

SCOPE & DEFINITIONS

This chapter contains criteria to control and abate pollution resulting from the storage, transport, and distribution of petroleum products. Criteria for Underground Storage Tanks (USTs) containing POL products are addressed in Chapter 19.

Above-ground Storage Tank – A fixed tank with a capacity of less than or equal to 190,000 liters (50,000 gallons) that is more than 10% above ground and is designed to store POL.

Bulk Storage Tanks – Refers to field-constructed tanks, usually having a capacity greater than 190,000 liters (50,000 gallons), and constructed above or below ground.

Pipeline Facility – Includes new and existing pipes, pipeline rights of way, auxiliary equipment (e.g., valves, manifolds, etc.), and buildings or other facilities used in the transportation of POL.

POL – Refined petroleum, oils, and lubricants.

POL Storage or Transfer Facility – An installation with any individual above ground tank of 2,500 liters (660 gallons) or greater; aggregate above-ground storage of 5,000 liters (1,320 gallons) or greater; UST storage of greater than 159,000 liters (42,000 gallons); or a pipeline facility.

Storage Tank – A fixed container designed to store POL.

Underground Storage Tank (UST) – Any tank including underground piping connected thereto, larger than 416 liters (110 gallons), that is used to contain POL products or hazardous materials and the volume of which (including the volume of connected pipes) is 10% or more beneath the surface of the ground, but does not include:

- Tanks containing heating oil used for consumption on the premises where it is stored
- Septic tanks
- Stormwater or wastewater collection systems
- Flow through process tanks
- Surface impoundments, pits, ponds, or lagoons
- Field constructed tanks
- Hydrant fueling systems
- UST containing "*de minimus*" concentrations of regulated substances
- Emergency spill or overflow containment UST systems that are expeditiously emptied after use
- Storage tanks located in an accessible underground area (such as a basement or vault) if the storage tank is situated upon or above the surface of the floor

CRITERIA

C9.1 SPILL PLANS

Each installation will have a contingency plan to manage spills and releases at all POL storage or transfer facilities. Criteria for these plans are found in Chapter 18 of this document. These plans must be written specifically for each POL facility, certified by a competent technical authority, and updated at least every 5 years, or when there are significant changes to facilities or operations.

C9.2 GENERAL PROVISIONS

C9.2.1 Secondary Containment for Bulk Storage Tanks. All above-ground bulk POL storage tanks must be provided with a secondary means of containment (dike and basin).

For containment areas with a single tank, the containment must be capable of holding the entire contents of the largest single tank plus sufficient freeboard to allow for precipitation and expansion of product.

When multiple bulk POL storage tanks are present in a single secondary containment system, the capacity of the secondary containment system must be equal to or greater than the larger of the following values:

- 100% of the largest tank
- 30% of the total capacity of all tanks

The total capacity of the secondary containment surrounding two or more bulk storage tanks must not exceed 200,000 meters³ (52,800,000 gallons). Secondary containment with multiple tanks must be divided by dikes 0.7 meters high, so that each compartment does not contain more than one tank with a capacity of 20,000 meters³ or greater, or multiple tanks with a total capacity of 20,000 meters³ (5,280,000 gallons) or greater. The walls of the secondary containment must be at least 1 meter high. The minimum height of the containment walls and dikes can be modified for construction on sloping ground.

Secondary Containment for Other POL ASTs. All single-walled above-ground POL storage tanks with a capacity less than 190,000 liters (50,000 gallons) must also be provided with secondary containment (with the exception of tanks less than 1,000 liters [264.2 gallons] that store diesel, fuel oil, or lubricants).

For containment areas with a single tank, the containment must be capable of holding the entire contents of the largest single tank plus sufficient freeboard to allow for precipitation and expansion of product.

When multiple POL storage tanks are present in a single secondary containment system, the capacity of the secondary containment system must be equal to or greater than the larger of the following values:

- 100% of the largest tank
- 10% of the total capacity of all tanks

For single-walled diesel, fuel oil, or lubricants ASTs with a capacity of less than 1,000 liters (264.2 gallons), secondary containment can be provided by a collection tray with a capacity equal to at least 10% of the capacity of the tank.

C9.2.2 Permeability Standard. The maximum permeability for containment areas will be 10^{-7} cm/sec.

C9.2.3 Management of Stormwater. Drainage of stormwaters from containment areas will be controlled by a valve that is locked closed when not in active use.

Before draining stormwaters from containment areas, they will be inspected for petroleum sheen. If a petroleum sheen is present it must be collected with adsorbent material prior to drainage, or treated using an oil-water separator. Disposal of adsorbent material exhibiting the hazardous characteristics in Appendix A will be in accordance with Chapter 6 of this document.

