillary equipment shall be in good working order and maintained according to manufacturer's specifications and accepted industry practices. Ancillary equipment shall be compatible with the stored substance.

(b) Tanks shall be appropriately vented to protect the tank from over pressurization and excessive vacuums. Vents shall meet or exceed the appropriate codes of practice developed by Nationally recognized associations such as API and NFPA. Normal venting shall allow the tank to breath when transferring the stored product. Emergency venting shall ensure that the safe pressure for the tank is not exceeded.

(c) Tank connections through which regulated substance can flow shall be equipped with an operating valve adjacent to the tank to control flow of substance. Appropriate valves shall be installed to meet or exceed current codes of practice and jurisdictional requirements. Valves shall be designed, installed and maintained according to current codes of practice.

§ 245.526. Piping for aboveground storage tanks.

(a) Piping shall be compatible with the substance stored and properly designed to resist internal and external wear, vibration and shock.

(b) New and replacement piping shall be designed, fabricated and tested in accordance with current codes of practice developed by Nationally recognized

associations such as API, ASME, ANSI, NFPA, PEI or STI. Installation of piping shall meet or exceed current codes of practice and be in strict accordance with manufacturer's specifications. Piping shall be tested for tightness before being placed in service and all deficiencies remedied.

(c) Piping installed after October 11, 1997, and in contact with the soil or an electrolyte shall be adequately protected from corrosion in accordance with current codes of practice developed by Nationally recognized associations such as NACE or API.

(d) Piping shall be tested and inspected in accordance with current industry practices and §§ 245.552 and 245.553 (relating to in-service inspections; and out-of-service inspections).

(e) Aboveground piping shall be adequately supported and be protected from physical damage caused by freezing, frost heaving and vehicular traffic.

CORROSION AND DETERIORATION PREVENTION

§ 245.531. General corrosion and deterioration requirements.

(a) The tank system shall be maintained with corrosion and deterioration prevention measures.

(b) Metallic tank systems in direct contact with the soil or other electrolyte shall be evaluated by a corrosion expert to determine if cathodic protection is necessary or appropriate.

(c) Existing tank bottoms that do not meet the standards in subsection (b) shall be upgraded when the tank bottom is replaced.

Cross References

This section cited in 25 Pa. Code § 245.521 (relating to performance standards for aboveground storage tanks).

§ 245.532. Cathodic protection systems.

(a) When required for corrosion prevention, on new, reconstructed or relocated tanks or the replacement of the tank bottom the cathodic protection system shall consist of one or more of the following:

(1) Sacrificial anodes and dielectrical coating.

(2) Impressed current.

(3) Another method specified in an appropriate Nationally recognized association code of practice such as API 651 or associations such as NACE.

(b) Cathodic protection systems shall be designed by a corrosion expert and maintained to provide protection against external corrosion for the operational life of the tank system.

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(c) Each cathodic protection system shall have an access point which enables the owner or operator to check on the adequacy of cathodic protection. The cathodic protection systems shall be monitored periodically as determined by the corrosion system design.

(d) Tank and piping connections of two dissimilar metals which create a galvanic cell are prohibited.

Cross References

This section cited in 25 Pa. Code § 245.521 (relating to performance standards for aboveground storage tanks).

§ 245.533. Coating exterior tank and piping surfaces.

The exterior surfaces of aboveground tanks and piping shall be protected by a suitable coating which prevents corrosion and deterioration. The coating system shall be maintained throughout the entire operational life of the tank.

Cross References

This section cited in 25 Pa. Code § 245.521 (relating to performance standards for aboveground storage tanks).

§ 245.534. Interior linings and coatings.

(a) Coating or lining systems may be used to protect tank interiors from corrosion. The coating or lining system shall be designed in accordance with current codes of practices such as API 652 or associations such as NACE. Any appropriate coating which is bonded firmly to the interior surfaces may be used to protect a tank from corrosion.

(b) Specific requirements are as follows:

(1) Coatings and linings shall be chemically compatible with the substance to be stored.

(2) Coating material shall be applied and cured in strict accordance with manufacturer's specifications.

(3) Surfaces shall be prepared and inspected in accordance with applicable nationally recognized codes and standards.

(4) Coatings used to protect the bottom of a tank shall extend up the side of the tank a minimum of 18 inches, while some forms of lining may cover the entire tank interior.

(5) Coatings shall be examined for blisters and air pockets, and tested for pinholes. The coating thickness shall be checked to assure compliance with manufacturer's specifications.

(6) Defects in coating or lining systems shall be repaired or corrected prior to putting the tank or system into service.

Cross References

This section cited in 25 Pa. Code § 245.521 (relating to performance standards for aboveground storage tanks); and 25 Pa. Code § 245.612 (relating to performance and design standards).

RELEASE PREVENTION AND LEAK DETECTION

§ 245.541. Overfill prevention requirements.

(a) Owner/operators shall ensure that releases from overfills do not occur. Transfer of stored substance may not exceed the volume available in the receiving tank and the transfer shall be adequately monitored. Immediate action shall be taken to stop the flow of regulated substance prior to exceeding tank capacity or in the event that an equipment failure occurs.

(b) Tanks installed after October 11, 1997, shall be installed with the following:

(1) A gauge or monitoring device which accurately indicates the level or volume in the tank and is visible to the individual responsible for the transfer of product. The monitoring device shall be installed, calibrated and maintained in accordance with manufacturer's specifications.

(2) A high-level alarm and an automatic high-level cut-off device or a high-level alarm and a manned operator shutdown procedure in operation.

(c) Existing tanks shall have a gauge or monitoring device installed by October 11, 2000.

(d) An existing tank system which is taken out of service to perform a scheduled out-of-service inspection or a major modification to the tank shall be upgraded with a high-level alarm and cut-off device or a high-level alarm and a manned operator shutdown procedure prior to being put back in service.

Cross References

This section cited in 25 Pa. Code § 245.521 (relating to performance standards for aboveground storage tanks).

§ 245.542. Containment requirements for aboveground storage tank systems.

(a) Containment structures shall be compatible with the substance stored and minimize deterioration to the storage tank system.

(b) Containment areas shall be designed, maintained and constructed in accordance with sound engineering practices adhering to Nationally recognized codes of practice such as NFPA, NACE, ACI or API and in compliance with State and Federal requirements.

(c) Secondary containment under the tank bottom and around underground piping shall be designed to direct any release to a monitoring point to meet leak detection requirements. Secondary containment shall be provided on a new tank

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at installation, and shall be provided on an existing tank at reconstruction or relocation of the tank or when the tank floor is replaced. Permeability of the secondary containment shall be less than 1x10-7 cm/sec at anticipated hydrostatic head and shall be verified at the time of installation.

(d) Aboveground tanks shall have emergency containment structures, such as dike fields, curbing and containment collection systems, which contain releases from overfills, leaks and spills, when a new tank system is installed or at the next out-of-service inspection for existing tank systems as established in § 245.553(d) (relating to out-of-service inspections).

(1) Permeability of new emergency containment structures installed after October 11, 1997, shall be less than 1×10^{-6} cm/sec at anticipated hydrostatic head and be of sufficient thickness to prevent the released substance from penetrating the containment structure for a minimum of 72 hours, and until the release can be detected and recovered.

(2) Emergency containment structures for existing aboveground storage tanks shall meet one of the following standards at the next out-of-service inspection, prior to the tank being placed back into service.

(i) The standards for new emergency containment structures for aboveground storage tanks in paragraph (1).

(ii) Verification by a professional engineer that the emergency containment structure, coupled with the tank monitoring program and response plan is capable of detecting and recovering a release and is designed to prevent contamination of the waters of this Commonwealth.

(3) All transfers of regulated substances to a tank within the emergency containment shall be monitored by designated personnel for the duration of the transfer.

(e) Emergency containment areas, such as dike fields, shall be able to contain 110% of the capacity of the largest tank in the containment area.

(f) Stormwater shall be removed from the emergency containment area as soon as possible or when the water is in contact with the tank or piping and prior to the capacity of containment being reduced by 10% or more. Manually operated pumps or siphons and manually operated gravity drains may be used to empty the containment. If drain valves are used they shall be secured in the closed position when not in use. Discharge or disposal of substances from the containment structure shall comply with applicable State and Federal requirements.

Cross References

This section cited in 25 Pa. Code § 245.521 (relating to performance standards for aboveground storage tanks).

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§ 245.543. Leak detection requirements.

(a) Aboveground tank systems installed after October 11, 1997, shall provide a method of leak detection capable of detecting a release. The leak detection method shall be monitored at least monthly and shall be installed, calibrated, operated and maintained in accordance with industry practices and manufacturer's specifications.

(1) The area beneath the tank bottom shall be monitored for leakage by visual, mechanical or electronic leak detection methods.

(2) Observation wells outside of the secondary containment structure do not satisfy the leak detection requirements.

(b) Existing aboveground storage tank systems with secondary containment shall implement a monthly leak detection method as required by subsection (a). Monthly visual inspections shall be an acceptable method of leak detection.

(c) Existing aboveground storage tanks without secondary containment under the bottom of the tank that are in contact with the soil, such as vertical flat bottom tanks, and do not have cathodic protection or an internal lining shall be tested for tightness at the next scheduled service inspection after October 11, 1997, and continue testing for tightness at each service inspection thereafter, until the tank is upgraded.

(d) Aboveground piping shall be visually checked for leaks in accordance with the facility operations and maintenance plan.

Cross References

This section cited in 25 Pa. Code § 245.521 (relating to performance standards for aboveground storage tanks); and 25 Pa. Code § 252.3 (relating to scope).

ABOVEGROUND STORAGE TANK INSPECTIONS

§ 245.551. General requirements for third party inspections.

(a) Aboveground storage tank owners and operators shall have their storage tank systems inspected by a Department certified aboveground storage tank inspector at frequencies established in this subchapter. Inspections will check for compliance with State and Federal requirements and adherence to current codes of practice developed by Nationally recognized associations, tank manufacturer's instructions and design engineer's specifications.

(b) Only Department certified inspectors shall be used to satisfy requirements for:

(1) In-service inspections.

(2) Out-of-service inspections.

(3) Installation and modification inspections.

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Cross References

This section cited in 25 Pa. Code § 245.562 (relating to temporary removal-from-service).

§ 245.552. In-service inspections.

(a) The in-service inspection shall follow the guidelines of a Nationally recognized association such as API 653 and API 570.

(b) The in-service inspection shall evaluate the following:

(1) Containment areas.

(2) Foundation.

(3) Tank shell.

(4) Tank roof.

(5) Appurtenances.

(6) Ancillary equipment including piping.

(7) Leak detection method.

(8) Cathodic protection system, if installed.

(c) Inspection information shall be submitted to the Department on a form provided by the Department and shall include the results of the evaluation in subsection (b) and the following:

(1) A determination of the corrosion rate of the shell and piping.

(2) A calculation of the life of the tank shell and piping based on corrosion rate.

(3) The next inspection schedule based on 1/4 of the corrosion rate life with a maximum of 5 years.

(4) The recommendations for maintaining tank system integrity.

(d) Inspection intervals for in-service inspections are as follows:

(1) Aboveground tanks installed after October 11, 1997, shall be initially inspected within 5 years of installation.

(2) Existing tanks shall be initially inspected as follows:

(i) Tanks over 5 years old without a previous inspection shall be inspected by October 11, 1999.

(ii) Tanks with an inspection more than 3 years prior to October 11, 1997, shall be inspected by October 11, 2000.

(iii) Tanks with an inspection within 3 years prior to October 11, 1997, shall be inspected within 6 years of the previous inspection.

(3) Tanks shall have an in-service inspection within 1/4 of the corrosion rate life with a maximum of 5 years from the previous inspection or installation.

(4) An out-of-service inspection may replace an in-service inspection.

(e) Inspection recommendations shall be addressed.

(f) The complete inspection report shall be kept at the facility until the next out-of-service inspection is completed.

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Cross References

This section cited in 25 Pa. Code § 245.526 (relating to piping for aboveground storage tanks); and 25 Pa. Code § 245.562 (relating to temporary removal-from-service).

§ 245.553. Out-of-service inspections.

(a) Inspections shall follow the guidelines of a Nationally recognized association such as API 653, API 570 or ASME.

(b) The out-of-service inspection shall evaluate the following:

(1) Containment areas.

(2) Foundation and supports.

(3) Tank shell.

(4) Tank roof.

(5) Tank bottom.

(6) Appurtenances.

(7) Ancillary equipment including piping.

(8) Leak detection method.

(9) Cathodic protection system, if installed.

(10) Internal linings and coatings, if installed.

(c) Inspection information shall be submitted to the Department on a form provided by the Department and shall include the results of subsection (b) and the following:

(1) A determination of the corrosion rate for tank shell, bottom plates and piping.

(2) A calculation of the tank life and piping life based on the corrosion rate.

(3) The schedule for next out-of-service inspection, based on 1/2 of the corrosion rate life with a maximum of 20 years between inspections.

(4) The recommendations for maintaining tank system integrity and meeting performance standards.

(d) Inspection intervals for out-of-service inspections are as follows:

(1) Tanks installed after October 11, 1997, shall be initially inspected based on measured or similar service corrosion rates. When the corrosion rate is unknown the tanks actual bottom thickness shall be determined by inspection within 10 years of installation to determine the corrosion rate.

(2) Existing tanks shall be initially inspected as follows:

(i) If corrosion rates are not known, tanks shall be inspected within 10 years of installation or by October 11, 2000, whichever is later.

(ii) If corrosion rates can be determined or are known, tanks shall be inspected at 1/2 the corrosion rate life from installation or previous out-of-service inspection or by October 11, 2000, whichever is later.

(3) Tanks shall have an out-of-service inspection at 1/2 of the corrosion rate life with a maximum of 20 years from the last out-of-service inspection.

(e) Deficiencies shall be remedied before the tank is returned to service.

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(f) Aboveground storage tanks which can be completely examined from the exterior are exempt from out-of-service inspections except for tanks that are internally lined.

(g) The completed inspection report for out-of-service inspections shall be kept with the facility records under § 245.516 (relating to recordkeeping requirements).

Cross References

This section cited in 25 Pa. Code § 245.526 (relating to piping for aboveground storage tanks); 25 Pa. Code § 245.542 (relating to containment requirements for aboveground storage tank systems); and 25 Pa. Code § 245.562 (relating to temporary removal-from-service).

§ 245.554. Installation and modification inspections.

(a) Aboveground storage tank systems shall be inspected by a Department certified inspector at the time of installation in accordance with § 245.522 (relating to new aboveground tank installations and reconstructions), and current Nationally recognized association's code of practice and manufacturer's specifications. The inspection report shall be kept for the operational life of the tank.

(b) Major modifications shall be inspected by a Department certified inspector at the time of modification under § 245.524 (relating to aboveground tank modifications) and a current codes of practice developed by Nationally recognized associations prior to being put back in service. The inspection report shall be kept for the operational life of the tank.

(c) Tanks which are relocated or reconstructed shall be inspected by a Department certified inspector and tested for tightness in accordance with § 245.522 and current codes of practice developed by Nationally recognized associations prior to being put in service. The inspection report shall be kept for the operational life of the tank.

Cross References

This section cited in 25 Pa. Code § 241.521 (relating to performance standards for standards for aboveground storage tanks); and 25 Pa. Code § 245.562 (relating to temporary removal-from-service).

CLOSURE AND REMOVAL FROM SERVICE REQUIREMENTS

§ 245.561. Permanent closure or change-in-service.

Before permanent closure or change-in-service is completed, owner/operator shall comply with the following:

(1) At least 30 days before beginning either a permanent closure or change-in-service to an unregulated tank, or within a lesser time as determined by the Department, owner/operator shall notify the Department of its intent to

permanently close or change-in-service from a regulated tank to an unregulated tank, unless the action is in response to a corrective action or waived by the Department.

(2) The owner/operator shall submit an amended registration form to the Department indicating the change in tank status within 30 days after the change in tank status.

(3) The owner/operators shall complete a site assessment to measure for the presence of any release from the storage tank system and a closure report. The assessment of the site shall be made after the notification. The results of the site assessment and the closure report shall be retained for 3 years.

(4) If contaminated soil, sediment, surface water or groundwater, or free product is discovered or confirmed by either direct observation or indicated by the analytical results of sampling, the owner/operator shall proceed with the corrective action as required in Subchapter D (relating to corrective action process for owners and operators of storage tanks and storage tank facilities and other responsible parties) or, if applicable, in accordance with remedial action agreements.

(5) Regulated substance and contents removed from the tank system including piping shall be reused, treated or disposed of in a manner consistent with applicable State and Federal waste management requirements.

(6) Tank systems shall be cleaned, rendered free of hazardous vapors and ventilated if left onsite or tank systems shall be emptied and removed from the site in a manner consistent with current industry practices and Bureau of Land Recycling and Waste Management requirements such as Chapters 263 and 299 (relating to reserved; and storage and transportation of residual waste).

(7) Tanks to be permanently closed and left onsite shall be legibly marked with the date of permanent closure.

(8) The State Fire Marshal shall be notified if the tank is under a fire marshal permit.

(9) Tanks that are to be closed in place shall:

(i) Be rendered inoperable and incapable of storing liquid substance.

(ii) Be secured against unauthorized entry.

(iii) Meet the requirements specified in paragraphs (1)—(8).

Cross References

This section cited in 25 Pa. Code § 245.516 (relating to recordkeeping requirements).

§ 245.562. Temporary removal-from-service.

(a) The owner/operator shall complete and submit an amended registration form to the Department within 30 days after the change in tank status.

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(b) A tank system shall be emptied and regulated substances and contents shall be reused, treated or disposed of in accordance with State and Federal requirements.

(c) A tank shall be secured against unauthorized entry and all piping entering or existing the tank, excluding vents, shall be capped or blinded.

(d) Tank integrity shall be maintained throughout the temporary removal-from-service time and the tank shall be protected against flotation.

(e) Inspection requirements shall be maintained as specified in §§ 245.551—245.554 (relating to aboveground storage tank inspections).

(f) Tanks which are temporarily removed-from-service for 5 years or longer shall meet the requirements for permanent closure.

Subchapter G. SIMPLIFIED PROGRAM FOR SMALL ABOVEGROUND STORAGE TANKS

GENERAL

Sec.
245.601. Purpose.
245.602. Scope.
245.603. General storage tank facility requirements.
245.604. Referenced organizations.

TECHNICAL REQUIREMENTS

Sec.
245.611. Testing requirements for new and substantially modified small aboveground storage tanks.
245.612. Performance and design standards.
245.613. Monitoring standards.
245.614. Requirements for closure.
245.615. Recordkeeping requirements.
245.616. Inspection requirements.

Source

The provisions of this Subchapter G adopted October 10, 1997, effective October 11, 1997, 27 Pa.B. 5341, unless otherwise noted.

Cross References

This subchapter cited in 25 Pa. Code § 245.212 (relating to minimum requirements for obtaining a permit-by-rule); 25 Pa. Code § 245.232 (relating to general requirements); and 25 Pa. Code § 245.502 (relating to scope).

GENERAL

§ 245.601. Purpose.

This subchapter establishes a simplified program of technical standards and requirements for small aboveground storage tanks not exceeding 21,000 gallons capacity and regulated under the act. Regulated aboveground storage tanks are defined in § 245.1 (relating to definitions).

§ 245.602. Scope.

The standards and requirements established in this subchapter shall be applied through the use of appropriate current codes of practice developed by Nationally recognized associations such as, but not limited to, those referenced in § 245.604 (relating to referenced organizations) and through the use of manufacturer's specifications and sound engineering practices. This subchapter is not intended to supersede other State and Federal regulations or jurisdictional requirements when they are more restrictive than the requirements in this part. For certain types of tanks this subchapter may make reference to the requirements for aboveground storage tanks in Subchapter F (relating to technical standards for aboveground storage tanks and facilities).

§ 245.603. General storage tank facility requirements.

(a) The owner/operator of aboveground storage tank facilities with an aggregate aboveground storage capacity greater than 21,000 gallons shall develop and adhere to a Spill Prevention Response Plan (Plan) which addresses the requirements described in Chapter 9 of the act (35 P. S. §§ 6021.901—6021.904). The Plan shall be provided to the Department and updated as necessary. A current copy of the Plan shall be readily available at the storage tank facility at all times.

(b) The owner/operator of aboveground storage tank facilities is responsible to assure that appropriate security measures and procedures based on the facility location are established and implemented to protect the environment and the public. These security measures may include, but are not limited to, fencing, lighting, access control, locked entrances and securing of valves, drains and dispensers.

§ 245.604. Referenced organizations.

(a) Nationally recognized associations which are referenced throughout this subchapter are as follows:

(1) American National Standards Institute (ANSI).
(2) American Petroleum Institute (API).
(3) American Society of Mechanical Engineers (ASME).
(4) American Society for Testing and Materials (ASTM).
(5) National Association of Corrosion Engineers (NACE).
(6) National Fire Protection Association (NFPA).
(7) Petroleum Equipment Institute (PEI).

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(8) Steel Structures Painting Council (SSPC).
(9) Steel Tank Institute (STI).
(10) Underwriters Laboratory (UL).

(b) Nationally recognized codes and standards shall be used in conjunction with manufacturer's specifications to comply with this subchapter. When used to meet the technical standards and requirements of this subchapter, the most current or latest edition of the codes and standards shall be applied. Other Nationally recognized codes and standards, not referenced in this part, may also be used to comply with this subchapter, when appropriate.

(c) When Nationally recognized codes and standards are updated, facilities or storage tank systems installed to previously existing standards prior to the update will not automatically be required to be upgraded to meet the new standard.

Cross References

This section cited in 25 Pa. Code § 245.602 (relating to scope).

TECHNICAL REQUIREMENTS

§ 245.611. Testing requirements for new and substantially modified small aboveground storage tanks.

(a) Tanks installed after October 11, 1997, shall be tested for tightness in accordance with current codes of practice developed by Nationally recognized associations and manufacturer's specifications, except for manufactured, shop built tanks that meet the requirements of subsection (b). The testing shall be completed, as part of the installation process, prior to putting the tank in service.

(b) Manufactured, shop built tanks that are initially tested after full assembly at the plant do not require additional testing at installation if the manufacturer certifies that the tank was tested at the plant and the manufacturer's installation instructions do not specify additional testing.

(c) Tanks that receive major modifications to the tank shell or the tank bottom shall be tested for tightness, in accordance with current codes of practice developed by Nationally recognized associations or manufacturer's specifications, prior to being returned to service.

§ 245.612. Performance and design standards.

(a) Tanks shall be designed, constructed and installed or modified in accordance with current codes of practice developed by Nationally recognized associations such as API, ASME, ASTM, ANSI, STI and UL and the manufacturer's specifications.

(b) Tanks shall have a stable support or foundation capable of adequately supporting the total weight of the tank and its contents when in use. The support or foundation shall meet or exceed the specifications of the tank manufacturer and be designed and constructed in accordance with sound engineering practices.

(c) Ancillary equipment, including piping, shall be designed, installed and modified in accordance with current codes of practice developed by Nationally recognized associations such as API, SSPC, NACE, ASME, PEI and UL and the manufacturer's specifications. Ancillary equipment shall be compatible with the substance stored and shall be adequately protected from corrosion, excessive wear and deterioration. Protective coatings shall be maintained throughout the entire operational life of the storage tank system.

(d) Tanks installed after October 11, 1997, shall be installed with secondary containment in or under the tank bottom to provide monitoring capability to satisfy leak detection requirements in § 245.613 (relating to monitoring standards) and emergency containment to contain possible releases, such as overfills, leaks and spills. Emergency containment shall be sufficiently impermeable to contain any potential release for a minimum of 72 hours and until the release can be detected and fully recovered in an expeditious manner.

(e) Existing tanks which do not meet the requirements specified in subsection (d) shall be upgraded with secondary containment by October 11, 2007, and emergency containment by October 11, 2000.

(f) Tanks installed in underground vaults after October 11, 1997, and used for dispensing Class I and Class II motor fuels shall comply with § 245.523 (relating to aboveground storage tanks in underground vaults).

(g) The exterior of the tank system shall be protected by an appropriate coating or paint which shall be maintained throughout the entire operational life of the tank system.

(h) Tanks which are internally lined shall comply with § 245.534 (relating to interior linings and coatings).

(i) Tanks shall be labeled or marked in a manner consistent with industry standards and which provides for identifying the regulated substance stored from outside the containment area.

§ 245.613. Monitoring standards.

(a) By October 12, 1998, a method of leak detection shall be in use and monitored at least monthly. An automatic sensing device, mechanical device or other appropriate method may be used. This method, at a minimum, shall provide a visual examination of the storage tank system by the owner/operator or designated representative. If releases are detected, they shall be corrected and the provisions of Subchapter D (relating to corrective action process for owners and operators of storage tanks and storage tank facilities and other responsible parties) shall be complied with.

(b) The owner/operator shall assure that a maintenance and general operations check of the storage tank system is performed at least monthly. Deficiencies noted during the check shall be corrected. The small aboveground storage tank general operations and maintenance checklist provided by the owner/

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operator shall be used to document the monthly operations and maintenance check. The operations and maintenance check shall include:

(1) A visual examination of the tank system for deterioration, including, but not limited to, the tank, piping, ancillary equipment, foundation and safety equipment.

(2) A check of the containment areas for accumulation of water and removal of water as necessary.

(3) Confirmation that containment drain valves are secured in the closed position when not in use.

(4) Monitoring of the leak detection system.

(5) A check of vents for restrictions.

(6) A check of ancillary equipment for operational malfunctions.

(7) An investigation of conditions that may be a fire or safety hazard, or pose an environmental hazard.

(8) Observation for evidence of a release of regulated substance from the tank system.

Cross References

This section cited in 25 Pa. Code § 245.612 (relating to performance and design standards); 25 Pa. Code § 245.614 (relating to requirements for closure); and 25 Pa. Code § 252.3 (relating to scope).

§ 245.614. Requirements for closure.

(a) Tank systems shall be cleaned, rendered free from hazardous vapors and ventilated if left onsite or shall be emptied and removed from the site in a manner consistent with current industry practices and Bureau of Land Recycling and Waste Management requirements such as Chapters 263 and 299 (relating to reserved; and storage and transportation of residual waste).

(b) The owner shall conduct a visual examination of the surface, soil and area surrounding and underlying the storage tank system for obvious indications or evidence of a release of regulated substance.

(1) If a release is suspected, it shall be investigated in accordance with § 245.304 (relating to investigation of suspected releases).

(2) If a release is confirmed, it shall be reported to the appropriate Department regional office responsible for the county in which the tank is located in accordance with § 245.305 (relating to reporting releases).

(c) The owner shall complete and submit an amended tank registration form to the Department within 30 days of:

(1) The completion of permanent closure.

(2) Change-in-service status of the tank.

(3) Temporary removal from service.

(d) Temporary removal from service requires that the owner/operator empty the tank system of regulated substances and conduct a visual examination of the area surrounding the tank as required in subsection (b), excluding the surface and

soil underlying any tank bottom in contact with the ground. A tank may be considered to be in a temporary removal from service status when the tank is emptied and intended to remain out of use for 1 year or more.

(1) Temporary removal from service may not exceed 5 years.

(2) Monitoring standards in § 245.613 (relating to monitoring standards) are not required when a tank is reported to the Department as temporarily removed from service.

(3) Inspection of tanks temporarily removed from service shall be performed in accordance with § 245.616 (relating to inspection requirements).

§ 245.615. Recordkeeping requirements.

(a) The owner/operator shall maintain required storage tank system records. If records are maintained offsite, the records shall be easily obtained and provided to the Department upon request.

(b) The following records shall be maintained for the operational life of the tank unless otherwise stated:

(1) Original tank and system installation records and design specifications. This requirement is limited to records currently available for tank systems existing prior to October 11, 1997.

(2) Records of modification to the tank or storage tank system.

(3) The permits issued under Subchapter C (relating to permitting of underground and aboveground storage tank systems and facilities).

(4) Current registration certificates.

(5) Monthly leak detection records and maintenance checklists for the past 12 months.

(6) Third-party inspection reports.

§ 245.616. Inspection requirements.

(a) Required inspections of small aboveground storage tanks shall be conducted by Department certified aboveground storage tank inspectors according to a current Nationally recognized association's code of practice such as API and ASME and according to manufacturer's specifications. Deficiencies noted during the inspection shall be addressed.

(b) After October 11, 1997, small aboveground field constructed storage tanks shall be inspected at installation, reconstruction or relocation and when a major modification activity is performed on the tank shell or the tank bottom plates.

(c) The owner/operator of small aboveground storage tanks storing regulated substances with a capacity greater than 5,000 gallons and owner/operator of small aboveground storage tanks storing highly hazardous substances with a capacity greater than 1,100 gallons shall have in-service inspections conducted every 10 years or at 1/4 of the corrosion rate life with a maximum of 10 years between inspections. Inspections shall be phased in for tanks without a previous inspection as follows:

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(1) New tanks shall be initially inspected within 10 years of installation.

(2) Existing tanks, less than 10 years old without a previous inspection, shall be inspected by October 13, 2003, or 10 years from the date of installation, whichever is later.

(3) Existing tanks over 10 years old, without a previous inspection, shall be inspected by October 11, 2002.

(d) In-service inspections shall evaluate the following:

(1) Containment areas.

(2) Foundation and tank supports.

(3) Tank shell and tank roof, where a roof exists.

(4) Appurtenances.

(5) Ancillary equipment including piping.

(6) Leak detection method, including monthly leak detection records and maintenance checklists.

(7) Cathodic protection system, if installed.

(8) Coatings and protections from deteriorations.

Cross References

This section cited in 25 Pa. Code § 245.614 (relating to requirements for closure).

Subchapter H. FINANCIAL RESPONSIBILITY REQUIREMENTS FOR OWNERS AND OPERATORS OF UNDERGROUND STORAGE TANKS AND STORAGE TANK FACILITIES

Sec.

245.701. Purpose.
245.702. Scope.
245.703. Owner or operator financial responsibility.
245.704. General requirements.
245.705. Owner and operator liability.
245.706. Underground storage tanks not covered by USTIF.
245.707. Coverage amounts for financial responsibility.
245.708. Failure to maintain financial responsibility.

Source

The provisions of this Subchapter H adopted December 23, 1994, effective December 24, 1994, 24 Pa.B. 6515, unless otherwise noted.

Cross References

This subchapter cited in 25 Pa. Code § 245.212 (relating to minimum requirements for obtaining a permit-by-rule); 25 Pa. Code § 245.222 (relating to application requirements); and 25 Pa. Code § 245.423 (relating to registration requirements).

§ 245.701. Purpose.

This subchapter sets forth the requirements for an owner or operator of an underground storage tank to comply with the obligation to have adequate finan-

cial responsibility, as required by section 701 of the act (35 P. S. § 6021.701), and by Federal regulations at 40 CFR 280, Subpart H (relating to financial responsibility).

§ 245.702. Scope.

This subchapter applies to an owner or operator of an underground storage tank regulated under the act.

§ 245.703. Owner or operator financial responsibility.

The owner of the underground storage tank shall comply with the financial responsibility requirements of this subchapter, unless there is a written agreement between the owner and the operator of the underground storage tank setting forth a different arrangement between the owner and operator for provision of financial responsibility. The liability of the owner or operator established under the act for corrective action and for compliance with the requirements for the operation of underground storage tanks will not be affected by this section.

§ 245.704. General requirements.

(a) An owner or operator of an underground storage tank shall continuously participate in the USTIF, unless the EQB has determined that the underground storage tank is an exempt underground storage tank.

(b) An owner or operator of an underground storage tank shall have sufficient financial resources available to continuously meet the USTIF deductibles for both corrective action and third party liability as determined in accordance with § 245.707 (relating to coverage amounts for financial responsibility).

(c) Upon request of the Department, an owner or operator of an underground storage tank shall submit a written certification or provide other written evidence that the owner or operator has sufficient financial resources to meet the USTIF deductible for both corrective action and third party liability as determined in accordance with § 245.707. The certification shall be made on a form provided by the Department.

§ 245.705. Owner and operator liability.

This subchapter does not limit or waive the liability of an owner or operator for corrective action or for third party liability.

§ 245.706. Underground storage tanks not covered by USTIF.

(a) The owner or operator of an exempt underground storage tank shall maintain adequate financial responsibility in accordance with 40 CFR 280, Subpart H (relating to financial responsibility).

(b) Upon request of the Department, an owner or operator of an exempt underground storage tank shall submit a written certification or provide other

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written evidence to the Department that the owner or operator satisfies the requirements of subsection (a). The certification shall be made on a form provided by the Department.

§ 245.707. Coverage amounts for financial responsibility.

The owner or operator of an underground storage tank, other than an exempt underground storage tank, shall comply with the financial responsibility requirements of this subchapter by maintaining sufficient financial resources to provide the coverage for both corrective action and third party liability, in the amounts set forth in paragraphs (1) and (2) for the applicable number of tanks:

(1) *For corrective action*:

Number of tanks	*Amount of required coverage*
1—6	1 × USTIF deductible
7—12	2 × USTIF deductible
13—18	3 × USTIF deductible
19—24	4 × USTIF deductible
25—30	5 × USTIF deductible
31—36	6 × USTIF deductible
37—42	7 × USTIF deductible
43—48	8 × USTIF deductible
49—60	9 × USTIF deductible
61—100	10 × USTIF deductible
101—200	11 × USTIF deductible
201—300	12 × USTIF deductible
301—600	13 × USTIF deductible
over 600	14 × USTIF deductible

(2) *For third party liability*:

Number of tanks	*Amount of required coverage*
1—100	1 × USTIF deductible
over 101	2 × USTIF deductible

Cross References

This section cited in 25 Pa. Code § 245.704 (relating to general requirements).

§ 245.708. Failure to maintain financial responsibility.

The failure of an owner or operator of an underground storage tank to comply with this subchapter shall subject the owner or operator to the enforcement pro09visions in Chapter 13 of the act (35 P. S. §§ 6021.1301—6021.1315).

[Next page is 250-1.]

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CHAPTER 260a. HAZARDOUS WASTE MANAGEMENT SYSTEM: GENERAL

Subchap.		Sec.
A.	**GENERAL**	**260a.1**
B.	**DEFINITIONS**	**260a.10**
C.	**RULEMAKING PETITIONS**	**260a.20**

Authority

The provisions of this Chapter 260a issued under sections 105, 401—403 and 501 of the Solid Waste Management Act (35 P. S. §§ 6018.105, 6018.401—6018.403 and 6018.501); sections 105, 402 and 501 of The Clean Streams Law (35 P. S. §§ 691.105, 691.402 and 691.501); and section 1920-A of The Administrative Code of 1929 (71 P. S. § 510-20); amended under section 105(a) of the Solid Waste Management Act (35 P. S. § 6018.105(a)); sections 5(b) and 402 of The Clean Streams Law (35 P. S. §§ 691.5(b) and 691.402); section 302 of the Municipal Waste Planning, Recycling and Waste Reduction Act (53 P. S. § 4000.302); section 480(e) of the Pennsylvania Used Oil Recycling Act (58 P. S. § 480(e)); and sections 1905-A, 1917-A and 1920-A of The Administrative Code of 1929 (71 P. S. §§ 510-5, 510-17 and 510-20); amended under sections 105, 402 and 501 of the Solid Waste Management Act (35 P. S. §§ 6018.105, 6018.402 and 6018.501); sections 303 and 305(e)(2) of the Hazardous Sites Cleanup Act (35 P. S. §§ 6020.303 and 6020.305(e)(2)); sections 5, 402 and 501 of The Clean Streams Law (35 P. S. §§ 691.5, 691.402 and 691.501); and section 1920-A of The Administrative Code of 1929 (71 P. S. § 510-20), unless otherwise noted.

Source

The provisions of this Chapter 260a adopted April 30, 1999, effective May 1, 1999, 29 Pa.B. 2367, unless otherwise noted.

Cross References

This chapter cited in 25 Pa. Code § 252.3 (relating to scope); 25 Pa. Code § 264a.141 (relating to definitions); and 25 Pa. Code § 298.10 (relating to applicability).

Subchapter A. GENERAL

Sec.
260a.1. Incorporation by reference, purpose, scope and applicability.
260a.2. Availability of information.
260a.3. Terminology and citations related to Federal Regulations.

§ 260a.1. Incorporation by reference, purpose, scope and applicability.

(a) Except as expressly provided in this chapter, 40 CFR Part 260 and its appendices (relating to hazardous waste management system: general) are incorporated by reference.

(b) Regarding the requirements incorporated by reference, nothing contained in this article relieves or limits a person or municipality who generates, transports, stores, treats or disposes of hazardous waste from complying with the Pennsylvania law, including: The Clean Streams Law (35 P. S. §§ 691.1—691.1001); the Hazardous Sites Cleanup Act (35 P. S. §§ 6020.101—6020.1305);

the Air Pollution Control Act (35 P. S. §§ 4001—4015); the Surface Mining Conservation and Reclamation Act (52 P. S. §§ 1396.1—1396.31); the Dam Safety and Encroachments Act (32 P. S. §§ 693.1—693.27); the Pennsylvania Bituminous Coal Mine Act (52 P. S. §§ 1406.1—1406.21); the Pennsylvania Anthracite Coal Mine Act (52 P. S. §§ 70-101—70-1405); and the act of July 9, 1976 (P. L. 931, No. 178) (52 P. S. §§ 27.7-1—27.7-9).

Cross References

This section cited in 25 Pa. Code § 298.1 (relating to definitions); 25 Pa. Code § 298.55 (relating to analysis plan); and 25 Pa. Code § 298.61 (relating to restrictions on burning).

§ 260a.2. Availability of information.

40 CFR 260.2 (relating to availability of information) is not incorporated by reference.

§ 260a.3. Terminology and citations related to Federal regulations.

(a) For purposes of interfacing with 40 CFR Parts 260—279, the following terms apply, unless otherwise noted:

(1) The terms "Administrator," "Regional Administrator," "Assistant Administrator," "Assistant Administrator for Solid Waste and Emergency Response" and "State Director" are substituted with "Department."

(2) When referring to an operating permit or to the Federal hazardous waste program, "Resource Conservation and Recovery Act (42 U.S.C.A. §§ 6901—6986)," "RCRA," "Subtitle C of RCRA," "RCRA Subtitle C" or "Subtitle C" is substituted with the act.

(3) "Environmental Protection Agency" or "EPA" and all names or associated acronyms are substituted with "Department" except when referring to the terms "EPA Form," "EPA Identification Number," "EPA Acknowledgment of Consent," "EPA Hazardous Waste Number," "EPA publication," "EPA publication number," "EPA Test Methods" and "EPA Guidance" including any mailing addresses associated with these terms.

(4) "Used oil" is substituted with "waste oil."

(5) "State," "authorized state," "approved state" or "approved program" is substituted with "the Commonwealth."

(6) Whenever the regulations require compliance with procedures found in 40 CFR Part 270 (relating to EPA administered permit programs: the hazardous waste permit program), compliance is accomplished by the procedures found in Chapter 270a (relating to hazardous waste permit program).

(7) The Commonwealth equivalent of 40 CFR Part 273 (relating to universal waste management) is found in Chapter 266b (relating to universal waste management).

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(8) The Commonwealth equivalent of 40 CFR Part 279 (relating to standards for the management of used oil) is found in Chapter 298 (relating to management of waste oil).

(b) Federal regulations that are cited in this article or that are cross referenced in the Federal regulations incorporated by reference include any Pennsylvania modifications made to those Federal regulations.

(c) References to 40 CFR Part 124 (relating to procedures for decision making) found in Federal regulations incorporated by reference are substituted with Pennsylvania procedures found in Chapter 270a.

(d) References to the "Department of Transportation" or "DOT" mean the United States Department of Transportation.

(e) The effective date for the *Code of Federal Regulations* incorporated by reference in this article is May 1, 1999. The incorporation by reference includes any subsequent modifications and additions to the CFR incorporated in this article.

Source

The provisions of this § 260a.3 amended June 1, 2001, effective June 2, 2001, 31 Pa.B. 2873. Immediately preceding text appears at serial pages (254872) to (254873).

Cross References

This section cited in 25 Pa. Code § 260a.10 (relating to definitions); 25 Pa. Code § 261a.1 (relating to incorporation by reference, purpose and scope); 25 Pa. Code § 262a.12 (relating to EPA identification numbers); 25 Pa. Code § 262a.21 (relating to acquisition of manifests); 25 Pa. Code § 262a.23 (relating to use of the manifest); 25 Pa. Code § 262a.50 (relating to applicability); 25 Pa. Code § 262a.80 (relating to applicability); 25 Pa. Code § 263a.11 (relating to EPA identification number); 25 Pa. Code § 263a.20 (relating to manifest system); 25 Pa. Code § 264a.12 (relating to required notices); 25 Pa. Code § 264a.147 (relating to liability requirements); 25 Pa. Code § 265a.12 (relating to required notices); 25 Pa. Code § 265a.141 (relating to definitions); 25 Pa. Code § 265a.147 (relating to liability requirements); 25 Pa. Code § 266b.30 (relating to applicability); 25 Pa. Code § 266b.60 (relating to applicability); 25 Pa. Code § 268a.1 (relating to incorporation by reference, purpose, scope and applicability); 25 Pa. Code § 270a.2 (relating to definitions); 25 Pa. Code § 270a.5 (relating to noncomplying and program reporting by Director); 25 Pa. Code § 270a.10 (relating to general application requirements and permit issuance procedures); 25 Pa. Code § 270a.60 (relating to permits-by-rule); 25 Pa. Code § 270a.72 (relating to changes during interim status); and 25 Pa. Code § 298.12 (relating to prohibitions).

Subchapter B. DEFINITIONS

Sec.
260a.10. Definitions.

§ 260a.10. Definitions.

A term defined in this section replaces the definition of the term in 40 CFR 260.10, or, in situations for which no term exists in 40 CFR 260.10, the term shall

be defined in accordance with this section. The substitution of terms in § 260a.3 (relating to terminology and citations related to Federal regulations) does not apply to the incorporated definition of "EPA region," "State," "United States," "Administrator" and "Regional Administrator."

Act—The Solid Waste Management Act (35 P. S. §§ 6018.101—6018.1003).

Disposal—The incineration, deposition, injection, dumping, spilling, leaking or placing of solid waste into or on the land or water in a manner that the solid waste or a constituent of the solid waste enters the environment, is emitted into the air or is discharged to the waters of this Commonwealth.

Existing tank system or *existing component*—The Federal definition for ''existing tank system or existing component'' in 40 CFR 260.10 is incorporated by reference except that the date referenced is January 16, 1993, instead of July 14, 1986.

Facility—The land, structures and other appurtenances or improvements where municipal or residual waste disposal or processing is permitted or takes place, or where hazardous waste is treated, stored or disposed.

Fund—The Host Municipalities Fund.

Hazardous Sites Cleanup Act—The Hazardous Sites Cleanup Act (35 P. S. §§ 6020.101—6020.1305).

Hazardous Sites Cleanup Fund—The fund established by section 901 of the Hazardous Sites Cleanup Act (35 P. S. § 6020.901).

Host municipality—A municipality, other than a county, where a qualifying facility is located, either in whole or in part, within its established corporate boundaries.

Management or *hazardous waste management*—The entire process, or a part thereof, of storage, collection, transportation, processing, treatment and disposal of solid wastes by a person engaging in the process. The term ''hazardous waste management'' refers to management of hazardous waste.

New hazardous waste management facility or *new facility*—The Federal definition for ''new hazardous waste management facility or new facility'' in 40 CFR 260.10 is incorporated by reference except that the date referenced is November 19, 1980, instead of October 21, 1976.

New tank system or *new tank component*—The Federal definition for ''new tank system or new tank component'' in 40 CFR 260.10 is incorporated by reference except that the date referenced is January 16, 1993, instead of July 14, 1986.

Pennsylvania hazardous waste facilities plan—A plan required by sections 104(14) and 105(f) of the act (35 P. S. §§ 6018.104(14) and 6018.105(f)) and adopted by the EQB which identifies current and future hazardous waste treatment and disposal facilities necessary for the proper management of hazardous waste in this Commonwealth.

Person—An individual, partnership, corporation, association, institution, cooperative enterprise, municipal authority, Federal government or agency,

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State institution and agency (including, but not limited to, the Department of General Services and the State Public School Buildings Authority), or other legal entity which is recognized by law as the subject of rights and duties. In any provision of the act prescribing a fine, imprisonment or penalty, or a combination of the foregoing, the term includes the officers and directors of a corporation or other legal entity having officers and directors.

RCRA—The Federal Solid Waste Disposal Act, as amended by the Resource Conservation and Recovery Act of 1976 (42 U.S.C.A. §§ 6901—6986).

Registered professional engineer or *professional engineer*—An engineer registered to practice engineering in this Commonwealth.

Registered professional geologist or *professional geologist*—A geologist registered to practice geology in this Commonwealth.

Responsible official—For corporations, a corporate officer; for limited partnerships, a general partner; for all other partnerships, a partner; for a sole proprietorship, the proprietor; for a municipal, state or Federal authority or agency, an executive officer or ranking elected official responsible for compliance of the hazardous waste activities and facilities of the authority or agency with all applicable rules and regulations.

Source reduction—The reduction or elimination of the quantity or toxicity of hazardous waste generated. Source reduction may be achieved through changes within the production process, including process modifications, feedstock substitutions, improvements in feedstock purity, shipping and packing modifications, housekeeping and management practices, increases in the efficiency of machinery and recycling within a process. The term does not include dewatering, compaction, reclamation, treatment, or the use or reuse of waste.

State manifest document number—The state abbreviation, the letter and the unique number assigned to the manifest, usually preprinted on the form, for recording and reporting purposes.

Storage—The containment of a waste on a temporary basis that does not constitute disposal of the waste. It will be presumed that the containment of waste in excess of 1 year constitutes disposal. This presumption can be overcome by clear and convincing evidence to the contrary.

Transportation—The offsite removal of solid waste at any time after generation.

Treatment—

(i) A method, technique or process, including neutralization, designed to change the physical, chemical or biological character or composition of waste to neutralize the waste or to render the waste nonhazardous, safer for transport, suitable for recovery, suitable for storage, or reduced in volume.

(ii) The term includes an activity or processing designed to change the physical form or chemical composition of waste to render it neutral or nonhazardous.

Source

The provisions of this § 260a.10 amended September 7, 2001, effective September 8, 2001, 31 Pa.B. 5075; amended December 13, 2002, effective December 14, 2002, 32 Pa.B. 6102. Immediately preceding text appears at serial pages (282462) to (282464).

Cross References

This section cited in 25 Pa. Code § 269a.1 (relating to definitions); 25 Pa. Code § 269a.101 (relating to definitions); and 25 Pa.Code § 298.1 (relating to definitions).

Subchapter C. RULEMAKING PETITIONS

Sec.
260a.20. Rulemaking petitions.
260a.30. Variances from classification as a solid waste.

§ 260a.20. Rulemaking petitions.

Each petition shall be submitted in accordance with Chapter 23 (relating to Environmental Quality Board—policy for processing petitions—statement of policy) instead of the procedures in 40 CFR 260.20(b)—(e) (relating to general).

§ 260a.30. Variances from classification as a solid waste.

The coproduct transition scheme is as follows:

(1) Those materials previously regulated as coproducts prior to May 1, 1999, and that are not otherwise excluded as solid wastes, continue to be regulated as if excluded from classification as a solid waste until a variance from classification as a solid waste under 40 CFR 260.30 (relating to variances from classification as a solid waste) is acted upon by the Department. The request for a variance shall be filed by May 1, 2001.

(2) To qualify under paragraph (1), a person producing, selling, transferring, possessing or using a material as a coproduct not exempt from regulation under other provisions of this article shall submit by August 13, 1999, a written notification to the Department that the exemption in paragraph (1) applies to the person's activity.

Source

The provisions of this § 260a.30 corrected May 14, 1999, effective May 1, 1999, 29 Pa.B. 2576.

[Next page is 261-1.]

