

**§ 180.401**

**49 CFR Ch. I (10–1–04 Edition)**

(A) End joints are secured in the manner prescribed by the design.

(B) IBC walls are free from defects in wood. Inner protrusions which could puncture or abrade the liner must be covered.

(d) *Requirements applicable to repair of IBCs.* (1) Except for flexible and fiberboard IBCs and the bodies of rigid plastic and composite IBCs, damaged IBCs may be repaired and the inner receptacles of composite packagings may be replaced and returned to service provided:

(i) The repaired IBC conforms to the original design type, is capable of withstanding the applicable design qualification tests, and is retested and inspected in accordance with the applicable requirements of this section;

(ii) An IBC intended to contain liquids or solids that are loaded or discharged under pressure is subjected to a leakproofness test as specified in §178.813 of this subchapter and is marked with the date of the test; and

(iii) The IBC is subjected to the internal and external inspection requirements as specified in paragraph (b) of this section.

(iv) The person performing the tests and inspections after the repair must durably mark the IBC near the manufacturer's UN design type marking to show the following:

(A) The country in which the tests and inspections were performed;

(B) The name or authorized symbol of the person performing the tests and inspections; and

(C) The date (month, year) of the tests and inspections.

(2) Except for flexible and fiberboard IBCs, the structural equipment of an IBC may be repaired and returned to service provided:

(i) The repaired IBC conforms to the original design type and is capable of withstanding the applicable design qualification tests; and

(ii) The IBC is subjected to the internal and external inspection requirements as specified in paragraph (b) of this section.

(3) Service equipment may be replaced provided:

(i) The repaired IBC conforms to the original design type and is capable of

withstanding the applicable design qualification tests;

(ii) The IBC is subjected to the external visual inspection requirements as specified in paragraph (b) of this section; and

(iii) The proper functioning and leak tightness of the service equipment, if applicable, is verified.

(e) *Retest date.* The date of the most recent periodic retest must be marked as provided in §178.703(b) of this subchapter.

(f) *Record retention.* The owner or lessee of the IBC must keep records of periodic retests, initial and periodic inspections, and tests performed on the IBC if it has been repaired. Records must include design types and packaging specifications, test and inspection dates, name and address of test and inspection facilities, names or name of any persons conducting tests or inspections, and test or inspection specifics and results. Records must be kept for each packaging at each location where periodic tests are conducted, until such tests are successfully performed again or for at least 2.5 years from the date of the last test. These records must be made available for inspection by a representative of the Department on request.

[Amdt. 180-5, 59 FR 38079, July 26, 1994, as amended at 64 FR 10782, Mar. 5, 1999; 65 FR 58632, Sept. 29, 2000; 66 FR 45186, 45391, Aug. 28, 2001; 68 FR 45042, July 31, 2003]

**Subpart E—Qualification and Maintenance of Cargo Tanks**

**§ 180.401 Applicability.**

This subpart prescribes requirements, in addition to those contained in parts 107, 171, 172, 173 and 178 of this subchapter, applicable to any person responsible for the continuing qualification, maintenance or periodic testing of a cargo tank.

[Amdt. 180-2, 54 FR 25032, June 12, 1989, as amended at 55 FR 37065, Sept. 7, 1990]

**§ 180.403 Definitions.**

In addition to the definitions contained in §§171.8, 178.320(a) and 178.345-1 of this subchapter, the following definitions apply to this subpart:

*Corroded or abraded* means any visible reduction in the material thickness of the cargo tank wall or valve due to pitting, flaking, gouging, or chemical reaction to the material surface that affects the safety or serviceability of the cargo tank. The term does not include cosmetic or minor surface degradation that does not effect the safety or serviceability of the cargo tank.

*Corrosive to the tank or valve* means that the lading has been shown through experience or test data to reduce the thickness of the material of construction of the tank wall or valve.

*Delivery hose assembly* means a liquid delivery hose and its attached couplings.

*Modification* means any change to the original design and construction of a cargo tank or a cargo tank motor vehicle that affects its structural integrity or lading retention capability including changes to equipment certified as part of an emergency discharge control system required by § 173.315(n)(2) of this subchapter. Any modification that involves welding on the cargo tank wall must also meet all requirements for "Repair" as defined in this section. Excluded from this category are the following:

(1) A change to motor vehicle equipment such as lights, truck or tractor power train components, steering and brake systems, and suspension parts, and changes to appurtenances, such as fender attachments, lighting brackets, ladder brackets; and

(2) Replacement of components such as valves, vents, and fittings with a component of a similar design and of the same size.

*Owner* means the person who owns a cargo tank motor vehicle used for the transportation of hazardous materials, or that person's authorized agent.

*Piping system* means any component of a cargo tank delivery system, other than a delivery hose assembly, that contains product during loading or unloading.

*Rebarrelling* means replacing more than 50 percent of the combined shell and head material of a cargo tank.

*Repair* means any welding on a cargo tank wall done to return a cargo tank or a cargo tank motor vehicle to its original design and construction speci-

fication, or to a condition prescribed for a later equivalent specification in effect at the time of the repair. Excluded from this category are the following:

(1) A change to motor vehicle equipment such as lights, truck or tractor power train components, steering and brake systems, and suspension parts, and changes to appurtenances, such as fender attachments, lighting brackets, ladder brackets; and

(2) Replacement of components such as valves, vents, and fittings with a component of a similar design and of the same size.

(3) Replacement of an appurtenance by welding to a mounting pad.

*Replacement of a barrel* means to replace the existing tank on a motor vehicle chassis with an unused (new) tank. For the definition of tank, see § 178.320, § 178.345, or § 178.338-1 of this subchapter, as applicable.

*Stretching* means any change in length, width or diameter of the cargo tank, or any change to a cargo tank motor vehicle's undercarriage that may affect the cargo tank's structural integrity.

[Amdt. 180-2, 54 FR 25032, June 12, 1989, as amended at 55 FR 37065, Sept. 7, 1990; Amdt. 180-3, 57 FR 45466, Oct. 1, 1992; Amdt. 180-7, 59 FR 55177, Nov. 3, 1994; 60 FR 17402, Apr. 5, 1995; Amdt. 180-10, 61 FR 51342, Oct. 1, 1996; 63 FR 52850, Oct. 1, 1998; 64 FR 28050, May 24, 1999; 68 FR 19286, Apr. 18, 2003; 69 FR 54047, Sept. 7, 2004]

#### § 180.405 Qualification of cargo tanks.

(a) *General.* Unless otherwise provided in this subpart, each cargo tank used for the transportation of hazardous material must be an authorized packaging.

(b) *Cargo tank specifications.*

(1) To qualify as an authorized packaging, each cargo tank must conform to this subpart, the applicable requirements specified in part 173 of this subchapter for the specific lading, and where a DOT specification cargo tank is required, an applicable specification in effect on the date initial construction began: MC 300, MC 301, MC 302, MC 303, MC 304, MC 305, MC 306, MC 307, MC 310, MC 311, MC 312, MC 330, MC 331, MC 338, DOT 406, DOT 407, or DOT 412 (§§ 178.337, 178.338, 178.345, 178.346,