C9.2.4 Spill & Overfill Protection. POL storage tanks with a capacity greater than 3,000 liters (792.6 gallons) must be equipped with devices to avoid spills or overfills during filling operations.

C9.2.5 Integrity Testing. A visual inspection of the AST wall must be conducted every 5 years if the AST capacity is greater than the following:

- Indoor gasoline ASTs: 300 liters (79.3 gallons)
- Outdoor gasoline ASTs: 500 liters (132.1 gallons)
- Indoor diesel fuel, fuel oil, or lubricants ASTs: 3,000 liters (792.6 gallons)
- Outdoor diesel fuel, fuel oil, or lubricants ASTs: 5,000 liters (1,321 gallons)

A visual inspection of the AST wall must be conducted every 10 years for ASTs with capacities less than or equal to the above sizes.

If deterioration is observed, the AST wall integrity must be assessed by a competent engineer or company.

Installations will document that these evaluations have been conducted and retain the records for the life of the tank.

C9.2.6 Inspections. Installations will conduct periodic inspections of their POL storage tanks to determine if the corresponding testing has been performed (see C9.2.5), and to verify if needed repairs have been made.

C9.2.7 Tank Registration & Authorization. Installations with POL ASTs with capacities greater than or equal to the following will provide information regarding their POL ASTs to the Spanish Base Commander (who may pursue registration of the ASTs in the corresponding Autonomous Community Register):

- Indoor gasoline ASTs: 50 liters (13.2 gallons)
- Outdoor gasoline ASTs: 100 liters (26.4 gallons)
- Indoor or outdoor diesel, fuel oil, or lubricants ASTs: 1,000 liters (264.2 gallons)

Installations will provide information regarding operation of their POL storage facilities (with the exception of liquid fuel storage facilities annexed to a combustion unit) to the Spanish Base Commander, who may seek the administrative authorization for operation of the facilities.

C9.3 TANK WASTES PROVISIONS

POL tank cleaning wastes frequently have hazardous characteristics (as defined in Chapter 6) and must be handled and disposed of according to the requirements of Chapter 6 of this document. These wastes and handling procedures include:

C9.3.1 Tank cleaning wastes (sludge and washwaters) that contain hydrocarbons will be disposed of as hazardous waste in accordance with Chapter 6.

C9.3.2 Tank bottom waters (which are periodically drained from bulk storage tanks) will be collected and disposed of in accordance with Chapter 6 of this document, unless testing confirms they do not have hazardous characteristics.

C9.4 GENERAL POL PIPELINE PROVISIONS FOR TESTING & MAINTENANCE

All pipeline facilities carrying POL must be tested and maintained in accordance with recognized U.S. or European industry standards. This includes these requirements:

C9.4.1 Each pipeline operator handling POL will prepare and follow a procedural manual for operations, maintenance, and emergencies.

C9.4.2 Each new pipeline facility and each facility in which pipe has been repaired, replaced, or relocated must be tested in accordance with recognized U.S. or European industry standards, without leakage before being placed in-service.

In addition, pipeline facilities must be tightness tested within 10 years of construction and every 5 years thereafter. The testing must be conducted in accordance with recognized U.S. industry standards or the Spanish norm UNE 100 151 (Tightness Testing for Pipelines) and must be capable of detecting a leak of 100 ml/hr. An accredited company must conduct the testing.

C9.5 GENERAL POL STORAGE OR TRANSFER FACILITY CONSTRUCTION

All POL storage or transfer facilities with a construction start date after 1 October 1994 will be designed and constructed to meet recognized U.S. (e.g., ASME, ASTM, ASA, API) or European (e.g., ISO, UNE, DIN, AFNOR) industry standards. New POL storage or transfer facilities will be constructed by authorized companies.

C9.6 POL SPILLS & LEAKS

To control accidental POL releases, the installation must follow the guidance in the spill plan required under C18.2 in Chapter 18.

ADMINISTRATIVE ITEMS

1. Installations will provide the Spanish Base Commander with sufficient information to pursue registration of their POL storage ASTs with capacities greater than or equal to the following:

- Indoor gasoline ASTs: 50 liters (13.2 gallons)
- Outdoor gasoline ASTs: 100 liters (26.4 gallons)
- Indoor or outdoor diesel, fuel oil, or lubricants ASTs: 1,000 liters (264.2 gallons)

2. Installations will provide information regarding operation of their POL storage facilities (with the exception of liquid fuel storage facilities annexed to a combustion unit) to the Spanish Base Commander, who may seek the administrative authorization for operation of the facilities.