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CHAPTER 261a. IDENTIFICATION AND LISTING OF HAZARDOUS WASTE

Subchap. Sec.
A. GENERAL 261a.1
D. LISTS OF HAZARDOUS WASTES 261a.32

Authority

The provisions of this Chapter 261a issued under sections 105, 401—403 and 501 of the Solid Waste Management Act (35 P. S. §§ 6018.105, 6018.401—6018.403 and 6018.501); sections 105, 402 and 501 of The Clean Streams Law (35 P. S. §§ 691.105, 691.402 and 691.501); and section 1920-A of The Administrative Code of 1929 (71 P. S. § 510-20); amended under section 105(a) of the Solid Waste Management Act (35 P. S. § 6018.105(a)); sections 5(b) and 402 of The Clean Streams Law (35 P. S. §§ 691.5(b) and 691.402); section 302 of the Municipal Waste Planning Recycling and Waste Reduction Act (58 P. S. § 4000.302); section 480(e) of the Pennsylvania Used Oil Recycling Act (58 P. S. § 480(e)); and sections 1905-A, 1917-A and 1920-A of The Administrative Code of 1929 (71 P. S. §§ 510-5, 510-17 and 510-20); amended under section 207(a) of the Small Business and Household Pollution Prevention Program Act (35 P. S. § 6029.207(a)); section 105(a) of the Solid Waste Management Act (35 P. S. § 6018.105(a)); section 4(a) of the Household Hazardous Waste Funding Act (35 P. S. § 6025.4(a)); sections 5(b), 304 and 402 of The Clean Streams Law (35 P. S. §§ 691.5(b), 691.304 and 691.402); section 302 of the Municipal Waste Planning, Recycling and Waste Reduction Act (53 P. S. § 4000.302); and sections 1917-A and 1920-A of The Administrative Code of 1929 (71 P. S. §§ 510-17 and 510-20), unless otherwise noted.

Source

The provisions of this Chapter 261a adopted April 30, 1999, effective May 1, 1999, 29 Pa.B. 2367, unless otherwise noted.

Cross References

This chapter cited in 25 Pa. Code § 252.3 (relating to scope); 25 Pa. Code § 264a.1 (relating to incorporation by reference, purpose, scope and reference); 25 Pa. Code § 265a.1 (relating to incorporation by reference, purpose, scope and applicability); 25 Pa. Code § 266b.2 (relating to applicability—mercury-containing devices); 25 Pa. Code § 266b.11 (relating to waste management for universal waste mercury-containing devices); 25 Pa. Code § 266b.31 (relating to waste management for universal waste mercury-containing devices); 25 Pa. Code § 287.1 (relating to definitions); 25 Pa. Code § 287.54 (relating to chemical analysis of waste); 25 Pa. Code § 287.102 (relating to permit by rule); 25 Pa. Code § 287.132 (relating to chemical analysis of waste); 25 Pa. Code § 298.10 (relating to applicability); 25 Pa. Code § 298.54 (relating to waste oil management); and 25 Pa. Code § 298.55 (relating to analysis plan).

Subchapter A. GENERAL

Sec.
261a.1. Incorporation by reference, purpose and scope.
261a.2. Definition of ‘‘solid waste.’’
261a.3. Definition of ‘‘hazardous waste.’’
261a.4. Exclusions.
261a.5. Special requirements for hazardous waste generated by conditionally exempt small quantity generators.

261a.6. Requirements for recyclable materials.
261a.7. Residues of hazardous waste in empty containers.
261a.8. Requirements for universal rule.

§ 261a.1. Incorporation by reference, purpose and scope.

Except as expressly provided in this chapter, 40 CFR Part 261 and its appendices (relating to identification and listing of hazardous waste) are incorporated by reference. The substitution of terms in § 260a.3(a)(1) (relating to terminology and citations related to Federal regulations) does not apply to 40 CFR 261.4(f)(1), 261.10 and 261.11 (relating to notification of treatability studies; criteria for identifying the characteristics of hazardous waste; and criteria for listing hazardous waste). The substitution of terms in § 260a.3(a)(3) does not apply to Appendix IX (relating to wastes excluded under §§ 260.20 and 260.22) of the CFR.

Cross References

This section cited in 25 Pa. Code § 271.1 (relating to definitions); 25 Pa. Code § 272.501 (relating to scope); 25 Pa. Code § 287.1 (relating to definitions); 25 Pa. Code § 287.8 (relating to coproduct determinations); 25 Pa. Code § 287.54 (relating to chemical analysis of waste); 25 Pa. Code § 287.132 (relating to chemical analysis of waste); 25 Pa. Code § 298.10 (relating to applicability); 25 Pa. Code § 298.40 (relating to applicability); 25 Pa. Code § 298.44 (relating to rebuttable presumption for waste oil and flash point screening); 25 Pa. Code § 298.53 (relating to rebuttable presumption for waste oil and flash point screening); and 25 Pa. Code § 298.63 (relating to rebuttable presumption for waste oil).

§ 261a.2. Definition of "solid waste."

Materials that are excluded from the definition of "solid waste" in 40 CFR 261.2(c)—(e) (relating to the definition of "solid waste") shall be managed in accordance with Chapters 287—299 (relating to residual waste management).

Source

The provisions of this § 261a.2 adopted June 1, 2001, effective June 2, 2001, 31 Pa.B. 2873.

§ 261a.3. Definition of "hazardous waste."

(a) 40 CFR 261.3(c)(2)(ii)(C) (relating to certain non-wastewater residues such as slag resulting from HTMR processing of K061, K062 or F006 waste) is not incorporated by reference.

(b) In addition to the requirements incorporated by reference, except when the waste is contaminated media subject to remediation, when it is not promptly possible to determine if a material will be a hazardous waste, the material shall be managed as a hazardous waste until the determination is made that indicates it is not a hazardous waste.

Source

The provisions of this § 261a.3 amended December 13, 2002, effective December 14, 2002, 32 Pa.B. 6102. Immediatelt preceding text appears at serial page (284428).

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§ 261a.4. Exclusions.

In addition to the requirements incorporated by reference:

(1) The exclusion in 40 CFR 261.4(b)(1) (relating to exclusions) does not apply to household hazardous waste as defined in § 271.1 (relating to definitions) if the waste is collected as part of a collection event or collected at an out-of-State household hazardous waste collection and brought into this Commonwealth for processing, treatment, storage or disposal.

(2) A copy of the written State agreement required by 40 CFR 261.4(b)(11)(ii) that includes a provision to assess the groundwater and the need for further remediation once the free phase recovery is completed for free phase hydrocarbon recovery operations shall be submitted to: Pennsylvania Department of Environmental Protection, Bureau of Land Recycling and Waste Management, Division of Hazardous Waste Management, Post Office Box 8471, Harrisburg, Pennsylvania 17105-8471.

Source

The provisions of this § 261a.4 amended October 5, 2001, effective October 6, 2001, 31 Pa.B. 5547. Immediately preceding text appears at serial page (280178).

§ 261a.5. Special requirements for hazardous waste generated by conditionally exempt small quantity generators.

(a) The reference to 40 CFR Part 279 in 40 CFR 261.5(c)(4) and (j) (relating to special requirements for hazardous waste generated by conditionally exempt small quantity generators) is replaced with Chapter 298 (relating to management of waste oil).

(b) In addition to the requirements incorporated by reference, a conditionally exempt small quantity generator may not dispose of hazardous waste in a municipal or residual waste landfill in this Commonwealth.

(c) A conditionally exempt small quantity generator complying with this subchapter and 40 CFR 261.5 is deemed to have a license for the transportation of those conditionally exempt small quantity generator wastes generated by the generator's own operation.

Source

The provision of this § 261a.5 amended June 1, 2001, effective June 2, 2001, 31 Pa.B. 2873; amended December 13, 2002, effective December 14, 2002, 32 Pa.B. 6102. Immediately preceding text appears at serial page (284429).

Cross References

This section cited in 25 Pa. Code § 264a.11 (relating to identification number and transporter license); and 25 Pa. Code § 265a.11 (relating to identification number and transporter license).

§ 261a.6. Requirements for recyclable materials.

(a) The reference to "Part 279 of this chapter" in 40 CFR 261.6(a)(4) (relating to requirements for recyclable materials) is replaced with Chapter 298 (relating to management of waste oil).

(b) 40 CFR 261.6(c) is not incorporated by reference.

(c) Instead of 40 CFR 261.6(c), owners and operators of facilities that store or treat recyclable materials are regulated under all applicable and incorporated provisions of 40 CFR Parts 264 and 265, Subparts A—L, AA, BB, CC and DD; 40 CFR Part 264 Subpart X; 40 CFR Parts 266 and 270, except as provided in 40 CFR 261.6(a).

(1) In addition, owners and operators of facilities regulated under this section are subject to the applicable provisions of:

(i) Chapter 264a and Chapter 265a, Subchapters A, B, D, E, G—J and P.

(ii) Chapter 264a, Subchapters X and DD.

(iii) Chapters 266a and 270a.

(2) Recycling processes that are not treatment are exempt from regulation except as provided in 40 CFR 261.6(d).

(3) The sizing, shaping or sorting of recyclable materials will not be considered treatment for purposes of this section.

(d) The requirements of §§ 270a.3, 264a.82, 264a.83, 265a.82 and 265a.83 do not apply to facilities or those portions of facilities that store or treat recyclable materials.

(e) References to § 279.11 in 40 CFR 261.6 are replaced with § 298.11 (relating to waste oil specifications).

Source

The provisions of this § 261a.6 amended June 1, 2001, effective June 2, 2001, 31 Pa.B. 2873. Immediately preceding text appears at serial pages (272702) to (272703).

Cross References

This section cited in 25 Pa. Code § 266a.70 (relating to applicability and requirements); 25 Pa. Code § 266a.80 (relating to applicability and requirements); and 25 Pa. Code § 287.8 (relating to coproduct determinations).

§ 261a.7. Residues of hazardous waste in empty containers.

(a) Hazardous waste removed from either an empty container or an inner liner removed from an empty container, as defined in 40 CFR 261.7(b) (relating to residues of hazardous waste in empty containers), is subject to this chapter and Chapters 262a—265a, 268a and 270a.

(b) For purposes of this section, the term ''containers'' includes tanks.

Cross References

This section cited in 25 Pa. Code § 298.40 (relating to applicability).

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§ 261a.8. Requirements for universal waste.

In addition to the requirements incorporated by reference, mercury-containing devices as defined in § 266b.3 (relating to definitions) are included as wastes subject to regulation under Chapter 266b (relating to universal waste management).

Source

The provisions of this § 261a.8 adopted December 22, 2000, effective December 23, 2000, 30 Pa.B. 6587.

Subchapter D. LISTS OF HAZARDOUS WASTES

Sec.
261a.32. Hazardous wastes from specific sources.

Authority

The provisions of this Subchapter D issued under setion 105(a) of the Solid Waste Management Act (35 P. S. § 6018.105(a)), unless otherwise noted.

Source

The provisions of this Subchapter D adopted February 10, 2006, effective February 11, 2006, 36 Pa.B. 705, unless otherwise noted.

§ 261a.32. Hazardous wastes from specific sources.

In addition to the requirements for lists of hazardous wastes incorporated by reference in 40 CFR 261.32 (relating to hazardous waste from specific sources), the solid wastes listed in Appendix IXa (relating to wastes excluded under 25 Pa. Code § 260a.20 and 40 CFR 260.20 and 260.22) are excluded under §§ 260a.1 and 260a.20 (relating to incorporation by reference, purpose, scope and applicability; and rulemaking petitions).

APPENDIX IXa. WASTES EXCLUDED UNDER 25 Pa. Code § 260a.20 AND 40 CFR 260.20 AND 260.22.

Table 2a. Wastes Excluded from Specific Sources

Facility	*Address*	*Waste Description*
Max Environmental Technologies, Inc.	233 Max Lane Yukon, PA 15698	Electric arc furnace dust (EAFD) that has been treated on site by MAX Environmental Technologies, Inc. (MAX) at a maximum annual rate of 300,000 cubic yards per year and disposed of in a Permitted Resource Conservation and Recovery Act Subtitle D/ Pennsylvania Class 1 residual waste landfill that has groundwater monitoring. (1) *Delisting Levels:*

Facility	*Address*	*Waste Description*
		(i) The constituent concentrations measured in either of the extracts specified in paragraph (2) may not exceed the following levels (mg/L): Antimony-0.206; Arsenic-0.0094; Barium-21; Beryllium-0.416; Cadmium-0.11; Chromium-0.60; Lead-0.75; Mercury-0.025; Nickel-11.0; Selenium-0.58; Silver-0.14; Thallium-0.088; Vanadium-21.1; Zinc-4.3.
		(ii) Total mercury may not exceed 1 mg/kg.
		(2) *Verification Testing:*
		(i) On a batch basis, MAX must analyze a representative sample of the waste using the following:
		(A) The Toxicity Characteristic Leaching Procedure (TCLP) , test Method 1311 in ''Test Methods for Evaluating Solid Waste. Physical/Chemical Methods.'' EPA publication SW-846, as incorporated by reference in 40 CFR 260.11.
		(B) The TCLP as referenced above with an extraction fluid of pH 12 ±0.05 standard units.
		(C) SW-846 Method 7470 for mercury.
		(ii) The constituent concentrations measured must be less than the delisting levels established in paragraph (1).
		(3) *Changes in Operating Conditions:*
		(i) If any of the approved EAFD generators significantly changes the manufacturing process or chemicals used in the manufacturing process or MAX significantly changes the treatment process or the type of chemicals used in the treatment process, MAX must notify the Department of the changes in writing.
		(ii) MAX must handle wastes generated after the process change as hazardous until MAX has demonstrated that the wastes continue to meet the delisting levels set forth in paragraph (1) and that no new hazardous constituents listed in Appendix VIII of Part 261 have been introduced and MAX has received written approval from the Department.
		(4) *Data Submittals:*

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Facility	*Address*	*Waste Description*
		(i) MAX must submit the data obtained through routine batch verification testing, as required by other conditions of this rule or conditions of the permit, to the Pennsylvania Department of Environmental Protection Southwest Region, 400 Waterfront Drive, Pittsburgh, Pennsylvania 15222.
		(ii) The data from the initial full scale batch treatments following permit modification and construction of the treatment unit shall be submitted to the Department as it becomes available and prior to disposal of those batches.
		(iii) The data submission frequency can be modified by the Department upon demonstration that the treatment method is effective.
		(iv) All data must be accompanied by a signed copy of the certification statement in 40 CFR 260.22(i)(12).
		(v) MAX must compile, summarize, and maintain on site for a minimum of 5 years records of operating conditions and analytical data. MAX must make these records available for inspection.
		(5) *Reopener Language:*
		(i) If, at any time after disposal of the delisted waste, MAX possesses or is otherwise made aware of any data for any of the approved disposal facilities (including but not limited to leachate data or groundwater monitoring data) relevant to the delisted waste indicating that any constituent identified in paragraph (1) is at a level in the leachate higher than the delisting level established in paragraph (1), or is at a level in the groundwater higher than the specific facility action levels, then MAX or the disposal facility must report such data, in writing, to the Regional Director of the Pennsylvania Department of Environmental Protection Southwest Region within 10 days of first possessing or being made aware of that data.

Facility	*Address*	*Waste Description*
		(ii) Based on the information described in subparagraph (i) and any other information received from any source, the Regional Director will make a preliminary determination as to whether the reported information requires Department action to protect human health or the environment. Further action may include suspending or revoking the exclusion or other appropriate response necessary to protect human health and the environment.
		(iii) If the Regional Director determines that the reported information does require Department action, the Regional Director will notify MAX in writing of the actions the Regional Director believes are necessary to protect human health and the environment. The notice shall include a statement of the proposed action and a statement providing MAX and/or the approved disposal facility with an opportunity to present information as to why the proposed Department action is not necessary or to suggest an alternative action. MAX and/or the approved disposal facility shall have 30 days from the date of the Regional Director's notice to present the information.
		(iv) If after 30 days MAX and/or the approved disposal facility presents no further information, the Regional Director will issue a final written determination describing the Department actions that are necessary to protect human health or the environment. Any required action described in the Regional Director's determination shall become effective immediately, unless the Regional Director provides otherwise.

Authority

The provisions of this Appendix IXa issued under section 105(a) of the Solid Waste Management Act (35 P. S. § 6018.105(a)).

Source

The provisions of this Appendix IXa adopted February 10, 2006, effective February 11, 2006, 36 Pa.B. 705.

[Next page is 262-1.]

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CHAPTER 262a. STANDARDS APPLICABLE TO GENERATORS OF HAZARDOUS WASTE

Subchap.		Sec.
A.	GENERAL	262a.10
B.	MANIFEST	262a.20
C.	PRETRANSPORT REQUIREMENTS	262a.34
D.	RECORDKEEPING AND REPORTING	262a.41
E.	EXPORTS OF HAZARDOUS WASTE	262a.55
H.	TRANSFRONTIER SHIPMENTS OF HAZARDOUS WASTE FOR RECOVERY WITHIN THE OECD	262a.80
I.	SOURCE REDUCTION STRATEGY	262a.100

Authority

The provisions of this Chapter 262a issued under sections 105, 401—403 and 501 of the Solid Waste Management Act (35 P. S. §§ 6018.105, 6018.401—6018.403 and 6018.501); sections 105, 402 and 501 of The Clean Streams Law (35 P. S. §§ 691.105, 691.402 and 691.501); and section 1920-A of The Administrative Code of 1929 (71 P. S. § 510-20), unless otherwise noted.

Source

The provisions of this Chapter 262a adopted April 30, 1999, effective May 1, 1999, 29 Pa.B. 2367, unless otherwise noted.

Cross References

This chapter cited in 25 Pa. Code § 252.3 (relating to scope); 25 Pa. Code § 261a.7 (relating to residues of hazardous waste in empty containers); 25 Pa. Code § 266b.11 (relating to waste management for universal waste mercury-containing devices); 25 Pa. Code § 266b.31 (relating to waste management for universal waste mercury-containing devices); 25 Pa. Code § 270a.60 (relating to permits by rule); 25 Pa. Code § 272.541 (relating to basic requirements); 25 Pa. Code § 272.551 (relating to household hazardous waste transportation, storage and disposal; and 25 Pa. Code § 298.10 (relating to applicability).

Subchapter A. GENERAL

Sec.
262a.10. Incorporation by reference, purpose, scope and applicability.
262a.11. Hazardous waste determination.
262a.12. EPA identification numbers.

§ 262a.10. Incorporation by reference, purpose, scope and applicability.

Except as expressly provided in this chapter, 40 CFR Part 262 and its appendices (relating to standards applicable to generators of hazardous waste) are incorporated by reference. In 40 CFR 262.10(g) (relating to purpose, scope and applicability) the term ‘‘section 3008 of the act’’ is replaced with ‘‘Article VI of the Solid Waste Management Act (35 P. S. §§ 6018.601—6018.617).”

Cross References

This section cited in 25 Pa. Code § 272.541 (relating to collection contractor).

§ 262a.11. Hazardous waste determination.

In addition to the requirements incorporated by reference, a determination that a waste is not hazardous under 40 CFR 262.11 (relating to hazardous waste determination) does not preclude the Department from determining the waste to be hazardous, using the characteristics and testing methods set forth in 40 CFR Part 261 (relating to identification and listing of hazardous waste).

Source

The provisions of this § 262a.11 adopted December 13, 2002, effective December 14, 2002, 32 Pa.B. 6102.

§ 262a.12. EPA identification numbers.

(a) Regarding the requirements incorporated by reference, the substitution of terms in § 260a.3 (relating to terminology and citations related to Federal regulations) does not apply to the incorporation by reference of 40 CFR 262.12 (relating to EPA identification numbers).

(b) In addition to the requirements incorporated by reference:

(1) A generator shall submit a subsequent notification to the Department if:

(i) The generator activity moves to another location.

(ii) The generator facility's designated contact person changes.

(iii) The ownership of the generator facility changes.

(iv) The type of regulated activity that takes place at the generator facility changes.

(v) The generator's facility class changes, except when the facility class change is temporary.

(2) A generator shall offer a shipment of hazardous waste only to a transporter with a valid license issued by the Department.

Source

The provisions of this § 262a.12 amended December 13, 2002, effective December 14, 2002, 32 Pa.B. 6102. Immediately preceding text appears at serial page (284432).

Cross References

This section cited in 25 Pa. Code § 272.541 (relating to collection contractor).

Subchapter B. MANIFEST

Sec.

262a.20. General requirements.
262a.21. Acquisition of manifests.
262a.22. Number of copies.
262a.23. Use of the manifest.

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§ 262a.20. General requirements.

40 CFR 262.20 (b) and (c) (relating to general requirements) is not incorporated by reference. In addition to the requirements incorporated by reference, a generator shall:

(1) Complete the manifest form in its entirety and distribute manifest copies in accordance with the instructions for the manifest, except that generators need not submit copies of manifests to the Department unless required by § 262a.23(a)(2) (relating to use of the manifest).

(2) List no more than four waste streams on one manifest. If the generator is transporting or offering for transportation more than four different hazardous waste streams for offsite treatment, storage or disposal, the generator shall complete additional manifest forms for the remaining waste streams in the shipment, unless the waste stream is a lab pack.

(3) Complete a continuation sheet, EPA Form 8700-22a, when there are more than two transporters, or for lab packs with more than four different waste streams in one shipment.

(4) Ensure that the required information on all copies, including photocopies, of the manifest is legible to the Department, transporter and designated facility.

(5) A generator shall designate only one permitted facility to handle the waste described on the manifest.

Source

The provisions of this § 262a.20 amended December 13, 2002, effective December 14, 2002, 32 Pa.B. 6102. Immediately preceding text appears at serial pages (284432) to (284433).

Cross References

This section cited in 25 Pa. Code § 263a.21 (relating to compliance with the manifest); and 25 Pa. Code § 270a.60 (relating to permits-by-rule).

§ 262a.21. Acquisition of manifests.

(a) The substitution of terms in § 260a.3(a)(5) (relating to terminology and citations related to Federal regulations) does not apply to 40 CFR 262.21 (relating to acquisition of manifests).

(b) In addition to the requirements incorporated by reference, a generator shipping hazardous waste to a facility in a state that does not require use of its own state manifest shall use the Department's manifest.

Source

The provisions of this § 262a.21 amended December 13, 2002, effective December 14, 2002, 32 Pa.B. 6102. Immediately preceding text appears at serial page (284433).

§ 262a.22. Number of copies.

(a) 40 CFR 262.22 (relating to number of copies) is not incorporated by reference.

(b) The manifest shall consist of at least the number of copies which will provide the generator, each transporter and the owner or operator of the designated facility with one copy each for their records and which will allow the designated facility to send copies to the generator, generator state and destination state.

§ 262a.23. Use of the manifest.

(a) In addition to the requirements incorporated by reference:

(1) The generator shall print or type the generator's name and enter the date of shipment in the designated space on the manifest.

(2) If the out-of-State manifest does not include a generator-state copy to be submitted to the Department by the out-of-State designated facility, the generator shall submit a complete, legible copy, such as a photocopy, of the manifest as signed by the generator, all transporters and the designated facility. This copy shall be sent within 10 days of the generator's receipt of its signed copy from the designated facility.

(3) The generator shall obtain the printed or typed name of the transporter on the manifest.

(4) A generator may not use a hazardous waste manifest which has either a preprinted Manifest Document Number or preprinted Manifest Tracking Number that has been altered by anyone other than the printer of the manifest.

(b) The substitution of terms in § 260a.3(a)(5) (relating to terminology and citations related to Federal regulations) does not apply to 40 CFR 262.23(e) (relating to notification of shipments of hazardous waste to a facility in an authorized state which has not yet received authorization to regulate a newly designated hazardous waste).

Source

The provisions of this § 262a.23 amended December 13, 2002, effective December 14, 2002, 32 Pa.B. 6102. Immediately preceding text appears at serial page (284433).

Cross References

This section cited in 25 Pa. Code § 262a.20 (relating to general requirements).

Subchapter C. PRETRANSPORT REQUIREMENTS

Sec.
262a.34. Accumulation time.

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§ 262a.34. Accumulation time.

In addition to the requirements incorporated by reference, a generator who accumulates hazardous waste onsite as specified in 40 CFR 262.34(a)(1)(i) (relating to accumulation time) shall also comply with Chapter 265a, Subchapter I (relating to use and management of containers).

Source

The provisions of this § 262a.34 adopted December 13, 2002, effective December 14, 2002, 32 Pa.B. 6102.

Subchapter D. RECORDKEEPING AND REPORTING

Sec.
262a.41. Biennial report.
262a.42. Exception reporting.
262a.43. Additional reporting.

Cross References

This subchapter cited in 25 Pa. Code § 272.541 (relating to basic requirements).

§ 262a.41. Biennial report.

Regarding the requirements incorporated by reference, the following replaces the introductory paragraph in 40 CFR 262.41 (relating to biennial report):

A generator who ships hazardous waste offsite to a treatment, storage or disposal facility within the United States shall prepare and submit a single copy of a biennial report to the Department by March 1 of each even numbered year. The biennial report shall be submitted on EPA Form 8700—13A as modified by the Department, shall cover generator activities during the previous year and shall include the following information:

§ 262a.42. Exception reporting.

Regarding the requirements incorporated by reference, the phrase ''for the region in which the generator is located'' contained in 40 CFR 262.42 (relating to exception reporting) is not incorporated by reference.

§ 262a.43. Additional reporting.

In addition to the requirements incorporated by reference:

(1) Spills and discharges which are in amounts less than the reportable quantities, which do not result in discharges into waters of this Commonwealth, and which are managed according to an approved contingency plan, need not be reported.

(2) The reportable quantities are:

(i) Liquid hazardous waste or liquids that become hazardous waste when spilled or discharged shall be reported to the Department when the quantity spilled or discharged equals or exceeds the reportable quantity for the waste contained in 40 CFR 302.4 (relating to designation of hazardous substances) or 10 gallons, whichever is more stringent. Liquids are flowable substances which contain less than 20% solids by dry weight. Flowable refers to flow in the sense of pourable as a liquid.

(ii) Solid hazardous waste or solids that become hazardous wastes when spilled or discharged shall be reported to the Department when the quantity spilled or discharged equals or exceeds the reportable quantity for the waste contained in 40 CFR 302.4 or 500 pounds, whichever is more stringent.

(3) A discharge or spill into waters of this Commonwealth shall be reported regardless of quantity spilled or discharged.

(4) In the event of a discharge or spill equal to or greater than the reportable quantity of hazardous waste or material that becomes a hazardous waste when spilled or discharged, the generator shall take appropriate immediate action to protect the health and safety of the public and the environment and immediately notify the Department by telephone at (800) 541-2050 with the following information:

(i) The name of the person reporting the spill.

(ii) The name and identification number of the generator.

(iii) The phone number where the person reporting the spill can be reached.

(iv) The date, time and location of the spill.

(v) A brief description of the incident.

(vi) For each material involved in the spill:

(A) The shipping name, hazard class and U.N. Number.

(B) The estimated quantity of material spilled.

(vii) The extent of contamination of land, water or air, if known.

(5) If a discharge or spill of hazardous waste, or hazardous material that becomes a hazardous waste when spilled or discharged, occurs during onsite unloading, loading, storage or plan operation, and a Departmental official acting within the scope of his official responsibilities determines that immediate removal of the material is necessary to protect the health and safety of the public and the environment, that official may authorize in writing the removal of the material by transporters who do not have identification numbers or license and without the preparation of a manifest.

(6) A generator shall clean up a spill or discharge of hazardous waste, or material that becomes a hazardous waste when spilled or discharged, that occurs during onsite unloading, loading, storage or plan operation, and take actions that may be required or approved by the Department so that the discharge or spill no longer presents a hazard to the health and safety of the public or environment.

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(7) In addition, the generator shall file a written report on a spill or discharge of a reportable hazardous waste or material that becomes a hazardous waste when spilled or discharged, with the Department within 15 days after the incident, and supply the Department with other information it may require or request that pertains to the discharge. The report on the spill or discharge shall be entitled "Hazardous Waste Spill Report" and shall contain the following information:

(i) The name, address and identification number of the generator and the date, time and location of the incident.

(ii) A brief description of the circumstances causing the incident.

(iii) A description of each of the hazardous wastes or materials that become hazardous wastes when spilled or discharged involved in the incident, including the estimated quantity spilled by weight or volume.

(iv) A legible copy of the manifest document, if applicable.

(v) A description of a contamination of land, water or air that has occurred due to the incident.

(vi) A description of the actions the generator intends to take to prevent a similar occurrence in the future.

Source

The provisions of this § 262a.43 adopted December 13, 2002, effective December 14, 2002, 32 Pa.B. 6102.

Subchapter E. EXPORTS OF HAZARDOUS WASTE

Sec.

262a.50. Applicability
262a.55—262a.57. [Reserved].

§ 262a.50. Applicability.

Relative to the requirements incorporated by reference, the substitution of terms in § 260a.3 (relating to terminology and citations related to Federal regulations) does not apply to the incorporation by reference of 40 CFR Part 262, Subpart E (relating to exports of hazardous waste).

Source

The provisions of this § 262a.50 adopted December 13, 2002, effective December 14, 2002, 32 Pa.B. 6102.

§§ 262a.55—262a.57. [Reserved].

Source

The provisions of these §§ 262a.55—262a.57 reserved December 13, 2002, effective December 14, 2002, 32 Pa.B. 6102. Immediately preceding text appears at serial page (284434).

Subchapter H. TRANSFRONTIER SHIPMENTS OF HAZARDOUS WASTE FOR RECOVERY WITHIN THE OECD

Sec.
262a.80. Applicability.

§ 262a.80. Applicability.

Relative to the requirements incorporated by reference, the substitution of terms in § 260a.3 (relating to terminology and citations related to Federal regulations) does not apply to the incorporation by reference of 40 CFR Part 262, Subpart H (relating to transfrontier shipments of hazardous waste for recovery within the OECD).

Subchapter I. SOURCE REDUCTION STRATEGY

Sec.
262a.100. Source reduction strategy.

Cross References

This subchapter cited in 25 Pa. Code § 262a.34 (relating to accumulation time); and 25 Pa. Code § 272.541 (relating to collection contractor).

§ 262a.100. Source reduction strategy.

(a) By January 17, 1994, a person or municipality that generates hazardous waste shall prepare a source reduction strategy in accordance with this section. Except as otherwise provided in this article, the strategy shall be signed by the person or municipality that generated the waste, be maintained on the premises where the waste is generated, be available on the premises for inspection by any representative of the Department and be submitted to the Department upon request. The strategy may designate certain production processes as confidential. This confidential information may not be made public without the expressed written consent of the generator. Unauthorized disclosure is subject to appropriate penalties as provided by law.

(b) For each type of waste generated, the strategy shall include:

(1) A description of the source reduction activities conducted by the person or municipality in the 5 years prior to the date that the strategy is required to be prepared. The description shall quantify reductions in the weight or toxicity of waste generated on the premises.

(2) A statement of whether the person or municipality established a source reduction program. This program shall identify the methods and procedures that the person or municipality will implement to achieve a reduction in the weight or toxicity of waste generated on the premises, quantify the projected

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reduction in weight or toxicity of waste to be achieved by each method or procedure and specify when each method or procedure will be implemented.

(3) If the person or municipality has not established a source reduction program as described in paragraph (2), it shall develop a strategy including the following:

(i) A waste stream characterization, including source, hazards, chemical analyses, properties, generation rate, management techniques and management costs.

(ii) A description of potential source reduction options.

(iii) A description of how the options were evaluated.

(iv) An explanation of why each option was not selected.

(c) The strategy required by this section shall be updated when either of the following occurs:

(1) There is a significant change in a type of waste generated on the premises or in the manufacturing process, other than a change described in the strategy as a source reduction method.

(2) Every 5 years, unless the Department establishes, in writing, a different period for the person or municipality that generated the waste.

(d) If hazardous waste generated by a person or municipality will be treated, stored or disposed of at a solid waste management facility which has applied to the Department for approval to treat, store or dispose of the waste, the person or municipality that generated the hazardous waste shall submit the source reduction strategy required by this section to the facility upon the request of the facility.

(e) This section does not apply to persons or municipalities that generate a total of less than 1,000 kilograms of hazardous waste in each month of the year.

(f) A person or municipality that generates hazardous waste may reference existing documents it has prepared to meet other waste minimization requirements to comply with this section, including those proposed to comply with 40 CFR 261.41(a)(5)—(7) (relating to biennial report).

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CHAPTER 265a. INTERIM STATUS STANDARDS FOR OWNERS AND OPERATORS OF HAZARDOUS WASTE TREATMENT, STORAGE AND DISPOSAL FACILITIES

Subchap.		Sec.
A.	GENERAL	265a.1
B.	GENERAL FACILITY STANDARDS	265a.11
D.	CONTINGENCY PLAN AND EMERGENCY PROCEDURES	265a.56
E.	MANIFEST SYSTEM, RECORDKEEPING AND REPORTING	265a.71
G.	CLOSURE AND POSTCLOSURE	265a.115
H.	FINANCIAL REQUIREMENTS	265a.141
I.	USE AND MANAGEMENT OF CONTAINERS	265a.173
J.	TANK SYSTEMS	265a.191
P.	THERMAL TREATMENT	265a.382

Authority

The provisions of this Chapter 265a issued under sections 105, 401—403 and 501 of the Solid Waste Management Act (35 P. S. §§ 6018.105, 6018.401—6018.403 and 6018.501); sections 105, 402 and 501 of The Clean Streams Law (35 P. S. §§ 691.105, 691.402 and 691.501); and section 1920-A of The Administrative Code of 1929 (71 P. S. § 510-20), unless otherwise noted.

Source

The provisions of this Chapter 265a adopted April 20, 1999, effective May 1, 1999, 29 Pa.B. 2367, unless otherwise noted.

Cross References

This chapter cited in 25 Pa. Code § 252.3 (relating to scope); 25 Pa. Code § 261a.7 (relating to residues of hazardous waste in empty containers); 25 Pa. Code § 266b.11 (relating to waste management for universal waste mercury-containing devices); 25 Pa. Code § 266b.31 (relating to waste management for universal waste mercury-containing devices); 25 Pa. Code § 270a.10 (relating to general application requirements and permit issuance procedures); 25 Pa. Code § 298.10 (relating to applicability); 25 Pa. Code § 298.12 (relating to prohibitions); 25 Pa. Code § 298.22 (relating to waste oil storage); 25 Pa. Code § 298.45 (relating to waste oil storage at transfer facility); 25 Pa. Code § 298.54 (relating to waste oil management); 25 Pa. Code § 298.62 (relating to notification); and 25 Pa. Code § 298.64 (relating to waste oil storage).

Subchapter A. GENERAL

Sec.
265a.1. Incorporation by reference, purpose, scope and applicability.

Cross References

This subchapter A cited in 25 Pa. Code § 261a.6 (relating to requirements for recyclable materials).

§ 265a.1. Incorporation by reference, purpose, scope and applicability.

(a) Except as expressly provided in this chapter, 40 CFR Part 265 and its appendices (relating to interim status standards for owners and operators of hazardous waste treatment, storage, and disposal facilities) are incorporated by reference.

(b) Relative to the requirements incorporated by reference in this section:

(1) 40 CFR 265.1(c)(4) (relating to purpose, scope and applicability) regarding state program authorization under 40 CFR Part 271 (relating to

requirements for authorization of state hazardous waste programs), are not incorporated to this section.

(2) This chapter applies to owners and operators of facilities which treat, store or dispose of hazardous waste in this Commonwealth, except as specifically provided in this chapter, Chapter 261a, 266a or § 270a.60 (relating to identification and listing of hazardous waste; management of specific hazardous wastes and specific types of hazardous waste management facilities; and permits by rule) instead of 40 CFR 265.1(b).

(3) Instead of 40 CFR 265.1(c)(6), this chapter does not apply to the owner or operator of a facility managing recyclable materials described in 40 CFR 261.6(a)(2)—(4) (relating to requirements for recyclable materials) except to the extent they are referred to in Chapter 266a, Subchapters C, E, F, G or § 270a.60.

(4) This chapter does not apply to handlers and transporters of universal wastes identified in 40 CFR Part 273 (relating to universal waste management) or additional Pennsylvania-designated universal wastes identified in Chapter 266b (relating to universal waste management).

Cross References

This section cited in 25 Pa. Code § 298.54 (relating to waste oil management); and 25 Pa. Code § 298.61 (relating to restrictions on burning).

Subchapter B. GENERAL FACILITY STANDARDS

Sec.
265a.11. Identification number and transporter license.
265a.12. Required notices.
265a.13. General and generic waste analysis.
265a.15. General inspection and construction inspection requirements.
265a.18. Location standards.

Cross References

This section cited in 25 Pa. Code § 261a.6 (relating to requirements for recyclable materials).

§ 265a.11. Identification number and transporter license.

In addition to the requirements incorporated by reference, a person or municipality who owns or operates a hazardous waste management facility may not accept hazardous waste for treatment, storage or disposal from a transporter without an EPA identification number and a license from the Department, except as otherwise provided. The licensing requirement does not apply to conditionally exempt small quantity generators transporting their own hazardous waste if the conditionally exempt small quantity generator is in compliance with § 261a.5(d) (relating to special requirements for hazardous waste generated by conditionally exempt small quantity generators) transporters transporting recyclable materials utilized for precious metal recovery in compliance with § 266a.70(1) (relating to applicability and requirements) or universal waste transporters in compliance with § 266b.50 (relating to applicability).

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§ 265a.12. Required notices.

The substitution of terms as specified in § 260a.3(a)(1) (relating to terminology and citations related to Federal regulations) does not apply to 40 CFR 265.12 (relating to required notices).

§ 265a.13. General and generic waste analysis.

In addition to the requirements incorporated by reference:

(1) Except as provided in paragraphs (4) and (5), before an owner or operator treats, stores or disposes of a specific hazardous waste from a specific generator for the first time, the owner or operator shall submit to the Department for approval, on a form provided by the Department, or on a form approved by the Department, a Module I report which the owner or operator shall retain for 3 years. The report shall include the following information:

(i) A detailed chemical and physical analysis of the waste.

(ii) A description of the waste and the process generating the waste.

(iii) The name and address of the hazardous waste management facility.

(iv) A description of the hazardous waste management facility's treatment, storage and disposal methods.

(v) Results of liner compatibility testing.

(vi) An assessment of the impact of the waste on the hazardous waste management facility.

(vii) Other information which the Department may prescribe for the Department to determine whether the waste will be treated, stored or disposed of in accordance with this chapter. The chemical and physical analysis of the waste shall be repeated under one or more of the following circumstances:

(A) When necessary to ensure that it is accurate and up-to-date.

(B) When the owner or operator is notified, or has reason to believe, that the process or operation that generates the hazardous waste has changed.

(C) For offsite facilities or onsite facilities receiving waste from offsite sources, when the results of the inspection or analysis, or both, of each hazardous waste indicates that the waste received at the facility does not match the description of the waste on the accompanying manifest or shipping paper.

(2) The owner or operator shall develop and follow a written waste analysis plan in compliance with 40 CFR 265.13 (relating to general waste analysis) which shall be submitted to the Department for approval at a time in the application process as the Department may prescribe. The plan shall be retained at the facility.

(3) The owner or operator of a facility utilizing a liner shall conduct an evaluation of the liner compatibility with the hazardous waste before accepting the waste for emplacement in a waste pile, surface impoundment or landfill

unless the approval to accept the waste is granted in the facility's permit. The evaluation procedure shall meet the approval of the Department prior to its commencement. The evaluation of the liner shall consist of testing the liner in the presence of the waste for a minimum of 30 days or as otherwise approved by the Department. In lieu of actual testing, existing published or documented data on the hazardous waste or waste generated from similar processes proving the liner compatibility may be substituted if approved by the Department. The results of the evaluation of the liner compatibility shall be furnished to the Department for approval of the waste before acceptance by the facility.

(4) The Department may waive prior approval of the report specified in paragraph (1) for wastes that are in containers that are only to be stored at the facility. The Department may waive prior approval of the report only if:

(i) The Department determines that the waiver does not pose a potential threat to human health or the environment.

(ii) The management of the wastes is allowed in the permit for the facility and properly addressed in the approved waste analysis plan for the facility.

(iii) The report is submitted to the Department within 1 week of the arrival of the wastes at the facility and a copy of the report is maintained in the operating record onsite for 20 years.

(5) Prior Department approval of the report specified in paragraph (1) is not required for offsite reclamation facilities that, under a contractual agreement, supply raw material to a generator and accept the expended material from the generator for storage prior to reclamation.

(6) In lieu of the waste and generator specific report required by paragraphs (1)—(3), the Department may accept from the operator of a treatment, storage or disposal facility a Generic Module I application for similar wastes containing similar hazardous constituents from multiple generators.

(7) An application for a Generic Module I shall include:

(i) The information required by paragraph (1). Generator specific information shall be included for each generator identified in the application.

(ii) Criteria for determining whether the wastes have similar physical and chemical characteristics and contain similar hazardous constituents.

(8) Additional generators may be added to an approved Generic Module I if the operator of the treatment, storage or disposal facility demonstrates that the waste from the new generator is consistent with the waste already approved in the Generic Module I. At least 15 days prior to accepting a waste from a new generator, the operator of the treatment, storage or disposal facility shall submit to the Department in writing, the generator specific information required by paragraph (1). The Department will not add an additional generator to the Generic Module I if the Department finds that the operator of the treatment, storage or disposal facility has not demonstrated that the waste from the new generator is consistent with that approved under the Generic Module I.

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(9) A permit modification and Generic Module I requested under this section shall be accompanied by a fee, as specified in § 270a.3 (relating to payment of fees).

Source

The provisions of this 265a.13 amended December 13, 2002, effective December 14, 2002, 32 Pa.B. 6102. Immediately preceding text appears at serial pages (272719) to (272721).

Cross References

This section cited in 25 Pa. Code § 264a.13 (relating to general and generic waste analysis).

§ 265a.15. General inspection and construction inspection requirements.

In addition to the requirements incorporated by reference, an owner or operator shall submit a schedule for construction of a hazardous waste management facility to the Department for approval. At a minimum, the schedule shall provide for inspection and approval by the Department of each phase of construction.

§ 265a.18. Location standards.

In addition to the requirements incorporated by reference, Chapter 269a (relating to siting) applies to hazardous waste treatment and disposal facilities.

Subchapter D. CONTINGENCY PLAN AND EMERGENCY PROCEDURES

Sec.
265a.56. Emergency procedures.

Cross References

This subchapter cited in 25 Pa. Code § 261a.6 (relating to requirements for recyclable materials).

§ 265a.56. Emergency procedures.

In addition to the requirements incorporated by reference, the emergency coordinator shall immediately notify the appropriate regional office of the Department, or the Department's Central Office by telephone at (717) 787-4343.

Subchapter E. MANIFEST SYSTEM, RECORDKEEPING AND REPORTING

Sec.
265a.71. Use of the manifest system.
265a.75. Biennial report.
265a.78. Hazardous waste management fee.
265a.79. Documentation of hazardous waste management fee submission.
265a.80. Civil penalties for failure to submit hazardous waste management fees.
265a.81. Assessment of penalties; minimum penalties.
265a.82. Administration fees.
265a.83. Administration fees during closure.

Cross References

This subchapter cited in 25 Pa. Code § 261a.6 (relating to requirements for recyclable materials).

§ 265a.71. Use of the manifest system.

In addition to the requirements incorporated by reference:

(1) An owner or operator, or the agent of the owner or operator, may not accept hazardous waste for treatment, storage or disposal unless it is accompanied by the Department's manifest, unless a manifest is not required by 40 CFR 262.20(e) (relating to general requirements).

(2) Within 30 days of the delivery, the owner or operator or the agent of the owner or operator shall send the specified copies of the manifest to the Department and generator state, as required.

(3) The owner or operator or other agent of the designated facility shall state in the Discrepancy Indication Space on the respective manifest and continuation sheet the actual quantity received in bulk shipment.

(4) The name of the designated facility representative signing the manifest shall be printed or typed on the manifest.

Source

The provisions of this 265a.71 amended December 13, 2002, effective December 14, 2002, 32 Pa.B. 6102. Immediately preceding text appears at serial page (272722).

§ 265a.75. Biennial report.

Relative to the requirements incorporated by reference, the owner or operator shall submit to the Department its biennial report on EPA Form 8700-13B, as modified by the Department.

§ 265a.78. Hazardous waste management fee.

(a) The owner or operator of a hazardous waste management facility shall remit to the Department a hazardous waste management fee based on the total number of tons, or portion thereof, treated, stored or disposed at that facility.

(b) A hazardous waste management fee will not be assessed for:

(1) Storage or treatment of hazardous waste at the site at which it was generated.

(2) Storage or treatment at a captive facility.

(3) Storage of hazardous waste prior to recycling at a commercial recycling facility which meets the requirements of this article.

(4) Hazardous waste derived from the cleanup of a site under the Hazardous Sites Cleanup Act, the Federal Superfund Act, Title II of the Solid Waste Disposal Act (42 U.S.C.A. §§ 6901—6987) or the act.

(c) The owner or operator shall remit hazardous waste management fees quarterly along with the forms required by § 265a.79 (relating to documentation of hazardous waste management fee submission) postmarked or delivered to the Department by the 20th day of the month following the quarter ending the last

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day of March, June, September and December of each year. If the submission date falls on a weekend or State holiday, the report shall be postmarked or received by the Department on or before the next business day after the 20th.

(d) Payment shall be by check or money order, payable to ''The Hazardous Sites Cleanup Fund,'' and shall be forwarded along with the required forms to the Department at the address specified on the form. Alternative payment methods may be accepted with prior written approval of the Department.

(e) For purposes of assessing fees, incineration is considered to be treatment. A fee will not be assessed for the incineration of hazardous waste at an onsite or captive incineration facility.

(f) Fees shall be calculated based on standard tons.

(1) For purposes of this section:

(i) A standard ton equals 2,000 pounds.

(ii) A metric ton shall be converted to a standard ton by dividing the metric ton by a factor of 0.91.

(2) Liquid wastes shall be converted to tons as follows:

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(i) Standard measure gallons shall be converted to tons using a factor of 8.0 pounds per gallon.

(ii) Liters shall be converted to tons using a factor of 2.1 pounds per liter.

(3) Cubic yards and cubic meters shall be converted to standard tons using a factor of 1 ton per each of these units, or part thereof.

(g) Quantities reported shall be as indicated on the manifest by the treatment, storage or disposal facility designated on the manifest or, if not indicated by that facility, as specified on the manifest by the generator.

(h) Except as provided in subsection (i), if more than one hazardous waste management activity occurs at the same commercial hazardous waste management facility, the owner or operator shall pay a single fee per ton, or fraction thereof, which shall be the highest rate of the management activities involving each individual waste stream at that facility.

(i) When treatment or incineration prior to disposal results in a reduction in the tonnage of waste requiring disposal, the operator shall be assessed the disposal management fee for the waste requiring disposal after treatment or incineration, and the treatment management fee for the remainder of the waste which underwent treatment.

Cross References

This section cited in 25 Pa. Code § 265a.79 (relating to documentation of hazardous waste management fee submission); 25 Pa. Code § 265a.80 (relating to civil penalties for failure to submit hazardous waste management fees); and 25 Pa. Code § 265a.81 (relating to assessment of penalties; minimum penalties).

§ 265a.79. Documentation of hazardous waste management fee submission.

(a) The owner or operator of a hazardous waste management facility required to submit hazardous waste management fees under § 264a.78 (relating to hazardous waste management fee) shall submit specific information to the Department to document that the amount of fees submitted under § 264a.78 is accurate. This information shall be submitted on forms provided or approved by the Department and completed in conformance with instructions provided.

(1) The owner or operator of a commercial facility, including onsite facilities which accept hazardous waste generated offsite, shall submit forms ER-WM-55D, ER-WM-55E and ER-WM-55F, or successor documents. If no hazardous waste management activities subject to the fees have occurred during a quarter, documentation to that effect shall be submitted on form ER-WM-55D only.

(2) The owner or operator of an offsite captive disposal facility shall submit forms ER-WM-55I, ER-WM-55L, ER-WM-55M and ER-WM-55N, or successor documents. If no hazardous waste management activities subject to

the fees have occurred during a quarter, documentation to that effect shall be submitted on form ER-WM-55I only.

(3) The owner or operator of an onsite captive disposal facility which does not accept wastes generated offsite shall submit forms ER-WM-55I, ER-WM-55J and ER-WM-55K, or successor documents. If no hazardous waste management activities subject to the fees have occurred during a quarter, documentation to that effect shall be submitted on form ER-WM-55I only.

(b) The owner or operator of a hazardous waste management facility shall, upon request from the Department, provide additional information or documentation regarding its hazardous waste management activities necessary for the Department to assess the accuracy of the information contained on the required forms and the amount of fees due.

Cross References

This section cited in 25 Pa. Code § 265a.78 (relating to hazardous waste management fee); 25 Pa. Code § 265a.80 (relating to civil penalties for failure to submit hazardous waste management fees); and 25 Pa. Code § 265a.81 (relating to assessment of penalties; minimum penalties).

§ 265a.80. Civil penalties for failure to submit hazardous waste management fees.

(a) The Department may assess a civil penalty for:

(1) Failure to submit hazardous waste management fees as required by § 265a.78(a) (relating to hazardous waste management fee), failure to submit properly completed documents required by § 265a.79 (relating to documentation of hazardous waste management fee submission) or failure to meet the time schedule for submission established by § 265a.78(c).

(2) Intentional submission of falsified information relating to hazardous waste managment fees required by this chapter and section 903 of the Hazardous Sites Cleanup Act (35 P. S. § 6020.903).

(3) Failure of a hazardous waste management facility to submit documentation confirming that no fee was due for the preceding quarter.

(b) This section does not preclude the Department from assessing a civil penalty for a violation of the act, or the Hazardous Sites Cleanup Act, this chapter or other chapters of this article.

(c) Failure of the owner or operator of a hazardous waste management facility to comply with the fee payment and documentation requirements of this chapter violates the act, the Hazardous Sites Cleanup Act and the regulations promulgated thereunder, and constitutes grounds for suspension or revocation of its hazardous waste permit, denial of issuance or renewal of a hazardous waste permit, and forfeiture of the facility's bond.

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§ 265a.81. Assessment of penalties; minimum penalties.

(a) Consistent with section 605 of the act (35 P. S. § 6018.605) and section 1104 of the Hazardous Sites Cleanup Act (35 P. S. § 6020.1104) and regulations thereunder, this section sets forth minimum civil penalties for certain violations. This section does not limit the Department's authority to assess a higher penalty for the violations identified in this section, or limit the Department's authority to proceed with appropriate criminal penalties.

(b) If a person or municipality fails to submit hazardous waste management fees as required by § 265a.78(c) (relating to hazardous waste management fee), fails to submit properly completed documents required by § 265a.79 (relating to documentation of hazardous waste management fee submission) or fails to meet the time schedule for submission established by § 265a.78(c), the Department will assess a minimum civil penalty of $500 for submissions which are less than 15 days late, and $500 per day for each day thereafter.

(c) If a person or municipality falsifies information relating to hazardous waste management fees required by this chapter and the Hazardous Sites Cleanup Act, the Department will assess a minimum civil penalty of $1,000.

§ 265a.82. Administration fees.

(a) The owner or operator of a hazardous waste management facility shall annually pay an administration fee to the Department according to the following schedule:

(1) Land disposal facilities—$2,500.
(2) Surface impoundments—$2,500.
(3) Commercial treatment—$2,000.
(4) Captive treatment—$700.
(5) Storage—$550.
(6) Incinerators—$1,300.

(b) The administration fee shall be in the form of a check made payable to the ''Commonwealth of Pennsylvania'' and be paid on or before the first of March to cover the preceding year.

(c) If more than one permitted activity is located at a site, or more than one activity occurs, the fee shall be cumulative.

Cross References

This section cited in 25 Pa. Code § 261a.6 (relating to requirements for recyclable materials); and 25 Pa. Code § 266a.80 (relating to applicability and requirements).

§ 265a.83. Administration fees during closure.

(a) Within 90 days after receiving the final volume of hazardous waste, or 90 days after approval of the closure plan, whichever is later, the owner or operator shall treat, remove from the site or dispose of onsite all hazardous waste in

accordance with the approved closure plan. The Department may approve in writing a longer period if the owner or operator demonstrates one of the following:

(1) The activities required to comply with this subsection will, of necessity, take longer than 90 days to complete, and the owner or operator will continue to take all measures necessary to ensure safety to human health and the environment.

(2) The facility has additional capacity under its permit, someone other than the present owner or operator will obtain a permit to recommence operation of the site, closure would be incompatible with continued operation of the site, and the owner or operator will continue to take all measures necessary to ensure safety to human health and the environment.

(b) The owner or operator shall complete closure activities in accordance with the approved closure plan and within 180 days after receiving the final volume of wastes or 180 days after approval of the closure plan, whichever is later. The Department may in writing approve a longer closure period if the owner or operator demonstrates the following:

(1) The closure activities will, of necessity, take him longer than 180 days to complete, and the owner or operator will continue to take measures necessary to ensure safety to human health and the environment.

(2) The facility has additional capacity under its permit, someone other than the owner or operator will obtain a permit to recommence operation of the site, closure would be incompatible with continued operation of the site and the owner or operator will continue to take all measures necessary to ensure safety to human health and the environment.

(c) The demonstrations referred to in subsections (a) and (b) shall be made as follows:

(1) The demonstrations in subsection (a) shall be made at least 30 days prior to the expiration of the 90-day period in subsection (b).

(2) The demonstrations in subsection (b) shall be made at least 30 days prior to the expiration of the 180-day period in subsection (b).

(d) A nonrefundable administration fee in the form of a check payable to the ''Commonwealth of Pennsylvania'' shall be forwarded to the Department within 30 days after receiving the final volumes of waste, and on or before January 20th of each succeeding year until the requirements of § 264a.115 (relating to certification of closure) are met. The fee shall be:

(1) Land disposal facilities—$100.

(2) Impoundments—$100.

(3) Other facilities—$50.

Cross References

This section cited in 25 Pa. Code § 261a.6 (relating to requirements for recyclable materials).

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Subchapter G. CLOSURE AND POSTCLOSURE

Sec.
265a.115. Certification of closure.
265a.120. Certification of completion of postclosure care.

Cross References

This subchapter cited in 25 Pa. Code § 261a.6 (relating to requirements for recyclable materials).

§ 265a.115. Certification of closure.

The owner or operator shall satisfy § 265a.166 (relating to closure and postclosure certification) instead of the reference to 40 CFR 265.143(h) (relating to final assurance for closure).

§ 265a.120. Certification of completion of postclosure care.

The owner or operator shall satisfy § 265a.166 (relating to closure and postclosure certification) instead of the reference to § 265a.145(h) (relating to financial assurance for postclosure care).

Subchapter H. FINANCIAL REQUIREMENTS

Sec.
265a.141. Definitions.
265a.143. Financial assurance for closure.
265a.145. Financial assurance for postclosure care.
265a.147. Liability requirements.
265a.148. Incapacity of owners or operators, guarantors or financial institutions.
265a.149. Use of state-required mechanisms.
265a.150. State assumption of responsibility.
265a.153. Requirement to file a bond.
265a.154. Form, terms and conditions of bond.
265a.155. Special terms and conditions for surety bonds.
265a.156. Special terms and conditions for collateral bonds and bonds pledging corporate guarantee for closure.
265a.157. Phased deposits of collateral.
265a.158. Replacement of bond.
265a.159. Reissuance of permits.
265a.160. Bond amount determination.
265a.162. Bond amount adjustments.
265a.163. Failure to maintain adequate bond.
265a.164. Separate bonding for a portion of a facility.
265a.165. Bond release.
265a.166. Closure and postclosure certification.
265a.167. Public notice and comment.
265a.168. Bond forfeiture.
265a.169. Preservation of remedies.

Cross References

This subchapter cited in 25 Pa. Code § 261a.6 (relating to requirements for recyclable materials).

§ 265a.141. Definitions.

In addition to the terms defined in 40 CFR 265.141 (relating to definitions of terms as used in this subpart) which are incorporated by reference, the definitions in section 103 of the act (35 P. S. § 6018.103) and Chapter 260a (relating to definitions and requests for determination) apply to this subchapter. The following words and terms, when used in this subchapter, have the following meanings, unless the context clearly indicates otherwise:

Applicant—An owner or operator of a hazardous waste treatment, storage or disposal facility which is attempting to demonstrate the capability to self-insure all or part of its liabilities to third persons for personal injury and property damage from sudden or nonsudden pollution occurrences, or both.

Collateral bond—A penal bond agreement in a sum certain, payable to the Department, executed by the facility owner or operator and which is supported by the deposit with the Department of cash, negotiable bonds of the United States, the Commonwealth, the Turnpike Commission, the General State Authority, the State Public School Building Authority, or a Commonwealth municipality, Pennsylvania Bank Certificates of Deposit, or irrevocable letters of credit of a bank organized or authorized to transact business in the United States.

Final closure—Successful completion of requirements for closure and postclosure care as required by 40 CFR Part 265, Subpart G (relating to closure and postclosure).

Financial institutions—Banks and other similar establishments organized or authorized to transact business in this Commonwealth or the United States, and insurance companies or associations licensed and authorized to transact business in this Commonwealth or designated by the Insurance Commissioner as an eligible surplus lines insurer.

Surety bond—A penal bond agreement in a sum certain, payable to the Department, executed by the facility owner or operator, and which is supported by the guarantee of payment on the bond by a corporation licensed to do business as a surety in this Commonwealth.

Surety company—A corporation licensed to do business as a surety in this Commonwealth.

§ 265a.143. Financial assurance for closure.

40 CFR 265.143 (relating to financial assurance for closure) is not incorporated by reference except for 40 CFR 265.143(e) as referenced in § 265a.156 (relating to special terms and conditions for collateral bonds and bonds pledging corporate guarantee for closure).

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§ 265a.145. Financial assurance for postclosure care.

40 CFR 265.145 (relating to financial assurance for post-closure care) is not incorporated by reference except for 40 CFR 265.145(e) as referenced in § 265a.156 (relating to special terms and conditions for collateral bonds and bonds pledging corporate guarantee for closure.)

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Cross References

This section cited in 25 Pa. Code § 265a.120 (relating to certification of completion of postclosure care).

§ 265a.147. Liability requirements.

The substitution of terms as specified in § 260a.3(a)(5) (relating to terminology and citations related to Federal regulations) does not apply to 40 CFR 265.147(g)(2) and (i)(4) (relating to liability requirements).

§ 265a.148. Incapacity of owners or operators, guarantors or financial institutions.

In addition to the requirements incorporated by reference, an owner or operator or guarantor of a corporate guarantee shall also notify the Department by certified mail in accordance with the provisions applicable to notifying the regional administrator of the EPA.

§ 265a.149. Use of State-required mechanisms.

Relative to the requirements incorporated by reference, 40 CFR 265.149 (relating to use of state-required mechanisms) is not incorporated by reference.

§ 265a.150. State assumption of responsibility.

Relative to the requirements incorporated by reference, 40 CFR 265.150 (relating to State assumption of responsibility) is not incorporated by reference.

§ 265a.153. Requirement to file a bond.

(a) Hazardous waste storage, treatment and disposal facilities permitted under the act, or being treated as having a permit under the act, shall file a bond in accordance with this subchapter and in the amount determined by § 265a.160 (relating to bond amount determination), payable to the Department.

(b) The Department will not issue a new, revised, amended, modified or renewed permit for the storage, treatment or disposal of hazardous waste unless the applicant files with the Department a bond under this subchapter, payable to the Department, on a form prepared and provided by or approved by the Department, and the bond has been approved by the Department.

(c) An applicant for a new, revised, amended, modified or renewed permit may not disturb surface acreage, start construction of facilities for the storage, treatment or disposal of hazardous waste, or accept hazardous waste prior to receipt from the Department of approval of bond and issuance of a permit to conduct a hazardous waste storage, treatment or disposal operation.

(d) A hazardous waste storage, treatment or disposal facility permitted or treated as issued a permit, shall cease accepting hazardous waste unless the owner or operator has submitted a bond under this subchapter. The Department will review and determine whether or not to approve the bond within 1 year of the

submittal. If, on review, the Department determines the owner or operator has submitted an insufficient bond amount, the Department will require the owner or operator to deposit additional bond amounts under § 265a.162 (relating to bond amount adjustments).

§ 265a.154. Form, terms and conditions of bond.

(a) The Department accepts the following types of bond:

(1) A surety bond.

(2) A collateral bond.

(3) A phased deposit collateral bond as provided in § 265a.157 (relating to phased deposits of collateral).

(b) The Department prescribes and furnishes the forms for bond instruments.

(c) Bonds are payable to the Department and conditioned upon the faithful performance of the requirements of the act, The Clean Streams Law (35 P. S. §§ 691.1—691.1001), the Surface Mining Conservation and Reclamation Act (52 P. S. §§ 1396.1—1396.19a), the Air Pollution Control Act (35 P. S. §§ 4001—4015), the Dam Safety and Encroachments Act (32 P. S. §§ 693.1—693.27), the regulations adopted thereunder, the terms and conditions of any permit issued thereunder, orders of the Department and amendments, revisions and changes to the acts, the regulations and the terms and conditions of the hazardous waste storage, treatment and disposal facility permit as may be lawfully made in the future.

(d) The bond shall cover the hazardous waste storage, treatment or disposal operations from the initiation of the operations until the bond is released as provided in this chapter. The bond shall cover all operations and activities conducted within the permitted area and all effects caused by the hazardous waste activities within or without the permit area. An owner or operator of a new facility shall submit the bond to the Department at least 60 days before the date that hazardous waste is first received for treatment, storage or disposal.

(e) Bonds will be reviewed for legality and form according to established Commonwealth procedures.

§ 265a.155. Special terms and conditions for surety bonds.

(a) The Department does not accept the bond of a surety company that failed or unduly delayed in making payment on a forfeited surety bond.

(b) The Department accepts only the bond of a surety authorized to do business in this Commonwealth and which is listed in Circular 570 of the United States Department of Treasury.

(c) The surety may cancel the bond by sending written notice of cancellation by certified mail to the owner or operator and the Department. Cancellation may not take effect until 120 days after receipt of the notice of cancellation by the principal and the Department, as evidenced by the return receipts. Within 60 days after receipt of the notice of cancellation, the owner or operator shall provide the

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Department with a replacement bond under § 265a.158 (relating to replacement of bond). Failure of the owner or operator to provide a replacement bond within the 60-day period constitutes grounds for forfeiture of the existing bond under § 265a.168 (relating to bond forfeiture).

(d) The Department does not accept surety bonds from a surety company for an owner or operator, on all facilities owned or operated by the owner or operator, in excess of the company's single risk limit as provided by The Insurance Company Law of 1921 (40 P. S. §§ 341—991), unless the surety has complied with the provisions of The Insurance Company Act of 1921 (40 P. S. §§ 1—297.4) for accepting risk above its single risk limit.

(e) The bond shall provide that full payment will be made on the bond within 30 days of receipt of a notice of forfeiture by the surety notwithstanding judicial or administrative appeal of the forfeiture and that the amount is confessed to judgment upon forfeiture.

(f) The bond shall provide that the surety and the owner or operator are joint and severally liable for payment of the bond amount.

§ 265a.156. Special terms and conditions for collateral bonds and bonds pledging corporate guarantee for closure.

(a) The Department obtains possession and keeps custody of collateral deposited by the owner or operator until authorized for release or replacement as provided in this subchapter.

(b) The Department values governmental securities for both current market value and face value. For the purpose of establishing the value of the securities for bond deposit, the Department uses the lesser of current market value or face value. Government securities shall be rated at least BBB by Standard and Poor's or Baa by Moody's.

(c) Collateral bonds pledging Pennsylvania bank certificates of deposit are subject to the following conditions:

(1) The Department requires that certificates of deposit be assigned to the Department, in writing, and the assignment recorded upon the books of the issuing institution.

(2) The Department may accept an individual certificate of deposit for the maximum insurable amount as determined by the Federal Deposit Insurance Corporation (FDIC) and which is otherwise secured under Pennsylvania law.

(3) The Department requires the issuing institution to waive all rights of setoff or liens which it has or might have against the certificates.

(4) The Department only accepts automatically-renewable certificates of deposit.

(5) The Department requires that the certificates of deposit be assigned to the Department to assure that the Department can liquidate the certificates prior to maturity, upon forfeiture, for the amount of the bond determined under this subchapter.

(6) The Department only accepts certificates of deposit only from banks or banking institutions licensed, chartered or otherwise authorized to do business in the United States.

(7) The Department does not accept certificates of deposit from banks that failed or delayed to make payment on defaulted certificates of deposit.

(d) Collateral bonds pledging a letter of credit are subject to the following conditions:

(1) The letter of credit is a standby letter of credit issued only by a bank organized or authorized to do business in the United States, examined by a state or Federal agency and Federally insured or equivalently protected.

(2) The letter of credit may not be issued without a credit analysis substantially equivalent to that of a potential borrower in an ordinary loan situation. A letter of credit so issued is supported by the customer's unqualified obligation to reimburse the issuer for moneys paid under the letter of credit.

(3) The letter of credit may not be issued when the amount of the letter of credit, aggregated with other loans and credits extended to the owner or operator, exceeds the issuer legal lending limits for that owner or operator as defined in the United States Banking Code (12 U.S.C.A. §§ 21—220).

(4) The letter of credit is irrevocable and is so designated. The Department may accept a letter of credit for which at least a 1 year period is stated if the following conditions are met and are stated in the credit:

(i) The letter of credit is automatically renewable for additional time periods of at least 1 year, unless the bank gives at least 120 days prior written notice by certified mail to the Department and the customer of its intent to terminate the credit at the end of the current time period.

(ii) The Department has the right to draw upon the credit before the end of the time period, if the customer fails to replace the letter of credit with other acceptable bond guarantee within 30 days of the bank's notice to terminate the credit.

(5) Letters of credit shall name the Department as the beneficiary and be payable to the Department, upon demand, in part or in full, upon presentation of the Department's drafts at sight. The Department's right to draw upon the letter of credit will not require documentary or other proof by the Department that the customer has violated the conditions of the bond, the permit or another requirement of this subchapter.

(6) Letters of credit are subject to 13 Pa.C.S. (relating to the Uniform Commercial Code) and the latest revision of the Uniform Customs and Practice for Documentary Credits, published by the International Chamber of Commerce. The Department may accept 13 Pa.C.S. Division 5 (relating to letters of credit) in effect in the state of the issuer.

(7) The issuing bank waives the rights to setoff or liens it has or might have against the letter of credit.

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(8) The Department will not accept letters of credit from a bank that failed or delayed in making payment on a letter of credit previously submitted as collateral to the Department.

(e) Bonds pledging a corporate guarantee for closure shall be subject to the requirements of 40 CFR 265.143(e) (relating to financial test and corporate guarantee for closure) and 40 CFR 265.145(e) (relating to financial assurance for post-closure care) except for the provision of 40 CFR 265.143(e)(10)(i) (relating to financial assurance for closure) as specified in § 264a.143(a) (relating to financial assurance for closure). This is replaced by the procedures of § 265a.168 (relating to bond forfeiture).

Cross References

This section cited in 25 Pa. Code § 265a.143 (relating to financial assurance for closure); and 25 Pa. Code § 265a.145 (relating to financial assurance for postclosure care).

§ 265a.157. Phased deposits of collateral.

(a) A permit applicant, or an owner or operator may post a collateral bond in phased deposits for a hazardous waste storage, treatment or disposal facility that will be continuously operated or used for at least 10 years from the date of issuance of the permit or permit amendment, according to all of the following requirements:

(1) The owner or operator submits a collateral bond form to the Department.

(2) The owner or operator deposits $10,000 or 25%, whichever is greater, of the total amount of bond determined in this chapter in approved collateral with the Department.

(3) The owner or operator submits a schedule agreeing to deposit 10% of the remaining amount of bond, in approved collateral in each of the next 10 years.

(b) The permit applicant or owner or operator deposits the full amount of bond required for the hazardous waste storage, treatment or disposal facility within 30 days of receipt of a written demand by the Department to accelerate deposit of the bond. The Department makes the demand when one of the following occurs:

(1) The owner or operator fails to make a deposit of bond amount when required by the schedule for the deposits.

(2) The owner or operator violates the requirements of the act, this article, the terms and conditions of the permit or orders of the Department and has failed to correct the violations within the time required for the correction.

(c) Interest earned by collateral on deposit accumulates and becomes part of the bond amount until the owner or operator completes deposit of the requisite bond amount in accordance with the schedule of deposit. Interest so accumulated may not offset or diminish the amount required to be deposited in each of the

succeeding years set forth in the schedule of deposit, except that in the last year in which a deposit is due, the amount to be deposited is adjusted by applying the total accumulated interest to the amount to be deposited as established by the schedule of deposit.

Cross References

This section cited in 25 Pa. Code § 265a.154 (relating to form, terms and conditions of bond); and 25 Pa. Code § 265a.163 (relating to failure to maintain adequate bond).

§ 265a.158. Replacement of bond.

(a) The Department may allow owners or operators to replace existing surety or collateral bonds with other surety or collateral bonds if the liability accrued against the owner or operator of the hazardous waste storage, treatment or disposal facility is transferred to the replacement bonds. The bond amount for the replacement bond as determined under this chapter, may not be less than the amount on deposit with the Department.

(b) The Department will not release existing bonds until the owner or operator submits and the Department has approved acceptable replacement bonds. A replacement of bonds under this section may not constitute a release of bond under this subchapter.

(c) Within 60 days of approval of acceptable replacement bonds, the Department will take appropriate action to initiate the release of existing surety or collateral bonds being replaced by the owner or operator.

Cross References

This section cited in 25 Pa. Code § 265a.155 (relating to special terms and conditions for surety bonds).

§ 265a.159. Reissuance of permits.

Before a permit is reissued to a new owner or operator, the new owner or operator shall post a new bond in an appropriate amount determined by the Department under this subchapter but in no case less than the amount of bond on deposit with the Department, in the new owner's or operator's name, assuming all accrued liability for the hazardous waste storage, treatment or disposal facility.

§ 265a.160. Bond amount determination.

(a) The Department determines bond amount requirements for each hazardous waste storage, treatment and disposal facility based upon the total estimated cost to the Commonwealth to complete final closure of the facility. This is done in accordance with the requirements of applicable statutes, this article, the terms and conditions of the permit and orders issued thereunder by the Department and

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to take measures that are necessary to prevent adverse effects upon the environment during the life of the facility and after closure until released as provided by this subchapter.

(b) This amount is based on the owner's or operator's written estimate submitted under 40 CFR 265.142 and 265.144 (relating to cost estimate for closure; and cost estimate for post-closure care).

Cross References

This section cited in 25 Pa. Code § 265a.153 (relating to requirement to file a bond).

§ 265a.162. Bond amount adjustments.

The owner or operator shall deposit additional amounts of bond within 60 days of any of the following:

(1) The permit is amended to increase acreage, to change the kind of waste handled or for another reason that requires an additional amount of bond determined under 40 CFR 265.142 and 265.144 (relating to cost estimate for closure; and cost estimate for postclosure care).

(2) Inflationary cost factors exceed the estimate used for the original bond amount determination under 40 CFR 265.142 and 265.144.

(3) The permit is to be renewed or reissued, or the bond on deposit is to be replaced, requiring an additional amount of bond determined under 40 CFR 265.142 and 265.144.

(4) An additional amount of bond is required as determined by 40 CFR 265.142 and 265.144 to meet the requirements of applicable statutes, this subchapter and the terms and conditions of the permit or orders of the Department.

Cross References

This section cited in 25 Pa. Code § 265a.153 (relating to requirement to file a bond); 25 Pa. Code § 265a.163 (relating to failure to maintain adequate bond); 25 Pa. Code § 265a.164 (relating to separate bond for a portion of a facility); and 25 Pa. Code § 265a.165 (relating to bond release).

§ 265a.163. Failure to maintain adequate bond.

If an owner or operator fails to post additional bond within 60 days after receipt of a request by the Department for additional bond amounts under § 265a.162 (relating to bond amount adjustments), or fails to make timely deposits of bond in accordance with the schedule submitted under § 265a.157 (relating to phased deposits of collateral), the Department will issue a notice of violation to the owner or operator, and if the owner or operator fails to deposit the required bond amount within 15 days of the notice, the Department will issue a cessation order for all of the hazardous waste storage, treatment and disposal facilities operated by the owner or operator and take additional actions that may be appropriate, including suspending or revoking permits.

§ 265a.164. Separate bonding for a portion of a facility.

(a) The Department may require a separate bond to be posted for a part of a hazardous waste storage, treatment or disposal facility if that part of the facility can be separated and identified from the remainder of the facility and the bond liability for that part will continue beyond the time provided for the remainder of the facility, or the Department determines that separate bonding of the facility is necessary to administer and apply applicable statutes, this article, the terms and conditions of the permit or orders of the Department.

(b) If the Department requires a separate bond for part of a facility, the original bond amount for the facility may be adjusted under § 265a.162 (relating to bond amount adjustments).

Cross References

This section cited in 25 Pa. Code § 265a.166 (relating to closure and postclosure certification).

§ 265a.165. Bond release.

(a) The owner or operator may file a written application with the Department requesting release of all or part of the bond amount posted for a hazardous waste storage, treatment or disposal facility. The bond release may be requested during the operation of the facility as part of a request for bond adjustment under § 265a.162 (relating to bond amount adjustments); upon completion of closure for a storage or treatment facility and upon expiration of the postclosure care period of liability, for a disposal facility as specified in 40 CFR Part 265, Subpart G (relating to closure and postclosure care).

(b) The application for bond release shall contain the following:

(1) The name of the owner or operator and shall identify the hazardous waste storage, treatment or disposal facility for which bond release is sought.

(2) The total amount of bond in effect for the facility and the amount for which release is sought.

(3) The reasons why, in specific detail, bond release is requested, including, but not limited to, the closure, postclosure care and abatement measures taken, the permit amendments authorized or the change in facts or assumptions made during the bond amount determination which demonstrate and would authorize a release of part or all of the bond deposited for the facility.

(4) Provide a revised cost estimate for closure and postclosure care in accordance with 40 CFR 265.142 and 265.144 (relating to cost estimate for closure; and post-closure care).

(5) Closure or postclosure certification for full bond release requests.

(6) Provide other information as may be required by the Department.

(c) The Department will evaluate the bond release request as if it were a request for a new bond amount determination under 40 CFR 265.142 and 265.144. If the new bond amount determination would require less bond for the facility than the amount already on deposit, the Department will release the por-

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tion of the bond amount which is not required for the facility. If the new bond amount determination would require an additional amount of bond for the facility, the Department will require the additional amount to be deposited for the facility.

(d) The Department will not release a bond amount deposited for a facility if the release would reduce the total remaining amount of bond to an amount which would be insufficient for the Department to complete closure and postclosure care and to take measures that may be necessary to prevent adverse effects upon the environment or public health, safety or welfare in accordance with applicable statutes, this chapter, the terms and conditions of the permits and orders of the Department.

(e) The Department will make a decision on a bond release application within 6 months after receipt unless additional time is authorized by the owner or operator.

(f) The Department will not release a bond amount for a facility which is causing adverse effects on the public health, safety or welfare or the environment, creating a public nuisance, or is in violation of this chapter, the act or the statutes in section 505(a) of the act (35 P. S. § 6018.505).

§ 265a.166. Closure and postclosure certification.

(a) The owner or operator shall submit a request for closure certification upon completion of closure of the facility in accordance with the provisions of 40 CFR 265.115 and 265.120 (relating to certification of closure; and certification of completion of postclosure care).

(b) Within 60 days after receipt of a written request for closure or postclosure certification, the Department will initiate an inspection of the facility to verify that closure was effected in accordance with the approved facility closure or postclosure care plan and this article.

(c) If the Department determines that the facility closed in accordance with this article, and that there is no reasonable expectation of adverse effects upon the environment or the public health, safety and welfare, the Department will certify in writing to the owner or operator that closure or postclosure effected in accordance with this subchapter. Closure or postclosure certification may not take effect until 1 year after receipt of the Department's determination.

(d) The closure or postclosure certification does not constitute a waiver or release of bond liability or other liability existing in law for adverse environmental conditions or conditions of noncompliance existing at the time of the notice or which might occur at a future time, for which the owner or operator shall remain liable.

(e) The Department will not issue a closure or postclosure certification for a facility causing adverse effects on the public health, safety or welfare or the environment, creating a public nuisance, or is in violation of this article, the act or the statutes set forth in section 505(a) of the act (35 P. S. § 6018.505(a)).

(f) At any time after issuance of a certification of closure or postclosure, if inspection by the Department indicates that additional postclosure care measures are required to abate or prevent any adverse effects upon the environment or the public health, safety and welfare, the Department will issue a written notice to the owner or operator setting forth the schedule of measures which the owner or operator shall take in order to bring the facility into compliance.

(g) At least 6 months prior to expiration of the 1 year liability period following closure and postclosure care, the Department will conduct an inspection of the facility. If the Department determines that the facility will continue to cause adverse effects upon the environment or the public health, safety and welfare after expiration of the 1 year liability period, the Department will require the owner or operator to deposit a separate bond under § 265a.164 (relating to separate bonding for a portion of a facility), or forfeit the bond under § 264a.168 (relating to bond forfeiture) on deposit with the Department.

§ 265a.167. Public notice and comment.

The original bond amount determination, a decision by the Department to release bond, a request to reduce bond amount after permit issuance and a request for closure or postclosure certification shall be, for the purpose of providing public notice and comment, considered a permit modification and shall be subject to the public notice and comment requirements for Class 3 permit modifications.

Cross References

This section cited in 25 Pa. Code § 265a.115 (relating to certification of closure); and 25 Pa. Code § 265a.120 (relating to certification of completion of postclosure care).

§ 265a.168. Bond forfeiture.

(a) The Department will forfeit the bond for a hazardous waste storage, treatment or disposal facility when it determines that any of the following occur:

(1) The owner or operator fails and continues to fail to conduct the hazardous waste storage, treatment or disposal activities in accordance with this article, the act, the statutes in section 505(a) of the act (35 P. S. § 6018.505(a)), the terms and conditions of the permit or orders of the Department.

(2) The owner or operator abandons the facility without providing closure or postclosure care, or otherwise fails to properly close the facility in accordance with this article, the act, the statutes in section 505(a) of the act, the terms and conditions of the permit or orders of the Department.

(3) The owner or operator fails, and continues to fail to take those measures determined necessary by the Department to prevent effects upon the environment before, during and after closure and postclosure care.

(4) The owner or operator or financial institution becomes insolvent, fails in business, is adjudicated bankrupt, a delinquency proceeding is initiated under Article V of The Insurance Department Act of 1921 (40 P. S. §§ 221.1—

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221.63), files a petition in bankruptcy, in liquidation, for dissolution or for a receiver, or has a receiver appointed by the court, or had action initiated to suspend, revoke or refuse to renew the license or certificate of authority of the financial institution, or a creditor of the owner or operator attaches or executes a judgment against the owner's or operator's equipment, materials or facilities at the permit area or on the collateral pledged to the Department; and the owner or operator or financial institution cannot demonstrate or prove the ability to continue to operate in compliance with this article, the act, the statutes in section 505(a) of the act, the terms and conditions of the permit and orders of the Department.

(b) If the Department determines that bond forfeiture is appropriate, the Department will do the following:

(1) Send written notification by mail to the owner or operator, the host municipality and the surety on the bond, if any, of the Department's determination to forfeit the bond and the reasons for the forfeiture.

(2) Advise the owner or operator and surety, if any, of their right to appeal to the EHB under section 1921-A of The Administrative Code of 1929 (71 P. S. § 510-21).

(3) Proceed to collect on the bond as provided by applicable statutes for the collection of defaulted bonds or other debts.

(4) Deposit all money collected from defaulted bonds into the Solid Waste Abatement Fund.

(5) Forfeit all bond deposited for the facility, including all additional amounts of bond posted for the facility.

Cross References

This section cited in 25 Pa. Code § 265a.155 (relating to special terms and conditions for surety bonds); 25 Pa. Code § 265a.156 (relating to special terms and conditions for collateral bonds and bonds pledging corporate guarantee for closure); and 25 Pa. Code § 265a.166 (relating to closure and postclosure certification).

§ 265a.169. Preservation of remedies.

Remedies provided or authorized by law for violation of statutes, including but not limited to, the act, The Clean Streams Law (35 P. S. §§ 691.1—691.1001), the Surface Mining Conservation and Reclamation Act (52 P. S. §§ 1396.1—1396.19c), the Air Pollution Control Act (35 P. S. §§ 4001—4015), the Dam Safety and Encroachments Act (32 P. S. §§ 693.1—693.27), this article, the terms and conditions of permits and orders of the Department, are expressly preserved. Nothing in this chapter may be construed as an exclusive penalty or remedy for the violations. An action taken under this subchapter may not waive or impair another remedy or penalty provided in law.

Subchapter I. USE AND MANAGEMENT OF CONTAINERS

Sec.
265a.173. Management of containers.
265a.175. [Reserved].
265a.179. Containment.

Cross References

This subchapter cited in 25 Pa. Code § 261a.6 (relating to requirements for recyclable materials); and 25 Pa. Code § 262a.34 (relating to accumulation time).

§ 265a.173. Management of containers.

In addition to the requirements incorporated by reference:

(1) For indoor storage of reactive or ignitable hazardous waste, the container height width and depth of a group of containers shall provide a configuration and aisle spacing which insures safe management and access for purposes of inspection, containment and remedial action with emergency vehicles.

(2) For outdoor storage of reactive or ignitable hazardous waste, the container height, width and depth of a group of containers shall provide a configuration and aisle spacing which insures safe management and access for purposes of inspection, containment and remedial action with emergency vehicles.

(3) For indoor or outdoor storage of nonreactive or nonignitable hazardous waste, the container height, width and depth of a group of containers shall provide a configuration and aisle spacing which insures safe management and access for purposes of inspection, containment and remedial action with emergency vehicles.

Source

The provisions of this 265a.173 amended December 13, 2002, effective December 14, 2002, 32 Pa.B. 6102. Immediately preceding text appears at serial pages (272730).

§ 265a.175. [Reserved].

Source

The provisions of this 265a.175 reserved December 13, 2002, effective December 14, 2002, 32 Pa.B. 6102. Immediately preceding text appears at serial pages (272730) to (272731).

§ 265a.179. Containment.

40 CFR 264.175 (relating to containment) is incorporated by reference.

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Subchapter J. TANK SYSTEMS

Sec.
265a.191. Assessment of existing tank system's integrity.
265a.193. Containment and detection of releases.
265a.194. General operating requirements.
265a.195. Inspections.

Cross References

This subchapter cited in 25 Pa. Code § 261a.6 (relating to requirements for recyclable materials).

§ 265a.191. Assessment of existing tank system's integrity.

In addition to the requirements incorporated by reference, by January 17, 1994, an owner or operator of tanks or tank systems shall obtain and keep on file at the facility a written assessment of the tank or tank system's integrity in accordance with the provisions of 40 CFR 265.191 (relating to assessment of existing tank system's integrity).

§ 265a.193. Containment and detection of releases.

In addition to the requirements incorporated by reference, owners or operators of existing tank systems shall comply with 40 CFR 265.193 (relating to containment and detection of releases) by January 16, 1995, except that owners and operators of existing tank systems for which the age cannot be documented, shall comply with 40 CFR 265.193 by January 16, 1996.

§ 265a.194. General operating requirements.

In addition to the requirements incorporated by reference, tanks shall be labeled to accurately identify their contents.

§ 265a.195. Inspections.

In addition to the requirements incorporated by reference, the tank or tank system shall be inspected every 72 hours when not operating, if waste remains in the tank or tank system components.

Subchapter P. THERMAL TREATMENT

Sec.
265a.382. Open burning; waste explosives.

§ 265a.382. Open burning; waste explosives.

In addition to the requirements incorporated by reference, the open burning of waste explosives as specified in 40 CFR 265.382 (relating to open burning; waste explosives) is not permitted in air basins as defined in § 121.1 (relating to definitions).

[Next page is 266-1.]

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CHAPTER 266b. UNIVERSAL WASTE MANAGEMENT

Subchap.		Sec.
A.	**GENERAL**	**266b.1**
B.	**SMALL QUANTITY HANDLERS OF UNIVERSAL WASTE**	**266b.10**
C.	**LARGE QUANTITY HANDLERS OF UNIVERSAL WASTE**	**266b.30**
D.	**UNIVERSAL WASTE TRANSPORTERS**	**266b.50**
E.	**DESTINATION FACILITIES**	**266b.60**

Authority

The provisions of this Chapter 266b issued under sections 105, 401—403 and 501 of the Solid Waste Management Act (35 P. S. §§ 6018.105, 6018.401—6018.403 and 6018.501); sections 105, 402 and 501 of The Clean Streams Law (35 P. S. §§ 691.105, 691.402 and 691.501); and section 1920-A of The Administrative Code of 1929 (71 P. S. § 510-20), unless otherwise noted.

Source

The provisions of this Chapter 266b adopted April 30, 1999, effective May 1, 1999, 29 Pa.B. 2367, unless otherwise noted.

Cross References

This chapter cited in 25 Pa. Code § 252.3 (relating to scope); 25 Pa. Code § 260a.3 (relating to terminology and citations related to Federal regulations); 25 Pa. Code § 261a.8 (relating to requirements for universal waste); 25 Pa. Code § 264a.1 (relating to incorporation by reference, purpose, scope and reference); and 25 Pa. Code § 265a.1 (relating to incorporation by reference, purpose, scope and applicability).

Subchapter A. GENERAL

Sec.
266b.1. Incorporation by reference and scope.
266b.2. Applicability—mercury-containing devices.
266b.3. Definitions.

§ 266b.1. Incorporation by reference and scope.

(a) Except as expressly provided in this chapter, 40 CFR Part 273 (relating to standards for universal waste management) is incorporated by reference.

(b) In addition to the requirements incorporated by reference in 40 CFR 273.1(a) (relating to scope), mercury-containing devices as defined in § 266b.3 (relating to definitions) are included as wastes subject to regulation under this chapter.

(c) In addition to the requirements incorporated by reference in 40 CFR 273.4 (relating to applicability—mercury thermostats), mercury-containing devices as defined in § 266b.3 are included as wastes subject to the standards specified for thermostats in this chapter.

(d) In addition to the requirements incorporated by reference in 40 CFR 273.6 (relating to definitions), mercury-containing devices as defined in § 266b.3 are included as wastes listed in the definition of ‘‘universal waste.’’

Source

The provisions of this § 266b.1 amended December 22, 2000, effective December 23, 2000, 30 Pa.B. 6587. Immediately preceding text appears at serial page (255129).

Cross References

This section cited in 25 Pa. Code § 270a.1 (relating to incorporation by reference, scope and applicability).

§ 266b.2. Applicability—mercury-containing devices.

(a) In addition to the requirements incorporated by reference in 40 CFR Part 273 (relating to standards for universal waste management), this chapter applies to persons managing mercury-containing devices as defined in § 266b.3 (relating to definitions), except those listed in subsection (b).

(b) This section does not apply to persons managing the following mercury-containing devices:

(1) Mercury-containing devices that are not yet wastes under Chapter 261a (relating to identification and listing of hazardous waste). Subsections (c) and (d) describe when mercury-containing devices become wastes.

(2) Mercury-containing devices that are not hazardous waste. A mercury-containing device is a hazardous waste if it exhibits one or more of the characteristics identified in 40 CFR Part 261, Subpart C (relating to characteristics of hazardous waste).

(c) A used mercury-containing device becomes a waste on the date it is discarded or sent for reclamation.

(d) An unused mercury-containing device becomes a waste on the date the handler discards it.

Source

The provisions of this § 266b.2 adopted December 22, 2000, effective December 23, 2000, 30 Pa.B. 6587.

Cross References

This section cited in 25 Pa. Code § 268a.1 (relating to incorporation by reference, purpose, scope and applicability).

§ 266b.3. Definitions.

In addition to the definitions incorporated by reference in 40 CFR 273.6 (relating to definitions), the following words and terms, when used in this chapter, have the following meanings, unless the context clearly indicates otherwise:

Mercury-containing device—A product or component of a product (excluding batteries) which contains elemental mercury that is necessary for operation of the device.

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Source

The provisions of this § 266b.3 adopted December 22, 2000, effective December 23, 2000, 30 Pa.B. 6587.

Cross References

This section cited in 25 Pa. Code § 261a.8 (relating to requirements for universal waste); 25 Pa. Code § 266b.1 (relating to incorporation by reference and scope); and 25 Pa. Code § 266b.2 (relating to applicability—mercury-containing devices).

Subchapter B. SMALL QUANTITY HANDLERS OF UNIVERSAL WASTE

Sec.
266b.10. Applicability.
266b.11. Waste management for universal waste mercury-containing devices.
266b.12. Labeling/marking.

§ 266b.10. Applicability.

In addition to the requirements incorporated by reference, a small quantity handler of universal waste complying with this subchapter is deemed to have a permit for the storage of universal wastes.

§ 266b.11. Waste management for universal waste mercury-containing devices.

In addition to the requirements incorporated by reference in 40 CFR 273.13 (relating to waste management), the following apply:

(1) A small quantity handler of universal waste shall contain any universal waste mercury-containing device that shows evidence of leakage, spillage or damage that could cause leakage under reasonably foreseeable conditions in a container. The container shall be closed, structurally sound, compatible with the contents of the mercury-containing device and lack evidence of leakage, spillage or damage that could cause leakage under reasonably foreseeable conditions.

(2) A small quantity handler of universal waste may remove mercury-containing ampules from universal waste mercury-containing devices if the handler:

(i) Removes the ampules in a manner designed to prevent breakage of the ampules.

(ii) Removes ampules only over or in a containment device (for example, a tray or pan sufficient to collect and contain mercury released from an ampule in case of breakage).

(iii) Ensures that a mercury clean-up system is readily available to immediately transfer mercury resulting from spills or leaks from broken

ampules, from the containment device to a container that meets the requirements of 40 CFR 262.34 (relating to accumulation time).

(iv) Immediately transfers mercury resulting from spills or leaks from broken ampules from the containment device to a container that meets the requirements of 40 CFR 262.34.

(v) Ensures that the area in which ampules are removed is well ventilated and monitored to ensure compliance with applicable occupational safety and health administration exposure levels for mercury found in 29 CFR Part 1910, Subpart Z (relating to toxic and hazardous substances).

(vi) Ensures that employes removing ampules are thoroughly familiar with proper waste mercury handling and emergency procedures, including transfer of mercury from containment devices to appropriate containers.

(vii) Stores removed ampules in closed, nonleaking containers that are in good condition.

(viii) Packs removed ampules in the container with packing materials adequate to prevent breakage during storage, handling and transportation.

(3) A small quantity handler of universal waste who removes mercury-containing ampules from mercury-containing devices shall determine whether the following exhibit a characteristic of hazardous waste identified in 40 CFR Part 261, Subpart C (relating to characteristics of hazardous waste):

(i) Mercury or clean-up residues resulting from spills or leaks.

(ii) Other solid waste generated as a result of the removal of mercury-containing ampules (for example, remaining mercury device units).

(4) If the mercury, residue or other solid waste exhibits a characteristic of hazardous waste, it shall be managed in compliance with applicable requirements of Chapters 261a—265a. The handler is considered the generator of the mercury, residues or other waste and is subject to Chapter 262a (relating to standards applicable to generators of hazardous waste).

(5) If the mercury, residue or other solid waste is not hazardous, the handler shall manage the waste in compliance with the applicable municipal or residual waste regulations found in Articles VIII and IX (relating to municipal waste management; and residual waste management).

Source

The provisions of this § 266b.11 adopted December 22, 2000, effective December 23, 2000, 30 Pa.B. 6587.

§ 266b.12. Labeling/marking.

In addition to the requirements incorporated by reference in 40 CFR 273.14 (relating to labeling/marking), a small quantity handler of universal waste shall label each mercury-containing device, or a container in which the device is con-

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tained, with one of the following phrases: ''universal waste mercury-containing device(s),'' or ''waste mercury-containing device(s)'' or ''used mercury-containing device(s).''

Source

The provisions of this § 266b.12 adopted December 22, 2000, effective December 23, 2000, 30 Pa.B. 6587.

Subchapter C. LARGE QUANTITY HANDLERS OF UNIVERSAL WASTE

Sec.
266b.30. Applicability.
266b.31. Waste management for universal waste mercury-containing devices.
266b.32. Labeling/marking.

§ 266b.30. Applicability.

(a) In addition to the requirements incorporated by reference, a large quantity handler of universal waste complying with this subchapter is deemed to have a permit for the storage of universal wastes.

(b) The substitution of terms in § 260a.3(a)(3) (relating to terminology and citations related to Federal regulations) does not apply to 40 CFR 273.32(a)(3) and 273.40(b) and (c) (relating to notification; and exports).

§ 266b.31. Waste management for universal waste mercury-containing devices.

In addition to the requirements incorporated by reference at 40 CFR 273.33 (relating to waste management), the following apply:

(1) A large quantity handler of universal waste shall contain any universal waste mercury-containing device that shows evidence of leakage, spillage or damage that could cause leakage under reasonably foreseeable conditions in a container. The container shall be closed, structurally sound, compatible with the contents of the mercury-containing device and lack evidence of leakage, spillage or damage that could cause leakage under reasonably foreseeable conditions.

(2) A large quantity handler of universal waste may remove mercury-containing ampules from universal waste mercury-containing devices if the handler:

(i) Removes the ampules in a manner designed to prevent breakage of the ampules.

(ii) Removes ampules only over or in a containment device (for example, a tray or pan sufficient to collect and contain mercury released from an ampule in case of breakage).

(iii) Ensures that a mercury clean-up system is readily available to immediately transfer mercury resulting from spills or leaks from broken ampules, from the containment device to a container that meets the requirements of 40 CFR 262.34 (relating to accumulation time).

(iv) Immediately transfers mercury resulting from spills or leaks from broken ampules from the containment device to a container that meets the requirements of 40 CFR 262.34.

(v) Ensures that the area in which ampules are removed is well ventilated and monitored to ensure compliance with applicable occupational safety and health administration exposure levels for mercury found in 29 CFR Part 1910, Subpart Z (relating to toxic and hazardous substances).

(vi) Ensures that employes removing ampules are thoroughly familiar with proper waste mercury handling and emergency procedures, including transfer of mercury from containment devices to appropriate containers.

(vii) Stores removed ampules in closed, nonleaking containers that are in good condition.

(viii) Packs removed ampules in the container with packing materials adequate to prevent breakage during storage, handling and transportation.

(3) A large quantity handler of universal waste who removes mercury-containing ampules from mercury-containing devices shall determine whether the following exhibit a characteristic of hazardous waste identified in 40 CFR Part 261, Subpart C (relating to characteristics of hazardous waste):

(i) Mercury or clean-up residues resulting from spills or leaks.

(ii) Other solid waste generated as a result of the removal of mercury-containing ampules (for example, remaining mercury device units).

(4) If the mercury, residue or other solid waste, exhibits a characteristic of hazardous waste, it shall be managed in compliance with applicable requirements of Chapters 261a—265a and Chapter 266a, Subchapters C and F—H. The handler is considered the generator of the mercury, residue or other waste and is subject to Chapter 262a (relating to standards applicable to generators of hazardous waste).

(5) If the mercury, residues or other solid waste is not hazardous, the handler shall manage the waste in compliance with the applicable municipal or residual waste regulations found in Articles VIII and IX (relating to municipal waste management; and residual waste management).

Source

The provisions of this § 266b.31 adopted December 22, 2000, effective December 23, 2000, 30 Pa.B. 6587.

§ 266b.32. Labeling/marking.

In addition to the requirements incorporated by reference in 40 CFR 273.34 (relating to labeling/marking), a large quantity handler of universal waste shall

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label each mercury-containing device, or a container in which the device is contained, with one of the following phrases: ''universal waste mercury-containing device(s),'' or ''waste mercury-containing device(s)'' or ''used mercury-containing device(s).''

Source

The provisions of this § 266b.32 adopted December 22, 2000, effective December 23, 2000, 30 Pa.B. 6587.

Subchapter D. UNIVERSAL WASTE TRANSPORTERS

Sec.
266b.50. Applicability.

§ 266b.50. Applicability.

(a) In addition to the requirements incorporated by reference, a universal waste transporter complying with this subchapter is deemed to have a license for the transportation of universal wastes.

(b) The substitution of terms in § 260a.3(a)(3) (relating to terminology and citations related to Federal regulations) does not apply to 40 CFR 273.56 (relating to exports).

Cross References

This section cited in 25 Pa. Code § 263a.13 (relating to licensing); and 25 Pa. Code § 265a.11 (relating to identification number and transporter license).

Subchapter E. DESTINATION FACILITIES

Sec.
266b.60. Applicability.

§ 266b.60. Applicability.

Relative to the requirements incorporated by reference, 40 CFR 273.60(b) (relating to applicability) is not incorporated by reference.

[Next page is 267-1.]

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CHAPTER 298. MANAGEMENT OF WASTE OIL

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Authority

The provisions of this Chapter 298 issued under section 105(a) of the Solid Waste Management Act (35 P. S. § 6018.105(a)); sections 5(b) and 402 of The Clean Streams Law (35 P. S. §§ 691.5(b) and 691.402); section 302 of the Municipal Waste Planning, Recycling and Waste Reduction Act (53 P. S. § 4000.302); section 480(e) of the Pennsylvania Used Oil Recycling Act (58 P. S. § 480(e)); and sections 1905-A, 1917-A and 1920-A of The Administrative Code of 1929 (71 P. S. §§ 510-5, 510-17 and 510-20), unless otherwise noted.

Source

The provisions of this Chapter 298 adopted June 1, 2001, effective June 2, 2001, 31 Pa.B. 2873, unless otherwise noted.

Cross References

This chapter cited in 25 Pa. Code § 252.3 (relating to scope); 25 Pa. Code § 260a.3 (relating to terminology and citations related to Federal regulations); 25 Pa. Code § 261a.2 (relating to definition of "solid waste"); 25 Pa. Code § 261a.5 (relating to special requirements for hazardous waste generated by conditionally exempt small quantity generators); 25 Pa. Code § 261a.6 (relating to requirements for recyclable materials); and 25 Pa. Code § 266a.100 (relating to applicability).

Subchapter A. GENERAL

Sec.
298.1. Definitions.
298.2. Scope.

§ 298.1. Definitions.

Terms defined in §§ 260a.1 and 260a.10 (relating to incorporation by reference, purpose, scope and applicability; and definitions) that are not defined in § 287.1 (relating to definitions) have the same meanings when used in this chapter. The following words and terms, when used in this chapter, have the following meanings, unless the context clearly indicates otherwise:

Aboveground storage tank—A tank used to store or process waste oil that is not an underground storage tank.

Container—A portable device in which a material is stored, transported, treated, disposed of or otherwise handled.

Household "do-it-yourselfer" waste oil—Oil that is derived from households, such as waste oil generated by individuals who generate waste oil through the maintenance of their personal vehicles.

Household "do-it-yourselfer" waste oil generator—An individual who generates household "do-it-yourselfer" waste oil.

Petroleum refining facility—An establishment primarily engaged in producing gasoline, kerosene, distillate fuel oils, residual fuel oils and lubricants, through fractionation, straight distillation of crude oil, redistillation of unfinished petroleum derivatives, cracking or other processes—for example, facilities classified as SIC 2911.

Rerefining distillation bottoms—The heavy fraction produced by vacuum distillation of filtered and dehydrated waste oil. The composition of still bottoms varies with column operation and feedstock.

Tank—A stationary device, designed to contain an accumulation of waste oil which is constructed primarily of nonearthen or nonwooden materials—for example, concrete, steel, plastic—which provides structural support.

Underground storage tank—An underground storage tank as defined in § 245.1 (relating to definitions).

Waste oil aggregation point—A site or facility that accepts, aggregates or stores waste oil collected only from other waste oil generation sites owned or operated by the owner or operator of the aggregation point, from which waste oil is transported to the aggregation point in shipments of no more than 55 gallons. Waste oil aggregation points may also accept waste oil from household do-it-yourselfers.

Waste oil burner—A facility where waste oil not meeting the specification requirements in § 298.11 (relating to waste oil specifications) is burned for energy recovery in devices identified in § 298.61(a) (relating to restrictions on burning).

Waste oil collection center—A site or facility that is registered, licensed, permitted and accepts, aggregates and stores waste oil collected from waste oil generators regulated under Subchapter C (relating to waste oil generators) who bring waste oil to the collection center in shipments of no more than 55 gallons under § 298.24 (relating to offsite shipments). Waste oil collection centers may also accept waste oil from household do-it-yourselfers.

Waste oil fuel marketer—A person who conducts one of the following activities:

(i) Directs a shipment of off-specification waste oil from the person's facility to a waste oil burner.

(ii) First claims that waste oil that is to be burned for energy recovery meets the waste oil fuel specifications in § 298.11.

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Waste oil generator—A person, by site, whose act or process produces waste oil or whose act first causes waste oil to become subject to this chapter.

Waste oil processing—Chemical or physical operations designed to produce from waste oil, or to make waste oil more amenable for production of, fuel oils, lubricants or other waste oil-derived products. Waste oil processing includes: blending waste oil with virgin petroleum products, blending waste oils to meet the fuel specification, filtration, simple distillation, chemical or physical separation and rerefining.

Waste oil processor/rerefiner—A facility that processes waste oil.

Waste oil transfer facility—A transportation related facility including loading docks, parking areas, storage areas and other areas where shipments of waste oil are received or held, or both, during the normal course of transportation.

Waste oil transporter—A person who transports waste oil and a person who collects waste oil from more than one generator and transports the collected oil. Transportation may include consolidation or aggregation of loads of waste oil on the vehicle or in transportation containers. Transporters may conduct incidental waste oil separation that occurs in the normal course of waste oil transportation—for example, settling and water separation.

§ 298.2. Scope.

(a) This chapter specifies general procedures and rules for persons or municipalities who generate, manage or handle waste oil that is being recycled.

(b) Waste oil that is being recycled shall be managed in accordance with this chapter.

Subchapter B. APPLICABILITY

Sec.
298.10. Applicability.
298.11. Waste oil specifications.
298.12. Prohibitions.

§ 298.10. Applicability.

(a) *Waste oil*. It is presumed that waste oil is to be recycled unless a waste oil handler disposes of waste oil, or sends waste oil for disposal. Except as provided in § 298.11 (relating to waste oil specifications), this chapter applies to waste oil and to materials identified in this section as being subject to regulation as waste oil whether or not the waste oil or material exhibits any characteristics of hazardous waste identified in 40 CFR Part 261, Subpart C (relating to characteristics of hazardous waste), incorporated by reference in § 261a.1 (relating to incorporation by reference, purpose and scope).

(b) *Mixtures of waste oil and hazardous waste*.

(1) *Listed hazardous waste*.

(i) *Mixtures of waste oil*. Mixtures of waste oil and hazardous waste that are listed in 40 CFR Part 261, Subpart D (relating to lists of hazardous waste), incorporated by reference in § 261a.1, are subject to regulation as hazardous waste under Chapters 260a—266a and Chapter 270a rather than as waste oil under this chapter.

(ii) *Rebuttable presumption for waste oil*. Waste oil containing more than 1,000 parts per million total halogens is presumed to be a hazardous waste. A person may rebut this presumption by demonstrating that the waste oil does not contain hazardous waste. For example, a person may use an analytical method from the current edition of SW-846 to show that the waste oil does not contain significant concentrations of halogenated hazardous constituents identified in 40 CFR Part 261, Appendix VIII (relating to hazardous constituents), incorporated by reference in § 261a.1. EPA publication SW-846, current edition, is available from the Government Printing Office, Superintendent of Documents, Post Office Box 371954, Pittsburgh, Pennsylvania 15250-7954, (202) 512-1800 (Document number 955-001-00000-1). Another way of rebutting this presumption is to demonstrate that the halogenated constituents are from wastes generated by households and, therefore, under 40 CFR 261.4(b)(1) (relating to exclusions), incorporated by reference in § 261a.1, are excluded from regulation as hazardous waste.

(A) The rebuttable presumption does not apply to metalworking oils/fluids containing chlorinated paraffins, if they are processed, through a tolling arrangement as described in § 298.24(c) (relating to offsite shipments), to reclaim metalworking oils/fluids. The presumption does apply to metalworking oils/fluids if the oils/fluids are recycled in another manner or disposed.

(B) The rebuttable presumption does not apply to waste oils contaminated with chlorofluorocarbons (CFCs) removed from refrigeration units where the CFCs are destined for reclamation. The rebuttable presumption applies to waste oils contaminated with CFCs that have been mixed with waste oil from sources other than refrigeration units.

(2) *Characteristic hazardous waste*. A mixture of waste oil and hazardous waste that solely exhibits one or more of the hazardous waste characteristics identified in 40 CFR Part 261, Subpart C (relating to characteristics of hazardous waste), incorporated by reference in § 261a.1, and mixtures of waste oil and hazardous waste that is listed in 40 CFR Part 261, Subpart D (relating to lists of hazardous waste), incorporated by reference in § 261a.1, solely because it exhibits one or more of the characteristics of hazardous waste identified in 40 CFR Part 261, Subpart C (relating to characteristics of hazardous waste), incorporated by reference in § 261a.1, are subject to:

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(i) Regulation as hazardous waste under Chapters 260a—270a, rather than as waste oil under this chapter, except as provided in subparagraphs (ii) and (iii).

(ii) Regulation as waste oil under this chapter if the mixture is of waste oil and a waste which is hazardous waste, mixed in accordance with § 270a.60(b)(2) (relating to permit-by-rule) or in accordance with a permitted hazardous waste treatment facility, and if the waste is hazardous solely because it exhibits the toxicity characteristic for benzene, arsenic, cadmium, chromium or lead or ignitability, provided that the resultant mixture does not exhibit any characteristic of hazardous waste identified under 40 CFR Part 261, Subpart C (relating to characteristics of hazardous waste) except as specified in subparagraph (iii).

(iii) Regulation as waste oil under this chapter if the mixture is of waste oil and a waste which is hazardous solely because it exhibits the characteristic of ignitability—for example, ignitable-only mineral spirits—if the resultant mixture does not exhibit the characteristic of ignitability under 40 CFR 261.21 (relating to characteristic of ignitability), incorporated by reference at § 261a.1. The hazardous waste, as well as the mixing of waste oil with a waste that is hazardous solely because it exhibits the characteristic of ignitability, shall be managed in accordance with this chapter.

(c) *Materials containing or otherwise contaminated with waste oil*.

(1) Except as provided in paragraph (2), materials containing or otherwise contaminated with waste oil from which the waste oil has been properly drained or removed to the extent possible so that no visible signs of free- flowing oil remain in or on the material:

(i) Are not waste oil and thus not subject to this chapter.

(ii) Are subject to regulation under Articles VII and VIII (relating to hazardous waste management; and municipal waste management) or this article.

(2) Materials containing or otherwise contaminated with waste oil that are burned for energy recovery are subject to regulation as waste oil under this chapter when burned at an industrial furnace or boiler.

(3) Waste oil drained or removed from materials containing or otherwise contaminated with waste oil is subject to regulation as waste oil under this chapter.

(4) Except as provided in paragraph (2) and subsection (f), wastewater contaminated with waste oil is managed under this chapter if it is demonstrated that one of the following applies:

(i) At least 1% of the wastewater is waste oil.

(ii) The wastewater contains marketable quantities of waste oil.

(d) *Mixtures of waste oil with products*.

(1) Except as provided in paragraph (2), mixtures of waste oil and fuels or other fuel products are subject to regulation as waste oil under this chapter.

(2) A mixture of waste oil and diesel fuel mixed onsite by the generator of the waste oil for use in the generator's own vehicles is not subject to this chapter once the waste oil and diesel fuel have been mixed. Prior to mixing, the waste oil is subject to Subchapter C (relating to waste generators).

(e) *Materials derived from waste oil*.

(1) A material reclaimed from waste oil that is used beneficially and is not burned for energy recovery or used in a manner constituting disposal—for example, rerefined lubricants—may not be subject to this title if the Department determines that the material is no longer a waste in accordance with § 287.7 (relating to determination that a material is no longer a waste).

(2) A material produced from waste oil that is burned for energy recovery—for example, waste oil fuels—is subject to regulation as waste oil under this chapter.

(3) Except as provided in paragraph (4), a material derived from waste oil that is disposed or used in a manner constituting disposal is:

(i) Not waste oil and thus is not subject to this chapter.

(ii) A waste subject to regulation under Article VII or this article.

(4) Waste oil rerefining distillation bottoms that are used by the rerefiner as feedstock to manufacture asphalt products are not subject to this chapter.

(f) *Waste oil introduced into crude oil pipelines or a petroleum refining facility*.

(1) Waste oil mixed with crude oil or natural gas liquids—for example, in a production separator or crude oil stock tank—for insertion into a crude oil pipeline is exempt from this chapter. Waste oil is subject to this chapter prior to the mixing of waste oil with crude oil or natural gas liquids.

(2) A mixture of waste oil and crude oil or natural gas liquids containing less than 1% waste oil that is being stored or transported to a crude oil pipeline or petroleum refining facility for insertion into the refining process at a point prior to crude distillation or catalytic cracking is exempt under this chapter.

(3) Waste oil that is inserted into the petroleum refining facility process before crude distillation or catalytic cracking without prior mixing with crude oil is exempt from this chapter if the waste oil constitutes less than 1% of the crude oil feed to a petroleum refining facility process unit at any given time. Prior to insertion into the petroleum refining facility process, the waste oil is subject to this chapter.

(4) Except as provided in paragraph (5), waste oil that is introduced into a petroleum refining facility process after crude distillation or catalytic cracking is exempt from this chapter only if the waste oil meets the specification of § 298.11 (relating to waste oil specifications). Prior to insertion into the petroleum refining facility process, the waste oil is subject to this chapter.

(5) Waste oil that is incidentally captured by a hydrocarbon recovery system or wastewater treatment system as part of routine process operations at a petroleum refining facility and inserted into the petroleum refining facility pro-

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cess is exempt from this chapter. This exemption does not extend to waste oil which is intentionally introduced into a hydrocarbon recovery system—for example, by pouring collected waste oil into the waste water treatment system.

(6) Tank bottoms from stock tanks containing exempt mixtures of waste oil and crude oil or natural gas liquids are exempt from this chapter.

(g) *Waste oil on vessels*. Waste oil produced on vessels from normal shipboard operations is not subject to this chapter until it is transported ashore.

(h) *Waste oil containing PCBs*. In addition to the requirements of this chapter, a marketer and burner of waste oil who markets waste oil containing a quantifiable level of PCBs is subject to 40 CFR 761.20(e) (relating to prohibitions and exceptions).

Cross References

This section cited in 25 Pa. Code § 298.20 (relating to applicability); 25 Pa. Code § 298.21 (relating to applicability); 25 Pa. Code § 298.24 (relating to offsite shipments); 25 Pa. Code § 298.40 (relating to applicability); 25 Pa. Code § 298.44 (relating to rebuttable presumption for waste oil and flash point screening); 25 Pa. Code § 298.46 (relating to tracking); 25 Pa. Code § 298.53 (relating to rebuttable presumption for waste oil and flash point screening); 25 Pa. Code § 298.59 (relating to management of waste); 25 Pa. Code § 298.63 (relating to rebuttable presumption for waste oil); and 25 Pa. Code § 298.67 (relating to management of waste).

§ 298.11. Waste oil specifications.

(a) Waste oil, and any fuel produced from waste oil by waste oil processing, blending or other treatment, to be burned for energy recovery either under this chapter or as specification fuel oil shall have at least 8,000 Btus per pound.

(b) Waste oil burned for energy recovery and fuel produced from waste oil by waste oil processing, blending or other treatment is subject to this chapter unless it is shown not to exceed any of the allowable levels of the constituents and properties in the specification shown in Table 1. Once waste oil that is to be burned for energy recovery has been shown not to exceed any specification and the person making that showing complies with §§ 298.72—298.74 (relating to on-specification waste oil fuel; notification; and tracking), the waste oil is no longer subject to this chapter. This waste oil is also known as on-specification fuel oil.

Table 1—Waste Oil Not Exceeding Any Specification Level Is Not Subject To This Chapter When Burned For Energy Recovery.[1]

Constituent/Property	*Allowable Levels*
Arsenic	5 ppm maximum
Cadmium	2 ppm maximum
Chromium	10 ppm maximum
Lead	100 ppm maximum
Flash point	100°F minimum

Constituent/Property	*Allowable Levels*
Total halogens	1,000 ppm maximum for residential and commercial uses and 4,000 maximum for industrial uses.

[1] The specifications do not apply to mixtures of waste oil and hazardous waste that continue to be regulated as hazardous waste (see § 298.10(b) (relating to applicability).

Cross References

This section cited in 25 Pa. Code § 261a.6 (relating to requirements for recyclable materials); 25 Pa. Code § 298.1 (relating to definitions); 25 Pa. Code § 298.10 (relating to applicability); 25 Pa. Code § 298.20 (relating to applicability); 25 Pa. Code § 298.40 (relating to applicability); 25 Pa. Code § 298.50 (relating to applicability); 25 Pa. Code § 298.60 (relating to applicability); 25 Pa. Code § 298.70 (relating to applicability); 25 Pa. Code § 298.72 (relating to on-specification waste oil fuel); and 25 Pa. Code § 298.74 (relating to tracking).

§ 298.12. Prohibitions.

(a) *Surface impoundment prohibition*. Waste oil may not be managed in surface impoundments or waste piles unless the units are subject to Chapter 264a or 265a (relating to owners and operators of hazardous waste treatment, storage and disposal facilities; and interim status standards for owners and operators of hazardous waste treatment, storage and disposal facilities).

(b) *Use as a dust suppressant*. The use of waste oil as a dust suppressant is prohibited.

(c) *Burning in particular units*. Off-specification waste oil fuel may be burned for energy recovery in only the following devices:

(1) An industrial furnace identified in 40 CFR 260.10 (relating to definitions), incorporated by reference in § 260a.1 (relating to incorporation by reference, purpose, scope and applicability).

(2) A boiler, as defined in 40 CFR 260.10, incorporated by reference in § 260a.1, that is identified as one of the following:

(i) An industrial boiler located on the site of a facility engaged in a manufacturing process where substances are transformed into new products, including the component parts of products, by mechanical or chemical processes.

(ii) A utility boiler used to produce electric power, steam, heated or cooled air, or other gases or fluids for sale.

(iii) A waste oil-fired space heater if the burner meets the provisions of § 298.23 (relating to onsite burning in space heaters).

(3) A hazardous waste incinerator subject to 40 CFR Part 264, Subpart O (relating to incinerators), incorporated by reference in § 264a.1 (relating to incorporation by reference, purpose, scope and reference), or Chapter 265a.

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Subchapter C. WASTE OIL GENERATORS

Sec.
298.20. Applicability.
298.21. Hazardous waste mixing.
298.22. Waste oil storage.
298.23. Onsite burning in space heaters.
298.24. Offsite shipments.
298.25. Source reduction strategy.
298.26. Biennial report.

Cross References

This subchapter cited in 25 Pa. Code § 270a.60 (relating to permits-by-rule); 25 Pa. Code § 298.1 (relating to definitions); 25 Pa. Code § 298.30 (relating to waste oil collection centers); 25 Pa. Code § 298.40 (relating to applicability); 25 Pa. Code § 298.50 (relating to applicability); 25 Pa. Code § 298.60 (relating to applicability); and 25 Pa. Code § 298.70 (relating to applicability).

§ 298.20. Applicability.

(a) *General*. Except as provided in paragraphs (1)—(4), this subchapter applies to a waste oil generator. A waste oil generator is a person, by site, whose act or process produces waste oil or whose act first causes waste oil to become subject to regulation.

(1) *Household "do-it-yourselfer" waste oil generators*. A household "do-it yourselfer" waste oil generator is not subject to this chapter.

(2) *Vessels*. A vessel at sea or at port is not subject to this subchapter. For purposes of this subchapter, waste oil produced on vessels from normal shipboard operations is considered to be generated at the time it is transported ashore. The owner or operator of the vessel and the person removing or accepting waste oil from the vessel are cogenerators of the waste oil and are both responsible for managing the waste in compliance with this subchapter once the waste oil is transported ashore. The cogenerators may decide among them which party will fulfill the requirements of this subchapter.

(3) *Diesel fuel*. A mixture of waste oil and diesel fuel mixed by the generator of the waste oil for use in the generator's own vehicles is not subject to this chapter once the waste oil and diesel fuel have been mixed. Prior to mixing, the waste oil fuel is subject to this subchapter.

(4) *Farmers*. A farmer who generates an average of 25 gallons per month or less of waste oil from vehicles or machinery used on the farm in a calendar year is not subject to this chapter.

(b) *Other applicable provisions*. A waste oil generator who conducts the following activities is subject to the requirements of other applicable provisions of this chapter and other chapters as indicated in paragraphs (1)—(8):

(1) A waste oil generator who transports waste oil, except under the self-transport provisions of § 298.24(1) and (2) (relating to offsite shipments), shall also comply with Subchapter E (relating to waste oil transporter and transfer facilities).

(2) Except as provided in paragraphs (3) and (4), a waste oil generator who processes or rerefines waste oil shall also comply with Subchapter F (relating to waste oil processing/refining facilities).

(3) A waste oil generator who performs the following activities is deemed to have a solid waste management permit-by-rule for the captive processing of waste oil provided that the waste oil is not being sent offsite to a burner of on-specification or off-specification waste oil fuel and provided that the generator submits a written notice to the Department that includes the name, address and telephone number of the facility, the individual responsible for operating the facility and a brief description of the facility. The Department may require a generator, who is conducting one of the activities in subparagraphs (i)—(iv) under a permit-by-rule, to apply for, and obtain, a permit in accordance with Chapters 287 and 297 (relating to residual waste management—general provisions; incinerators and other processing facilities), or take other appropriate action, when the generator is not in compliance with the requirements for the permit-by-rule or is conducting an activity that harms or presents a threat of harm to the health, safety or welfare of the people or the environment of this Commonwealth.

(i) Filtering, cleaning or otherwise reconditioning waste oil before it is reused by the generator. The generator shall also meet the following requirements:

(A) Remaining waste is managed under the act.

(B) Processing does not have an adverse effect on public health, safety, welfare or the environment.

(C) Processing occurs at the same manufacturing or production facility where some or all of the waste oil is generated.

(ii) Separating waste oil from wastewater generated onsite to make the wastewater acceptable for discharge or shipment offsite. For this activity to be authorized by a permit-by-rule, the generator shall also meet the following requirements:

(A) Processing occurs at the same manufacturing or production facility where some or all of the waste oil is generated.

(B) The facility has an NPDES permit, if required, and complies with the conditions of that permit.

(C) The facility meets the requirements of 40 CFR 264.11, 264.14, 264.15, 264.73, 264.75 and 264.77 all of which are incorporated by reference in § 264a.1 (relating to incorporation by reference, purpose, scope and reference).

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(D) The generator shall maintain, in a readily accessible place at the facility, a copy of a preparedness prevention and contingency (PPC) plan that is consistent with the Department's most recent guidelines for development and implementation of PPC plans.

(iii) Draining or otherwise removing waste oil from materials containing or otherwise contaminated with waste oil to remove excessive oil to the extent possible under § 298.10(c) (relating to applicability). For this activity to be authorized by a permit-by-rule, the generator shall also meet the following requirements:

(A) Waste remaining from the filter process is managed under the act.

(B) Processing does not have an adverse effect on public health, safety, welfare or the environment.

(C) Processing occurs at the same manufacturing or production facility where some or all of the waste oil is generated.

(iv) Filtering, separating or otherwise reconditioning waste oil before burning it in a space heater under § 298.23 (relating to onsite burning in space heaters). For this activity to be authorized by a permit-by-rule, the generator shall also meet the following requirements:

(A) Waste remaining from the filter process is managed under the act.

(B) Processing does not have an adverse effect on public health, safety, welfare or the environment.

(C) Processing occurs at the same manufacturing or production facility where some or all of the waste oil is generated.

(4) A waste oil generator is not a processor when it is using oil mist collectors to remove small droplets of waste oil from in-plant air to make plant air suitable for continued recirculation. For this exemption to be applicable, the waste oil so generated is not being sent offsite to a burner of on- or off-specification waste oil fuel.

(5) A waste oil generator who burns off-specification waste oil for energy recovery, except under the onsite space heater provisions of § 298.23, shall also comply with Subchapter G (relating to waste oil burners who burn off-specification waste oil for energy recovery).

(6) A waste oil generator who directs shipments of off-specification waste oil from its facility to a waste oil burner, or first claims that waste oil that is to be burned for energy recovery meets the waste oil fuel specifications in § 298.11 (relating to waste oil specifications) shall also comply with Subchapter H (relating to waste oil fuel marketers).

(7) A waste oil generator shall dispose of waste oil in accordance with Article VII or IX (relating to hazardous waste management; and residual waste management).

(8) A material managed in accordance with this section and that is not burned for energy recovery or used in a manner constituting disposal may not be subject to regulation under this title if the Department determines that the

material is no longer a waste in accordance with § 287.7 (relating to determination that a material is no longer a waste).

(c) *Recordkeeping*. The generator is required to maintain, for 3 years, the following records:

(1) The type of oil used.

(2) A description of the process that generates the waste oil.

(3) A record of the tests used to determine if the waste oil contains more than 1,000 parts per million total halogens.

(4) A record of the information used to rebut the presumption in § 298.10(b)(1)(ii) if the waste oil contains more than 1,000 parts per million total halogens.

(5) The type and quantity of any hazardous waste generated and the analyses of hazardous waste characteristics for any mixtures of hazardous waste with waste oil.

§ 298.21. Hazardous waste mixing.

(a) A mixture of waste oil and hazardous waste shall be managed in accordance with § 298.10(b) (relating to applicability).

(b) The rebuttable presumption for waste oil of § 298.10(b)(1)(ii) applies to waste oil managed by generators. Under the rebuttable presumption for waste oil of § 298.10(b)(1)(ii), waste oil containing greater than 1,000 parts per million total halogens is presumed to be a hazardous waste and shall be managed as hazardous waste and not as waste oil unless the presumption is rebutted. However, the rebuttable presumption does not apply to certain metalworking oils/fluids and certain waste oils removed from refrigeration units, as provided for in § 298.10(b)(1)(ii)(A) and (B).

(c) A generator shall perform a hazardous waste determination on any hazardous waste generated prior to mixing with waste oil and on the resultant mixture.

(d) If a generator rebuts the presumption in accordance with § 298.10(b)(1)(ii), the generator shall provide all information used to rebut the presumption to the transporter.

§ 298.22. Waste oil storage.

(a) *Storage units*. A waste oil generator may not store waste oil in units other than tanks, containers or units subject to regulation under Chapter 264a or 265a (relating to owners and operators of hazardous waste treatment, storage and disposal facilities; and interim status standards for owners and operators of hazardous waste treatment, storage and disposal facilities).

(b) *Condition of units*. A container or aboveground storage tank used to store waste oil at generator facilities shall meet the following requirements:

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(1) *Be in good condition*. For example, containers and aboveground storage tanks may not exhibit severe rusting, apparent structural defects or deterioration.

(2) *Not leaking (no visible leaks)*.

(c) *Labels*.

(1) Except as provided in paragraphs (2) and (3), a container or aboveground storage tank used to store waste oil at generator facilities shall be labeled or marked clearly with the words "waste oil" by no later than December 2, 2001.

(2) Containers or aboveground storage tanks which are labeled or marked with the words "used oil" on June 2, 2001, shall be labeled or marked with the words "waste oil" by no later than June 2, 2003.

(3) Containers used in transportation may be labeled or marked with the words "used oil," instead of "waste oil," or the words required by a receiving state if the containers and vehicles are destined for recycling or disposal outside of this Commonwealth. If a person accepts waste oil from or delivers waste oil to a generator, transfer facility, or processor/rerefiner in this Commonwealth in a container used in transportation, paragraph (1) or (2) shall be met.

(4) Fill pipes used to transfer waste oil into underground storage tanks at generator facilities shall be labeled or marked clearly with the words "waste oil" by no later than December 2, 2001. Fill pipes which are labeled or marked with the words "used oil" on June 2, 2001, shall be labeled or marked with the words "waste oil" by no later than June 2, 2003.

(d) *Additional requirements for storage tanks*. Storage tanks used to store waste oil shall be designed and operated in accordance with § 299.122(b) and (c) (relating to storage tanks). For existing aboveground storage tanks, an alternative design to secondary containment may be demonstrated where the tank meets the ground.

(e) *Additional requirements for containers*. The total container height of a group of containers may not exceed 9 feet. The maximum width and depth of a group of containers shall provide a configuration and aisle space which ensures access for purposes of inspection, containment and remedial action with emergency vehicles and equipment.

(f) *Response to releases*. Upon detection of a release of waste oil to the environment not subject to Chapter 245, Subchapter D (relating to corrective action process for owners and operators of storage tanks and storage tank facilities and other responsible parties) which has occurred after June 2, 2001, a generator shall perform the following cleanup steps:

(1) Stop the release.

(2) Contain the released waste oil.

(3) Clean up and manage properly the released waste oil and other materials.

(4) Repair or replace any leaking waste oil storage containers or tanks prior to returning them to service, if necessary.

(g) *Additional requirements*. In addition to the requirements of this subchapter, a waste oil generator shall maintain, in a readily accessible place at the facility, a copy of a preparedness, prevention and contingency (PPC) plan that is consistent with the Department's most recent guidelines for development and implementation of PPC plans. Waste oil generators are subject to the applicable spill prevention, control and countermeasures (40 CFR Part 112 (relating to oil pollution prevention)) in addition to the requirements of this subchapter. Waste oil generators are also subject to the underground storage tank standards in Chapter 245 (relating to administration of the storage tank and spill prevention program) for waste oil stored in underground storage tanks whether or not the waste oil exhibits any characteristics of hazardous waste.

§ 298.23. Onsite burning in space heaters.

A generator is deemed to have a solid waste management permit-by-rule to burn waste oil in waste oil-fired space heaters if the following apply:

(1) The heater burns only waste oil that the owner or operator generates or waste oil received from household do-it-yourselfer waste oil generators.

(2) The heater is designed to have a maximum capacity of not more than 0.5 million Btu per hour.

(3) The combustion gases from the heater are vented to the ambient air.

Cross References

This section cited in 25 Pa. Code § 298.12 (relating to prohibitions); 25 Pa. Code § 298.20 (relating to applicability); 25 Pa. Code § 298.50 (relating to applicability); 25 Pa. Code § 298.60 (relating to applicability); and 25 Pa. Code § 298.61 (relating to restrictions on burning).

§ 298.24. Offsite shipments.

Except as provided in paragraphs (1)—(3), a generator shall ensure that waste oil is transported only by transporters who have obtained identification numbers. The generator shall provide the transporter with a certification that, except as provided for in § 298.10(b)(2)(ii) (relating to applicability), its waste oil has not been mixed with a hazardous waste.

(1) *Self-transportation of small amounts to approved collection centers*. Generators may transport, without an identification number, waste oil that is generated at the generator's site and waste oil collected from household do-it-yourselfers to a waste oil collection center if the following apply:

(i) The generator transports the waste oil in a vehicle owned by the generator or owned by an employe of the generator.

(ii) The generator transports no more than 55 gallons of waste oil at any time.

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(iii) The generator transports the waste oil to a waste oil collection center that is one of the following:

(A) Operated in accordance with the requirements of Subchapter D (relating to waste oil collection centers and aggregation points) if the facility is located within this Commonwealth.

(B) Registered, licensed, permitted or recognized by a state/county/municipal government to manage waste oil if the facility is located outside this Commonwealth.

(iv) The generator shall provide the waste oil collection center with a certification that except as provided for in § 298.10(b)(2)(ii), the generator has not mixed its waste oil with hazardous waste.

(2) *Self-transportation of small amounts to aggregation points owned by the generator*. A generator may transport, without an identification number, waste oil that is generated at the generator's site to an aggregation point if the following apply:

(i) The generator transports the waste oil in a vehicle owned by the generator or owned by an employee of the generator.

(ii) The generator transports no more than 55 gallons of waste oil at any time.

(iii) The generator transports the waste oil to an aggregation point that is owned or operated, or both, by the same generator.

(3) *Tolling arrangements*. A waste oil generator may arrange for waste oil to be transported by a transporter without an identification number if the waste oil is reclaimed under a contractual agreement under which reclaimed oil is returned by the waste oil processor/rerefiner to the generator for use as a lubricant, cutting oil or coolant. The contract, known as a tolling arrangement, shall indicate the following:

(i) The type of waste oil and the frequency of shipments.

(ii) The vehicle used to transport the waste oil to the waste oil processing/rerefining facility and to deliver recycled waste oil back to the generator is owned and operated by the waste oil processor/rerefiner.

(iii) Reclaimed oil will be returned to the generator.

Cross References

This section cited in 25 Pa. Code § 298.1 (relating to definitions); 25 Pa. Code § 298.10 (relating to applicability); 25 Pa. Code § 298.20 (relating to applicability); 25 Pa. Code § 298.30 (relating to waste oil collection centers); 25 Pa. Code § 298.31 (relating to waste oil aggregation points owned by the generator); 25 Pa. Code § 298.40 (relating to applicability); 25 Pa. Code § 298.44 (relating to rebuttable presumption for waste oil and flash point screening); 25 Pa. Code § 298.50 (relating to applicability); and 25 Pa. Code § 298.63 (relating to rebuttable presumption for waste oil).

§ 298.25. Source reduction strategy.

A waste oil generator subject to this subchapter shall prepare a source reduction strategy in accordance with §§ 287.51, 287.53 and 287.54 (relating to scope; source reduction strategy; and chemical analysis of waste).

§ 298.26. Biennial report.

By March 1 of each odd numbered year a waste oil generator subject to this subchapter shall file a biennial report with the Department in accordance with §§ 287.51, 287.52 and 287.55 (relating to scope; biennial report; and retained recordkeeping).

Subchapter D. WASTE OIL COLLECTION CENTERS AND AGGREGATION POINTS

Sec.
298.30. Waste oil collection centers.
298.31. Waste oil aggregation points owned by the generator.

Cross References

This subchapter cited in 25 Pa. Code § 298.24 (relating to offsite shipments); and 25 Pa. Code § 298.4 (relating to offsite shipments).

§ 298.30. Waste oil collection centers.

(a) *Applicability*. This section applies to owners or operators of waste oil collection centers. A waste oil collection center is any site or facility that accepts/aggregates and stores waste oil collected from waste oil generators regulated under Subchapter C (relating to waste oil generators) who bring waste oil to the collection center in shipments of no more than 55 gallons under § 298.24(a) (relating to offsite shipments). Waste oil collection centers may also accept waste oil and oil filters from household do-it-yourselfers.

(b) *Permit-by-rule for waste oil collection centers*. For the operation of a waste oil collection center to be deemed to have a permit-by-rule, the owner or operator of a waste oil collection center shall do the following:

(1) Be a state inspection facility, oil retailer, retail service station, a facility owned or operated by a municipality, municipal authority, or state agency, or a facility owned or operated by a nonprofit organization.

(2) Not blend oil for offsite reuse.

(3) Comply with the generator standards in Subchapter C.

(4) Maintain on the premises waste oil collection tanks that are properly sheltered and protected to prevent spillage, seepage or discharge of the waste oil into the water, land and air of this Commonwealth and of sufficient size to handle returns of waste oil.

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(5) Have collection facilities for the safe and proper disposal of waste oil containers within a very close proximity to the collection tanks.

(6) Not accept water, antifreeze, other residual or hazardous wastes or other contaminants.

(7) Design, construct and operate the facility in a manner to ensure that any hazardous waste generated at the facility is not mixed with the waste oil being collected at the facility.

(8) Have a procedure for ensuring that items in paragraph (6) are not collected at the facility and that if waste oil collected at the facility contains more than 1,000 parts per million total halogens it is due to the household do-it yourselfer waste oil collected by the facility.

§ 298.31. Waste oil aggregation points owned by the generator.

(a) *Applicability*. This section applies to owners or operators of all waste oil aggregation points. A waste oil aggregation point is any site or facility that accepts, aggregates or stores waste oil collected only from other waste oil generation points owned or operated by the owner or operator of the aggregation point, from which waste oil is transported to the aggregation point in shipments of no more than 55 gallons under § 298.24(b) (relating to offsite shipments). Waste oil aggregation points may also accept waste oil from household do-it-yourselfers.

(b) *Permit-by-rule for waste oil aggregation points*. The owner or operator of an aggregation point may operate the aggregation point under a permit-by-rule. The Department may require the owner or operator of an aggregation point operated under a permit-by-rule to apply for and obtain a permit or take other appropriate action, when the generator is not in compliance with the requirements for the permit-by-rule or is conducting an activity that harms or presents a threat of harm to the health, safety or welfare of the people or the environment of this Commonwealth. For the operation of a waste oil aggregation point to be authorized by a permit-by-rule, the owner or operator shall:

(1) Comply with the generator standards in Subchapter C (relating to waste oil generators).

(2) Maintain on the premises waste oil collection tanks that are properly sheltered and protected to prevent spillage, seepage or discharge of the waste oil into the water, land and air of this Commonwealth and of sufficient size to handle returns of waste oil.

(3) Have within a very close proximity to the collection tanks, collection facilities for the safe and proper disposal of waste oil containers.

(4) Not accept water, antifreeze, other residual or hazardous wastes or other contaminants.

(5) Submit a written notice to the Department that includes the name, address and the telephone number of the facility, the individual responsible for operating the facility and a brief description of the facility.

Subchapter E. WASTE OIL TRANSPORTER AND TRANSFER FACILITIES

Sec.
298.40. Applicability.
298.41. Restrictions on transporters and transfer facilities who are not also processors or refiners.
298.42. Notification.
298.43. Waste oil transportation.
298.44. Rebuttable presumption for waste oil and flash point screening.
298.45. Waste oil storage at transfer facility.
298.46. Tracking.
298.47. Management of wastes.
298.48. Signs on vehicles.

Cross References

This subchapter cited in 25 Pa. Code § 298.20 (relating to applicability); 25 Pa. Code § 298.50 (relating to applicability); 25 Pa. Code § 298.60 (relating to applicability); and 25 Pa. Code § 298.70 (relating to applicability).

§ 298.40. Applicability.

(a) *General*. Except as provided in paragraphs (1)—(4), this subchapter applies to all waste oil transporters and transfer facilities.

(1) This subchapter does not apply to onsite transportation.

(2) This subchapter does not apply to a generator who transports shipments of waste oil totaling 55 gallons or less from the generator to a waste oil collection center as specified in § 298.24(a) (relating to offsite shipments).

(3) This subchapter does not apply to a generator who transports shipments of waste oil totaling 55 gallons or less from the generator to a waste oil aggregation point owned or operated by the same generator as specified in § 298.24(b).

(4) This subchapter does not apply to transportation of waste oil from household do-it-yourselfers to a regulated waste oil generator, collection center, aggregation point, transfer facility, processor/rerefiner or burner subject to this chapter. Except as provided in paragraphs (1)—(3), this subchapter does apply to transportation of collected household do-it-yourselfer waste oil from regulated waste oil generators, collection centers, aggregation points or other facilities where household do-it-yourselfer waste oil is collected.

(b) *Imports and exports*. A transporter who imports waste oil into or exports waste oil out of this Commonwealth is subject to this subchapter from the time the waste oil enters until the time it exits this Commonwealth.

(c) *Trucks used to transport hazardous waste*. Unless trucks previously used to transport hazardous waste are emptied as described in 40 CFR 261.7 (relating to residues of hazardous waste in empty containers) incorporated by reference in § 261a.1 (relating to incorporation by reference, purpose and scope), and modi-

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fied in § 261a.7 (relating to residues of hazardous waste in empty containers) prior to transporting waste oil, the waste oil is considered to have been mixed with the hazardous waste and shall be managed as hazardous waste unless, under § 298.10(b)(2) (relating to applicability), the hazardous waste/waste oil mixture is determined not to exhibit the characteristic of ignitability.

(d) *Other applicable provisions*. A waste oil transporter or transfer facility that conducts the following activities is also subject to other applicable provisions of this chapter as indicated in paragraphs (1)—(5):

(1) A transporter or transfer facility that generates waste oil shall also comply with Subchapter C (relating to waste oil generators).

(2) A transporter or transfer facilty that processes or rerefines waste oil, except as provided in § 298.41 (relating to restrictions on transporters and transfer facilities who are not also processors or rerefiners), shall also comply with Subchapter F (relating to waste oil processing/refining facilities).

(3) A transporter or transfer facility that burns off-specification waste oil for energy recovery shall also comply with Subchapter G (relating to waste oil burners who burn off-specification waste oil for energy recovery).

(4) A transporter or transfer facility that directs shipments of off-specification waste oil from its facility to a waste oil burner or first claims that waste oil that is to be burned for energy recovery meets the waste oil fuel specifications in § 298.11 (relating to waste oil specifications) shall also comply with Subchapter H (relating to waste oil fuel marketers).

(5) A transporter or transfer facility shall dispose of waste oil in accordance with Article VII or IX (relating to hazardous waste management; and residual waste management).

§ 298.41. Restrictions on transporters and transfer facilities who are not also processors or rerefiners.

(a) A waste oil transporter may, at a transfer facility authorized under § 298.45 (relating to waste oil storage at transfer facilities), consolidate or aggregate loads of waste oil for purposes of transportation. Except as provided in subsections (b) and (c), waste oil transporters may not process waste oil unless they also comply with the requirements for processors/rerefiners in Subchapter F (relating to waste oil processing/rerefining facilities).

(b) A transporter or transfer facility may conduct incidental waste oil processing operations that occur in the normal course of waste oil transportation—for example, settling and water separation that occurs in a transport vehicle or in a single consolidation tank-but that are not designed to produce (or make more amenable for production of) waste oil derived products unless they also comply with the processor/rerefiner requirements in Subchapter F.

(c) A transporter or transfer facility managing waste oil that is removed from oil bearing electrical transformers and turbines and filtered by the transporter in the course of loading or unloading waste oil or at a transfer facility authorized

under § 298.45 prior to being returned to its original use is not subject to the waste oil processor/rerefiner requirements in Subchapter F.

Cross References

This section cited in 25 Pa. Code § 298.40 (relating to applicability); and 25 Pa. Code § 298.50 (relating to applicability).

§ 298.42. Notification.

(a) *Identification numbers*. A waste oil transporter or transfer facility shall have an EPA identification number.

(b) *Mechanics of notification*. A waste oil transporter or transfer facility that has not received an identification number may obtain one by notifying the EPA Region III Administrator of its waste oil activity by submitting one of the following:

(1) A completed EPA form 8700-12. (To order information for EPA form 8700-12, call RCRA/Superfund hotline at (800) 424-9346 or (703) 920-9810.)

(2) A letter requesting an identification number. Call RCRA/Superfund hotline to determine where to send a letter requesting an identification number. The letter should include the following information:

(i) The transporter or transfer facility company name.

(ii) The owner of the transporter or transfer facility company.

(iii) The mailing address for the transporter or transfer facility.

(iv) The name and telephone number for the transporter or transfer facility point of contact.

(v) The type of transport activity—for example, transport only, transport and transfer facility, transfer facility only.

(vi) The location of all transfer facilities at which waste oil is stored.

(vii) The name and telephone number for a contact at each transfer facility.

§ 298.43. Waste oil transportation.

(a) *Deliveries*. A waste oil transporter shall deliver all waste oil received to one of the following:

(1) Another waste oil transporter, if the transporter has obtained an identification number.

(2) A waste oil processing/rerefining facility who has obtained an identification number.

(3) An off-specification waste oil burner facility who has obtained an identification number.

(4) An on-specification waste oil burner facility.

(5) A waste oil transfer facility that has obtained an identification number.

(b) *Department of Transportation requirements*. A waste oil transporter shall comply with the applicable requirements under the United States Department of

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Transportation regulations in 49 CFR Parts 171—180. Persons transporting waste oil that meets the definition of a hazardous material in 49 CFR 171.8 (relating to definitions and abbreviations) shall comply with applicable regulations in 49 CFR Parts 171—180.

(c) *Waste oil discharges*.

(1) In the event of a discharge of waste oil during transportation, the transporter shall notify the appropriate Departmental office of emergency response and take appropriate immediate action to protect human health and the environment—for example, notify local authorities, dike the discharge area—and the like.

(2) If a discharge of waste oil occurs during transportation and the Department determines that immediate removal of the waste oil is necessary to protect human health or the environment, the Department may authorize the removal of the waste oil by transporters who do not have identification numbers.

(3) An air, rail, highway or water transporter who has discharged waste oil shall do the following:

(i) Give notice if required by 49 CFR 171.15 (relating to immediate notice of certain hazardous materials incidents) to the National Response Center (800) 424-8802 or (202) 426-2675).

(ii) Report in writing as required by 49 CFR 171.16 (relating to detailed hazardous materials incident reports) to the Director, Office of Hazardous Materials Regulations, Materials Transportation Bureau, Department of Transportation, Washington, D.C. 20590.

(4) A water transporter who has discharged waste oil shall give notice as required by 33 CFR 153.203 (relating to procedure for the notice of discharge).

(5) A transporter shall clean up any waste oil discharge that occurs during transportation or take action as required or approved by the Department so that the waste oil discharge no longer presents a hazard to human health or the environment.

§ 298.44. Rebuttable presumption for waste oil and flash point screening.

(a) To ensure that waste oil is not a hazardous waste under the rebuttable presumption of § 298.10(b)(1)(ii) (relating to applicability), the waste oil transporter and the transfer facility shall determine whether the total halogen content of waste oil being transported or stored at a transfer facility is above or below 1,000 parts per million. The waste oil transporter shall make the determination at the generator's location, prior to loading on the transportation vehicle. The waste oil transfer facility shall make the determination prior to the unloading of a transportation vehicle at the transfer facility.

(b) The transporter and transfer facility shall make this total halogen determination by:

(1) Testing the waste oil.

(2) Applying knowledge of the halogen content of the waste oil in light of the materials or processes used.

(c) If the waste oil contains greater than or equal to 1,000 parts per million total halogens, it is presumed to be a hazardous waste because it has been mixed with halogenated hazardous waste listed in 40 CFR Part 261, Subpart D (relating to lists of hazardous waste), incorporated by reference in § 261a.1 (relating to incorporation by reference, purpose and scope). The owner or operator may rebut the presumption by demonstrating that the waste oil does not contain hazardous waste. For example, by using an analytical method from SW-846, current edition, to show that the waste oil does not contain significant concentrations of halogenated hazardous constituents identified in 40 CFR Part 261, Appendix VIII (relating to hazardous constituents), incorporated by reference in § 261a.1. EPA publication SW-846, current edition, is available from the Government Printing Office, Superintendent of Documents, Post Office Box 371954, Pittsburgh, Pennsylvania 15250-7954, (202) 512-1800 (Document number 955-001-00000-1). Another way of rebutting this presumption is to demonstrate that the halogenated constituents are from wastes generated by households and therefore under 40 CFR 261.4(b)(1) (relating to exclusions), incorporated by reference in § 261a.1 are excluded from regulation as a hazardous waste.

(1) The rebuttable presumption does not apply to metalworking oils/fluids containing chlorinated paraffins, if they are processed, through a tolling arrangement as described in § 298.24(c) (relating to offsite shipments), to reclaim metalworking oils/fluids. The presumption does apply to metalworking oils/fluids if the oils/fluids are recycled in any other manner, or disposed.

(2) The rebuttable presumption does not apply to waste oils contaminated with CFCs removed from refrigeration units if the CFCs are destined for reclamation. The rebuttable presumption does apply to waste oils contaminated with CFCs that have been mixed with waste oil from sources other than refrigeration units.

(d) The owner or operator of a waste oil transfer facility shall test waste oil for flash point or shall request approval from the Department for an alternative method to screen waste oil for the purposes of detecting adulteration of waste oil and providing a safety measure in determining the potential for a waste oil to initiate a fire during storage and processing.

(e) Records of analyses conducted or information used to comply with subsections (a)—(d) shall be maintained by the transporter and transfer facility for at least 3 years.

Cross References

This section cited in 25 Pa. Code § 252.6 (relating to accreditation-by-rule); and 25 Pa. Code § 298.45 (relating to waste oil storage at transfer facility).

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§ 298.45. Waste oil storage at transfer facility.

(a) *Applicability*. This section applies to a waste oil transfer facility. A waste oil transfer facility is a transportation related facility including loading docks, parking areas, storage areas and other areas where shipments of waste oil are received or held during normal course of transportation.

(b) *Permits*.

(1) The owners or operators of a transfer facility shall obtain a permit issued under Chapters 287 and 293 (relating to residual waste management—general provisions; and transfer facilities for residual waste).

(2) A general permit is only available if all of the following are met:

(i) The owner or operator of the waste oil transfer facility is responsible for transporting the waste oil from the generator to the transfer facility or the waste oil is from a household do-it-yourselfer waste oil generator.

(ii) The owner or operator of the waste oil transfer facility only:

(A) Consolidates/aggregates waste oil.

(B) Conducts incidental waste oil processing operations that occur in the normal course of waste oil transportation or in a single consolidation tank.

(3) The owners or operators of a waste oil transfer facility authorized prior to June 2, 2001 by a general permit issued prior to June 2, 2001, may continue to operate the facility under the general permit for the term of the permit. At the end of the permit term, this general permit is not renewable. The owner or operator of the transfer facility may only continue to operate the facility after the term has expired on the general permit if the owner or operator has obtained an individual permit issued under Chapters 287 and 293.

(4) A copy of the protocol for satisfying the requirements of § 298.44 (relating to rebuttable presumption for waste oil and flashpoint screening) shall be maintained at a facility operating under paragraph (2) or (3).

(c) *Storage units*. The owner or operator of a waste oil transfer facility may not store waste oil in units other than tanks, containers or units subject to regulation under Chapter 264a or 265a (relating to owners and operators of hazardous waste treatment, storage and disposal facilities; and interim status standards for owners and operators of hazardous waste treatment, storage and disposal facilities).

(d) *Condition of units*. A container or aboveground storage tank used to store waste oil at transfer facilities shall meet the following requirements:

(1) *Be in good condition.* For example—containers and aboveground storage tanks may not exhibit severe rusting, apparent structural defects or deterioration.

(2) *Not leaking (no visible leaks).*

(e) *Secondary containment for containers*. A container used to store waste oil at transfer facilities shall be equipped with a secondary containment system.

(1) The secondary containment system shall consist of one of the following:

(i) Dikes, berms or retaining walls and a floor. The floor shall cover the entire area within the dikes, berms or retaining walls.

(ii) An equivalent secondary containment system.

(2) The entire containment system, including walls and floors, shall be sufficiently impervious to the migration of waste oil to prevent any waste oil released into the containment system from migrating out of the system to the soil, groundwater or surface water.

(f) *Additional requirements for containers*. The total container height of a group of containers may not exceed 9 feet. The maximum width and depth of a group of containers shall provide a configuration and aisle space which ensures access for purposes of inspection, containment and remedial action with emergency vehicles and equipment.

(g) *Additional requirements for storage tanks*. Storage tanks used to store waste oil shall be designed and operated in accordance with § 299.122(b) (relating to storage tanks). For existing aboveground storage tanks, an alternative design to secondary containment may be demonstrated where the tank meets the ground.

(h) *Labels*.

(1) Except as provided in paragraphs (2) and (3), a container or aboveground tank used to store waste oil at transfer facilities shall be labeled or marked clearly with the words "waste oil" by no later than December 2, 2001.

(2) Containers or aboveground storage tanks which are labeled or marked with the words "used oil" on June 2, 2001, shall be labeled or marked with the words "waste oil" by no later than June 2, 2003.

(3) Containers used in transportation may be labeled or marked with the words "used oil," instead of "waste oil," or the words required by a receiving state if the containers and vehicles are destined for recycling or disposal outside of this Commonwealth. If a person accepts waste oil from or delivers waste oil to a generator, transfer facility, or processor/rerefiner in this Commonwealth in a container used in transportation, paragraph (1) or (2) shall be met.

(4) Fill pipes used to transfer waste oil into underground storage tanks at transfer facilities shall be labeled or marked clearly with the words "waste oil" by no later than December 2, 2001. Fill pipes which are labeled or marked with the words "used oil" on June 2, 2001, shall be labeled or marked with the words "waste oil" by no later than June 2, 2003.

(i) *Response to releases*. Upon detection of a release of waste oil to the environment not subject to Chapter 245, Subchapter D (relating to corrective action process for owners and operators of storage tanks and storage tank

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facilities and other responsible parties) which has occurred after June 2, 2001, the owner or operator of a transfer facility shall perform the following cleanup steps:

(1) Stop the release.

(2) Contain the released waste oil.

(3) Clean up and manage properly the released waste oil and other materials.

(4) If necessary, repair or replace any leaking waste oil storage containers or tanks prior to returning them to service.

(j) *Additional requirements*. In addition to the requirements of this subchapter, a waste oil transfer facility is subject to §§ 293.109 and 293.241—293.243. Waste oil transfer facilities are subject to all applicable spill prevention, control and countermeasures (40 CFR Part 112 (relating to oil pollution prevention)) in addition to the requirements of this subchapter. A waste oil transfer facility is also subject to the underground storage tank standards in Chapter 245 (relating to administration of the storage tank and spill prevention program) for waste oil stored in underground storage tanks whether or not the waste oil exhibits any characteristics of hazardous waste.

Cross References

This section cited in 25 Pa. Code § 298.41 (relating to restrictions on transporters and transfer facilities who are not also processors or refiners).

§ 298.46. Tracking.

(a) *Acceptance*. A waste oil transporter and transfer facility shall keep a record of each waste oil shipment accepted for transport. Records for each shipment shall include the following:

(1) The name and address of the generator, transporter, transfer facility or processor/rerefiner who provided the waste oil for transport.

(2) The identification number (if applicable) of the generator, transporter, transfer facility or processor/rerefiner who provided the waste oil for transport.

(3) The quantity of waste oil accepted.

(4) The date of acceptance.

(5) The signature of a representative of the generator, transporter, transfer facility or processor/rerefiner who provided the waste oil for transport, dated upon receipt of the waste oil.

(b) *Deliveries*. A waste oil transporter and transfer facility shall keep a record of each shipment of waste oil that is delivered to another waste oil transporter, or to a waste oil burner, processor/rerefiner, transfer facility or disposal facility. Records of each delivery shall include the following:

(1) The name and address of the receiving facility or transporter.

(2) The identification number of the receiving facility or transporter.

(3) The quantity of waste oil delivered.

(4) The date of delivery.

(5) The signature, dated upon receipt of the waste oil, of a representative of the receiving facility or transporter.

(6) An intermediate rail transporter is not required to sign the record of delivery.

(c) *Exports of waste oil*. Waste oil transporters and transfer facilities must maintain the records described in subsection (b)(1)—(4) for each shipment of waste oil exported to a foreign country.

(d) *Record retention*. The records described in subsections (a)—(c) shall be maintained for at least 3 years.

§ 298.47. Management of wastes.

A transporter or transfer facility who generates wastes from the storage or transport of waste oil shall manage the wastes as specified in § 298.10(e) (relating to applicability).

§ 298.48. Signs on vehicles.

(a) A vehicle that is ordinarily or primarily used for the transportation of waste oil shall bear a sign that meets the following:

(1) The sign shall include the name and business address of the waste oil transporter that owns the vehicle.

(2) The sign shall have lettering that is 6 inches in height. The required information shall be clearly visible and easily readable.

(b) Transportation vehicles may be labeled or marked with the words "used oil," instead of "waste oil," or the words required by a receiving state if the vehicles are destined for recycling or disposal outside of this Commonwealth. If a person accepts waste oil from or delivers waste oil to a generator, transfer facility, or processor/rerefiner in this Commonwealth in a transportation vehicle, the following shall be met:

(1) Except as provided in paragraph (2), the transportation vehicle shall be labeled or marked clearly with the words "waste oil" by no later than December 2, 2001.

(2) Transportation vehicles that are marked or labeled "used oil" on December 2, 2001, shall be marked or labeled with the words "waste oil" by no later than June 2, 2003.

Subchapter F. WASTE OIL PROCESSING/REFINING FACILITIES

Sec.

298.50. Applicability.
298.51. Notification.
298.52. General facility standards.
298.53. Rebuttable presumption for waste oil and flash point screening.

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298.54. Waste oil management.
298.55. Analysis plan.
298.56. Tracking.
298.57. Operating record and reporting.
298.58. Offsite shipments of waste oil.
298.59. Management of waste.

Cross References

This subchapter cited in 25 Pa. Code § 298.20 (relating to applicability); 25 Pa. Code § 298.40 (relating to applicability); 25 Pa. Code § 298.41 (relating to restrictions on transporters and transfer facilities who are not also processor or rerefiners); 25 Pa. Code § 298.60 (relating to applicability); 25 Pa. Code § 298.61 (relating to restrictions on burning); and 25 Pa. Code § 298.70 (relating to applicability).

§ 298.50. Applicability.

(a) *General*. Except as provided in this subsection, this subchapter applies to owners and operators of waste oil processing/rerefining facilities. This subchapter does not apply to:

(1) A transporter or transfer facility that conducts incidental waste oil processing operations that occur during the normal course of transportation as provided in § 298.41 (relating to restrictions on transporters and transfer facilities who are not also processors or rerefiners).

(2) A burner that conducts incidental waste oil processing operations that occur during the normal course of waste oil management prior to burning as provided in § 298.61(b) (relating to restrictions on burning).

(b) *Other applicable provisions*. A waste oil processor/rerefiner who conducts the following activities is also subject to other applicable provisions of this chapter as indicated in paragraphs (1)—(5).

(1) A processor/rerefiner who generates waste oil shall also comply with Subchapter C (relating to waste oil generators).

(2) A processors/rerefiner who transports waste oil shall also comply with Subchapter E (relating to waste oil transporter and transfer facilities).

(3) Except as provided in subparagraphs (i) and (ii), a processor/rerefiner who burns off-specification waste oil for energy recovery shall also comply with Subchapter G (relating to waste oil burners who burn off-specification waste oil for energy necessary). A processor/rerefiner burning waste oil for energy recovery under the following conditions is not subject to Subchapter G.

(i) The waste oil is burned in an onsite space heater that meets the requirements of § 298.23 (relating to onsite burning in space heaters).

(ii) The waste oil is burned for purposes of waste oil processing which is considered burning incidentally to waste oil processing.

(4) A processor/rerefiner who directs shipments of off-specification waste oil from its facility to a waste oil burner or first claims that waste oil that is to be burned for energy recovery meets the waste oil fuel specifications in

§ 298.11 (relating to waste oil specifications) shall also comply with Subchapter H (relating to waste oil fuel marketers).

(5) A processor/rerefiner shall dispose of waste oil in accordance with Article VII or IX (relating to hazardous waste management; and residual waste management).

(c) *Permits*.

(1) The owner or operator of a waste oil processing facility shall obtain a permit issued under Chapters 287 and 297 (relating to residual waste management—general provisions; and incinerators and other processing facilities).

(2) A general permit is only available for the following types of waste oil processing/rerefining facilities:

(i) A mobile waste oil processor/rerefiner that operates at the site of waste oil generation.

(ii) A waste oil processor/rerefiner that reclaims waste oil under toll arrangements as specified in § 298.24(3) (relating to offsite shipments).

(3) The owner or operator of a facility authorized prior to June 2, 2001, by a waste oil processing/rerefining general permit issued prior to June 2, 2001, may continue to operate its facility under the general permit for the permit term. At the end of the permit term, this general permit is not renewable. The owner or operator of the waste oil processing/rerefining facility after the term has expired on the general permit may only continue to operate the facility if the owner or operator has obtained an individual permit issued under Chapters 287 and 297.

§ 298.51. Notification.

(a) *Identification numbers*. A waste oil processor or rerefiner who has not previously obtained an identification number shall comply with 40 CFR 264.11 (relating to identification number), incorporated by reference in § 264a.1 (relating to incorporation by reference, purpose, scope and reference), and modified in § 264a.11 (relating to identification number and transporter license) and obtain an EPA identification number.

(b) *Mechanics of notification*. A waste oil processor or rerefiner who has not received an identification number may obtain one by notifying the regional administrator of the waste oil activity by submitting one of the following:

(1) A completed EPA form 8700-12 (to obtain EPA form 8700-12, call RCRA/Superfund hotline at (800) 424-9346 or (703) 920-9810).

(2) A letter requesting an identification number. Call RCRA/Superfund hotline to determine where to send a letter requesting an identification number. The letter should include the following information:

(i) The processor or rerefiner company name.

(ii) The owner of the processor or rerefiner company.

(iii) The mailing address for the processor or rerefiner.

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(iv) The name and telephone number for the processor or rerefiner point of contact.

(v) The type of waste oil activity-for example, process only, process and rerefine.

(vi) The location of the processor or rerefiner facility.

§ 298.52. General facility standards.

(a) *Preparedness and prevention*. The owner and operator of a waste oil processor or rerefiners facility shall comply with the following requirements:

(1) *Maintenance and operation of facility*. A facility shall be maintained and operated to minimize the possibility of a fire, explosion or any unplanned sudden or nonsudden release of waste oil to air, soil or surface water which could threaten human health or the environment.

(2) *Required equipment*. A facility shall be equipped with the following, unless none of the hazards posed by waste oil handled at the facility could require a particular kind of equipment specified in subparagraphs (i)—(iv):

(i) An internal communications or alarm system capable of providing immediate emergency instruction (voice or signal) to facility personnel.

(ii) A device, such as a telephone (immediately available at the scene of operations) or a hand-held two-way radio, capable of summoning emergency assistance from local police departments, fire departments or State or local emergency response teams.

(iii) A portable fire extinguisher, fire control equipment (including special extinguishing equipment, such as that using foam, inert gas or dry chemicals), spill control equipment and decontamination equipment.

(iv) Water at adequate volume and pressure to supply water hose streams, foam producing equipment, or automatic sprinklers or water spray systems.

(3) *Testing and maintenance of equipment*. The facility communications or alarm systems, fire protection equipment, spill control equipment and decontamination equipment, when required, shall be tested and maintained as necessary to assure its proper operation in time of emergency.

(4) *Access to communications or alarm system*.

(i) Whenever waste oil is being poured, mixed, spread or otherwise handled, the personnel involved in the operation shall have immediate access to an internal alarm or emergency communication device, either directly or through visual or voice contact with another employee, unless the device is not required in paragraph (2).

(ii) When there is just one employee on the premises while the facility is operating, the employee shall have immediate access to a device, such as a telephone (immediately available at the scene of operation) or a hand-held two-way radio, capable of summoning external emergency assistance, unless the device is not required in paragraph (2).

(5) *Required aisle space*. The owner or operator shall maintain aisle space to allow the unobstructed movement of personnel, fire protection equipment, spill control equipment and decontamination equipment to any area of facility operation in an emergency, unless aisle space is not needed for any of these purposes.

(6) *Arrangements with local authorities*.

(i) The owner or operator shall attempt to make the following arrangements, as appropriate, for the type of waste oil handled at the facility and the potential need for the services of these organizations:

(A) Arrangements to familiarize police, fire departments and emergency response teams with the layout of the facility, properties of waste oil handled at the facility and associated hazards, places where facility personnel would normally be working, entrances to roads inside the facility and possible evacuation routes.

(B) Where more than one police and fire department might respond to an emergency, agreements designating primary emergency authority to a specific police and a specific fire department and agreements with any others to provide support to the primary emergency authority.

(C) Agreements with State emergency response teams, emergency response contractors and equipment suppliers.

(ii) Arrangements to familiarize local hospitals with the properties of waste oil handled at the facility and the types of injuries or illnesses which could result from fires, explosions or releases at the facility.

(iii) If State or local authorities decline to enter into these arrangements, the owner or operator shall document the refusal in the operating record.

(b) *Contingency plan and emergency procedures*. Owners and operators of waste oil processing and rerefining facilities shall comply with the following requirements:

(1) *Purpose and implementation of contingency plan.*

(i) Each owner or operator shall have a contingency plan for the facility. The contingency plan shall be designed to minimize hazards to human health or the environment from fires, explosions or any unplanned sudden or nonsudden release of waste oil to air, soil or surface water.

(ii) The provisions of the plan shall be carried out immediately whenever there is a fire, explosion or release of waste oil which could threaten human health or the environment.

(2) *Content of contingency plan*.

(i) The contingency plan shall describe the actions facility personnel shall take to comply with paragraphs (1) and (6) in response to fires, explosions or any unplanned sudden or nonsudden release of waste oil to air, soil or surface water at the facility.

(ii) If the owner or operator has already complied with 40 CFR Part 264, Subparts C and D (relating to preparedness and prevention; and contin-

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gency plan and emergency procedures), incorporated by reference in § 264a.1 (relating to incorporation by reference, purpose, scope and reference), and modified in § 264a.56 (relating to emergency procedures) or has already prepared some other emergency or contingency plan, the owner or operator need only amend that plan to incorporate waste oil management provisions that are sufficient to comply with this chapter.

(iii) The plan shall describe arrangements agreed to by local police departments, fire departments, hospitals, contractors and State and local emergency response teams to coordinate emergency services, under subsection (a)(6).

(iv) The plan shall list names, addresses and the office and home phone numbers of the persons qualified to act as emergency coordinators, as described in paragraph (5), and this list shall be kept up to date. If more than one person is listed, one person shall be named as primary emergency coordinator and the others shall be listed in the order in which they will assume responsibility as alternates.

(v) The plan shall include a list of all emergency equipment at the facility—such as fire extinguishing systems, spill control equipment, communications and alarm systems (internal and external) and decontamination equipment—if this equipment is required. This list shall be kept up to date. In addition, the plan shall include the location and a physical description of each item on the list, and a brief outline of its capabilities.

(vi) The plan shall include an evacuation plan for facility personnel if there is a possibility that evacuation could be necessary. This plan shall describe signals to be used to begin evacuation, evacuation routes and alternate evacuation routes, in cases where the primary routes could be blocked by releases of waste oil or fires.

(3) *Copies of contingency plan*. A copy of the contingency plan and revisions to the plan shall be:

(i) Maintained at the facility.

(ii) Submitted to all local police departments, fire departments, hospitals and State and local emergency response teams that may be called upon to provide emergency services.

(4) *Amendment of contingency plan*. The contingency plan shall be reviewed and immediately amended, if necessary, whenever:

(i) Applicable regulations are revised.

(ii) The plan fails in an emergency.

(iii) The facility changes in its design, construction, operation, maintenance or other circumstances in a way that materially increases the potential for fires, explosions or releases of waste oil, or changes the response necessary in an emergency.

(iv) The list of emergency coordinators changes.

(v) The list of emergency equipment changes.

(5) *Emergency coordinator*. At all times, there shall be at least one employe either on the facility premises or on call—for example, available to respond to an emergency by reaching the facility within a short period of time—with the responsibility for coordinating all emergency response measures. This emergency coordinator shall be thoroughly familiar with all aspects of the facility's contingency plan, the operations and activities at the facility, the location and characteristic of waste oil handled, the location of all records within the facility and facility layout. In addition, this person shall have the authority to commit the resources needed to carry out the contingency plan.

(6) *Emergency procedures*.

(i) Whenever there is an imminent or actual emergency situation, the emergency coordinator, or the designee when the emergency coordinator is on call, shall immediately do the following:

(A) Activate internal facility alarms or communication systems, if applicable, to notify all facility personnel.

(B) Notify appropriate State or local agencies with designated response roles if their help is needed.

(ii) Whenever there is a release, fire or explosion, the emergency coordinator shall immediately identify the character, exact source, amount and real extent of any released materials. The emergency coordinator may do this by observation or review of facility records of manifests and, if necessary, by chemical analysis.

(iii) Concurrently, the emergency coordinator shall assess possible hazards to human health or the environment that may result from the release, fire or explosion. This assessment shall consider both direct and indirect effects of the release, fire or explosion-for example, the effects of any toxic, irritating or asphyxiating gases that are generated or the effects of any hazardous surface water run-off from water or chemical agents used to control fire and heat-induced explosions.

(iv) If the emergency coordinator determines that the facility has had a release, fire or explosion which could threaten human health or the environment, outside the facility, the emergency coordinator shall report the findings as follows:

(A) If the assessment indicated that evacuation of local areas may be advisable, the emergency coordinator shall immediately notify the appropriate Departmental office of emergency response and the appropriate local authorities. The emergency coordinator shall be available to help appropriate officials decide whether local areas should be evacuated.

(B) The emergency coordinator shall immediately notify either the government official designated as the on-scene coordinator for the geographical area in the applicable regional contingency plan or the National Response Center (using the 24-hour toll free number (800) 424-8802). The report shall include:

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(1) The name and telephone number of reporter.

(2) The name and address of the facility.

(3) The time and type of incident-for example, release or fire.

(4) The name and quantity of materials involved, to the extent known.

(5) The extent of injuries, if any.

(6) The possible hazards to human health, or the environment, outside the facility.

(v) During an emergency, the emergency coordinator shall take all reasonable measures necessary to ensure that fires, explosions and releases do not occur, recur or spread to other waste oil or hazardous waste at the facility. These measures shall include, if applicable, stopping processes and operation, collecting and containing released waste oil, and removing or isolating containers.

(vi) If the facility stops operation in response to a fire, explosion or release, the emergency coordinator shall monitor for leaks, pressure buildup, gas generation or ruptures in valves, pipes or other equipment, wherever this is appropriate.

(vii) Immediately after an emergency, the emergency coordinator shall provide for recycling, storing or disposing of recovered waste oil, contaminated soil or surface water, or any other material that results from a release, fire or explosion at the facility.

(viii) The emergency coordinator shall ensure that, in the affected areas of the facility, the following conditions apply:

(A) No waste or waste oil that may be incompatible with the released material is recycled, treated, stored or disposed of until cleanup procedures are completed.

(B) The emergency equipment listed in the contingency plan is cleaned and fit for its intended use before operations are resumed.

(C) The owner or operator shall notify the Department and applicable local authorities that the facility is in compliance with clauses (A) and (B) before operations are resumed in the affected areas of the facility.

(ix) The owner or operator shall note in the operating record the time, date and details of any incident that requires implementing the contingency plan. Within 15 days after the incident, the owner or operator shall submit a written report on the incident to the Department. The report shall include the following:

(A) The name, address and telephone number of the owner or operator.

(B) The name, address and telephone number of the facility.

(C) The date, time and type of incident-for example, fire or explosion.

(D) The name and quantity of materials involved.

(E) The extent of injuries, if any.

(F) An assessment of actual or potential hazards to human health or the environment, if applicable.

(G) An estimated quantity and disposition of recovered material that resulted from the incident.

Cross References

This section cited in 25 Pa. Code § 298.57 (relating to operating record and reporting).

§ 298.53. Rebuttable presumption for waste oil and flash point screening.

(a) To ensure that waste oil managed at a waste oil processing/rerefining facility is not hazardous waste under the rebuttable presumption of § 298.10(b)(1)(ii) (relating to applicability), the owner or operator of a waste oil processing/rerefining facility shall determine whether the total halogen content of waste oil managed at the facility is above or below 1,000 parts per million. The waste oil processing/rerefining facility shall make the determination prior to the unloading of a transportation vehicle at the processing/rerefining facility.

(b) The owner or operator shall make this total halogen determination by either:

(1) Testing the waste oil.

(2) Applying knowledge of the halogen content of the waste oil in light of the materials or processes used.

(c) Waste oil containing more than 1,000 parts per million total halogens, is presumed to be a hazardous waste because it has been mixed with halogenated hazardous waste listed in 40 CFR Part 261, Subpart D (relating to lists of hazardous waste), incorporated by reference in § 261a.1 (relating to incorporation by reference, purpose and scope). Persons may rebut this presumption by demonstrating that the waste oil does not contain hazardous waste. For example, by using an analytical method from the current edition of SW-846 to show that the waste oil does not contain significant concentrations of halogenated hazardous constituents identified in 40 CFR Part 251, Appendix VIII (relating to hazardous constituents), incorporated by reference in § 261a.1. EPA publication SW-846, current edition, is available from the Government Printing Office, Superintendent of Documents, Post Office Box 371954, Pittsburgh, Pennsylvania 15250-7954, (202) 512-1800 (Document number 955-001-00000-1). Another way of rebutting this presumption is to demonstrate that the halogenated constituents are from wastes generated by households and therefore under 40 CFR 261.4(b)(1) (relating to exclusions), incorporated by reference in § 261a.1 are excluded from regulation as hazardous waste.

(1) The rebuttable presumption does not apply to metalworking oils/fluids containing chlorinated paraffins, if they are processed, through a tolling agreement, to reclaim metalworking oils/fluids. The presumption does apply to metalworking oils/fluids if the oils/fluids are recycled in any other manner, or disposed.

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(2) The rebuttable presumption does not apply to waste oils contaminated with CFCs removed from refrigeration units where the CFCs are destined for reclamation. The rebuttable presumption does apply to waste oils contaminated with CFCs that have been mixed with waste oil from sources other than refrigeration units.

(d) The owner or operator of a waste oil processing/refining facility shall test waste oil for flash point or shall request approval from the Department for an alternative method to screen waste oil for the purposes of detecting adulteration of waste oil and providing a safety measure in determining the potential for a waste oil to initiate a fire during storage and processing.

Cross References

This section cited in 25 Pa. Code § 298.55 (relating to analysis plan).

§ 298.54. Waste oil management.

(a) *Management units*. Waste oil processor/rerefiners may not store waste oil in units other than tanks, containers, or units subject to regulation under Chapters 264a or 265a (relating to owners and operators of hazardous waste treatment, storage and disposal facilities; and interim status standards for owners and operators of hazardous waste treatment, storage and disposal facilities).

(b) *Condition of units*. A container or aboveground tank used to store or process waste oil at waste oil processing and rerefining facilities shall meet the following conditions:

(1) *Be in good condition*. For example, containers and aboveground storage tanks may not exhibit severe rusting, apparent structural defects or deterioration.

(2) *Not leaking (no visible leaks)*.

(c) *Secondary containment for containers*. A container used to store or process waste oil at waste oil processing and rerefining facilities shall be equipped with a secondary containment system.

(1) The secondary containment system shall consist of one of the following:

(i) Dikes, berms or retaining walls and a floor. The floor shall cover the entire area within the dike, berm or retaining wall.

(ii) An equivalent secondary containment system.

(2) The entire containment system, including walls and floor, shall be sufficiently impervious to the migration of waste oil to prevent any waste oil released into the containment system from migrating out of the system to the soil, groundwater or surface water.

(d) *Additional requirements for containers*. The total container height of a group of containers may not exceed 9 feet. The maximum width and depth of a group of containers shall provide a configuration and aisle space which ensures

access for purposes of inspection, containment and remedial action with emergency vehicles and equipment.

(e) *Additional requirements for storage tanks*. Storage tanks used to store waste oil shall be designed and operated in accordance with § 299.122(b) (relating to storage tanks). For existing aboveground storage tanks, an alternative design to secondary containment may be demonstrated where the tank meets the ground.

(f) *Labels*.

(1) Except as provided in paragraphs (2) and (3), a container or aboveground tank used to store waste oil at processing and rerefining facilities shall be labeled or marked clearly with the words "waste oil" by no later than December 2, 2001.

(2) Containers or aboveground storage tanks which are labeled or marked with the words "used oil" on June 2, 2001, shall be labeled or marked with the words "waste oil" by no later than June 2, 2003.

(3) Containers used in transportation may be labeled or marked with the words "used oil," instead of "waste oil," or the words required by a receiving state if the containers and vehicles are destined for recycling or disposal outside of this Commonwealth. If a person accepts waste oil from or delivers waste oil to a generator, transfer facility, or processor/rerefiner in pennsylvania in a container used in transportation, paragraph (1) or (2) shall be met.

(4) Fill pipes used to transfer waste oil into underground storage tanks at processing or rerefining facilities shall be labeled or marked clearly with the words "waste oil" by no later than December 2, 2001. Fill pipes which are labeled or marked with the words "used oil" on June 2, 2001, shall be labeled or marked with the words "waste oil" by no later than June 2, 2003.

(g) *Response to releases*. Upon detection of a release of waste oil to the environment not subject to Chapter 245, Subchapter D (relating to corrective action process for owners and operators of storage tanks and storage tank facilities and other responsible parties) which has occurred after June 2, 2001. An owner or operator shall perform the following cleanup steps:

(1) Stop the release.

(2) Contain the released waste oil.

(3) Clean up and properly manage the released waste oil and other materials.

(4) If necessary, repair or replace any leaking waste oil storage containers or tanks prior to returning them to service.

(h) *Closure*.

(1) *Aboveground storage tanks*. The owner and operator who stores or processes waste oil in an aboveground tank shall comply with the following requirements:

(i) At closure of a tank system, the owner or operator shall remove or decontaminate waste oil residues in tanks, contaminated containment system

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components, contaminated soils and structures and equipment contaminated with waste oil, and manage them as hazardous waste, unless the materials are not hazardous waste under this chapter.

(ii) If the owner or operator demonstrates that not all contaminated soils can be practicably removed or decontaminated as required in subsection (i)(1)(i), the owner or operator shall close the tank system and perform post-closure care in accordance with the closure and postclosure care requirements that apply to hazardous waste landfills. (See 40 CFR 265.310 (relating to closure and post-closure care), incorporated by reference in § 265a.1 (relating to incorporation by reference, purpose, scope and applicability).

(2) *Containers*. An owner or operator who store waste oil in containers shall comply with the following requirements:

(i) At closure, containers holding waste oils or residues of waste oil shall be removed from the site.

(ii) The owner or operator shall remove or decontaminate waste oil residues, contaminated containment system components, contaminated soils and structures and equipment contaminated with waste oil, and manage them as hazardous waste, unless the materials are not hazardous waste under Chapter 261a (relating to identification and listing of hazardous waste).

(i) *Additional requirements*. In addition to the requirements of this subchapter, waste oil processor/rerefiners are subject to all applicable spill prevention, control and countermeasures (40 CFR Part 112), 40 CFR Part 264, Subparts C and D (relating to preparedness and prevention; and contingency plan and emergency procedures), incorporated by reference in § 264a.1 (relating to incorporation by reference, purpose, scope and reference), and modified in § 264a.56 (relating to emergency procedures). In addition to the requirements of this subchapter, a waste oil processor/rerefiner is also subject to the underground storage tank standards in Chapter 245 (relating to administration of the storage tank and spill prevention program) for waste oil stored in underground storage tanks whether or not the waste oil exhibits any characteristics of hazardous waste, in addition to the requirements of this subchapter.

§ 298.55. Analysis plan.

The owner or operator of a waste oil processing or rerefining facility shall develop and follow a written analysis plan describing the procedures that will be used to comply with the analysis requirements of § 298.53 (relating to rebuttable presumption for waste oil and flashpoint screening) and, if applicable, § 298.72 (relating to on-specification waste oil fuel). The owner or operator shall keep the plan at the facility.

(1) *Rebuttable presumption for waste oil and flash point screening in § 298.53*. At a minimum, the plan shall specify the following:

(i) Whether sample analyses or knowledge of the halogen content of the waste oil will be used to make this determination.

(ii) If sample analyses are used to make this determination:

(A) The sampling method used to obtain representative samples to be analyzed. A representative sample may be obtained using either:

(I) One of the sampling methods in 40 CFR Part 261, Appendix I (relating to representative sampling methods) incorporated by reference in § 261a.1 (relating to incorporation by reference, purpose and scope).

(II) A method shown to be equivalent under 40 CFR 260.20 and 260.21 (relating to general; and petitions for equivalent testing or analytical methods), incorporated by reference in § 260a.1 (relating to incorporated by reference, purpose, scope and applicablity).

(B) The frequency of sampling to be performed, and whether the analysis will be performed onsite or offsite.

(C) The methods used to analyze waste oil for the parameters specified in § 298.53.

(iii) The type of information that will be used to determine the halogen content of the waste oil.

(2) *On-specification waste oil fuel in § 298.72*. At a minimum, the plan shall specify the following if § 298.72 applies:

(i) Whether sample analyses or other information will be used to make this determination.

(ii) If sample analyses are used to make this determination:

(A) The sampling method used to obtain representative samples to be analyzed. A representative sample may be obtained using one of the following:

(I) One of the sampling methods in 40 CFR Part 261, Appendix I, incorporated by reference in § 261a.1.

(II) A method shown to be equivalent under 40 CFR 260.20 and 260.21 incorporated by reference in § 260a.1.

(B) Whether waste oil will be sampled and analyzed prior to or after any waste oil processing/rerefining.

(C) The frequency of sampling to be performed and whether the analysis will be performed onsite or offsite.

(D) The methods used to analyze waste oil for the parameters specified in § 298.72.

(iii) The type of information that will be used to make the on-specification waste oil fuel determination.

§ 298.56. Tracking.

(a) *Acceptance*. A waste oil processor/rerefiner shall keep a record of each waste oil shipment accepted for waste oil processing/rerefining. These records

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may take the form of a log, invoice, manifest, bill of lading or other shipping documents. Records for each shipment shall include the following information:

(1) The name and address of the transporter who delivered the waste oil to the processor/rerefiner.

(2) The name and address of the generator, transfer facility or processor/rerefiner from whom the waste oil was sent for waste oil processing/rerefining.

(3) The identification number of the transporter who delivered the waste oil to the processor/rerefiner.

(4) The identification number (if applicable) of the generator, transfer facility or processor/rerefiner from whom the waste oil was sent for waste oil processing/rerefining.

(5) The quantity of waste oil accepted.

(6) The date of acceptance.

(b) *Delivery*. A waste oil processor/rerefiner shall keep a record of each shipment of waste oil that is shipped to a waste oil burner, processor/rerefiner, transfer facility or disposal facility. These records may take the form of a log, invoice, manifest, bill of lading or other shipping documents. Records for each shipment shall include the following information:

(1) The name and address of the transporter who delivers the waste oil to the burner, processor/rerefiner, transfer facility or disposal facility.

(2) the name and address of the burner, processor/rerefiner, transfer facility or disposal facility who will receive the waste oil.

(3) The identification number of the transporter who delivers the waste oil to the burner, transfer facility, processor/rerefiner or disposal facility.

(4) The identification number of the burner, processor/rerefiner, transfer facility or disposal facility who will receive the waste oil.

(5) The quantity of waste oil shipped.

(6) The date of shipment.

(c) *Record retention*. The records described in subsections (a) and (b) shall be maintained for at least 3 years.

§ 298.57. Operating record and reporting.

(a) *Operating record*.

(1) The owner or operator shall keep a written operating record at the facility.

(2) The following information shall be recorded, as it becomes available, and maintained in the operating record until closure of the facility:

(i) Records and results of waste oil analysis performed as described in the analysis plan required under § 298.55 (relating to analysis plan).

(ii) Summary reports and details of all incidents that require implementation of the contingency plan as specified in § 298.52(b) (relating to general facility standards).

(b) *Reporting*. A waste oil processor/rerefiner shall report to the Department in the form of a letter, on a biennial basis (by March 1 of each even numbered year), the following information concerning waste oil activities during the previous calendar year:

(1) The identification number, name, and address of the processor/rerefiner.

(2) The calendar year covered by the report.

(3) The quantities of waste oil accepted for waste oil processing/rerefining and the manner in which the waste oil is processed/rerefined, including the specific processes employed.

§ 298.58. Offsite shipments of waste oil.

A waste oil processor/rerefiner who initiates shipments of waste oil offsite shall ship the waste oil using a waste oil transporter who has obtained an identification number.

§ 298.59. Management of waste.

An owner or operator of waste oil processing/rerefining facilities who generates waste from the storage, waste oil processing or rerefining of waste oil shall manage the wastes from its operations as specified in § 298.10(e) (relating to materials derived from waste oil).

Subchapter G. WASTE OIL BURNERS WHO BURN OFF-SPECIFICATION WASTE OIL FOR ENERGY RECOVERY

Sec.

298.60. Applicability.
298.61. Restrictions on burning.
298.62. Notification.
298.63. Rebuttable presumption for waste oil.
298.64. Waste oil storage.
298.65. Tracking.
298.66. Notices.
298.67. Management of waste.

Cross References

This subchapter cited in 25 Pa. Code § 298.20 (relating to applicability); 25 Pa. Code § 298.40 (relating to applicability); 25 Pa. Code § 298.50 (relating to applicability); and 25 Pa. Code § 298.70 (relating to applicability).

§ 298.60. Applicability.

(a) *General*. This subchapter applies to waste oil burners except as specified in paragraphs (1) and (2). A waste oil burner is a facility where waste oil not meeting the specification requirements in § 298.11 (relating to waste oil specifi-

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cations) is burned for energy recovery in devices identified in § 298.61(a) (relating to restrictions on burning). A waste oil burner who complies with this subchapter is deemed to have a solid waste permit for the burning of that waste oil. The Department may require a waste oil burner subject to permit-by-rule to apply for, and obtain, an individual or general permit, or take other appropriate action, when the waste oil burner is not in compliance with the requirements for the permit-by-rule or is conducting an activity that harms or presents a threat of harm to the health, safety or welfare of the people or the environment of this Commonwealth. Facilities burning waste oil for energy recovery under one or more of the following conditions are not subject to this subchapter:

(1) The waste oil is burned by the generator in an onsite space heater under the provisions of § 298.23 (relating to onsite burning in space heaters).

(2) The waste oil is burned by a processor/rerefiner for purposes of processing waste oil which is considered burning incidentally to waste oil processing.

(b) *Other applicable provisions*. A waste oil burner who conducts the following activities is also subject to other applicable provisions of this chapter as follows:

(1) A burner who generates waste oil shall also comply with Subchapter C (relating to waste oil generators).

(2) A burner who transports waste oil shall also comply with Subchapter E (relating to waste oil transporters and transfer facilities).

(3) Except as provided in § 298.61(b), a burner who processes or rerefines waste oil shall also comply with Subchapter F (relating to waste oil processing/rerefining facilities).

(4) A burner who directs shipments of off-specification waste oil from its facility to a waste oil burner or first claims that waste oil that is to be burned for energy recovery meets the waste oil fuel specifications in § 298.11 shall also comply with Subchapter H (relating to waste oil fuel marketers).

(5) A burner shall dispose of waste oil in accordance with Article VII or IX (relating to hazardous waste management; and residual waste management).

(c) *Specification fuel*. This subchapter does not apply to a person burning waste oil that meets the waste oil fuel specification of § 298.11, if the burner complies with Subchapter H.

§ 298.61. Restrictions on burning.

(a) Off-specification waste oil fuel may be burned for energy recovery in only the following devices:

(1) An industrial furnace identified in 40 CFR 260.10 (relating to definitions), incorporated by reference in § 260a.1 (relating to incorporation by reference, purpose, scope and applicability).

(2) A boiler, as defined in 40 CFR 260.10, incorporated by reference in § 260a.1 that is identified as follows:

(i) An industrial boiler located on the site of a facility engaged in a manufacturing process where substances are transformed into new products, including the component parts of products, by mechanical or chemical processes.

(ii) A utility boiler used to produce electric power, steam, heated or cooled air, or other gases or fluids for sale.

(iii) A waste oil-fired space heater if the burner meets the provisions of § 298.23 (relating to onsite burning in space heaters).

(3) A hazardous waste incinerator subject to 40 CFR Part 264, Subpart O (relating to incinerators), incorporated in § 264a.1 (relating to incorporation by reference, purpose, scope and reference), or 40 CFR Part 265, Subpart O (relating to incinerator), incorporated by reference in § 265a.1 (relating to incorporation by reference, purpose, scope and applicability).

(b) A person burning waste oil in a boiler or industrial furnace specified in paragraph (1) or (2) shall have a plan approval and operating permit issued under Chapter 127 (relating to construction, modification, reactivation and operation of sources) from the Bureau of Air Quality, or written approval from the Bureau of Air Quality if the fuel is burned in Allegheny or Philadelphia counties if Allegheny or Philadelphia county is issued first.

(c) Except as provided in subsection (d), a waste oil burner may not process waste oil unless it also complies with the requirements of Subchapter F (relating to waste oil processing/refining facilities).

(d) A waste oil burner may aggregate off-specification waste oil with virgin oil or on-specification waste oil for purposes of burning, but may not aggregate for purposes of producing on-specification waste oil.

Cross References

This section cited in 25 Pa. Code § 298.1 (relating to definitions); 25 Pa. Code § 298.60 (relating to applicability); 25 Pa. Code § 298.66 (relating to notices); 25 Pa. Code § 298.72 (relating to prohibitions); and 25 Pa. Code § 298.75 (relating to notices).

§ 298.62. Notification.

(a) *Identification numbers*. A waste oil burner which has not previously complied with the notification requirements of 40 CFR 264.11 (relating to identification number), incorporated by reference in § 264a.1 (relating to incorporation by reference, purpose, scope and reference), and 40 CFR 265.11 (relating to identification number), incorporated by reference in § 265a.1 (relating to incorporation by reference, purpose, scope and applicability), shall comply with these requirements and obtain an EPA identification number.

(b) *Mechanics of notification*. A waste oil burner who has not received an identification number may obtain one by notifying the regional administrator of their waste oil activity by submitting one of the following:

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(1) A completed EPA form 8700-12 (to obtain EPA form 8700-12 call RCRA/Superfund hotline at (800) 424-9346 or (703) 920-9810).

(2) A letter requesting an identification number. A burner may call the RCRA/Superfund hotline to determine where to send a letter requesting an identification number. The letter should include the following information:

(i) The burner company name.

(ii) The owner of the burner company.

(iii) The mailing address for the burner.

(iv) The name and telephone number for the burner point of contact.

(v) The type of waste oil activity.

(vi) The location of the burner facility.

§ 298.63. Rebuttable presumption for waste oil.

(a) To ensure that waste oil managed at a waste oil burner facility is not hazardous waste under the rebuttable presumption of § 298.10(b)(1)(ii) (relating to applicability), a waste oil burner shall determine whether the total halogen content of waste oil managed at the facility is above or below 1,000 parts per million.

(b) The waste oil burner shall determine if the waste oil contains above or below 1,000 parts per million total halogens by one of the following:

(1) Testing the waste oil.

(2) Applying knowledge of the halogen content of the waste oil in light of the materials or processes used.

(3) If the waste oil has been received from a processor/rerefiner subject to regulation under Subchapter F (relating to waste oil processing/rerefining facilities), using information provided by the processor/rerefiner.

(c) Waste oil containing more than 1,000 parts per million total halogens, is presumed to be a hazardous waste because it has been mixed with halogenated hazardous waste listed under 40 CFR Part 261, Subpart D (relating to lists of hazardous waste), incorporated by reference in § 261a.1 (relating to incorporation by reference, purpose and scope). A person may rebut this presumption by demonstrating that the waste oil does not contain hazardous waste. For example, by using an analytical method from the current edition of SW-846 to show that the waste oil does not contain significant concentrations of halogenated hazardous constituents identified in 40 CFR Part 261, Appendix VIII (relating to hazardous constituents), incorporated by reference in § 261a.1. EPA publication SW-846, current edition, is available from the Government Printing Office, Superintendent of Documents, Post Office Box 371954, Pittsburgh, Pennsylvania 15250-7954, (202) 512-1800 (Document number 955-001-00000-1). Another way of rebutting this presumption is to demonstrate that the halogenated constituents are from wastes generated by households and, therefore, under 40 CFR 261.4(b)(1) (relating to exclusions), incorporated by reference in § 261a.1 are excluded from regulation as hazardous waste.

(1) The rebuttable presumption does not apply to metalworking oils/fluids containing chlorinated paraffins, if they are processed, through a tolling arrangement as described in § 298.24(c) (relating to offsite shipments), to reclaim metalworking oils/fluids. The presumption does apply to metalworking oils/fluids if the oils/fluids are recycled in any other manner, or disposed.

(2) The rebuttable presumption does not apply to waste oils contaminated with chlorofluorocarbons (CFCs) removed from refrigeration units if the CFCs are destined for reclamation. The rebuttable presumption does apply to waste oils contaminated with CFCs that have been mixed with waste oil from sources other than refrigeration units.

(d) *Record retention*. Records of analyses conducted or information used to comply with subsections (a)—(c) shall be maintained by the burner for at least 3 years.

§ 298.64. Waste oil storage.

(a) *Storage units*. A waste oil burner may not store waste oil in units other than tanks, containers or units subject to regulation under Chapter 264a or 265a (relating to owners and operators of hazardous waste treatment, storage and disposal facilities; and interim status standards for owners and operators of hazardous waste treatment, storage and disposal facilities).

(b) *Condition of units*. Containers and aboveground storage tanks used to store oil at burner facilities shall meet the following conditions:

(1) *Be in good condition*. For example, containers and aboveground storage tanks shall not exhibit severe rusting, apparent structural defects or deterioration.

(2) *Not leaking (no visible leaks)*.

(c) *Secondary containment for containers*. A container used to store waste oil at burner facilities shall be equipped with a secondary containment system.

(1) The secondary containment system shall consist of one of the following:

(i) Dikes, berms or retaining walls and a floor. The floor shall cover the entire area within the dike, berm or retaining wall.

(ii) An equivalent secondary containment system.

(2) The entire containment system, including walls and floor, shall be sufficiently impervious to the migration of waste oil to prevent waste oil released into the containment system from migrating out of the system to the soil, groundwater or surface water.

(d) *Additional requirements for containers*. The total container height of a group of containers may not exceed 9 feet. The maximum width and depth of a group of containers shall provide a configuration and aisle space which ensures access for purposes of inspection, containment and remedial action with emergency vehicles and equipment.

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(e) *Additional requirements for storage tanks*. Storage tanks used to store waste oil shall be designed and operated in accordance with § 299.122(b) (relating to storage tanks). For existing aboveground storage tanks, an alternative design to secondary containment may be demonstrated where the tank meets the ground.

(f) *Labels*.

(1) Except as provided in paragraph (2), a container or aboveground tank used to store waste oil at burner facilities shall be labeled or marked clearly with the words "waste oil" by no later than December 2, 2001.

(2) Containers or aboveground storage tanks which are labeled or marked with the words "used oil" on June 2, 2001, shall be labeled or marked with the words "waste oil" by no later than June 2, 2003.

(3) Fill pipes used to transfer waste oil into underground storage tanks at burner facilities shall be labeled or marked clearly with the words "waste oil" by no later than December 2, 2001. Fill pipes which are labeled or marked with the words "used oil" on June 2, 2001, shall be labeled or marked with the words "waste oil" by no later than June 2, 2003.

(g) *Response to releases*. Upon detection of a release of waste oil to the environment not subject to Chapter 245, Subchapter D (relating to corrective action process for owners and operators of storage tanks and storage tank facilities and other responsible parties) which has occurred after June 2, 2001, a burner shall perform the following cleanup steps:

(1) Stop the release.

(2) Contain the released waste oil.

(3) Clean up and properly manage the released waste oil and other materials.

(4) Repair or replace any leaking waste oil storage containers or tanks prior to returning them to service, if necessary.

(h) In addition to the requirements of this subchapter, a waste oil burner shall maintain, in a readily accessible place at the facility, a copy of a preparedness, prevention and contingency (PPC) plan that is consistent with the Department's most recent guidelines for development and implementation of PPC plans. Waste oil burners are subject to all applicable spill prevention, control and countermeasures (40 CFR Part 112 (relating to oil pollution prevention)) in addition to the requirements of this subchapter. A waste oil burner is also subject to the underground storage tank standards for waste oil stored in underground storage tanks in Chapter 245 (relating to administration of the storage tank and spill prevention program) whether or not the waste oil exhibits any characteristics of hazardous waste.

§ 298.65. Tracking.

(a) *Acceptance*. A waste oil burner shall keep a record of each waste oil shipment accepted for burning. These records may take the form of a log, invoice,

manifest, bill of lading or other shipping documents. Records for each shipment shall include the following information:

(1) The name and address of the transporter who delivered the waste oil to the burner.

(2) The name and address of the generator, transfer facility or processor/rerefiner from whom the waste oil was sent to the burner.

(3) The identification number of the transporter who delivered the waste oil to the burner.

(4) The identification number (if applicable) of the generator, transfer facility or processor/rerefiner from whom the waste oil was sent to the burner.

(5) The quantity of waste oil accepted.

(6) The date of acceptance.

(b) *Record retention.* The records described in subsection (a) shall be maintained for at least 3 years.

§ 298.66. Notices.

(a) *Certification*. Before a burner accepts the first shipment of off-specification waste oil fuel from a generator, transporter, transfer facility or processor/rerefiner, the burner shall provide to the generator, transporter, transfer facility or processor/rerefiner a one-time written and signed notice certifying the following:

(1) The burner has notified EPA stating the location and general description of its waste oil management activities.

(2) The burner will burn the waste oil only in an industrial furnace or boiler identified in § 298.61(a) (relating to restrictions on burning).

(b) *Certification retention.* The certification described in subsection (a) shall be maintained for 3 years from the date the burner last receives shipment of off-specification waste oil from that generator, transporter, transfer facility or processor/rerefiner.

§ 298.67. Management of waste.

A burner who generates waste from the storage or burning of waste oil shall manage the waste as specified in § 298.10(e) (relating to applicability).

Subchapter H. WASTE OIL FUEL MARKETERS

Sec.

298.70. Applicability.
298.71. Prohibitions.
298.72. On-specification waste oil fuel.
298.73. Notification.
298.74. Tracking.
298.75. Notices.

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Cross References

This subchapter cited in 25 Pa. Code § 298.20 (relating to applicability); 25 Pa. Code § 298.40 (relating to applicability); 25 Pa. Code § 298.50 (relating to applicability); and 25 Pa. Code § 298.60 (relating to applicability).

§ 298.70. Applicability.

(a) A person who conducts one of the following activities is subject to the requirements of this subchapter:

(1) Directs a shipment of off-specification waste oil from its facility to a waste oil burner.

(2) First claims that waste oil that is to be burned for energy recovery meets the waste oil fuel specifications in § 298.11 (relating to waste oil specifications).

(b) The following persons are not marketers subject to this subchapter:

(1) Waste oil generators, waste oil transporters and waste oil transfer facilities who transport waste oil received only from waste oil generators, unless the waste oil generator, waste oil transporter or waste oil transfer facility directs a shipment of off-specification waste oil from its facility to a waste oil burner. However, waste oil processors/rerefiners who burn some waste oil fuel for purposes of waste oil processing are considered to be burning incidentally to waste oil processing. Thus, waste oil generators, waste oil transporters and waste oil transfer facilities who direct shipments of off-specification waste oil to waste oil processors/rerefiners who incidentally burn waste oil are not marketers subject to this subchapter.

(2) Persons who direct shipments of on-specification waste oil and who are not the first person to claim the oil meets the waste oil fuel specifications of § 298.11.

(c) Any person subject to the requirements of this subchapter shall also comply with one of the following:

(1) Subchapter C (relating to waste oil generators).

(2) Subchapter E (relating to waste oil transporters and transfer facilities).

(3) Subchapter F (relating to waste oil processing/rerefining facilities).

(4) Subchapter G (relating to waste oil burners who burn off-specification waste oil for energy recovery).

§ 298.71. Prohibitions.

A waste oil fuel marketer may initiate a shipment of off-specification waste oil only to a waste oil burner which:

(1) Has an identification number.

(2) Burns the waste oil in an industrial furnace or boiler identified in § 298.61(a) (relating to restrictions on burning).

§ 298.72. On-specification waste oil fuel.

(a) *Analysis of waste oil fuel*. A waste oil generator, waste oil transporter, waste oil transfer facility, waste oil processor/rerefiner or waste oil burner may determine that waste oil that is to be burned for energy recovery meets the fuel specifications of § 298.11 (relating to waste oil specifications) by performing analyses or obtaining copies of analyses or other information documenting that the waste oil fuel meets the specifications.

(b) *Record retention*. A waste oil generator, waste oil transporter, waste oil transfer facility, waste oil processor/rerefiner or waste oil burner who first claims that waste oil that is to be burned for energy recovery meets the specifications for waste oil fuel under § 298.11 shall keep copies of analyses of the waste oil (or other information used to make the determination) for 3 years.

Cross References

This section cited in 25 Pa. Code § 298.11 (relating to waste oil specifications); 25 Pa. Code § 298.55 (relating to analysis plan); and 25 Pa. Code § 298.74 (relating to tracking).

§ 298.73. Notification.

(a) *Identification numbers*. A waste oil fuel marketer subject to this subchapter who has not previously obtained an identification number shall comply with these requirements and obtain an EPA identification number.

(b) A marketer who has not received an identification number may obtain one by notifying the EPA Regional Administrator of its waste oil activity by submitting one of the following:

(1) A completed EPA form 8700-12.

(2) A letter requesting an identification number. The letter shall include the following information:

(i) The marketer company name.

(ii) The owner of the marketer.

(iii) The mailing address for the marketer.

(iv) The name and telephone number for the marketer point of contact.

(v) The type of waste oil activity (for example, generator directing shipments of off-specification waste oil to a burner).

Cross References

This section cited in 25 Pa. Code § 298.11 (relating to waste oil specifications).

§ 298.74. Tracking.

(a) *Off-specification waste oil delivery*. A waste oil marketer who directs a shipment of off-specification waste oil to a burner must keep a record of each shipment of waste oil to a burner. These records may take the form of a log, invoice, manifest, bill of lading or other shipping documents. Records for each shipment shall include the following information:

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(1) The name and address of the transporter who delivers the waste oil to the burner.

(2) The name and address of the burner who will receive the waste oil.

(3) The identification number of the transporter who delivers the waste oil to the burner.

(4) The identification number of the burner.

(5) The quantity of waste oil shipped.

(6) The date of shipment.

(b) *On-specification waste oil delivery*. A generator, transporter, transfer facility, processor/rerefiner or burner who first claims that waste oil that is to be burned for energy recovery meets the fuel specifications under § 298.11 (relating to waste oil specifications) shall keep a record of each shipment of waste oil to the facility to which it delivers the waste oil. Records for each shipment shall include the following information:

(1) The name and address of the facility receiving the shipment.

(2) The quantity of waste oil fuel delivered.

(3) The date of shipment or delivery.

(4) A cross reference to the record of waste oil analysis or other information used to make the determination that the oil meets the specification as required under § 298.72(a) (relating to on-specification waste oil fuel).

(c) *Record retention*. The records described in subsections (a) and (b) shall be maintained for at least 3 years.

Cross References

This section cited in § 298.11 (relating to waste oil specifications).

§ 298.75. Notices.

(a) *Certification*. Before a waste oil generator, transporter, transfer facility or processor/rerefiner directs the first shipment of off-specification waste oil fuel to a burner, it shall obtain a one-time written and signed notice from the burner certifying the following:

(1) That the burner has notified EPA stating the location and general description of waste oil management activities.

(2) That the burner will burn the off-specification waste oil only in an industrial furnace or boiler identified in § 298.61(a) (relating to restrictions on burning).

(b) *Certification retention*. The certification described in subsection (a) shall be maintained for 3 years from the date the last shipment of off-specification waste oil is shipped to the burner.

[Next page is 299-1.]

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CHAPTER 299. STORAGE AND TRANSPORTATION OF RESIDUAL WASTE

Subchap. Sec.
A. STANDARDS FOR STORAGE OF RESIDUAL WASTE 299.101
B. STANDARDS FOR COLLECTING AND TRANSPORTING OF RESIDUAL WASTE 299.201

Authority

The provisions of this Chapter 299 issued under the Solid Waste Management Act (35 P. S. §§ 6018.101—6018.1003); the Pennsylvania Used Oil Recycling Act (58 P. S. §§ 471—480); The Clean Streams Law (35 P. S. §§ 691.1—691.1001); sections 1905-A, 1917-A and 1920-A of The Administrative Code of 1929 (71 P. S. §§ 510-5, 510-17 and 510-20); and the Municipal Waste Planning, Recycling and Waste Reduction Act (53 P. S. §§ 4000.101—4000.1904); amended under sections 5(b) and 402 of The Clean Streams Law (35 P. S. §§ 691.5(b) and 691.402); section 302 of the Municipal Waste Planning, Recycling and Waste Reduction Act (53 P. S. § 4000.302); section 408(e) of the Pennsylvania Used Oil Recycling Act (58 P. S. § 408(e)); sections 1905-A, 1917-A and 1920-A of The Administrative Code of 1929 (71 P. S. §§ 510-5, 510-17 and 510-20); section 105(4) of the Waste Tire Recycling Act (35 P. S. § 6029.105(4)); sections 301 and 302 of the Radiation Protection Act (35 P. S. §§ 7110.301 and 7110.302); and the Vehicle Code, 75 Pa.C.S. § 4909(e), unless otherwise noted.

Source

The provisions of this Chapter 299 adopted July 2, 1992, effective July 4, 1992, 22 Pa.B. 3389, unless otherwise noted.

Cross References

This chapter cited in 25 Pa. Code 261a.2 (relating to definition of ''solid waste''); 25 Pa. Code § 245.561 (relating to permanent closure or change-in-service); 25 Pa. Code § 245.614 (relating to requirements for closure); 25;Pa. Code § 252.3 (relating to scope); 25 Pa. Code § 287.101 (relating to general requirements for permit); 25 Pa. Code § 287.102 (relating to permit-by-rule); 25 Pa. Code § 287.504 (relating to operating requirements); 25 Pa. Code § 287.601 (relating to scope); 25 Pa. Code § 287.665 (relating to other beneficial uses of coal ash); 25 Pa. Code § 288.219 (relating to salvaging); 25 Pa. Code § 293.220 (relating to salvaging); 25 Pa. Code § 295.219 (relating to salvaging); and 25 Pa. Code § 297.220 (relating to salvaging).

Subchapter A. STANDARDS FOR STORAGE OF RESIDUAL WASTE

SCOPE

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299.163. Cessation of operations.

Cross References

This subchapter cited in 25 Pa. Code § 245.308 (relating to onsite storage of contaminated soil); 25 Pa. Code § 287.112 (relating to storage impoundments and storage facilities); 25 Pa. Code § 288.281 (relating to daily operational records); 25 Pa. Code § 289.301 (relating to daily operational records); 25 Pa. Code § 291.204 (relating to storage of residual waste); 25 Pa. Code § 291.414 (relating to weather); 25 Pa. Code § 293.251 (relating to daily operational records); 25 Pa. Code § 295.271 (relating to daily operational records); and 25 Pa. Code § 297.261 (relating to daily operational records).

SCOPE

§ 299.101. Scope.

(a) A person or municipality that stores residual waste shall comply with §§ 299.111—299.117 (relating to general).

(b) In addition to the requirements of subsection (a), the following requirements shall be met:

(1) A person or municipality that stores residual waste in the manner identified in §§ 299.121, 299.122, 299.131—299.133 and 299.141—299.145 shall store the waste under the applicable provisions of those sections.

(2) A person or municipality that stores the types of waste identified in §§ 299.151—299.163 (relating to types of waste) shall store the waste under the applicable provisions of those sections.

(c) This subchapter applies to residual waste storage at impoundments that are permitted for industrial waste water, pretreatment or storage and discharge under The Clean Streams Law.

Source

The provisions of this § 299.101 amended January 12, 2001, effective January 13, 2001, 31 Pa.B. 235. Immediately preceding text appears at serial pages (255124) and (256691).

Notes of Decisions

Waste

Discarded tires which are stored on property are considered ''waste'' and subject to regulation even though the tires may have value. *Starr v. Department of Environmental Resources*, 607 A.2d 321 (Pa. Cmwlth. 1992).

GENERAL

§ 299.111. General requirements.

A person or municipality that stores residual waste may not do the following:

(1) Mix the waste with hazardous waste that is regulated under Article VII (relating to hazardous waste management), except for purposes of treatment at permitted hazardous waste management facilities.

(2) Mix the waste with, or store the waste in proximity to other solid waste to create a risk of fire or explosion, or a risk of the accumulation of poisonous or otherwise harmful vapors or gases.

(3) Mix the waste with special handling waste.

(4) Allow waste or constituents of waste to be blown or otherwise deposited outside of the storage area.

Cross References

This section cited in 25 Pa. Code § 299.101 (relating to scope).

§ 299.112. Design and operation.

(a) A person or municipality storing residual waste shall employ best engineering design and construction practices for all phases of construction and operation.

(b) A person or municipality may not store residual waste in a manner that exceeds the design capacity of the storage facility.

(c) A person or municipality storing residual waste shall routinely inspect the facility, its equipment and the surrounding area for evidence of failure and shall immediately take necessary corrective actions. The person or municipality shall maintain records of the inspections and corrective actions that were taken, and shall make the records available to the Department upon request.

(d) A person or municipality may not store putrescible waste in piles.

Cross References

This section cited in 25 Pa. Code § 299.101 (relating to scope); and 25 Pa. Code § 299.155 (relating to storage of whole and processed waste).

§ 299.113. Duration of storage.

(a) A person or municipality may not store residual waste for more than 1 year unless:

(1) For waste that is reusable or reclaimable, the Department has approved in writing a longer period prior to the end of 1 year of storage based on a rate of use or reclamation of stored waste that is reasonably proportional to the rate of accumulation for storage.

(2) For other residual waste, the Department has approved in writing a longer period prior to the end of 1 year of storage.

(b) It shall be presumed that a person or municipality storing residual waste contrary to subsection (a) is operating a residual waste disposal facility and is subject to the applicable requirements of the act and the regulations thereunder for residual waste disposal.

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(c) A person or municipality that stores residual waste shall maintain accurate operational records that are sufficiently detailed to clearly and convincingly demonstrate to the Department that residual waste is being stored in accordance with subsection (a). The records shall be made available to the Department upon request. The presumption in subsection (b) may be overcome by the operational records required by this subsection.

(d) Nothing in this section supersedes a regulation, permit condition or other requirement providing for a storage period of less than 1 year.

Cross References

This section cited in 25 Pa. Code § 287.111 (relating to notice by impoundments and unpermitted processing or disposal facilities); 25 Pa. Code § 287.113 (relating to permitting procedure for unpermitted processing or disposal facilities); and 25 Pa. Code § 299.101 (relating to scope).

§ 299.114. Equipment.

(a) A person or municipality that stores residual waste shall maintain at the storage facility equipment necessary for the storage of residual waste in accordance with this subchapter. The equipment shall be maintained in an operable condition.

(b) Equipment shall be operated and maintained to prevent solid waste from being unintentionally conveyed out of the storage area.

(c) Equipment used to handle putrescible solid waste with which operations personnel are in direct contact shall be cleaned at the end of each working day or every 24 hours. Other equipment shall be cleaned based on scheduled or emergency maintenance periods.

Cross References

This section cited in 25 Pa. Code § 299.101 (relating to scope).

§ 299.115. Nuisance minimization and control.

(a) A person or municipality that stores residual waste shall:

(1) Control and minimize the harborage, breeding or attraction of vectors.

(2) Take other measures necessary to control and minimize the presence of vectors.

(3) Immediately take measures necessary to exterminate vectors.

(b) A person or municipality storing residual waste shall also minimize and control conditions not otherwise prohibited by this subchapter that are harmful to the public health, public safety or the environment, or which create safety hazards, odors, dust, unsightliness or other public nuisances.

Source

The provisions of this § 299.115 amended January 12, 2001, effective January 13, 2001, 31 Pa.B. 235. Immediately preceding text appears at serial page (226895).

Cross References

This section cited in 25 Pa. Code § 245.308 (relating to onsite storage of contaminated soil); and 25 Pa. Code § 299.101 (relating to scope).

§ 299.116. Surface and groundwater protection.

(a) Surface water runoff from storage areas shall be minimized. Collection of surface runoff shall be managed in accordance with The Clean Streams Law and the regulations promulgated thereunder.

(b) Surface water run-on to storage areas shall be minimized.

(c) Waste may not be stored to cause groundwater degradation.

Cross References

This section cited in 25 Pa. Code § 299.101 (relating to scope).

§ 299.117. Emergency storage.

Notwithstanding a provision of this article or term or condition of a permit for a solid waste processing or disposal facility, the Department may allow the storage of residual waste at a permitted facility if the following conditions are met:

(1) The waste was created, spilled or released during or as a result of an emergency as defined in § 287.103 (relating to emergency disposal or processing). The waste may also be created as a result of adverse effects on groundwater from a solid waste management facility, materials storage tank or similar source.

(2) The permitted facility includes the following:

(i) A designated waste storage area.

(ii) An approved storage and handling plan that will allow storage of the waste without any adverse effect on public health, safety, welfare or the environment.

(iii) Plans for prompt removal of the waste and disposal or processing at another permitted facility if the Department denies the application for permit modification under paragraph (3).

(3) Within 5 working days after storage begins, the Department has received an application for permit modification under § 271.222 or § 287.222 (relating to permit modification; and permit modification) to allow the disposal or processing of the waste at the facility.

Cross References

This section cited in 25 Pa. Code § 287.103 (relating to emergency disposal or processing); 25 Pa. Code § 299.101 (relating to scope); and 25 Pa. Code § 299.218 (relating to wastes from accidents and spills).

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TYPES OF STORAGE CONTAINERS AND TANKS

§ 299.121. Containers.

(a) A person or municipality storing residual waste in containers shall provide a sufficient number of containers to contain solid waste generated during periods between regularly scheduled collections.

(b) An individual container or bulk container used for the storage of residual waste shall have the following characteristics:

(1) The container shall be constructed to be easily handled for collection.

(2) The container shall be constructed of rust resistant and corrosion resistant materials.

(3) The container shall be designed to prevent leaks.

(c) Putrescible waste shall be stored in an individual container or bulk container that has the following characteristics:

(1) The container shall be equipped with a tight fitting lid or cover, or otherwise sealed.

(2) The container shall be watertight, leak-proof, insect-proof and rodent-proof.

(d) All containers shall be clearly labeled as ''residual waste'' or as the specific type of residual waste.

(e) The total container height of a group of containers may not exceed 9 feet. The maximum width and depth of a group of containers shall provide a configuration and aisle space which ensures access for purposes of inspection, containment and remedial action with emergency vehicles and equipment.

Source

The provisions of this § 299.121 amended January 12, 2001, effective January 13, 2001, 31 Pa.B. 235. Immediately preceding text appears at serial page (226896).

Cross References

This section cited in 25 Pa. Code § 299.101 (relating to scope).

§ 299.122. Storage tanks.

(a) Residual waste storage tanks shall meet the design and performance standards established by this section. A storage tank shall be clearly labeled as ''residual waste'' and the type of residual waste shall be identified.

(b) Aboveground residual waste storage tanks shall be designed and operated as follows, unless an alternative design is demonstrated to perform at a level equivalent to the requirements of this section and is otherwise approved by the Department:

(1) Tanks shall be designed and constructed in accordance with an appropriate current code of practice developed by Nationally recognized associations such as UL, ACI, API, ASME, ASTM or NACE.

(2) Tanks shall have a stable foundation, capable of supporting the total weight of the tank when full of waste without movement, rolling or unacceptable settling. The foundation shall minimize corrosion of the tank bottom and meet or exceed the specifications of the tank manufacturer. The foundation design and construction shall be based on sound engineering practices.

(3) Newly installed or repaired tanks shall be tested for tightness in accordance with current codes of practice developed by Nationally recognized associations and manufacturer's specifications. If a pneumatic test is used for manufactured (shop built) tanks, the fittings, welds, joints and connections shall be coated with a soap solution and checked for leaks. Deficiencies shall be remedied prior to tanks being placed into service. Hydrostatic test fluids shall be discharged or disposed of in accordance with State and Federal requirements.

(4) Tank connections through which waste can flow shall be equipped with an operating valve adjacent to the tank to control flow of waste. Appropriate valves shall be installed to meet or exceed current codes of practice and jurisdictional requirements. Valves shall be designed, installed and maintained according to current codes of practice.

(5) The exterior surfaces of aboveground tanks and piping shall be protected by a suitable coating, which prevents corrosion and deterioration. The coating system shall be maintained throughout the entire operational life of the tank.

(6) Owners and operators shall ensure that releases from overfills do not occur. Transfer of stored waste may not exceed the volume available in receiving tank and the transfer shall be adequately monitored. Immediate action shall be taken to stop the flow of waste prior to exceeding tank capacity or in the event that an equipment failure occurs.

(7) Tanks shall be installed with the following:

(i) A gauge or monitoring device which accurately indicates the level or volume in the tank and is visible to the individual responsible for the transfer of waste. The monitoring device shall be installed, calibrated and maintained in accordance with manufacturer's specifications.

(ii) A high-level alarm and an automatic high-level cut-off device or a high-level alarm and a manned operator shutdown procedure in operation.

(8) Containment structures shall be compatible with the wastes stored and minimize deterioration to the storage tank system.

(9) Containment areas shall be designed, maintained and constructed in accordance with sound engineering practices adhering to Nationally recognized codes of practice, such as NFPS, NACE, ACI or API and in compliance with State and Federal requirements.

(10) Secondary containment under the tank bottom and around underground piping shall be designed to direct any release to a monitoring point.

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(11) Permeability of the secondary containment shall be less than 1×10^{-7} cm/sec at anticipated hydrostatic head.

(12) Aboveground tanks shall have emergency containment structures, such as dike fields, curbing and containment collection systems, which contain releases from overfills, leaks and spills.

(13) Permeability of emergency containment structures shall be less than 1×10^{-6} cm/sec at anticipated hydrostatic head and be of sufficient thickness to prevent the released waste from penetrating the containment structure for a minimum of 72 hours and until the release can be detected and recovered.

(14) Emergency containment areas, such as dike fields, shall be able to contain 110% of the capacity of the largest tank in the containment area.

(15) Stormwater shall be removed from the emergency containment area as soon as possible or when the water is in contact with the tank or piping and prior to the capacity of containment being reduced by 10% or more. Manually operated pumps or siphons and manually operated gravity drains may be used to empty the containment. If drain valves are used, they shall be secured in the closed position when not in use. Discharge or disposal of wastes from the containment structure shall comply with applicable State and Federal requirements.

(16) Aboveground tank systems shall provide method of leak detection capable of detecting a release. The leak detection method shall be monitored at least monthly and shall be installed, calibrated, operated and maintained in accordance with industry practices and manufacturer's specifications.

(i) The area beneath the tank bottom shall be monitored for leakage by visual, mechanical or electronic leak detection methods.

(ii) Observation wells outside of the secondary containment structure do not satisfy the leak detection requirements.

(c) Underground residual waste storage tanks shall be designed and operated as follows, unless an alternative design is demonstrated to perform at a level equivalent to the requirements of this section and is otherwise approved by the Department:

(1) *Corrosion protection*.

(i) Parts of the system that routinely contain waste shall be protected from deterioration. Parts that are in contact with the ground shall be properly designed, constructed and protected from corrosion in accordance with a code of practice developed by a Nationally recognized association or independent testing laboratory.

(ii) System components constructed of metal do not need additional corrosion protection measures if:

(A) The site is determined by a corrosion expert to not be corrosive enough to cause a release due to corrosion during the systems operating life.

(B) Owners and operators maintain records that demonstrate compliance with clause (A) for the remaining life of the tank system including removal and closure.

(2) *Spill and overfill prevention equipment.*

(i) Except as provided in subparagraph (ii), to prevent spilling and overfilling associated with waste transfer to the underground storage tank system, owners and operators shall ensure that their systems have the following spill and overfill prevention equipment:

(A) Spill prevention equipment that will prevent release of waste to the environment when the transfer hose is detached from the fill pipe.

(B) Overfill prevention equipment that will do one or more of the following:

(I) Automatically shut off flow into the tank before the fittings on the top of the tank are touched by waste.

(II) Restrict the flow into the tank before it is 90% full or 30 minutes before it would be full.

(III) Activate an audible and visible high level alarm before the tank is 90% full or 30 minutes before it would be full.

(ii) Owners and operators are not required to use overfill prevention equipment if the underground storage tank system is filled by transfers of no more than 25 gallons at one time.

(3) *Installation*. Tanks and piping shall be properly installed and system integrity tested in accordance with a code of practice developed by a Nationally recognized association or independent testing laboratory such as API 1615 and PEI RP 100, and in accordance with the manufacturer's instructions.

(4) *Releases due to corrosion.* To ensure that releases due to corrosion are prevented for as long as the underground storage tank system is used to store waste, the owner and operator shall comply with the following requirements:

(i) Corrosion protection systems shall be operated and maintained to continuously provide corrosion protection to the metal components of that portion of the tank and piping that routinely contain wastes and is in contact with the ground.

(ii) Underground storage tank systems equipped with cathodic protection systems shall be inspected for proper operation by a qualified cathodic protection tester in accordance with the following requirements:

(A) *Frequency*. Cathodic protection systems shall be tested within 6 months of installation and at least every 3 years thereafter.

(B) *Inspection criteria.* The criteria that are used to determine that cathodic protection is adequate as required by this section shall be in accordance with a code of practice developed by a Nationally recognized association.

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(iii) Underground storage tank systems with impressed current cathodic protection systems shall be checked every 60 days to ensure the equipment is operating properly.

(iv) For underground storage tank systems using cathodic protection, records of the operation of the cathodic protection shall be maintained. These records shall provide the following:

(A) The results of the last three system checks required in paragraph (4)(iii).

(B) The results of testing from the last two inspections required in paragraph (4)(ii).

(5) *Unauthorized or accidental access.* Monitoring and observation wells shall be clearly identified using industry codes and standards and caps shall be secured to prevent unauthorized or accidental access.

(6) *Maintenance.* Sumps, release detection equipment, corrosion protection, spill prevention, overfill prevention and other appurtenances whose failure could contribute to a release of waste, shall be maintained in a good state of repair and shall function as designed.

(7) *Tightness testing.* Systems shall be precision tightness tested after installation and major repairs.

(8) *Monitoring for releases.* Portions of the tank and underground piping that routinely contain waste shall be monitored at least monthly for releases.

(9) *Method evaluation.* The method or combination of methods used shall have been evaluated by an independent third party and shown to be effective in detecting releases.

(10) *Records.* Records documenting the operation of the release detection method shall be made each month and kept for at least 1 year.

Source

The provisions of this § 299.122 amended January 12, 2001, effective January 13, 2001, 31 Pa.B. 235. Immediately preceding text appears at serial page (226896).

Cross References

This section cited in 25 Pa. Code § 288.455 (relating to leachate collection and storage); 25 Pa. Code § 288.555 (relating to leachate collection and storage); 25 Pa. Code § 289.455 (relating to leachate collection and storage); 25 Pa. Code § 298.22 (relating to waste oil storage); 25 Pa. Code § 298.45 (relating to waste oil storage at transfer facility); 25 Pa. Code § 298.54 (relating to waste oil management); 25 Pa. Code § 298.64 (relating to waste oil storage); 25 Pa. Code § 289.555 (relating to leachate collection and storage); and 25 Pa. Code § 299.101 (relating to scope).

STORAGE PILES

§ 299.131. General requirements.

(a) A person or municipality storing residual waste in piles shall prevent the dispersal of residual waste by wind or water erosion.

(b) A person or municipality may not store liquid waste in a residual waste pile.

(c) Unless the storage pile requires a liner system or storage pad under § 299.132 (relating to storage pad or liner system), the residual waste being stored shall be separated from the seasonal high water table by at least 4 feet without the use of a groundwater pumping system. The Department may, in writing, waive this requirement.

(d) A person or municipality storing residual waste in a pile shall design, install and maintain berms around the storage area and other structures or facilities to collect and, when necessary, treat runoff or leachate, or both, from the storage area. The Department may, in writing, waive the berm requirement when other collection methods are in place.

(e) For storage piles without a liner system or storage pad, the Department may require the person or municipality to install a water quality monitoring system in accordance with §§ 288.251—288.255 (relating to water quality monitoring).

Source

The provisions of this § 299.131 amended January 12, 2001, effective January 13, 2001, 31 Pa.B. 235. Immediately preceding text appears at serial page (226897).

Cross References

This section cited in 25 Pa. Code § 245.308 (relating to onsite storage of contaminated soil); and 25 Pa. Code § 299.101 (relating to scope).

§ 299.132. Storage pad or liner system.

(a) A person or municipality that installs a storage pad or liner system to prevent groundwater degradation shall meet the requirements of this section. This section does not preclude a person or municipality from using other means to prevent groundwater degradation, such as enclosure in a building.

(b) The storage pad or liner system shall meet the following requirements:

(1) The storage pad or liner system shall prevent the migration of leachate through the storage pad or liner system.

(2) The effectiveness of the storage pad or liner system in preventing the migration of leachate may not be adversely affected by the physical or chemical characteristics of solid waste, solid waste constituents or leachate from the facility.

(3) The storage pad or liner system shall be designed, constructed and maintained to protect the integrity of the pad or liner during the projected life of the facility.

(4) The storage pad or liner shall be constructed of earthen or nonearthen material.

(5) The storage pad or liner system may be no less permeable than 1 × 10-7 cm/sec., as demonstrated by field and laboratory testing.

(6) Residual waste may not be stored where continuous or intermittent contact could occur between the waste and groundwater or surface water.

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(7) The operator shall install and operate a monitoring system capable of verifying whether residual waste or leachate has penetrated the pad or liner, if required by the Department.

(8) The storage pad or liner shall be inspected for uniformity, damage and imperfections during construction and installation.

(9) The storage pad or liner shall be designed to collect leachate and runoff.

Cross References

This section cited in 25 Pa. Code § 299.101 (relating to scope); 25 Pa. Code § 299.131 (relating to general requirements); and 25 Pa. Code § 299.133 (relating to leachate and runoff control).

§ 299.133. Leachate and runoff control.

(a) A person or municipality required to install and maintain a storage pad or liner system under § 299.132 (relating to storage pad or liner system) shall collect leachate and runoff from the residual waste pile and divert it into a leachate storage system.

(b) A leachate storage system shall consist of a collection tank or surface impoundment. The tank or impoundment shall be:

(1) Sized for the anticipated leachate and runoff flow, including a 30-day reserve capacity.

(2) Chemically compatible with the leachate.

(3) Of sufficient strength to withstand expected loads.

(4) Equipped with cleanouts, if necessary.

(5) Sealed to prevent the loss of leachate and runoff.

(c) Collected leachate shall be treated or disposed in a manner that complies with the act, The Clean Streams Law, and the regulations promulgated thereunder.

Cross References

This section cited in 25 Pa. Code § 299.101 (relating to scope).

IMPOUNDMENTS

§ 299.141. Scope.

(a) Sections 299.142—299.145 apply to persons or municipalities that store residual waste in surface impoundments.

(b) Sections 299.142—299.145 do not apply to the following:

(1) Storage impoundments that are used to store non-contact cooling water.

(2) Storage impoundments which are designed for the express purpose of storing stormwater runoff and which store runoff composed entirely of stormwater. Impoundments which store stormwater runoff shall comply with the applicable requirements of The Clean Streams Law (35 P. S. §§ 691.308 and

691.402), section 13 of the Stormwater Management Act (32 P. S. § 680.13), Chapter 92 (relating to National Pollutant Discharge Elimination System Permitting, Monitoring and Compliance), Chapter 102 (relating to erosion and sediment control) and Chapter 105 (relating to dam safety and waterway management).

(c) For purposes of this section, ''stormwater'' means drainage runoff from the surface of the land resulting from precipitation or snow or ice melt.

Cross References

This section cited in 25 Pa. Code § 299.101 (relating to scope).

§ 299.142. General requirements.

A person or municipality storing residual waste in a surface impoundment shall:

(1) Hold a valid permit from the Department for the storage under sections 308 and 402 and other applicable provisions of The Clean Streams Law (35 P. S. §§ 691.308 and 691.402), Chapter 91 (relating to general provisions) and other applicable regulations promulgated thereunder, and shall comply with the permit.

(2) Comply with Chapter 105 (relating to dam safety and waterway management).

Cross References

This section cited in 25 Pa. Code § 288.455 (relating to leachate collection and storage); 25 Pa. Code § 288.555 (relating to leachate collection and storage); 25 Pa. Code § 289.455 (relating to leachate collection and storage); 25 Pa. Code § 289.555 (relating to leachate collection and storage); 25 Pa. Code § 299.101 (relating to scope); and 25 Pa. Code § 299.141 (relating to scope).

§ 299.143. Application requirements.

(a) As part of the application for a permit for a residual waste storage impoundment, the applicant shall comply, at a minimum, with the application requirements of Chapter 289 (relating to residual waste disposal impoundments) that correspond to the operating requirements in § 299.144 (relating to operating requirements).

(b) These application requirements shall include, but not be limited to, § 289.152 (relating to water quality monitoring plan) and one of the following:

(1) Section 289.412 (relating to liner system and leachate control plan) if the waste to be stored meets the requirements of § 289.523(a) (relating to minimum requirements for acceptable waste).

(2) Section 289.512 (relating to liner system and leachate control plan) if the waste to be stored does not meet the requirements of § 289.523(a).

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Cross References

This section cited in 25 Pa. Code § 299.101 (relating to scope); and 25 Pa. Code § 299.141 (relating to scope).

§ 299.144. Operating requirements.

(a) A person or municipality that stores residual waste in a surface impoundment shall design, operate and maintain the impoundment in accordance, at a minimum, with the following:

(1) Section 289.202 (relating to certification).

(2) Section 289.223 (relating to access roads).

(3) Sections 289.227 and 289.228 (relating to air resources protection; and nuisance minimization and control).

(4) Section 289.255 (relating to water supply replacement).

(5) Sections 289.261—289.268 (relating to water quality monitoring).

(6) Sections 289.271(a) and 289.272—289.274 (relating to impoundments).

(7) Section 289.312 (relating to closure).

(8) Section 289.522(a)(2), (6) and (7) (relating to areas where Class II residual waste disposal impoundments are prohibited).

(9) Notwithstanding the references to ''disposal,'' § 289.423(a)(1)—(3), (5) and (6) (relating to minimum requirements for acceptable waste) or § 289.523(a)(1)—(8) and (11) (relating to minimum requirements for acceptable waste).

(10) Notwithstanding the references to ''disposal,'' if the residual waste to be stored meets the requirements of § 289.523(a), the following shall be met:

(i) Section 289.532(a)—(c) (relating to general limitations).

(ii) Section 289.533 (relating to subbase).

(iii) Section 289.534 (relating to leachate detection zone).

(iv) Section 289.535 (relating to liner).

(v) Section 289.536 (a)(1) and (b)(1), (2) and (4) (relating to protective cover), except that the protective cover material may be up to 1 inch in diameter.

(11) Notwithstanding the references to ''disposal,'' if the residual waste to be stored does not meet the requirements of § 289.523(a), the following shall be met:

(i) Section 289.432(a)—(c) (relating to general limitations).

(ii) Section 289.433 (relating to subbase).

(iii) Section 289.434 (relating to secondary liner).

(iv) Section 289.435 (relating to leachate detection zone).

(v) Section 289.436 (relating to primary liner).

(vi) Section 289.437(a)(1) and (b)(1), (2) and (4) (relating to protective cover), except that the protective cover material may be up to 1 inch in diameter.

(b) A person or municipality that stores residual waste in a surface impoundment shall remove waste from the impoundment as follows:

(1) Waste removal may not damage the impoundment.

(2) The liner shall be inspected to ensure its integrity, and necessary repairs shall be made prior to returning the impoundment to service.

(3) The person or municipality shall provide for the disposal or processing of the removed waste in accordance with this article.

(4) Waste shall be removed in accordance with the permit.

(5) If the removal frequency is greater than once per year, the removal frequency shall be stated in the permit.

(6) If the removal frequency is less than or equal to once per year, or if no removal frequency is stated in the permit, waste shall be removed from the impoundment annually.

Source

The provisions of this § 299.144 amended January 12, 2001, effective January 13, 2001, 31 Pa.B. 235. Immediately preceding text appears at serial pages (266354) and (226901).

Cross References

This section cited in 25 Pa. Code § 287.111 (relating to notice by impoundments and unpermitted processing or disposal facilities); 25 Pa. Code § 287.112 (relating to storage impoundments and storage facilities); 25 Pa. Code § 299.101 (relating to scope); 25 Pa. Code § 299.141 (relating to scope); and 25 Pa. Code § 299.143 (relating to application requirements).

§ 299.145. Failure.

(a) If a surface impoundment fails, the person or municipality storing residual waste shall immediately:

(1) Stop adding waste to the impoundment.

(2) Contain any discharge that has occurred or is occurring.

(3) Empty the impoundment in a manner approved by the Department, if leaks cannot be stopped.

(4) Notify the Department of the failure of the impoundment and the measures taken to remedy the failure.

(b) A surface impoundment that has been removed from service due to failure may not be restored to service unless the following conditions are met:

(1) The impoundment has been repaired.

(2) The repair has been certified to the Department, in writing, by a registered professional engineer.

(3) The Department has approved, in writing, the restoration of the impoundment to service.

(c) If a storage impoundment fails and the impoundment or surrounding area cannot be cleaned up in a manner that is satisfactory to the Department, the impoundment shall be closed and bonded as a residual waste disposal impoundment under Chapter 289 (relating to residual waste disposal impoundments).

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Cross References

This section cited in 25 Pa. Code § 288.455 (relating to leachate collection and storage); 25 Pa. Code § 288.555 (relating to leachate collection and storage); 25 Pa. Code § 289.455 (relating to leachate collection and storage); 25 Pa. Code § 289.555 (relating to leachate collection and storage); 25 Pa. Code § 299.101 (relating to scope); and 25 Pa. Code § 299.141 (relating to scope).

TYPES OF WASTE

§ 299.151. Storage and containment of ash residue from residual waste incineration.

Ash residue from residual waste incineration shall be stored as follows:

(1) In an enclosed container, which may include a properly tarped container, or in an enclosed area, which may include an adequately ventilated building.

(2) On a pad that is no more permeable than 1×10^{-7} cm/sec.

(3) In a manner that prevents the release, dispersal or discharge of ash residue into the air, water or onto land.

Cross References

This section cited in 25 Pa. Code § 299.101 (relating to scope).

§ 299.152. Storage and containment of friable asbestos containing waste.

(a) Friable asbestos containing waste shall be sealed in leak proof containers while wet. The containers shall meet one of the following:

(1) The containers shall be multiple plastic bags with a cumulative thickness of 12 mils or more. The containers are not required to be sealed in steel or heavy duty fiberboard drums.

(2) The containers shall be single or multiple plastic bags with a cumulative thickness of 6 mils or more, and shall be sealed in steel or heavy duty fiberboard drums.

(3) If the waste quantity or physical form does not lend itself to the storage methods in paragraphs (1) and (2), the containers shall comply with an alternate storage method approved by the Department that does not result in visible emissions.

(b) Storage containers shall be labeled with an identification and warning label under 40 CFR 61.140—61.156 (relating to National emission standard for asbestos).

Cross References

This section cited in 25 Pa. Code § 299.101 (relating to scope); and 25 Pa. Code § 299.232 (relating to transportation of friable asbestos containing waste).

§ 299.153. Storage and containment of coal ash.

(a) Except as provided in subsection (b), coal ash may not be stored at the immediate area where it will be put to beneficial use for a longer period of time than necessary to complete the project or 90 days, whichever is less, unless the Department approves a different period in writing.

(b) Bottom ash being stored for use as antiskid material may be stored in areas adjacent to roads or highways for a period of more than 90 days without Department approval if the following are met:

(1) A significant quantity of the bottom ash is used annually for antiskid material.

(2) It is stored on an impermeable floor or pad, and it is stored either in an enclosed facility or an area where runoff is collected or treated. The Department may, in writing, waive or modify this requirement if there is no runoff from the storage.

(c) Coal ash may not be stored at another area as follows:

(1) For more than 1 year unless a minimum of 75% of the volume of the ash being stored is processed for beneficial use in the previous year.

(2) For more than 90 days unless it is stored on an impermeable floor or pad and either in an enclosed facility or in an area where runoff is collected and treated. The Department may, in writing, waive or modify this requirement if there is no runoff from the storage.

(d) Coal ash shall be stored in accordance with the following limitations:

(1) Coal ash shall be stored under Chapter 102 (relating to erosion and sediment control) to prevent erosion and sedimentation.

(2) Coal ash shall be stored in a manner that prevents unpermitted discharges onto the land or into the surface or ground water of this Commonwealth. Contaminated surface water runoff shall be collected and treated, when necessary, in accordance with The Clean Streams Law and regulations promulgated thereunder.

(3) Upon cessation of coal ash storage, the person or municipality storing coal ash shall remove coal ash and materials containing coal ash, and shall provide for the processing or disposal of the waste under the act and the regulations promulgated thereunder. The person or municipality shall also regrade and revegetate the site as required by the Department.

(4) The person or municipality storing coal ash shall take necessary measures to prevent groundwater degradation

(e) Unless fly ash is stored in an enclosed facility with an impermeable floor, fly ash may not be stored as follows:

(1) Within 100 feet of an intermittent or perennial stream or in or within 100 feet of a wetland, other than an exceptional value wetland.

(2) Within 300 feet of a groundwater source.

(3) Within 1,000 feet upgradient of a surface drinking water source.

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(4) Within 25 feet of a bedrock outcrop, unless the outcrop is properly treated to minimize infiltration into fractured zones.

(5) Within 100 feet of a sinkhole or area draining into a sinkhole.

(6) In or within 300 feet of an exceptional value wetland.

Cross References

This section cited in 25 Pa. Code § 287.665 (relating to other beneficial uses of coal ash); and 25 Pa. Code § 299.101 (relating to scope).

§ 299.154. Storage of PCB containing waste material.

(a) Except as provided in subsections (b) and (c), PCB containing waste material shall be stored as follows:

(1) The storage facility shall have adequate roof and walls to prevent rain water from reaching stored PCB containing waste materials.

(2) The floor of the storage facility shall be constructed of continuous smooth and impervious materials, such as Portland cement, concrete or steel, to prevent or minimize penetration of PCBs.

(3) The floor of the facility shall have continuous curbing at least 6 inches high. The curbing shall be made of the same type of materials as are required for the floor.

(4) The storage facility may not contain drain valves, floor drains, expansion joints, sewer lines or other openings that would permit liquids to flow from the curbed area.

(5) The storage facility may not be located in the 100 year flood plain of a water of this Commonwealth.

(6) The person or municipality operating the storage facility shall maintain sufficient records to demonstrate compliance with the requirements of this subchapter.

(b) Nonliquid PCB containing waste material may be temporarily stored for up to 6 months, if the wastes are stored as follows:

(1) The waste shall be stored in a container which adequately contains the waste to prevent dispersal into the air and prevent rain water from reaching the waste.

(2) The container used to store the waste shall be labeled, indicating the date that the waste was first placed in temporary storage.

(3) The container used to store the waste may not be located in the 100-year floodplain of the waters of this Commonwealth.

(4) The person or municipality operating the temporary storage facility shall establish and maintain sufficient records to demonstrate compliance with this subchapter.

(c) The Department may, in writing, approve an alternate storage facility design for nonleaking electrical equipment. The equipment may not be stored for more than 6 months.

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Cross References

This section cited in 25 Pa. Code § 299.101 (relating to scope).

§ 299.155. Storage of whole and processed waste tires.

(a) This section and §§ 299.156—299.163 do not apply to persons or municipalities who store less than 500 waste tires in open storage or who store less then 1,500 waste tires in enclosed storage unless the open or enclosed storage threatens or causes harm to the public health, safety, welfare or the environment.

(b) The requirements of this section and §§ 299.156—299.163 may be waived or modified for small piles at the location of waste tire generators.

(c) A person or municipality may not accumulate whole and processed waste tires speculatively or store for longer than 1 year. The actual tons of waste tires removed from a facility shall be verified through weight receipts.

(d) A person or municipality storing whole and processed waste tires shall maintain operational records that provide detailed information in accordance with § 299.112 (relating to design and operation).

Source

The provisions of this § 299.155 adopted January 12, 2001, effective January 13, 2001, 31 Pa.B. 235.

Cross References

This section cited in 25 Pa. Code § 299.101 (relating to scope); and 25 Pa. Code § 299.156 (relating to notice by waste tire storage sites operators).

§ 299.156. Notice by waste tire storage sites operators.

(a) By January 13, 2001, each operator of a waste tire storage site shall file a notice on a form prepared by the Department which includes the following:

(1) A brief description of the type and number of whole waste tires and the type and weight or volume of processed waste tires being stored at the waste tire storage site.

(2) A brief description of the physical design and layout of the waste tire storage site, including a description of structures used for storing whole and processed waste tires and their locations at the storage site, a diagram of the locations and approximate sizes of any piles of whole and processed waste tires at the storage site and a description of the location of emergency equipment at the storage site.

(3) The approximate date upon which the operator began to store 500 or more waste tires in open storage or 1,500 or more waste tires in enclosed storage.

(4) Information showing how the operator will comply with § 299.155(c) (relating to storage of whole and processed waste tires).

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(5) The address of the storage site and the individual responsible for operating the storage site.

(6) Verification of landowner consent to operate a waste tire storage site.

(b) An operator of a waste tire storage site that is not subject to the requirements of this section, §§ 299.155 and 299.157—299.163 on January 13, 2001, based on § 299.155(a), shall file the notice required by subsection (a) if the waste tire storage site becomes subject to the requirements of this section, §§ 299.155 and 299.157—299.163 after that date.

(c) As of January 13, 2001, no person or municipality operating a waste tire storage site may store whole and processed waste tires at the storage site unless the person or municipality has filed with the Department a notice that is consistent with this section.

Source

The provisions of this § 299.156 adopted January 12, 2001, effective January 13, 2001, 31 Pa.B. 235.

Cross References

This section cited in 25 Pa. Code § 299.101 (relating to scope); and 25 Pa. Code § 299.155 (relating to storage of whole and processed waste tires).

§ 299.157. General limitations on storage of whole and processed waste tires.

(a) Indoor storage of whole and processed waste tires shall be consistent with ''*The Standard for the Storage of Rubber Tires*,'' National Fire Protection Association Standard 231D, (NFPA 231D), as amended.

(b) When whole and processed waste tires are stored outdoors, each whole and processed waste tire pile shall:

(1) Cover a surface area not greater than 2,500 square feet.

(2) Have a vertical height not greater than 15 feet.

(3) Maintain corridors as firebreaks on all sides of a tire pile of at least 50 feet. Corridors shall be maintained free from obstructions that could limit access in the event of an emergency.

(4) For shredded or chipped tires stored in piles, cover a surface area of no more than 2,500 square feet, and be no more than 15 feet high. Thirty-five foot wide corridors shall be maintained for firebreaks on all sides of a pile with no point in a pile being more than 25 feet from a firebreak. Corridors shall be kept free from obstructions that could limit access in the event of an emergency.

(5) For baled tires stored in stockpiles, cover a surface area of no more than 5,000 square feet, and may be no more than 15 feet high. Thirty-five foot wide corridors shall be maintained for firebreaks on all sides of a pile with no point in a pile being more than 25 feet from a firebreak. Corridors shall be kept free from obstructions that could limit access in the event of an emergency.

(6) The firebreaks shall be free of waste, equipment and structures, and vegetation shall be maintained below 6 inches in length at all times.

(7) Outdoor storage of whole and processed waste tires shall be conducted to prevent the discharge of fire-generated oils and liquids into the surface water and groundwater of this Commonwealth.

(8) Outdoor storage of whole and processed waste tires shall be conducted to control mosquito propagation during warm weather. Controls may include use of tarps, indoor storage screens or spraying.

(9) A copy of a Preparedness, Prevention and Contingency (PPC) plan, that is consistent with the Department's most recent guidelines, shall be prepared and maintained at the waste tire storage facility and be updated annually. The applicable provisions of the Department approved PPC plan shall be immediately implemented for any emergency that affects or threatens public health, safety, welfare or the environment.

(c) Storage of whole and processed waste tires which occurs at a permitted processing or disposal facility shall be covered under the permit, and is limited to the total number or amount of whole and processed waste tires which can be processed or disposed by the permitted facility during a year. The processing or disposal permit shall incorporate the requirements of this subchapter.

(d) A waste tire storage site may not be greater than 5 acres in total area.

(e) Owners or operators of waste tire storage sites may not maintain additional storage areas on contiguous property.

Source

The provisions of this § 299.157 adopted January 12, 2001, effective January 13, 2001, 31 Pa.B. 235.

Cross References

This section cited in 25 Pa. Code § 299.101 (relating to scope); 25 Pa. Code § 299.155 (relating to storage of whole and processed waste tires); and 25 Pa. Code § 299.156 (relating to notice by waste tire storage sites operators).

§ 299.158. Areas where storage of whole and processed waste tires prohibited.

A person or municipality may not store whole and processed waste tires:

(1) In the 100 year floodplain of any waters of this Commonwealth, unless the Department approves a method of protecting the facility from a 100 year flood consistent with the Flood Plain Management Act (32 P. S. §§ 679.101—679.601), the Stormwater Management Act (32 P. S. §§ 680.1—680.17) and the Dam Safety and Encroachment Act (32 P. S. §§ 693.1—693.27).

(2) In or within 300 feet of an exceptional value wetland.

(3) In or within 100 feet of a wetland other than an exceptional value wetland.

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(4) Within 300 feet measured horizontally from an occupied dwelling, unless the owner thereof has provided a written waiver consenting to the activities being closer than 300 feet.

(5) Within 100 feet of a sinkhole or area draining into a sinkhole.

(6) Within 100 feet of a perennial stream.

(7) Within 300 feet of a water source.

(8) Within 50 feet of a property line unless the owner has provided a written waiver consenting to the facility being closer than 50 feet.

Source

The provisions of this § 299.158 adopted January 12, 2001, effective January 13, 2001, 31 Pa.B. 235.

Cross References

This section cited in 25 Pa. Code § 299.101 (relating to scope); 25 Pa. Code § 299.155 (relating to storage of whole and processed waste tires); and 25 Pa. Code § 299.156 (relating to notice by waste tire storage sites operators).

§ 299.159. Access control.

(a) A gate or other barrier shall be maintained at all potential vehicular access points to block unauthorized access to the site when an attendant is not on duty.

(b) The operator shall construct and maintain a fence or other suitable barrier around the area sufficient to prevent unauthorized access.

(c) Access to the site shall be limited to those times when an attendant is on duty.

Source

The provisions of this § 299.159 adopted January 12, 2001, effective January 13, 2001, 31 Pa.B. 235.

Cross References

This section cited in 25 Pa. Code § 299.101 (relating to scope); 25 Pa. Code § 299.155 (relating to storage of whole and processed waste tires); and 25 Pa. Code § 299.156 (relating to notice by waste tire storage sites operators).

§ 299.160. Hazard prevention.

(a) Persons or municipalities storing whole and processed waste tires shall design, construct, maintain and operate the storage site to prevent and minimize the potential for fire, explosion or release of solid waste constituents to the air, water or soil of this Commonwealth or threaten public health or safety, public welfare or the environment.

(b) A person or municipality may not cause or allow the open burning of whole and processed waste tires.

(c) Each person or municipality storing whole and processed waste tires shall have available in proper working condition equipment that will control, contain

and suppress fires or other hazards. The equipment shall include the following at the storage site unless otherwise approved by the Department in writing:

(1) An internal communications or alarm system capable of providing immediate emergency instructions by voice or signal to facility personnel.

(2) A communications system capable of summoning emergency assistance from local police, fire Departments, emergency medical services, and from State and local emergency response agencies.

(3) Portable fire extinguishers and suitable fire control equipment.

(4) Available water, at sufficient volume and pressure and suitable foam agent (3%—6% mixture) and application equipment at the storage site (or an agreement with the local fire Department to provide the equipment) to temporarily contain a fire at the facility until emergency personnel arrive.

(5) Equipment sufficient in size and design to provide timely movement of tires and tire derived materials in case of an emergency.

(6) For indoor tire storage, an active fire suppression system in the building.

(d) The operator of a waste tire storage site shall immediately implement the applicable provisions of the Preparedness, Prevention and Contingency (PPC) plan if there is a fire or other event that threatens public health, safety, welfare or the environment or threatens personal injury. In addition, the operator shall immediately:

(1) Assess actual or potential hazards to public health, safety, welfare or the environment that are occurring or may occur.

(2) Ensure that fires or other hazards do not occur, reoccur or spread to other solid waste at the storage site.

(3) Telephone the Department and county emergency management agency and report the following information:

(i) The name of the person reporting the incident and telephone number where that person can be reached.

(ii) The name and address of the storage site.

(iii) The date, time and location of the fire or other event that threatens the public health, safety, welfare or the environment.

(iv) A brief description of the event being reported, the type of solid waste involved and what dangers to public health, safety, welfare or the environment exist or may occur.

(v) The nature of any injuries.

(vi) Parts of the PPC plan being implemented to alleviate the situation.

(3) After a fire or other emergency, the operator of a waste tire storage site shall:

(i) Remediate the area affected by the emergency and treat, store or dispose of recovered solid waste, contaminated soil, contaminated water or other material in a manner approved by the Department.

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(ii) Prevent disposal, processing, storage or treatment of solid waste in the area affected by the emergency until the operator has remediated the area, and the Department has inspected and approved the remediation.

Source

The provisions of this § 299.160 adopted January 12, 2001, effective January 13, 2001, 31 Pa.B. 235.

Cross References

This section cited in 25 Pa. Code § 299.101 (relating to scope); 25 Pa. Code § 299.155 (relating to storage of whole and processed waste tires); and 25 Pa. Code § 299.156 (relating to notice by waste tire storage sites operators).

§ 299.161. Soil and water protection.

(a) Surface water runoff from storage areas shall be minimized. Collection of surface water runoff shall be managed in accordance with The Clean Streams Law and the regulations thereunder.

(b) Surface water run-on to storage areas shall be minimized.

(c) Whole and processed waste tires may not be stored so as to cause adverse affects on groundwater.

(d) The Department may require a person or municipality that stores whole and processed waste tires to conduct soil or groundwater monitoring, or both.

Source

The provisions of this § 299.161 adopted January 12, 2001, effective January 13, 2001, 31 Pa.B. 235.

Cross References

This section cited in 25 Pa. Code § 299.101 (relating to scope); 25 Pa. Code § 299.155 (relating to storage of whole and processed waste tires); and 25 Pa. Code § 299.156 (relating to notice by waste tire storage sites operators).

§ 299.162. Annual report for waste tire storage sites.

(a) Each person or municipality that stores whole and processed waste tires shall submit to the Department an annual operation report on or before June 30 of each year. The report shall include:

(1) The weight and approximate number of whole and processed waste tires that were being stored at the storage site on January 1 of the preceding calendar year, and the approximate number of whole and processed waste tires that were being stored at the storage site on December 31 of the preceding calendar year.

(2) The weight and approximate number of whole and processed waste tires that were received at the storage site in the preceding calendar year, the person and location from which they were shipped and the name of the transporter.

(3) The weight and approximate number of whole and processed waste tires that were shipped from the site in the preceding calendar year, the person and location to which they were shipped and the end use for which they were shipped.

(b) The annual report shall be based on a daily operational record, which shall be maintained by the person or municipality storing waste tires for each day that waste tires are received or transported off the storage site.

(c) All numbers and weights shall be reported in Passenger Tire Equivalents (PTE), with 1 PTE equal to 20 pounds.

Source

The provisions of this § 299.162 adopted January 12, 2001, effective January 13, 2001, 31 Pa.B. 235.

Cross References

This section cited in 25 Pa. Code § 299.101 (relating to scope); 25 Pa. Code § 299.155 (relating to storage of whole and processed waste tires); and § 299.156 (relating to notice by waste tire storage sites operators).

§ 299.163. Cessation of operations.

Upon cessation of whole and processed waste tire storage activities, the operator shall immediately remove all whole and processed waste tires from the storage site, and provide for the processing or disposal of the waste in accordance with the act, the environmental protection acts and this title.

Source

The provisions of this § 299.163 adopted January 12, 2001, effective January 13, 2001, 31 Pa.B. 235.

Cross References

This section cited in 25 Pa. Code § 299.101 (relating to scope); 25 Pa. Code § 299.155 (relating to storage of whole and processed waste tires); and § 299.156 (relating to notice by waste tire storage sites operators).

Subchapter B. STANDARDS FOR COLLECTING AND TRANSPORTING OF RESIDUAL WASTE

SCOPE

Sec.
299.201. Scope.

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GENERAL PROVISIONS

299.211. General requirements.
299.212. Transportation.
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299.214. Transportation equipment cleaning areas.
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299.219. Recordkeeping and reporting.
299.220. Signs on vehicles.
299.221. Transporting foodstuffs and feedstuffs in vehicles used to transport waste.

TYPES OF WASTE

299.231. Transportation of ash residue from residual waste incineration.
299.232. Transportation of friable asbestos-containing waste.

SCOPE

§ 299.201. Scope.

(a) A person or municipality that transports residual waste that is not mixed with waste that is regulated under Article VIII (relating to municipal waste) shall comply with §§ 299.211—299.221 (relating to general provisions). In addition, a person or municipality that transports waste referred to in §§ 299.231 and 299.232 (relating to types of waste) shall transport the waste in accordance with the applicable provisions of these sections, and may not mix the waste with other types of waste.

(b) A person or municipality that transports residual waste that is mixed with waste that is regulated under Article VIII shall comply with §§ 285.211—285.219 (relating to general provisions).

Source

The provisions of this § 299.201 amended January 12, 2001, effective January 13, 2001, 31 Pa.B. 235. Immediately preceding text appears at serial page (255127).

GENERAL PROVISIONS

§ 299.211. General requirements.

(a) Residual waste shall be completely enclosed or covered during transportation, including parking, unless the waste cannot be dispersed.

(b) A person or municipality that transports residual waste may not mix the waste with:

(1) Hazardous waste that is regulated under Article VII (relating to hazardous waste management).

(2) Other solid waste to create a risk of fire or explosion, or a risk of the accumulation of poisonous or otherwise harmful vapors or gases.

Cross References

This section cited in 25 Pa. Code § 299.201 (relating to scope).

§ 299.212. Transportation.

(a) A person or municipality that is responsible for transporting residual waste from the point of generation shall remove the waste with sufficient frequency to prevent a nuisance or hazard to public health, safety or welfare.

(b) A person or municipality that generates residual waste that is processed or disposed offsite shall schedule removal of the waste with sufficient frequency to prevent a nuisance.

(c) A person or municipality may not park a residual waste transportation vehicle in a manner that causes a nuisance or a hazard to public health, safety and welfare.

(d) A person or municipality may not store putrescible residual waste in transportation vehicles for more than 24 hours. A person or municipality may not store nonputrescible residual waste in transportation vehicles for more than 5 days.

Cross References

This section cited in 25 Pa. Code § 299.201 (relating to scope).

§ 299.213. Transportation equipment.

(a) Equipment used to transport residual waste shall comply with the following, unless otherwise approved by the Department in writing:

(1) Transportation equipment shall be:

(i) Cleaned as frequently as necessary to prevent odors, vectors and other nuisances.

(ii) Constructed to prevent littering and the ingress or egress of vectors.

(iii) Equipped with fire extinguishing equipment.

(2) Load compartments in transportation equipment shall be:

(i) Constructed to be easily cleaned.

(ii) Constructed in a manner that provides easy access for the application of odor masking agents and for the performance of required maintenance.

(iii) Provided with drain plugs or valves at their lowest points.

(iv) Fireproof, if the waste is combustible.

(b) Roll-off containers shall be:

(1) Constructed to be easily cleaned.

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(2) Cleaned as frequently as necessary to prevent odors, vectors and other nuisances.

(3) Constructed to prevent littering and the ingress or egress of vectors.

(4) Fireproof, if the waste is combustible.

(c) Equipment used to transport residual waste shall be routinely tested, inspected and maintained by the operator to ensure that there is no release or leakage of waste during transportation.

Cross References

This section cited in 25 Pa. Code § 299.201 (relating to scope).

§ 299.214. Transportation equipment cleaning areas.

Transportation equipment cleaning areas shall meet the following requirements:

(1) Drainage from equipment cleaning areas shall be managed to prevent water pollution.

(2) Drainage shall be discharged to a sanitary sewer system or other treatment facility.

(3) The surface of the equipment cleaning area shall be constructed of impervious material that can be easily cleaned and is well drained.

(4) Windborne drift of steam or atomized water shall be controlled.

Cross References

This section cited in 25 Pa. Code § 299.201 (relating to scope).

§ 299.215. Transportation to permitted facilities.

(a) Residual waste shall be transported to prevent a nuisance or hazard to public health, safety or welfare.

(b) A person or municipality may not transport residual waste to solid waste processing or disposal facility in this Commonwealth unless the facility has a permit or written approval from the Department that expressly allows processing or disposal of the particular residual waste being transported.

(c) A person or municipality may not transport residual waste in a manner that is contrary to the terms and conditions of a permit, an order issued by the Department, or requirements in the act, the environmental protection acts or this title.

Cross References

This section cited in 25 Pa. Code § 299.201 (relating to scope).

§ 299.216. Accident prevention and contingency planning.

(a) A person or municipality that transports residual waste shall have safety equipment available in the vehicle for use during discharges, fires and other emergencies. The equipment shall include protective clothing and equipment and first-aid supplies.

(b) Personnel operating transportation equipment shall be capable of operating the equipment in compliance with the act and this article and applicable public safety laws.

(c) Vehicles for the transportation of liquid residual waste shall be equipped with absorbent mats and material to absorb liquids that might leak from a damaged container during transportation.

(d) A person or municipality that transports residual waste shall have a contingency plan to minimize and abate a discharge of residual waste during transportation. A copy of the plan shall be kept in the cab of each transportation vehicle.

Cross References

This section cited in 25 Pa. Code § 299.201 (relating to scope).

§ 299.217. Emergencies.

In the event of a discharge or release of residual waste during transportation, the transporter shall immediately:

(1) Telephone the Department and report the following information:

(i) The name of the person reporting the incident and telephone number where that person can be reached.

(ii) The name, address and telephone number of the transporter.

(iii) The date, time and location of the incident.

(iv) The mode of transportation and the type of vehicle.

(v) A brief description of the nature of the incident, and what dangers to public health and safety, public welfare and the environment exist or may occur.

(vi) The nature of any injuries.

(vii) For each waste involved in the incident:

(A) The name and address of the generator of the waste.

(B) The estimated weight or volume of waste discharged or released.

(2) Notify the State or local police and the county emergency management official of the incident and the nature of the discharge or release.

(3) Clean up the residual waste and take other action as may be required or approved by the Department so that the discharge presents no threat to public health, safety, welfare and the environment.

Cross References

This section cited in 25 Pa. Code § 299.201 (relating to scope).

§ 299.218. Wastes from accidents and spills.

(a) A person or municipality that generates or releases residual waste as a result of an accident, spill or emergency shall notify the Department prior to the

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disposal or processing of the waste. Processing or disposal shall be under § 287.103 (relating to emergency disposal or processing).

(b) The Department may immediately approve emergency storage or transportation methods necessary to prevent or mitigate harm to the public health, safety or the environment. Storage may be at the site of the emergency, at a permitted processing or disposal facility under § 299.117 (relating to emergency storage) or at a site approved by the Department.

(c) After a release or other emergency, the transporter shall decontaminate equipment used to handle residual waste, including storage containers, processing equipment, trucks and loaders, before returning the equipment to service. Contaminated wash water, waste solutions and residues generated from washing or decontaminating equipment are deemed to be a residual waste, and shall be collected and disposed or processed in compliance with applicable laws and regulations.

(d) Compliance with this section does not relieve a person from criminal or civil liability, under the act, the environmental protection acts or this title.

Cross References

This section cited in 25 Pa. Code § 299.201 (relating to scope).

§ 299.219. Recordkeeping and reporting.

(a) A person or municipality that transports residual waste shall make and maintain an operational record for each day that residual waste is collected or transported, or both. The daily operational record shall be kept in the cab of each transportation vehicle on the date of collection or transportation. The record shall include the following:

(1) The types or classifications of residual waste transported.

(2) The weight or volume of the types of wastes transported.

(3) The name, mailing address, telephone number, county and state of each generator of transported waste.

(4) The name and location of a transfer facility that has received, or will receive, the waste.

(5) The name and location of the solid waste processing or disposal facility where the waste will be ultimately disposed or processed.

(6) A description of handling problems or emergency disposal activities.

(7) The name and address of he person or municipality collecting or transporting the waste.

(8) The license plate number of the trailer transporting the waste.

(b) The records required in subsection (a) shall be made available to the Department upon request and shall be retained for at least 5 years.

Authority

The provisions of this § 299.219 issued under the Solid Waste Management Act (35 P. S. §§ 6018.101—6018.1003); the Pennsylvania Used Oil Recycling Act (58 P. S. §§ 471—480); The Clean Streams Law (35 P. S. §§ 691.1—691.1001); sections 1905-A, 1917-A and 1920-A of The Administrative Code of 1929 (71 P. S. §§ 510-5, 510-17 and 510-20); and the Municipal Waste Planning, Recycling and Waste Reduction Act (53 P. S. §§ 4000.101—4000.1904); amended under sections 5(b) and 402 of The Clean Streams Law (35 P. S. §§ 691.5(b) and 691.402); section 302 of the Municipal Waste Planning, Recycling and Waste Reduction Act (53 P. S. § 4000.302); section 408(e) of the Pennsylvania Used Oil Recycling Act (58 P. S. § 408(e)); sections 1905-A, 1917-A and 1920-A of The Administrative Code of 1929 (71 P. S. §§ 510-5, 510-17 and 510-20); section 105(4) of the Waste Tire Recycling Act (35 P. S. § 6029.105(4)); sections 301 and 302 of the Radiation Protection Act (35 P. S. §§ 7110.301 and 7110.302); the Infectious and Chemotherapeutic Waste Law (35 P. S. §§ 6019.1—6019.6); and the Vehicle Code, 75 Pa.C.S. § 4909(e).

Source

The provisions of this § 299.219 amended November 28, 1997, effective November 29, 1997, 27 Pa.B. 6190; amended January 12, 2001, effective January 13, 2001, 31 Pa.B. 235. Immediately preceding text appears at serial pages (239049) to (239050).

Cross References

This section cited in 25 Pa. Code § 299.201 (relating to scope).

§ 299.220. Signs on vehicles.

A vehicle or conveyance that is ordinarily or primarily used for the transportation of solid waste shall bear a sign that meets the following:

(1) The sign shall include the name and business address of the person or municipality that owns the vehicle or conveyance.

(i) The name shall be the actually and commonly recognized name of the person or municipality. Abbreviations or acronyms are permissible if they do not obscure the meaning.

(ii) The address shall include the city, state and five digit zip code for the principal place of business for the person or municipality.

(2) The sign shall include the specific type of solid waste transported by the vehicle or conveyance.

(i) Infectious or chemotherapeutic waste shall be designated: Infectious/Chemotherapeutic waste.

(ii) Other municipal waste shall be designated: Municipal Waste.

(iii) Residual waste shall be designated: Residual Waste.

(iv) Mixed municipal and residual waste shall be designated: Municipal/Residual Waste.

(3) The sign shall have lettering that is 6 inches in height. The lettering shall be placed on the roll-off box or trailer. If available space for lettering on the trailer or roll-off box is so limited that all letters cannot be 6 inches in height, the lettering shall be as close to 6 inches as possible. The required information shall be clearly visible and easily readable.

(4) The sign may be permanent or detachable.

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Source

The provisions of this § 299.220 adopted January 12, 2001, effective January 13, 2001, 31 Pa.B. 235.

Cross References

This section cited in 25 Pa. Code § 299.201 (relating to scope).

§ 299.221. Transporting foodstuffs and feedstuffs in vehicles used to transport waste.

(a) A person or municipality may not transport, or knowingly provide a vehicle for the transportation of, a food product or produce intended for human or livestock consumption, in a vehicle which has been used to transport municipal, residual or hazardous waste, or, chemical or liquid, in bulk, which is not a food product or produce.

(b) A person or municipality may not knowingly accept a food product or produce from, or provide a food product or produce to, a vehicle used to transport municipal, residual or hazardous waste, or, chemical or liquid, in bulk, which is not a food product or produce.

(c) As used in this section, the following words and phrases have the following meanings:

(1) *Food product or produce*—A raw, cooked or processed edible substance, beverage or ingredient used or intended for use or for sale, in whole or in part, for human consumption.

(2) *In bulk*—Not divided into parts or packaged in separate units.

(3) *Chemical or liquid*—The term includes any chemical or liquid, including any pesticide or herbicide regardless of its use or intended use. The term does not include the following:

(i) A chemical or liquid food product or produce.

(ii) A chemical or liquid being transported for use directly in the production and preparation for market of poultry, livestock and their products or in the production, harvesting or preparation for market of agricultural, agronomic, horticultural, silvicultural or aquacultural crops and commodities.

(iii) A chemical or liquid being transported for use as an ingredient in a product used in the production and preparation for market of poultry, livestock and their products or in the production, harvesting or preparation for market of agricultural, agronomic, horticultural, silvicultural or aquacultural crops and commodities.

Source

The provisions of this § 299.221 adopted January 12, 2001, effective January 13, 2001, 31 Pa.B. 235.

TYPES OF WASTE

§ 299.231. Transportation of ash residue from residual waste incineration.

Ash residue from residual waste incineration shall be transported in an enclosed or covered vehicle that prevents the dispersal of ash residue.

Cross References

This section cited in 25 Pa. Code § 299.201 (relating to scope).

§ 299.232. Transportation of friable asbestos-containing waste.

(a) Friable asbestos-containing waste shall be transported in a vehicle without compaction and in a manner that will not create visible emissions to the outside air.

(b) If it is not feasible to enclose the waste in one or more plastic bags or drums as provided in § 299.152(a)(1) or (2) (relating to storage and containment of friable asbestos-containing waste), the transportation vehicle shall be covered with a tarp and the waste shall be wetted prior to transportation.

Cross References

This section cited in 25 Pa. Code § 299.201 (relating to scope).

[Next page is 301-1.]

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COMMONWEALTH OF PENNSYLVANIA
Department of Environmental Protection

Guidelines for the Development and Implementation of Environmental Emergency Response Plans

400-2200-001

PA Department of Environmental Protection
PO Box 2063
Harrisburg, PA 17105-2063

COMMONWEALTH OF PENNSYLVANIA
DEPARTMENT OF ENVIRONMENTAL PROTECTION

DOCUMENT ID:	400-2200-001
TITLE:	Guidelines for the Development and Implementation of Environmental Emergency Response Plans
EFFECTIVE DATE:	April 2001 Minor changes were made throughout the document on September 7, 2004 Minor changes were made throughout the document on August 6, 2005
AUTHORITY	The Federal Clean Water Act, the Pennsylvania Clean Streams Law (35 P.S. §§691.1-691.1001), the Pennsylvania Solid Waste Management Act, the Pennsylvania Storage Tank Act, the Oil Pollution Act and regulations promulgated thereunder.
POLICY:	To plan and provide effective and efficient response to emergencies and accidents for any situation dealing with the public health, safety and the environment.
PURPOSE:	To improve and preserve the purity of the Waters of the Commonwealth by prompt adequate response to all emergencies and accidental spills of polluting substances for the protection of public health, animal and aquatic life and for recreation.
BACKGROUND:	This document is being revised to add regulatory references in Table 1 and Procedures, Item A. Revisions were made to Procedures, Items A, C, D and F. Some telephone contact names, telephone contact numbers and bureau names have been updated in Appendices IV and V. Bureau and division names have been changed on the cover page of the Addendum.
APPLICABILITY:	This document provides a one stop requirement to comply with the state and federal laws and regulations dealing with emergency planning and response and pollution prevention and contingency planning requirements (plans such as PIP, SPCC, SWPPP, etc.) for all activities to be carried out in the Commonwealth.
DISCLAIMER:	The policies and procedures outlined in this guidance are intended to supplement existing requirements. Nothing in the policies or procedures shall affect regulatory requirements. The policies and procedures herein are not an adjudication or a regulation. There is no intent on the part of DEP to give the rules in these policies that weight or deference. This document establishes the framework within which DEP will exercise its administrative discretion in the future. DEP reserves the discretion to deviate from this policy statement if circumstances warrant.
PAGE LENGTH:	48 Pages
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COMMONWEALTH OF PENNSYLVANIA
DEPARTMENT OF ENVIRONMENTAL PROTECTION

Guidelines for the Development and Implementation of
Environmental Emergency Response Plans

This document (400-2200-001) provides a one stop requirement to comply with the state and federal laws and regulations dealing with emergency planning and response and pollution prevention and contingency planning requirements (i.e., PIP, SPCC, SWPPP, etc) for all activities to be carried out in the Commonwealth.

The use of the document and compliance with it are required as part of applying for any permit or requesting approval of any action that has a potential to cause pollution of the Commonwealth's air, water and land resources. The manual is also available to download from the DEP website at: www.dep.state.pa.us.

The document may be revised from time to time or as the need arises due to changes in state/federal laws and regulations. If you have suggestions for improvement to this document or desire that future revisions be sent to you, please provide the following information to the Department.

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Guidelines for the Development and Implementation of Environmental Emergency Response Plans

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Guidelines for the Development and Implementation of Environmental Emergency Response Plans

INTRODUCTION

A wide variety of industrial activities, both manufacturing and commercial, exist in Pennsylvania. Many of these activities have the potential for causing environmental degradation or endangerment of public health and safety through accidental releases of toxic, hazardous, or other pollutional materials.

In recognition of this fact, several State and Federal regulatory programs have been developed to encourage the use of preventive approaches to deal with unwarranted releases of toxic, hazardous, or other pollutants to the environment.

Table 1 lists these programs and defines the statutory and regulatory basis for each. A more detailed summary of each program is shown in Table 2 which illustrates the similarities among them. A review of the regulations and guidelines pertaining to each program more clearly illustrates these similarities. The main differences between the programs are the types of industrial activities and the nature of the polluting materials addressed.

The Department's objective is to consolidate the similarities of the State and Federal pollution incident prevention and emergency response programs into one overall program. Industrial and commercial installations which have the potential for causing accidental pollution of air, land or water, or the endangerment of public health and safety are required to develop and implement **Preparedness, Prevention and Contingency (PPC) Plans** which encompass the other Departmental program requirements.

A PPC Plan is required for any NPDES Application for Storm Water Discharge General Permits or Water Management Permits. A special addendum has been added to the document for NPDES Stormwater discharge applicants.

In the case of regulated storage tank facilities, with an aggregate aboveground storage capacity > 21,000 gallons, a **Spill Prevention Response (SPR)** plan is required. This SPR plan, in **addition to the contents** of a PPC plan, requires a specific downstream notification requirement. Those storage tank facilities that already have a PPC plan need only update the PPC plan and include the downstream notification requirement.

The Department strongly recommends that regulated facilities consolidate all required plans into one single document. For those facilities required to develop plans under SARA Title III, the Department will support deviation from the format suggested in this guidance document to ensure consistency with the SARA Title III plans provided that all required information is included in the one plan.

TABLE 1
STATE AND FEDERAL POLLUTION INCIDENT
PREVENTION AND EMERGENCY RESPONSE PROGRAMS

Plan	Implemented By	State and Federal Laws Which Apply	State and Implementing Regulations	Effective Date of Regulations
Spill Prevention Control and Countermeasure (SPCC)	U.S. EPA*	Federal Clean Water Act	40 CFR 112	1973
Preparedness, Prevention, and Contingency (PPC), or Contingency Planning	Pa. DEP as part of the Hazardous Waste Program	Pa. Solid Waste Management Act	25 Pa. Code Ch. 262a, 264a, 265a, 266a	5/01/99
	Pa. DEP as part of the Residual Waste Program	Pa. Solid Waste Management Act	25 Pa. Code Ch. 287, 288, 289, 293, 295 and 297	7/4/92
	Pa. DEP as part of the Municipal Waste Program	Pa. Solid Waste Management Act	25 Pa. Code Ch. 273, 277, 279, 281, 283 and 284	4/9/88
	Pa. DEP as part of the Oil and Gas Program[1]	Pa. Clean Streams Law, Pa Solid Waste Management Act	25 Pa. Code Ch. 91.34, 25 Pa. Code Ch. 78	1971
	Pa. DEP as part of the Water Quality Program.	PA Clean Streams Law	25 PA Code Chapter 91.34	1971
	Pa. DEP and US EPA as part of the NPDES Program	Federal Clean Water Act.	40 CFR 125 Subpart K	5/19/80
Spill Prevention Response (SPR) Plan	Pa. DEP as part of the Storage Tank Program	Pa. Storage Tank and Spill Prevention Act	Act 32-1989	8/89
Facility Response Plan (FRP)	US EPA* US Coast Guard	Oil Pollution Act	40 CFR 112	1990

(1) Complete information on PPC Plans required under the Oil and Gas Program can be found in the ***Oil & Gas Operators Manual*** available from the Bureau of Oil and Gas Management.

* Additional information is available from US EPA Region III, Philadelphia, PA, (215) 814-3292.

TABLE 2
COMPARISON OF STATE AND FEDERAL POLLUTION INCIDENT PREVENTION AND EMERGENCY RESPONSE PROGRAMS

Aspect	Preparedness, Prevention, and Contingency (PPC) (Water)	Preparedness, Prevention, and Contingency (PPC) (Waste)	Spill Prevention Response (SPR) Plan	Spill Prevention Control, and Countermeasures (SPCC)
Purpose	Prevention/Control of accidental discharge of polluting materials to surface waste or groundwater	To minimize and abate hazards to human health and the environment from fires, explosions, or release of solid wastes to air, soil, or surface water	Prevention/Control of accidental discharge of regulated substances and downstream notification requirements	Prevention of accidental discharges of oils and hazardous substances into the waters of the United States
Types of Industrial Activities Affected	All industrial activities having potential for accidental pollution	Activities which generate, store, recycle, treat, transport, or dispose of solid wastes, activities associated with drilling and operating oil and gas wells	Activities pertaining to above ground storage facilities with >21,000 gallons of regulated substances	Non-transportation related activities with potential for discharge of oil and hazardous substances
Activities Covered?	Transportation, storage, processing of raw materials, intermediates, products, fuels, wastes	Generation, storage, transport, recycle, treatment, disposal of hazardous wastes; processing and disposal of residual or municipal wastes; road spreading operations, brine disposal	Storage and handling of regulated substances	Production, storage, processing, refining, handling, transferring, distributing
What Pollution Materials are Addressed?	All polluting materials	Any hazardous, residual, municipal, or medical wastes	Hazardous Substances and Petroleum	Oil and hazardous substances defined pursuant to Sec. 311 of the Clean Water Act

TABLE 2 (Cont.)
COMPARISON OF STATE AND FEDERAL POLLUTION INCIDENT PREVENTION AND EMERGENCY RESPONSE PROGRAMS

Aspect	Preparedness, Prevention, and Contingency (PPC) (Water)	Preparedness, Prevention, and Contingency (PPC) (Waste)	Spill Prevention Response (SPR) Plan	Spill Prevention Control, and Countermeasures (SPCC)
Hazards Addressed	Container leaks, ruptures, spills, floods, power failures, mechanical failure, human error, strikes, vandalism	Same plus fires and explosions	Same	Same
Plan Includes	Study of past incidents, training, preventive maintenance, housekeeping, security, backup equipment, internal, external communicator, spill containment, drainage controls, inspections	Same plus additional local notification, emergency coordination, and evacuation requirements	Same, plus downstream notification requirement	Same
Amendments to Plan Required for Significant Facility or Operational Changes?	Yes	Yes	Yes	Yes
Emergency Incident Report Required?	Yes	Yes	Yes	Yes
Annual Notifica-tion/Updated	No	No	Yes	No

I. PROCEDURES FOR DEVELOPMENT AND REVIEW OF ENVIRONMENTAL EMERGENCY RESPONSE PLANS

A. Who Must Develop These Plans?

PPC

In general, any manufacturing or commercial installation which has the potential for causing accidental pollution of air, land, or water or for causing endangerment of public health and safety through accidental release of toxic, hazardous, or other polluting materials must develop, maintain, and implement a PPC Plan.*

Manufacturing or commercial waste water dischargers, which are required to obtain NPDES permits, must develop PPC plans in order to satisfy the requirements of Chapter 101 of the Department's Rules and Regulations. In addition to NPDES discharges there are a variety of other non-NPDES manufacturing or commercial installations which may be directed by the Department to develop PPC plans on a case-by-case basis.

Manufacturing or commercial installations which generate hazardous waste, or which involve treatment, recycling, storage, or disposal of hazardous waste must develop PPC plans in conformance with Chapter 262a, 264a, and 265a of the Department's regulations. Generators, of between 100 and 1,000 kilograms of hazardous waste per month, may not be required to have a PPC plan if they comply with the Preparedness and Prevention requirements in the regulations. (Note: hazardous waste transporters must also develop PPC plans under Chapter 263a. A separate PPC guidance document has been developed for transporters.)

A person who owns or operates a residual waste disposal or processing facility must develop a PPC plan under Chapters 287, 288, 289, 293, 295, and 297 of the residual waste regulations.

A person who owns or operates a municipal waste disposal or processing facility must develop a PPC plan under Chapters 273, 277, 279, 281, 283, and 284 of the municipal waste regulations.

In regards to the Oil and Gas Program, PPC Plans are required under the Clean Streams Law for approval of road spreading operations, drilling and operating oil and gas wells, and brine disposal wells. These plans are required under 25 Pa. Code Chapters 91.34 and 78.55. In addition, PPC Plans are required for NPDES and Part II Water Quality Management Permits. The Plan requirements are contained in the Oil and Gas Operators Manual

SPR

Facility owners with aboveground storage tank aggregate capacity > 21,000 gallons of a regulated substance.

*Note: PPC plans developed by hazardous waste generators and/or treatment, recycling, storage or disposal facilities, which would not otherwise be required to obtain NPDES or Water Quality Protection Part II permits, generally need only to address the PPC planning requirements as they pertain to their hazardous waste activity (unless otherwise directed by the Department).

B. How Do Existing Emergency Response Plans Fit in With Newer Program Requirements?

It should be noted that oil-related Spill Prevention, Control, and Countermeasure (SPCC) plans, which are or have been developed pursuant to EPA's oil-related SPCC regulations, should also be considered as part of an installation's overall PPC plan. Some installations may elect to integrate their oil-related SPCC plan with the PPC or SPR plan elements, or may elect to keep it as a separate chapter, or appendix, to the PPC or SPR plan.

Likewise, the additional downstream notification requirement of an SPR plan can be added to an existing plan to satisfy the "Storage Tank and Spill Prevention Act," providing all required elements of a SPR plan are completed for the existing plan.

Other types of existing emergency response plans should be handled in a similar manner.

C. Development and Submission of Plans for Review and Approval.

The plan must be developed in accordance with good engineering practice by someone who is familiar with the day-to-day operations at the site. If an outside consultant is employed for this purpose, he must be authorized to conduct a thorough study of the material storage, handling, usage, disposal, and waste management practices conducted at the installation.

Section II outlines the general content and format of PPC and SPR plans.

In general, plans should be submitted for review and approval by the Department in conjunction with applications for NPDES Water Quality Management, Storage Tank, Residual Waste Management, Municipal Water Management, or Hazardous Waste Management permits, as follows:

1. NPDES dischargers should submit (2) copies of the PPC plan for review, along with the NPDES application materials. All Stormwater General Permit applicants must complete and implement the Plans before or at the same time as application submission.

   Facilities which are not required to obtain NPDES permits, but which must obtain Water Quality Protection Part II permits, should submit (2) copies of the PPC plan for review, along with the Part II permit application.

2. Residual waste disposal/processing/transfer/composting facilities are required to develop and submit a PPC Plan as part of the residual waste permit application. Facilities permitted under permit-by-rule are required to develop PPC Plans and maintain them on site.

3. Municipal waste disposal/processing, transfer/composting facilities are required to develop and submit a PPC plan as part of the municipal waste permit application. Facilities permitted under permit-by-rule are required to develop PPC plans and maintain them on site.

   Other facilities which are not normally required to obtain NPDES or WQM Part II permits may also be required to develop and submit a PPC Plan, should conditions warrant, pursuant to Chapter 92 of the Department's regulations.

4. Hazardous waste generators are required to develop PPC plans and to maintain them on site. They are required to submit PPC plans to the Department for review upon request by the Department.

5. Hazardous waste treatment, recycling, storage, or disposal facilities should submit one copy of the PPC plan for each copy of the Hazardous Waste Part B permit application being submitted. In these situations the PPC plan is considered as part of the overall Hazardous Waste Part B permit application. Final PPC plan approval will accompany the issuance of a Hazardous Waste Management permit.

6. Aboveground storage tank facilities (with aggregate capacity >21,000 gallons) are required to submit one copy of the SPR plan to the appropriate regional DEP office for review. This plan must be developed in consultation with county and municipal emergency management agencies. Facilities that already have a PPC plan can update the PPC plan with the downstream notification requirement to satisfy this obligation.

7. Oil and gas well operators must prepare and implement a plan describing the measures to prevent pollution of the surface water and groundwater and for the control and disposal of pollutional substances and waste. A copy of the plan must be provided to the Department upon request.

D. Distribution of the Plan

A copy of the plan and any subsequent revisions must be maintained on-site. All members of the installation's organization for developing, implementing, and maintaining the plan and all emergency coordinators must review the plan and be thoroughly familiar with provisions.

In addition to the site copy and the copy submitted to the Department, other facility plans should be made available to the following agencies, to the extent which they may become involved in an actual emergency (see Description of PPC Plan Elements, Part E.1.):

Submission of copies to all of these entities is a legal requirement for hazardous waste facilities. Bulk aboveground storage tank facilities are required to submit copies to emergency management agencies, as noted below.

1. County and local Emergency Management Agencies. (This is a legal requirement for storage tank facilities with >21,000 gallons of above ground storage.)

2. Local Fire Service Agencies and/or Hazmat Team

3. Local Emergency Medical Service Agencies

4. Local Police

E. Implementation of the Plan

The provisions of the plan must be carried out whenever emergency situations arise which endanger public health and safety, or the environment.

F. Revisions of the Plan

The PPC Plan must be periodically reviewed and updated, if necessary. At minimum, this must occur when:

1. Applicable Department regulations are revised;

2. The plan fails in an emergency;
3. The installation changes in its design, construction, operation, maintenance, or other circumstances, in a manner that materially increases the potential for fires, explosions or releases of toxic or hazardous constituents; or which changes the response necessary in an emergency;
4. The list of emergency coordinators changes;
5. The list of emergency equipment changes; or
6. As otherwise required by the Department.

In addition to the above, the SPR or PPC plans must also be revised upon the removal or addition of a storage tank(s).

II. PLAN CONTENT AND FORMAT

General Instructions

A. Table 3 outlines the basic elements of a PPC and SPR Plan. Each of these elements is further described in this guidance document. Certain plan elements may not be entirely applicable or appropriate for a specific manufacturing or commercial installation. In these cases the person preparing the plan should act accordingly and should provide a brief explanation as to why the plan element(s) in question is not applicable or appropriate.

B. The most important thing to remember in developing your plan is that the actual effectiveness of the plan will depend upon its simplicity and readability.

Plans which are composed of several volumes of overly detailed narrative discussions and specifications tend to discourage the reader or user. Diagrams, charts, tables, maps, and plans must be easily readable and understandable, particularly in times of an actual emergency.

The plan should additionally be indexed or tabbed in such a way that the key portions which pertain to emergency response can be quickly referred to.

TABLE 3

ELEMENTS AND FORMAT OF A PPC AND SPR PLAN

A. Description of Facility

1. Description of the Industrial or Commercial Activity
2. Description of Existing Emergency Response Plans
3. Material and Waste Inventory
4. Pollution Incident History
5. Implementation Schedule for Plan Elements Not Currently in Place

B. Description of How Plan is Implemented by Organization

1. Organizational Structure of Facility for Implementation
2. List of Emergency Coordinators
3. Duties and Responsibilities of the Coordinator
4. Chain of Command

C. Spill Leak Prevention and Response

1. Pre release Planning
2. Material Compatibility
3. Inspection and Monitoring Program
4. Preventive Maintenance
5. Housekeeping Program
6. Security
7. External Factor Planning
8. Employe Training Program

D. Countermeasures

1. Countermeasures to be Undertaken by Facility
2. Countermeasures to be Undertaken by Contractors
3. Internal and External Communications and Alarm Systems
4. Evacuation Plan for Installation Personnel
5. Emergency Equipment Available for Response

E. Emergency Spill Control Network

1. Arrangements with Local Emergency Response Agencies
2. Notification Lists
3. Downstream Notification Requirement for Storage Tanks

DESCRIPTION OF PLAN ELEMENTS

A. Description of Facility

1. Description of the Industrial or Commercial Activity

- Briefly describe the nature of the industrial or commercial activity which occurs at the site. Include a general discussion of products manufactured, manufacturing processes used, wastes generated, etc.
- On a copy of a 7 1/2 minute USES map show the following:
  - Facility location
  - Facility name
  - Facility ID #
  - Name of 7 1/2 minute USES quadrangle
  - County
  - Location of facility site and site boundaries
  - Location of each storage tank
  - Location of surface drainage courses leading away from the site, and major surface streams and tributaries near the site
  - Location of any known public and private surface water intakes downstream from the site
- Include a drawing which shows the following:
  - General layout of the site
  - Property boundaries
  - Areas occupied by manufacturing or commercial activities
  - Raw materials and product storage
  - Loading and unloading operations
  - High risk areas where spills and leaks most likely would occur
  - Waste handling, storage, and treatment facilities
  - Drains, pipes, and channels which lead away from potential leak or spill areas
  - Outfall pipes which discharge to surface streams or drainage channels
  - Secure and open-access areas
  - Entrance and exit routes to the site

2. Description of Existing Emergency Response Plans

- Briefly describe any existing plan, which has been previously developed by the installation, for the purpose of pollution incident prevention or emergency response preparedness. If the plan has previously been

approved by the Department, this should also be noted, along with the date of approval.

- Provide a brief discussion as to how the existing plan relates to the overall PPC or SPR Plan being developed. The degree to which the existing plan encompasses some, or all, of the PPC/SPR Plan elements should also be noted. When the PPC has been developed and an SPR plan is needed, the downstream notification requirement information can be added as an addendum.

  Similar plans which have been prepared for agencies other than DEP should also be described and cross-referenced to the maximum extent possible to the PPC Plan elements so as to minimize rewriting. For example, an oil related Spill Prevention Control and Countermeasure (SPCC) Plan which has been developed to comply with EPA's regulations 40 CFR 112, may be treated as an appendix, or as a separate chapter, to the overall PPC/SPR Plan for an installation.

3. Material and Waste Inventory

- Identify and list by common chemical name and trade name, the locations, sources and quantities of raw chemical materials, commercial chemical products, manufacturing chemical intermediates, and process wastes managed at the installation which have the potential for causing environmental degradation or endangerment of public health and safety through accidental releases. Requests for confidentiality of this information will be handled in accordance with Department regulations.

  Detailed descriptions must be available for materials that have a high potential for spills, discharges, explosions, or fires (such as those stored in bulk storage). Materials that have a low potential for spills, discharges, explosions, or fires (such as those used and stored in small quantities in a laboratory) should be minimally detailed.

  This information should be used to evaluate the prevention, containment, mitigation, cleanup, and disposal measures which would be used in the event of a spill, discharge, explosion, or fire. As new materials are added to the list, their pollution potential should be evaluated.

- Attach to this plan the Material Safety Data Sheet (MSDS) for each material in storage (the MSDS must be completed to the extent it meets the requirements of 29 CFR 1910.1200(9) Hazardous Communications Standard Requirements).

4. Pollution Incident History

- List the previous pollution incidents, the date, the material or waste spilled, approximate amount spilled, environmental damage, and action taken to prevent a recurrence.

  An important criteria in determining the effectiveness of the plan and its implementation is the history of incidents at the installation. A history of no incidents suggest that the practices and procedures at the site are effective. For a site with a history of incidents, it is important to

investigate the reasons for the spills and the response of the company in minimizing the potential for their recurrence.

5. Implementation Schedule for Plan Elements Not Currently in Place

- Provide a list of any missing or incomplete aspects of the plan and a time schedule when they will be implemented.

  An implementation schedule, or any elements of the plan not currently in place, must be developed. Each missing or incomplete aspect of the plan should be addressed and discussed within the applicable elements of the plan. Missing or incomplete aspects must be implemented as soon as possible and in conformance with all Department regulations and requirements.

B. Description of How Plan is Implemented by Organization

1. Organizational Structure of Facility for Implementation

- Describe the organizational structure for implementation of the plan.
- Describe the duties and responsibilities of the individuals within the organization that will implement the plan.

  Each installation must develop a permanent organizational structure for developing, implementing, and maintaining the plan. The exact nature and make-up of this structure will vary considerably, depending upon the size and complexity of the installation.

  For example, a large manufacturing company may either establish a formal preparedness-response committee, or it may assign this responsibility to an existing organization within the company, such as a safety committee or a preventive maintenance group. A small manufacturing or commercial facility may only have one or two individuals responsible for developing and implementing the plan. However, the preparedness-response organization, regardless of its size, must be given both the responsibility and authority by management for developing, implementing, and maintaining the plan.

  The main duties and responsibilities of the preparedness-response organizational structure should include identification of materials and wastes handled (materials inventory), identification of potential spill sources (risk assessment), establishment of spill-reporting procedures, visual inspection programs review of past incidents and spills, and countermeasures utilized. In addition, the preparedness-response organizational structure should be responsible for coordination needed to implement the goals of the plan, coordination of the activities for spill cleanup, notification of authorities and establishment of training and educational programs for installation personnel.

  The preparedness response organizational structure should have the overall responsibility for periodically reviewing and evaluating the plan and instituting appropriate changes at regular intervals. The organizational structure should also be responsible for the review of new construction and process changes at an installation relative to the plan.

The organizational structure should also evaluate the effectiveness of the overall plan and make recommendations to management on related matters.

2. List of Emergency Coordinators

- Provide an up-to-date list of names, addresses, and phone numbers (office and home) of all persons qualified to act as emergency coordinator. Where more than one is listed, one must be named as the primary coordinator, and others shall be listed in the order in which they will assume responsibility as alternates.

  At all times there must be at least one employee either on the installation's premises or on-call with the responsibility for coordinating all emergency response measures. The emergency coordinator must be thoroughly familiar with all aspects of the plan, all operations and activities, the location and characteristics of all materials handled, the location of all records and the lay out of the installation. In addition, this individual should have the authority to commit the resources necessary to carry out the plan.

3. Duties and Responsibilities of the Coordinator

- Describe the duties and responsibilities of the emergency coordinator specific to your installation or activity in the event of an imminent or actual emergency.

  During an emergency, the emergency coordinator should activate alarm systems, notify emergency response agencies, identify the problem, assess the health or environmental hazards, and take all reasonable measures to stabilize the situation. The emergency coordinator should also be responsible for follow-up activities after the incident such as treating, storing, or disposing of residues and contaminated soil, decontamination and maintenance of emergency equipment, and submission of any reports. Appendix I describes some example duties and responsibilities of the emergency coordinator.

4. Chain of Command

- Provide an internal list, by position, of key employees that must be contacted in the event of an emergency or spill.

  List the positions, office telephone extensions, and home phone numbers (if applicable) of key employees, in the order of responsibility that would be contacted in the event of an emergency or spill.

  This list, along with the notification procedure, should be posted on bulletin boards or other conspicuous locations around the installation.

C. Spill Leak Prevention and Response

1. Pre-release Planning

- Describe the sources and areas where potential spills and leaks may occur, the direction of flow of spilled materials, and the pollution incident prevention practices (see Appendix II) specific to the source or area.

- Provide separate drawings, plot plans (or include in the general layout drawings), showing sources and quantities of materials and wastes. Sources and areas where potential spills may occur, and pollution incident prevention practices (see Appendix II).

  The plan should include a prediction of the direction of the flow of materials spilled as a result of equipment failure, accident, or human error. Particular care and attention should be paid to evaluating the following: raw materials storage, in plant transfer, process and materials handling, intermediary and product storage (if applicable), truck and rail car loading and unloading, and waste handling and storage. Describe and identify valving for the storage tank and system to be used to partition off each storage tank in case of a release.

  Liquid storage areas must have containment capacity sufficient to hold the volume of the largest single container or tank, plus a reasonable allowance for precipitation based on local weather conditions and plant operations. Containment systems must be sufficiently impervious to contain spilled material or waste until it can be removed or treated. Tank or container materials must be compatible with the material or waste stored.

  Pollution incident prevention practices to eliminate contaminated runoff, leaching, or windblowing must be implemented in non liquid storage areas. Provisions must be made to contain or manage contaminated run-off or leachate from these areas.

  Piping, processing, and materials handling equipment at in-plant transfer, process, and materials handling areas must be designed and operated so as to prevent spills. Containment practices should be instituted at processing and handling areas including floor drains, storm sewers, or drainage swales to prevent an accidental discharge. Protection such as covers or shields to prevent windblowing, spraying, and releases from pressure relief values from causing a discharge should be provided as appropriate.

  Truck and rail car loading and unloading areas must have sufficient containment capacity to hold the volume of the largest tank truck or rail car loaded or unloaded at the installation, plus a reasonable allowance for precipitation. Any overhead piping must have adequate clearance over roadways. Containment systems must be sufficiently impervious to contain spilled material or waste until it can be removed or treated.

2. Material Compatibility

- Summarize the engineering practices followed with regard to material compatibility such as materials of construction, corrosion, etc.

  Engineering practices with regard to material compatibility normally consist of an appraisement of the compatibility of construction materials of tanks, pipelines, etc., with their contents; the reaction of materials or wastes when intentionally or inadvertently mixed or combined; and, the compatibility of a container such as a storage tank or pipeline with its environment.

Specific consideration should be given to the procedures and practices delineating the mixing of materials and prohibiting mixing of incompatible materials which may result in fire, explosion, or unusual corrosion. Thorough cleaning of storage vessels and equipment before reuse should be standard practice to ensure that there is no residual incompatible with the next or later materials used. Coatings or cathodic protection should be considered for protecting buried pipelines or storage tanks from corrosion.

3. Inspection and Monitoring Program

- Describe the type and frequency of inspections and monitoring for leaks or other conditions that could lead to spills or emergency situations.

  Typical inspections include the following: pipes, pumps, values, and fittings for leaks; tanks for corrosion; tanks supports and foundations for deterioration; chemical material piles for windblowing; evidence of spilled materials along drainage ditches; effectiveness of housekeeping practices; damage to shipping containers; leaks, seeps, or overflows at waste treatment, storage, or disposal sites; etc. Areas that should be inspected include the following: storage, loading and unloading, transfer pipelines, waste treatment facilities, and disposal sites. The use of an inspection checklist may be useful in an inspection and monitoring program.

  Routine monitoring should be performed to determine the physical conditions and liquid levels in tanks, the quality of plant site runoff in diked areas, etc., either by manual testing or in-situ instrumentation. Monitoring should be used to initiate a warning of the need for immediate corrective action to prevent a spill or other emergency condition. Monitoring systems should be used in conjunction with a communications or alarm system to immediately notify personnel of abnormal conditions.

  An inventory system should also be considered for keeping track of those materials having the greatest potential for causing problems due to leaks, spills, or mishandling.

  As a minimum, the frequency of inspection and monitoring must be in accordance with the applicable Department regulations and permits. Appendix II includes some additional inspection and monitoring examples.

4. Preventive Maintenance

- Describe the aspects of the preventive maintenance program for equipment and systems relating to conditions that could cause environmental degradation or endangerment of public health and safety.

  Describe the procedures for the correction of those conditions by adjustment, repair, or replacement before the equipment or system fails.

  A good preventive maintenance program includes the following: (1) identification of equipment and systems to which the program should apply; (2) periodic inspections of identified equipment and systems; (3) periodic testing of equipment and systems, (such as routine calibration

of environmental monitoring equipment); (4) appropriate adjustment, repair, or replacement of parts; and (5) complete recordkeeping of the preventive maintenance activities, inspection and test results, calibration dates, repairs, replacement, and adjustments to the applicable equipment and systems.

5. Housekeeping Program

- Identify the areas and the type of housekeeping practices that should apply to reduce the possibility of accidental spills and safety hazards to plant personnel.

  Examples of good housekeeping include the following: neat and orderly storage of chemicals; prompt removal of small spillage; regular refuse pickup and disposal; maintenance of dry, clean floors by use of brooms, vacuum cleaners, or cleaning machines; and, provisions for the storage of containers or drums to keep them from protruding into open walkways, pathways, or roads.

  Dry chemicals should be swept or cleaned up to prevent possible washdown to drains and drainage ditches or windblowing of the material to other areas of the plant. Small liquid accumulations on the ground or on a floor in a building should be cleaned up to prevent discharge or transport to other areas. See Appendix I for additional examples.

6. Security

- Describe the security procedures employed at the installation to prevent accidental or intentional entry that could result in a violation of Departmental regulations, or injury to persons or livestock.

  Security systems described in the plan should address, as necessary: fencing; lighting; vehicular traffic control; access control; visitors passes; locked entrances; vandalism; locks on drain valves and television monitoring. Security procedures must be in accordance with applicable Department regulations.

7. External Factor Planning

- Describe the possible effects of power outages, strikes, floods, snowstorms, etc., and the action to be taken to alleviate any resulting effects to public health and safety or the environment.

8. Employe Training Program

- Summarize the training program given to employees which will enable them to understand the processes and-materials with which they are working, the safety and health hazards, the practices for preventing, and the procedures for responding properly and rapidly to spills.

  At a minimum, the training program must be designed to ensure that personnel are able to respond effectively to emergencies by familiarizing them with emergency procedures, emergency equipment systems including, where applicable: procedures for using, inspecting, repairing, and replacing emergency and monitoring equipment; key parameters for

automatic cut-off systems; communications and alarm systems; response to fires and explosions; site evacuation procedures; and shut down of operations.

In addition the employee training program should address other aspects of the preparedness-response program such as preventive maintenance, inspection and monitoring, housekeeping practices, etc. The training program must be designed and conducted in accordance with applicable Department regulations. Records of the employes' attendance in the training program should be included in personnel files.

D. Countermeasures

1. Countermeasures to be Undertaken by Facility

- Provide specific countermeasures which will be undertaken by facility personnel in the event of a release. Include valve activations, equipment isolations, flow diversions, boom deployment, and any other activities which will be undertaken to halt the migration of the contaminant off site and to mitigate the consequence of the release.

2. Countermeasures to be Undertaken by Contractors

- Provide a list of emergency response contractors, phone numbers, and the services they will provide.

  The services of nearby contractors should be investigated and arrangements made for the prompt performance of contractual services on short notice. Equipment suppliers should be contacted to determine the availability and means of delivery of equipment needed for removing pollution or hazards to the public health and safety. Describe arrangements with these contractors and the time frame in which they can respond with required equipment.

3. Internal and External Communications and Alarm Systems

- Describe the internal communications or alarm used to provide immediate emergency instruction (voice or signal) to installation personnel.
- Describe the external communications or alarm system used to summon emergency assistance from local police or fire departments.

  Examples of communications or alarm systems are: hand held two way radios; CB radios; telephones; fire or police alarms; PA systems; beeper or voice pagers, etc.

4. Evacuation Plan for Installation Personnel

- Describe the evacuation plan for facility personnel where there is a possibility that evacuation could be necessary.

  The plan must describe signals to be used to begin evacuation, primary evacuation route, and alternate evacuation routes (in cases where primary routes could be blocked by releases of hazardous materials, wastes, gases, or fires). Periodic drills should be conducted to evaluate the effectiveness of the plan.

5. Emergency Equipment Available for Response

- Provide an up-to-date list of available emergency equipment. The list must include the location, a physical description, and a brief description of the intended use and capabilities of each item on the list.
- Describe the procedures for maintenance and decontamination of emergency equipment.

All installations should have equipment available to allow personnel to respond safely and quickly to emergency situations. Some examples of emergency equipment are portable fire extinguishers, fire control equipment (including special extinguishing equipment such as that using foam, inert gas, or dry chemicals), spill control equipment, decontamination equipment, self contained breathing apparatus, gas masks, and emergency tool and patching kits. See Appendix III for more examples.

All equipment must be tested and maintained as necessary to assure its proper operation in time of emergency. After an emergency, all equipment must be decontaminated, cleaned, and fit for its intended use before normal operations resume.

E. Emergency Spill Control Network

1. Arrangements with Local Emergency Response Agencies and Hospitals

- Provide a list of local emergency response agencies and hospitals. Include the phone numbers and describe arrangements concerning the emergency services they will provide.

Arrangements must be made, as appropriate, to inform local emergency response agencies, and hospitals concerning the type of materials or wastes handled at the installation and the potential need for services. Arrangements should be made which will designate who will be the primary emergency response agency and who will provide support services during emergencies.

Efforts should be made to familiarize police, fire departments, emergency response teams, and the County Emergency Management Coordinator with the layout of the installation, the properties and dangers associated with the hazardous materials handled, places where personnel would normally be working, entrances to roads inside the facility, and the possible evacuation routes. At a minimum, this requirement must be in accordance with applicable Department regulations.

2. Notification Lists

- Provide a list of agencies and phone numbers that must be contacted in the event of an emergency or spill.

A list must be developed for notifying State, local, and Federal regulatory agencies of all spills. Such a list should include, as applicable: PA DEP (see Appendix IV); PA Emergency Management Agency; County Health Department; County EMA; PA Fish Commission; the National Response

Center (U.S. EPA and U.S. Coast Guard); local police and fire departments; the local sewage treatment plant (for discharges to sewer system); and downstream public water supplies, industrial water users, and recreation areas.

3. Downstream Notification Requirement for Storage Tanks

- This is an additional requirement of storage tank facilities with aggregate aboveground storage >21,000 gallons of regulated substances. It can be addended to an updated PPC plan so as to meet the SPR plan requirement.

  The requirement includes a 20-mile downstream Notification List, an annual notification requirement, and an annual Notification List update. Lists of downstream users may be developed from information provided by your county Emergency Management Agency.

  Downstream Notification List shall include all municipalities and surface water users within 20 downstream miles of the tank facility. Surface water users include drinking water companies, and industries that utilize surface water intakes; and municipalities include each county, township, city and borough located within this downstream corridor. This list is to be developed via assistance from the local emergency management agency. (Refer to Appendix V for an example.)

  Annual Written Notification must be given to downstream water users and municipalities on the Notification List. This written notification at a minimum must include a detailed inventory of the type and quantity of material in storage at the facility.

  Annual Update must be developed each year in cooperation with the local Emergency Management Agency. This Notification List update will show any changes in contacts, users, telephone #'s needed for emergency downstream notification and the annual written notification. Also, any changes in the emergency response organization (such as telephone numbers) should be updated.

APPENDIX I

EXAMPLES OF AN EMERGENCY COORDINATOR'S DUTIES AND RESPONSIBILITIES

Whenever there is an imminent or actual emergency situation, the emergency coordinator must immediately:

1. Activate facility alarms or communications systems, where applicable, to notify facility personnel; and
2. Notify local emergency response agencies including the Department.

Whenever there is an emission or discharge, fire, or explosion, the emergency coordinator must immediately identify the character, exact source, amount, and areal extent of emitted or discharged materials. He may do this by observation or review of records and, if necessary, by chemical analysis.

Concurrently, the emergency coordinator must assess possible hazards to human health or the environment that may result from the emission or discharge, fire, or explosion. This assessment must consider both direct and indirect effects of the emission, discharge, fire, or explosion.

If the emergency coordinator determines that the installation has had an emission, discharge, fire, or explosion which would threaten human health or the environment, he must immediately notify the applicable local authorities including the county emergency management agency and indicate if evacuation of local areas may be advisable; and immediately notify the Department in accordance with Appendix IV; the National Response Center; and the Pennsylvania Emergency Management Agency; and report the following:

a. Name of the person reporting the incident

b. Name and location of the installation

c. Phone number where the person reporting the spill can be reached

d. Date, time, and location of the incident

e. A brief description of the incident, nature of the materials or wastes involved, extent of any injuries, and possible hazards to human health or the environment

f. The estimated quantity of the materials or wastes spilled, and

g. The extent of contamination of land, water, or air, if known.

When there is a release from an aboveground storage tank which threatens the water supply of downstream users, these downstream users (on the Downstream Notification List) must be notified within 2 hours of the release. Priority for notification is by closest proximity to the release site.

During an emergency, the emergency coordinator must take all reasonable measures necessary to ensure that fire, explosion, emission, or discharge do not occur, reoccur, or spread to other materials or wastes at the installation. These measures shall include where applicable, stopping manufacturing processes and operations, collecting and containing released materials or wastes, and removing or isolating containers.

If the installation stops operations in response to a fire, explosion, emission, or discharge, the emergency coordinator must ensure that adequate monitoring is conducted for leaks, pressure

buildup, gas generation, or ruptures in valves, pipes, or other equipment, wherever this is appropriate.

Immediately after an emergency, the emergency coordinator, with Departmental approval, must provide for treating, storing, or disposing of residues, contaminated soil, etc., from an emission, discharge, fire, or explosion at the installation.

The emergency coordinator must insure that in the affected areas of the installation, no material or waste incompatible with the emitted or discharged residues is processed, stored, treated, or disposed of until cleanup procedures are completed; and, all emergency equipment listed in the plan is cleaned and fit for its intended use before operations are resumed.

Within 15 days after the incident, the installation must submit a written report on the incident to the Department. The report must include the following:

a. Name, address, and telephone number of the individual filing the report

b. Name, address, and telephone number of the installation

c. Date, time, and location of the incident

d. A brief description of the circumstances causing the incident

e. Description and estimated quantity by weight or volume of materials or wastes involved

f. An assessment of any contamination of land, water, or air that has occurred due to the incident

g. Estimated quantity and disposition of recovered materials or wastes that resulted from the incident, and

h. A description of what actions the installation intends to take to prevent a similar occurrence in the future.

APPENDIX II
POLLUTION INCIDENT PREVENTION PRACTICES

Pollution incident prevention practices can be divided into the following four categories: prevention, containment, mitigation and ultimate disposition. The listings below provide specific examples of each category.

1. PREVENTION

Visual Observations of:

Storage facilities
Transfer pipelines
Loading and unloading areas
Waste handling and storage areas

Detailed Inspections of:

Pipes, pumps, valves, and fittings for leaks
Tanks for corrosion (internal and external)
Dry material or waste stockpiles for windblowing
Tanks supports or foundations for deterioration
Walls for stains
Drainage ditches and areas around old tanks for evidence of spilled materials
Primary or secondary containment for deterioration
Housekeeping practices
Shipping containers for damage
Material or waste conveyance systems for leaks, spills, or overflows
Integrity of stormwater collection systems
Waste storage, treatment, or disposal sites for leaks, seeps, and overflows

Monitoring

Liquid-level detectors
Alarm systems
Pressure and temperature gauges
Analytical testing instrumentation
Pressure drop shut-off devices
Flow meters
Valve positioning indicators
Equipment operational lights
Excess-flow valves
Automatic runoff diversion devices
Routine sample collection (including groundwater and monitoring wells)
Redundant instrumentation
Records (all monitoring results/findings)

Nondestructive Testing

Hydrostatic pressure tests
Acoustical emission tests
Radiographic tests
Magnetic particle tests
Liquid Penetration
Records of tank wall thicknesses and results of all testing

2. CONTAINMENT

Secondary Containment

Dikes
Curbs
Depressed areas
Storage basins
Sumps
Drip pans
Liners
Double piping
Sewer collection systems

Flow Diversion

Trenches
Drains
Graded pavement
Grating
Overflow structures
Sewers
Culverts

Vapor Control

Water spray
Vapor space
Vacuum exhaust

Dust Control

Hoods
Cyclone collectors
Bag-type collectors
Filters
Negative-pressure systems
Water spraying

Sealing

Foamed plastic compounds used for plugging leaks in tanks

3. MITIGATION

Physical Clean-up

Brooms
Shovels
Plows

Labeling

U.S. DOT or National Fire Protection Association's (NFPA) designation on tanks and pipelines
Color coding of tanks and pipelines
Warning signs

Vehicle Positioning

Physical barriers (e.g., wheel chocks)
Underlying drains
Designated loading and unloading areas

Covering

Tarpaulins over outdoor dry waste or material stockpiles
Buildings or roofs over outside processes or stockpiles
Vegetation, rock, or synthetic covering on surface impoundments

Pneumatic and Vacuum Conveying

Loading and unloading by air pressure or vacuum
Safety relief valves
Dust collectors
Air slide trucks and rail cars

Preventive Maintenance

Periodic inspections
Periodic testing to determine soundness of system
Identification of equipment and systems that need to be upgraded, repaired, or replaced
Appropriate adjustment, repair, or replacement of parts
Complete recordkeeping of all repairs, upgrading, replacements, and adjustments; and all testing findings/results after system modifications were made

Good Housekeeping

Neat and orderly storage of chemicals
Prompt removal of small spillage
Regular garbage pickup and disposal
Maintenance of dry, clean floors by use of brooms, vacuum cleaners, etc.
Maintenance of proper spacing for pathways and walkways between containers and drums
Stimulation of employee interest in good housekeeping

Employee Training Programs

Materials Inventory Systems
Material Safety Data Sheets

Mechanical Clean up

Vacuum systems
Pumps
Pump/bag system

Chemical Clean up

Sorbents

activated carbon
polyurethane and polyolefin spheres, beads, and foam belts
amorphous silicate glass foam
clay
sawdust

Gelling agents

polyelectrolytes
polyacrylamide
butylstyrene copolmyers
polyacrylonitrile
polyethylene oxide

Foams

rockwood alcohol
protein
fluoroprotein
aqueous film-forming foam
polar liquid foam
surfactant-based foam

Volatilization

distillation
stripping
evaporation

Carbon absorption
Coagulation/precipitation
Neutralization
Ion exchange
Chemical oxidation
Biological treatment

4. ULTIMATE DISPOSITION

Thermal oxidation
Land disposal
Recycle
Recover
Reuse
Detoxification

APPENDIX III
EXAMPLES OF EMERGENCY EQUIPMENT

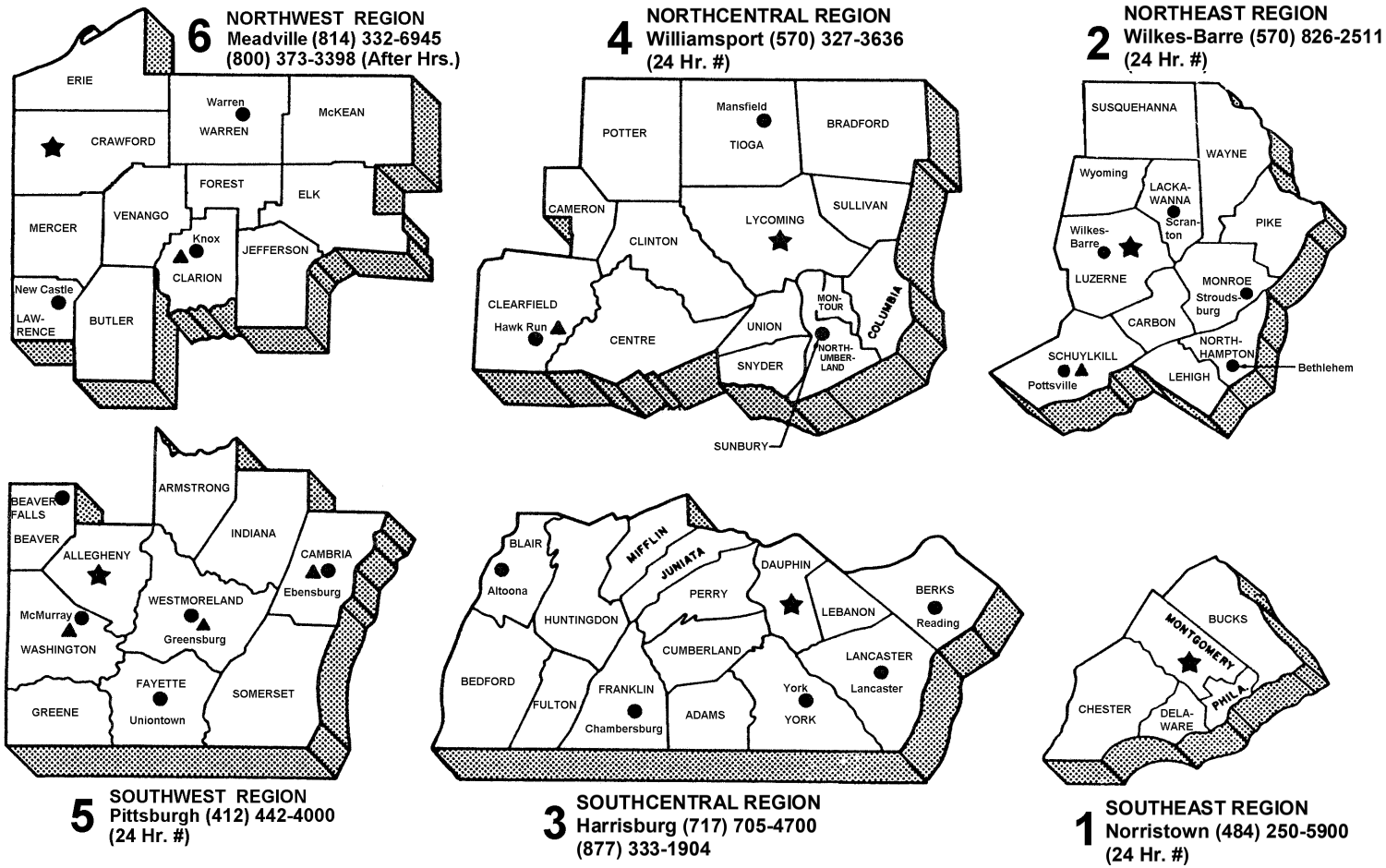
Special equipment is often required and may be needed quickly in an emergency. Examples include the following:

Aerial ladder
Absorbant materials
Accident investigation kit
Air compressor
Air supply, for breathing equipment
Backhoe
Basket stretchers
Bulldozer
Bullhorn
Camera/photo equipment
Cellar pump
Chain hoist
Chain saw
Chemical neutralizers
Crane
Cutters (power)
Decontamination equipment with a clean Resuscitator water supply (70-80%F)
Ejector - smoke
Elevated platform truck
Explosimeters
Fans
Firefighting equipment
First aid supplies
Foam concentrate supply
Foam generators
Forklift
Fuel Supply
Geiger counter
Generator trailer
Heaters, portable
Helicopter
Hydraulic spreader jacks
Inhalator
Jack hammer
Jacks
Ladder Truck
Lighting equipment, portable
Medical supplies
Metal saw (power)
Public address system
Radio
Resuscitator
Sand supply
Self-contained breathing apparatus (SCBA)
Self-contained underwater breathing apparatus (SCUBA)
Submersible pump
Tank truck
Tool box
Welding/cutting equipment
Water pump

APPENDIX IV
COMMONWEALTH OF PENNSYLVANIA
DEPARTMENT OF ENVIRONMENTAL PROTECTION
EMERGENCY NOTIFICATION NUMBERS

STATEWIDE EMERGENCY NOTIFICATION NUMBER (800) 541-2050 (PA ONLY) OR (717) 787-4343

(To Be Used If There Is A Problem In Contacting The Region)



APPENDIX V
PENNSYLVANIA DEPARTMENT OF ENVIRONMENTAL PROTECTION
Field Operations--Environmental Cleanup Program
Regional Storage Tank List

Region	Contact
Southeast Regional Office 2 East Main Street Norristown, PA 19401-4915 Telephone: (484) 250-5900	Kathy Nagle
Northeast Regional Office 2 Public Square Wilkes-Barre, PA 18711-0790 Telephone: (570) 826-2511	Ron Brezinski
Southcentral Regional Office 909 Elmerton Avenue Harrisburg, PA 17110-8200 Telephone: (717) 705-4700	Gregory Bowman
Northcentral Regional Office 208 W. Third Street Williamsport, PA 17701 Telephone: (570) 327-3636	Steve Webster
Southwest Regional Office 400 Waterfront Drive Pittsburgh, PA 15222 Telephone: (412) 442-4000	Gale Campbell
Northwest Regional Office 230 Chestnut Street Meadville, PA 16335 Telephone: (814) 332-6945	Daniel F. Peterson

In the event no contact with the Regional Office is made, the Department Emergency number (717) 787-4343 shall receive calls during and after business hours, 24 hours daily and holidays and weekends.

Oil and Gas Management Program

South Regional Office 400 Waterfront Drive Pittsburgh, Pa 15222-4745 (412) 442-4000	David F. Janco
Northwest Regional Office 230 Chestnut Street Meadville, PA 16335 (814) 332-6945	Craig Lobins

PENNSYLVANIA DEPARTMENT OF ENVIRONMENTAL PROTECTION
Field Operations--Water Management

Region	Contact
Southeast Regional Office 2 East Main Street Norristown, PA 19401-4915 Telephone: (484) 250-5900	James Newbold
Northeast Regional Office 2 Public Square Wilkes-Barre, PA 18711-0790 Telephone: (570) 826-2511	Kate Crowley
Southcentral Regional Office 909 Elmerton Avenue Harrisburg, PA 17110-8200 Telephone: (717) 705-4700	Jim Spontak
Northcentral Regional Office 208 W. Third Street Williamsport, PA 17701 Telephone: (570) 327-3636	Daniel Alters
Southwest Regional Office 400 Waterfront Drive Pittsburgh, PA 15222 Telephone: (412) 442-4000	Steve Balta
Northwest Regional Office 230 Chestnut Street Meadville, PA 16335 Telephone: (814) 332-6945	Dave Milhous

PENNSYLVANIA DEPARTMENT OF ENVIRONMENTAL PROTECTION
Field Operations--Waste Management
Regional Contact

Region	Contact
Southeast Regional Office 2 East Main Street Norristown, PA 19401-4915 Telephone: (484) 250-5900	Facilities Manager
Northeast Regional Office 2 Public Square Wilkes-Barre, PA 18711-0790 Telephone: (570) 826-2511	Facilities Manager
Southcentral Regional Office 909 Elmerton Avenue Harrisburg, PA 17110-8200 Telephone: (717) 705-4700	Facilities Manager
Northcentral Regional Office 208 W. Third Street Williamsport, PA 17701 Telephone: (570) 327-3636	Facilities Manager
Southwest Regional Office 400 Waterfront Drive Pittsburgh, PA 15222 Telephone: (412) 442-4000	Facilities Manager
Northwest Regional Office 230 Chestnut Street Meadville, PA 16335 Telephone: (814) 332-6945	Facilities Manager

APPENDIX VI
IGMARS STORAGE FACILITY
Harrisonberg, PA
Example
DOWNSTREAM NOTIFICATION LIST FOR YEAR 1992

Facility	Address	Mile Mark	Contact	Telephone
Harrison County	PO Box 15 Harrison Co. Courthouse Harrisonberg, PA	-	Ronald Swoyer Co. Emergency Mgt. Coordinator	Office: (717) 674-1212 Emergency: (717) 674-3434
Greenly Township	PO Box 498, RD 1 Harrisonberg, PA 19865	0	Donald Trump	Office: (717) 765-3468 Emergency: (717) 765-4579
Harrisonberg City	PO Box 21, City Hall Harrisonberg, PA 19869	3	Jay Miller	Office: (717) 674-2185 Emergency: (717) 674-2194
Harrisonberg Water	Harrisonberg, PA	6	Richard Miles	Office: (717) 254-8904 Emergency: (717) 254-8910
Harrison Township	Harrison Township Building Krissville, PA 19872	10	Charles Davis Township Manager	Office: (717) 760-3120 Emergency: (717) 760-3123
Harrison Township Auth.	PO Box 234 Krissville, PA 19870	12	Kemp Olsen Auth. Manager	Office: (717) 760-2334 Emergency: (717) 760-2333
Villa Assoc.	Box 29 Krissville, PA 19880	14	George Kay	Office: (717) 675-8960 Emergency: (717) 675-8961
Harrison Water Auth.	Box 28 Krissville, PA 19879	16	Justine Keener	Office: (717) 675-9004 Emergency: (717) 675-9005

Igmars Emergency Coor. Date

NOTE: This Downstream Notification List when annually updated should be dated for the year updated and signed by the storage tank facility's emergency coordinator.

ADDENDUM

COMMONWEALTH OF PENNSYLVANIA
DEPARTMENT OF ENVIRONMENTAL PROTECTION

SUPPLEMENTAL GUIDANCE FOR THE DEVELOPMENT AND IMPLEMENTATION OF PREPAREDNESS, PREVENTION AND CONTINGENCY (PPC) PLANS UNDER THE NATIONAL POLLUTANT DISCHARGE ELIMINATION SYSTEM (NPDES) STORM WATER PERMITTING PROGRAM

September 2001

BUREAU OF WATER STANDARDS AND FACILITY REGULATION
DIVISION OF PLANNING AND PERMITS

FORWARD

The "Supplemental Guidance for the Development and Implementation of Preparedness, Prevention and Contingency (PPC) Plans under the National Pollutant Discharge Elimination System (NPDES) Storm Water Permitting Program" has been prepared to provide those owners, operators, and municipalities who must prepare Preparedness, Prevention and Contingency (PPC) Plans (in accordance with the General Permit for Discharges of Storm Water from Industrial Activities and the Department's Chapter 91 regulations) with guidance on what storm water issues must be addressed. This supplemental guidance, when used with the existing guidance entitled "Guidelines for the Development and Implementation of Environmental Emergency Response Plans", hereafter called the PPC guidance or guidelines, will provide complete information on incorporating the new storm water requirements into existing or new PPC Plans for facilities seeking coverage under the general permit to discharge storm water associated with industrial activity.

Section 1 provides an introduction to the regulatory requirements for storm water discharges, the General Permit for Discharges of Storm Water From Industrial Activities and the special condition within the permit to develop and implement a Preparedness, Prevention and Contingency Plan.

Section 2 follows the format of the original guidelines. Where changes must be incorporated to address the new storm water requirements, the necessary modifications or addendums are explicitly presented.

It is emphasized that the original guidance pertains to emergency response plans that include potential releases, their controls, and management practices that are applicable to facilities regardless of whether they discharge storm water associated with industrial activity. The supplemental guidance's requirements, on the other hand, have specific requirements that focus exclusively on managing storm water discharges associated with industrial activity.

SECTION 1

INTRODUCTION

The Department of Environmental Protection is authorized by law to protect the quality of both surface and underground waters of the Commonwealth through the prevention and abatement of water pollution. Specifically, the federal Clean Water Act and the Pennsylvania Clean Streams Law require that all point source discharges of pollutants be authorized and regulated under a National Pollutant Discharge Elimination System (NPDES) permit. Point source discharges that are not regulated under a NPDES permit are in violation of the federal Clean Water Act and the Pennsylvania Clean Streams Law, and may be subject to applicable penalties and fines.

Recent revisions to the federal NPDES regulations (55 FR 47990; November 16, 1990) require that permit applications be submitted and NPDES permits be issued for storm water discharges associated with industrial activity (see the Bureau of Water Quality Management's "Notice of Intent Requirements for Coverage Under the General Permit for Discharges of Storm Water From Industrial Activities" for definition of industries covered). In accordance with the Department's regulations at 25 Pa. §§92.81 - 92.83, the Department of Environmental Protection has developed and issued a general NPDES permit that sets forth the requirements and conditions to control storm water discharges from industrial activities.

Special Permit Condition for the Development and Implementation of a PPC Plan

The General Permit for Discharges of Storm Water from Industrial Activities requires operators of facilities covered under the permit to develop and implement a Preparedness, Prevention and Contingency (PPC) Plan in accordance with 25 Pa. Code §91.34 and the PPC guidelines contained in this document prior to authorization to discharge under this general permit.[1] The PPC Plan, once implemented, will provide best management practices (BMPs) to control the discharges of pollutants to receiving waters. In general, the PPC Plan is required to identify potential sources of pollution which may reasonably be expected to affect the quality of storm water discharges associated with industrial activity from the facility. In addition, the PPC Plan is required to describe the implementation of practices that are to be used to reduce the pollutants in storm water discharges associated with industrial activity at the facility.

This supplemental guidance provides the additional elements and requirements needed to address storm water issues in the PPC Plan required under the general permit. When used in conjunction with this document, the terms and conditions of the permit should be satisfied and the appropriate "spill prevention control" and "storm water control" - requirements should be addressed.

[1] See Part C.3.a. of the General permit.

SECTION 2

MODIFICATIONS TO EXISTING ELEMENTS AND FORMAT OF THE PPC PLAN

Modify or add to Section II of the PPC guidance, the elements beginning with A (Description of Facility). Each modification or addendum is identified explicitly in the following pages using the format contained in this document. In cases where no modifications to the original guidelines are necessary, the element heading is presented and the user is referred to the requirements in the PPC guidance. Again, users or developers of PPC Plans that meet the requirements of a general permit to discharge storm water associated with industrial activity must fulfill all of the requirements of the PPC guidance and the additional requirements and addendums of this supplemental guidance.

A. Description of Facility

1. Description of the Industrial or Commercial Activity

Add the following to the requirements in the original guidance for this section.

- Provide a narrative description of significant materials[2] that have been treated, stored or disposed in a manner to allow exposure to storm water within the three years prior to the issuance of the general permit and the present; the method of on-site storage or disposal; materials management practices that were employed to minimize contact of these materials with storm water runoff between the time of three years prior to the date of the issuance of this permit and the present; materials loading and access areas; the location and a description of existing structural and nonstructural control measures to reduce pollutants in storm water runoff; and a description of any treatment the storm water receives.
- On the 7 1/2-minute USGS map show the following:
  - -- Provide an outline of the drainage area for each storm water outfall.
- On the drawings required in the original guidance show the following:
  - -- Indicate existing structural control measures to reduce pollutants in storm water runoff.
  - -- Identify commercial and industrial activities that are exposed to precipitation to include fueling stations, vehicle and equipment maintenance and/or cleaning areas, loading/unloading areas, locations used for treatment, storage or disposal of wastes, liquid storage tanks, and processing areas.

2. Description of Existing Emergency Response Plans

Refer to the requirements in the original guidance.

3. Material and Waste Inventory

Refer to the requirements in the original guidance.

[2] Significant materials includes, but is not limited to: raw materials; fuels, materials such as solvents, detergents, and plastic pellets; finished materials such as metallic products; raw materials used in food processing or production; hazardous substances designated under section 101(14) of CERCLA; any chemical the facility is required to report pursuant to EPCRA Section 313; fertilizers; pesticides; and waste products such as ashes, slag and sludge that have the potential to be released with storm water discharges.

4. Pollution Incident History

Add the following to the requirements in the original guidance for this section.

- Provide a list of significant leaks and spills[3] of toxic and hazardous pollutants that occurred in areas that are exposed to precipitation or that otherwise drain to a storm water conveyance at the facility after the date of three years prior to the effective date of the permit. This list shall be updated as appropriate during the permit.

5. Implementation for Plan Elements Not Currently in Place

Refer to the requirements in the original guidance.

B. Description of How Plan is Implemented by Organization

1. Organizational Structure of Facility for Implementation

Refer to the requirements in the original guidance.

2. List of Emergency Coordinators

Refer to the requirements in the original guidance.

3. Duties and Responsibilities of the Coordinator

Refer to the requirements in the original guidance.

4. Chain of Command

Refer to the requirements in the original guidance.

C. Spill Leak Prevention and Response

1. Pre-release Planning

Add the following to the requirements in the PPC guidance for this section.

- Assess the potential of various sources at the plant to contribute pollutants to storm water discharges. Each of the following shall be evaluated for the reasonable potential for contributing pollutants to runoff: loading and unloading operations; outdoor storage activities; outdoor manufacturing or processing activities; significant dust or particulate generating processes; and on-site waste disposal practices. Consider the toxicity of chemicals; quantity of chemicals used, produced, or discharged; the likelihood of contact with storm water; and history of significant leaks or spills of toxic or hazardous pollutants. The description shall specifically list any significant potential source of pollutants at the site and for each potential source, any pollutant or pollutant parameter of concern (e.g., biochemical oxygen demand).
- Describe pollution incident prevention practices in storage areas used for the storage of salts for deicing or other commercial or industrial purposes. Storage piles of salt used for deicing or other commercial or industrial purposes and which generate a storm water discharge associated with industrial activity which is discharged to a waters of the United States

[3] Significant spills includes, but is not limited to: releases of oil and hazardous substances in excess of reportable quantities under Section 311 of the Clean Water Act (see 40 CFR 110.10 and CFR 117.21) or section 102 of CERCLA (see 40 CFR 302.4).

shall be enclosed or covered to prevent exposure to precipitation, except for exposure resulting from adding or removing materials from the pile. Dischargers shall demonstrate compliance with this provision as expeditiously as practicable, but in no event later than October 1, 1995. Piles do not need to be enclosed or covered where storm water from the pile is not discharged to waters of the United States.

2. Material Compatibility

Refer to the requirements in the PPC guidance.

3. Inspection and Monitoring Program

Add the following to the requirements in the PPC guidance for this section.

- Identify qualified personnel to conduct site compliance evaluations for storm water discharges associated with industrial activities, but in no case, less than once per year. Such evaluations will provide the following:

  Visually inspect areas contributing to storm water discharges associated with industrial activity for evidence of, or the potential for, pollutants entering the drainage system. Measures to reduce pollutant loadings should be evaluated to determine whether additional control measures are needed. Structural storm water management measures, sediment and erosion control measures, and other structural pollution prevention measures identified in the plan should be observed to ensure that they are operating correctly. A visual inspection of equipment needed to implement the plan, such as spill response equipment, should be made.

  Based on the results of these inspections, potential pollutant sources identified (Section C) and control measures (i.e., good housekeeping, preventive maintenance, spill prevention and response), should be revised as necessary within 15 days of the inspection. The revision will provide for the implementation of any changes to the PPC plan in a timely manner, but in no case later than 90 days after the inspection.

  A report summarizing the scope of the inspection, personnel making the inspection, the date(s) of the inspection, major observations relating to the implementation of the PPC plan, and any actions taken as a result, should be retained for a period of at least one year after coverage under this permit terminates. This report will identify any incidents of non-compliance. Where a report does not identify any incidents of non-compliance, the report should contain a certification that the facility is in compliance with the PPC plan and the permit. This report shall be signed in accordance to the signatory requirements stipulated in the general permit.

  Where annual site inspections are shown in the plan to be impractical for inactive mining sites due to the remote location and inaccessibility of the site, site inspections required under this part should be conducted at appropriate intervals specified in the plan, but, in no case less than once in three years.

4. Preventive Maintenance

Add the following to the requirements in the PPC guidance for this section.

- Describe the aspects of the preventive maintenance program. This program should involve the timely inspection and maintenance of storm water management devices (e.g., cleaning oil/water separators, catch basins, etc.) as well as inspecting and testing plant equipment and systems to uncover conditions that could cause breakdowns or failures resulting in discharges of pollutants to surface waters. Records of these maintenance procedures should be maintained.

5. Housekeeping Program

Add the following to the requirements in the PPC guidance for this section.

- Establish housekeeping protocols to ensure the proper handling of materials and the maintenance of a clean, orderly facility to prevent pollutants from entering separate storm water sewers and/or to prevent contact with storm water runoff.

6. Security

Refer to the requirements in the PPC guidance.

7. External Factor Planning

Refer to the requirements in the PPC guidance.

8. Employee Training Program

Add the following to the requirements in the PPC guidance for this section.

- Employee training should inform personnel responsible for implementing activities identified in the storm water pollution prevention plan or otherwise responsible for storm water management at all levels of responsibility of the components and goals of the storm water pollution prevention plan. Training should address topics such as spill response, good housekeeping and material management practices. A pollution prevention plan shall identify periodic dates for such training.

D. Countermeasures

1. Countermeasures to be Undertaken by Facility

Refer to the requirements in the PPC guidance.

2. Countermeasures to be Undertaken by Contractors

Refer to the requirements in the PPC guidance.

3. Internal and External Communications and Alarm Systems

Refer to the requirements in the PPC guidance.

4. Evacuation Plan for Installation Personnel

Refer to the requirements in the PPC guidance.

5. Emergency Equipment Available for Response

Refer to the requirements in the PPC guidance.

E. Emergency Spill Control Network

1. Arrangements with Local Emergency Response Agencies and Hospitals

Refer to the requirements in the PPC guidance.

2. Notification Lists

Refer to the requirements in the PPC guidance.

3. Downstream Notification Requirements for Storage Tanks

Refer to the requirements in the PPC guidance.

THE ELEMENTS F THROUGH J ARE <u>ADDENDUMS</u> TO THE ORIGINAL GUIDANCE.

The PPC plan should also meet the requirements stipulated in these addendums to the PPC guidance. All of the management practices required for facilities (including EPCRA Section 313 facilities) are to be implemented and described in the plan.

F. Storm Water Management Practices

- Provide a narrative considering the appropriateness of traditional storm water management practices (practices other than source control) and the use of BMPs to control storm water runoff and prevent storm water pollution. Based on an assessment of the potential of various sources at the plant to contribute pollutants to storm water, provide that measures determined to be reasonable and appropriate, be implemented and maintained.

  Traditional storm water management practices are measures which reduce pollutant discharges by reducing the volume of storm water discharges, such as swales, or preventing storm water to run-on to areas of the site which conduct industrial activities. Low cost measures may include diverting rooftop or other drainage across grass swales, cleaning catch basins, and installing and maintaining oil and grit separators. Other measures may include infiltration devices and unlined retention and detention basins. Traditional storm water management practices can also include water reuse activities and snow removal activities.

- The PPC plan shall include a certification that the discharge has been tested or evaluated for the presence of non-storm water discharges. The certification shall include the identification of potential significant source of non-storm water at the site. A description of the results of any test and/or evaluation for the presence of non-storm water discharges, the evaluation criteria or testing method used, the date of any testing and/or evaluation, and the on-site drainage points that were directly observed during the test.

G. Sediment and Erosion Prevention

- In the PPC plan, identify areas which, due to topography, activities, or other factors, have a high potential for significant soil erosion, and identify measures to limit erosion.

  Sediment and erosion prevention and control measures should be developed and implemented in accordance with Chapter 102 of the Department's rules and regulations and the Bureau of Soil and Water Conservation's "Erosion and Sediment Pollution Control Program Manual."

H. Additional Requirements for EPCRA, Section 313 Facilities[4]

- Describe the types of storm water controls (containment, drainage control and/or diversionary structures) that will be used in areas where Section 313 water priority chemicals are stored,[5] processed or otherwise handled.

  Storm water controls should provide for the following preventive systems or its equivalent: Curbing, culverting, gutters, sewers or other forms or drainage control to prevent or minimize the potential for storm water run-on to come into contact with significant sources of pollutants; or roofs, covers or other forms of appropriate protection to prevent storage piles from exposure to storm water and wind blowing.

- In addition to the minimum standards for EPCRA Section 313 facilities, the storm water pollution prevention plan will meet the following requirements for liquid storage areas, material storage areas other than liquids, truck and rail car loading and unloading areas for liquid Section 313 water priority chemicals:

  -- Liquid storage areas where storm water comes into contact with any equipment, tank container, or other vessel used for Section 313 water priority chemicals.

- No tank or container shall be used for the storage of a Section 313 water priority chemical unless its material and construction are compatible with the material stored and conditions of storage such as pressure and temperature, etc.

- Secondary containment must be provided to contain the entire capacity of largest single container or tank plus sufficient freeboard to allow for precipitation, a strong spill contingency and integrity testing plan, and/or other equivalent measures. If the secondary containment and its upstream drainage system are subject to precipitation, an allowance for drainage for a 25-year, 24-hour storm event shall be provided over and above. Secondary containment shall be sufficiently impervious. Plant's treatment system may be substituted for secondary containment if it has sufficient excess holding capacity always available.

  -- Material storage areas for Section 313 water priority chemicals other than liquids.

- Material storage areas for Section 313 water priority chemicals other than liquids which are subject to runoff, leaching, or wind shall incorporate drainage or other control features which will minimize the discharge of Section 313 water priority chemicals.

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4 An "EPCRA, Section 313 Facility" means a facility that manufactures, imports, processes, or otherwise uses listed toxic chemicals and who, pursuant to Section 313 of Title III of SARA, are required to report annually their releases of those chemicals to any environmental media.

5 Section 313 water priority chemical means a chemical or chemical categories which: 1) Are listed at 40 CFR 372.65 pursuant to Section 313 of the Emergency Planning and Community Right-to-Know Act (EPCRA) (also known as Title III of the Superfund Amendments and Reauthorization Act (SARA) of 1986; 2) are present at or above threshold levels at a facility subject to EPCRA Section 313 reporting requirements; and 3) that meet at least one of the following criteria: (i) Are listed in Appendix D of 40 CFR 122 on either Table II (organic priority pollutants), Table III (certain metals, cyanides, and phenols) or Table V (certain toxic pollutants and hazardous substances); (ii) are listed as a hazardous substance pursuant to Section 311(b)(2)(A) of the CWA at 40 CFR 116.4; or (iii) are pollutants for which EPA has published acute or chronic water quality criteria.

-- Truck and rail car loading and unloading areas for liquid Section 313 water priority chemicals.

- These areas shall be operated to minimize discharges of Section 313 water priority chemicals. Protection such as overhangs or door skirts to enclose trailer ends at truck loading/unloading docks shall be provided as appropriate. Appropriate measures to minimize discharges of Section 313 chemicals may include: placement and maintenance of drip pans (including the proper disposal of materials collected in the drip pans where spillage may occur such as hose connections); a strong spill contingency and integrity testing plan; and/or other equivalent measures.

  -- Areas where Section 313 water priority chemicals are transferred, processed or otherwise handled.

- Processing equipment and materials handling equipment shall be operated so as to minimize the discharges of Section 313 water priority chemicals. Materials used in piping and equipment shall be compatible with the substances handled. Drainage from process and materials handling areas shall minimize storm water contact with Section 313 water priority chemicals. Additional protection such as covers or guards to prevent exposure to wind, spraying, or releases from pressure relief vents from causing a discharge of Section 313 water priority chemicals to the drainage system shall be provided as appropriate. Visual inspections or leak tests shall be provided for overhead piping conveying Section 313 water priority chemicals without secondary containment.

  -- For drainage originating from the above described areas, valves or other positive means should be used to prevent discharges or excessive leaks of Section 313 water priority chemicals. Where containment units are employed, such units may be emptied by pumps or ejectors; however, these shall be manually activated.

  Flapper-type drain valves must not be used to drain containment areas. Valves used for the drainage of containment areas should not be used to drain non-containment areas. Valves used should be of the open-and-closed design.

  If plant drainage is not engineered as above, the final discharge of all in-plant storm sewers should be equipped to be equivalent with a diversion system that could, in the event of an uncontrolled spill of a Section 313 water priority chemical, return the spilled material to the facility. Records shall be kept of the frequency and estimated volume (in gallons) of discharges from the containment areas.

  -- Records shall be kept of the frequency and estimated volume (in gallons) of discharges from containment areas.

  -- Other areas (other than those described above) of the facility from which runoff which may contain a Section 313 water priority chemical, or spills of Section 313 water priority chemicals could cause a discharge, shall incorporate the necessary drainage or other control features to prevent discharge of spilled or improperly disposed material and ensure the mitigation of pollutants in runoff or leachate.

-- All areas of the facility shall be inspected at specific intervals for leaks or conditions that could lead to discharges of Section 313 water priority chemicals or direct contact of storm water with raw materials, intermediate materials, waste materials or products. In particular, plant piping, pumps storage tanks and bins, pressure vessels, process and materials handling equipment, and material bulk storage area shall be examined for any conditions or failures which could cause a discharge. Inspection shall include examination for leaks, wind blowing, corrosion, support or foundation failure, or other forms of deterioration or noncontainment. Inspection intervals shall be specified in the plan and shall be based on design and operational experience. Different areas may require different inspection intervals. Where a leak or other condition is discovered which may result in significant releases of Section 313 water priority chemicals to the drainage system, corrective action shall be taken. When a leak or noncontainment of a Section 313 water priority chemical has occurred, contaminated soil, debris, or other material must be promptly removed and disposed in accordance with this PPC Plan.

-- Facility employees and contractor personnel using the facility shall be trained in and informed of preventive measures at the facility. Employee training shall be conducted at intervals specified in the plan, but not less than once per year, in matters of pollution control laws, and regulations and in the PPC Plan, and the particular features of the facility and its operation which are designed to minimize discharges of Section 313 water priority chemicals. The plan should designate a person who is accountable for spill prevention at the facility and who will set up the necessary spill emergency procedures and reporting requirements so that spills and emergency releases of Section 313 water priority chemicals can be isolated and contained before a discharge of a Section 313 water priority chemical can occur. Contractor or temporary personnel shall be informed of plant operation and design features in order to prevent discharges or spills from occurring.

If the installment of secondary containment structures or equipment listed above are not economically achievable at a facility, the PPC Plan should provide a spill contingency and integrity testing plan which provides a description of measures that ensure spills or other releases of toxic amounts of Section 313 water priority chemicals do not occur. The testing plan should contain the following:

-- Detailed descriptions which demonstrate that secondary containment is not economically achievable;

-- Description of response plans, personnel needs, and methods of mechanical containment such as the use or sorbents, booms collection devices, etc.); steps to be taken for removal of spilled Section 313 water priority chemicals; and access and availability of sorbents and other equipment;

-- The testing component of the alternative plan must provide for conducting integrity testing of storage tanks at least once every five years, and

conducting integrity and leak testing of valves and piping a minimum every year; and

-- A written and actual commitment of manpower, equipment and materials required to comply with this permit and to expeditiously control and remove quantity of Section 313 water priority chemicals that may result in a toxic discharge.

- Provide a certification by a Registered Professional Engineer. The Professional Engineer shall certify that he or she has examined the facility and is familiar with the provisions in the PPC Plan and can attest that the PPC Plan has been prepared in accordance with good engineering practices. The Professional Engineer must recertify the PPC Plan once a year.

I. Certification Requirements for Non-Storm Water Discharges

- Provide a certification meeting the requirements of Part C, Section 3(a) of the industrial activities stormwater general permit (PAG #3) relating to the presence of non-stormwater discharges in the system.

  If a facility does not have access to an outfall, manhole, or other point of access to the ultimate conduit which receives the discharge, this section of the plan shall indicate why the certification was not feasible. A discharge that is unable to provide the certification required by this paragraph must also then notify the Department within 180 days of the effective date of the general permit in accordance with Section A.3. of the permit.

J. Signatory Requirements

The PPC plan must be signed in accordance with the signatory requirements stipulated in the general permit.