

**§ 173.213 Non-bulk packagings for solid hazardous materials in Packing Group III.**

(a) When §172.101 of this subchapter specifies that a solid hazardous material be packaged under this section, only non-bulk packagings prescribed in this section may be used for its transportation. Each package must conform to the general packaging requirements of subpart B of part 173, to the requirements of part 178 of this subchapter at the Packing Group I, II or III performance level, and to the requirements of the special provisions of column 7 of the §172.101 table.

(b) The following combination packagings are authorized:

*Outer packagings:*

Steel drum: 1A1 or 1A2  
 Aluminum drum: 1B1 or 1B2  
 Metal drum other than steel or aluminum: 1N1 or 1N2  
 Plywood drum: 1D  
 Fiber drum: 1G  
 Plastic drum: 1H1 or 1H2  
 Wooden barrel: 2C2  
 Steel jerrican: 3A1 or 3A2  
 Plastic jerrican: 3H1 or 3H2  
 Aluminum jerrican: 3B1 or 3B2  
 Steel box: 4A  
 Aluminum box: 4B  
 Natural wood box: 4C1 or 4C2  
 Plywood box: 4D  
 Reconstituted wood box: 4F  
 Fiberboard box: 4G  
 Solid plastic box: 4H2

*Inner packagings:*

Glass or earthenware receptacles  
 Plastic receptacles  
 Metal receptacles  
 Glass ampoules

(c) The following single packagings are authorized:

Steel drum: 1A1 or 1A2  
 Aluminum drum: 1B1 or 1B2  
 Plywood drum: 1D  
 Plastic drum: 1H1 or 1H2  
 Fiber drum: 1G  
 Metal drum other than steel or aluminum: 1N1 or 1N2  
 Wooden barrel: 2C1 or 2C2  
 Steel jerrican: 3A1 or 3A2  
 Plastic jerrican: 3H1 or 3H2  
 Aluminum jerrican: 3B1 or 3B2  
 Steel box: 4A  
 Steel box with liner: 4A  
 Aluminum box: 4B  
 Aluminum box with liner: 4B  
 Natural wood box: 4C1  
 Natural wood box, sift proof: 4C2  
 Plywood box: 4D

Reconstituted wood box: 4F  
 Fiberboard box: 4G  
 Expanded plastic box: 4H1  
 Solid plastic box: 4H2  
 Bag, woven plastic: 5H1, 5H2 or 5H3  
 Bag, plastic film: 5H4  
 Bag, textile: 5L1, 5L2 or 5L3  
 Bag, paper, multiwall, water resistant: 5M2  
 Plastic receptacle in steel, aluminum, plywood, fiber or plastic drum: 6HA1, 6HB1, 6HD1, 6HG1 or 6HH1  
 Plastic receptacle in steel, aluminum, wood, plywood or fiberboard box: 6HA2, 6HB2, 6HC, 6HD2 or 6HG2  
 Glass, porcelain or stoneware in steel, aluminum, plywood or fiber drum: 6PA1, 6PB1, 6PD1 or 6PG1  
 Glass, porcelain or stoneware in steel, aluminum, wooden or fiberboard box: 6PA2, 6PB2, 6PC or 6PG2  
 Glass, porcelain or stoneware in expanded or solid plastic packaging: 6PH1 or 6PH2  
 Cylinders, as prescribed for any compressed gas, except for Specification 8 and 3HT

[Amdt. 173-224, 55 FR 52643, Dec. 21, 1990, as amended by Amdt. 173-241, 59 FR 67511, 67518, Dec. 29, 1994; Amdt. 173-261, 62 FR 24734, May 6, 1997; 69 FR 76158, Dec. 20, 2004; 70 FR 34398, June 14, 2005]

**§ 173.214 Packagings which require approval by the Associate Administrator.**

When §172.101 of this subchapter specifies that a hazardous material be packaged under this section, packagings and method of shipment must be approved by the Associate Administrator prior to the first shipment.

[Amdt. 173-224, 55 FR 52643, Dec. 21, 1990, as amended at 66 FR 45379, Aug. 28, 2001]

**§ 173.216 Asbestos, blue, brown or white.**

(a) Asbestos, blue, brown or white, includes each of the following hydrated mineral silicates: chrysolite, crocidolite, amosite, anthophyllite asbestos, tremolite asbestos, actinolite asbestos, and every product containing any of these materials.

(b) [Reserved]

(c) Packagings for asbestos must conform to the general packaging requirements of subpart B of this part but need not conform to the requirements of part 178 of this subchapter. Asbestos must be offered for transportation and transported in—

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(1) Rigid, leaktight packagings, such as metal, plastic or fiber drums, portable tanks, hopper-type rail cars, or hopper-type motor vehicles;

(2) Bags or other non-rigid packagings in closed freight containers, motor vehicles, or rail cars that are loaded by and for the exclusive use of the consignor and unloaded by the consignee;

(3) Bags or other non-rigid packagings which are dust and sift-proof. When transported by other than private carrier by highway, such packagings containing asbestos must be palletized and unitized by methods such as shrink-wrapping in plastic film or wrapping in fiberboard secured by strapping. Pallets need not be used during transportation by vessel for loads with slings that are unitized by methods such as shrink-wrapping, if the slings adequately and evenly support the loads and the unitizing method prevents shifting of the bags or other non-rigid packagings during conditions normally incident to transportation; or

(4) Bags or other non-rigid packagings which are dust and sift-proof in strong outside fiberboard or wooden boxes.

[Amdt. 173-224, 55 FR 52643, Dec. 21, 1990, as amended at 66 FR 45379, Aug. 28, 2001; 68 FR 45034, July 31, 2003]

**§ 173.217 Carbon dioxide, solid (dry ice).**

(a) Carbon dioxide, solid (dry ice), when offered for transportation or transported by aircraft or water, must be packed in packagings designed and constructed to permit the release of carbon dioxide gas to prevent a build-up of pressure that could rupture the packagings. Packagings must conform to the general packaging requirements of subpart B of this part but need not conform to the requirements of part 178 of this subchapter. For each shipment by air exceeding 2.3 kg (5 lbs) per package, advance arrangements must be made between the shipper and each carrier.

(b) Railroad cars and motor vehicles containing solid carbon dioxide, when accepted for transportation on board ocean vessels, must be conspicuously marked on two sides "WARNING CO<sub>2</sub> SOLID (DRY ICE)."

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(c) Other packagings containing solid carbon dioxide, when offered or accepted for transportation on board ocean vessels, must be marked "CARBON DIOXIDE, SOLID—DO NOT STOW BELOW DECKS."

(d) Not more than 200 kg (441 pounds) of solid carbon dioxide may be transported in any one cargo compartment or bin on any aircraft except by specific and special written arrangement between the shipper and the aircraft operator.

(e) Carbon dioxide, solid (dry ice) is excepted from the shipping paper and certification requirements of this subchapter if the requirements of paragraphs (a) and (d) of this section are complied with and the package is marked "Carbon dioxide, solid" or "Dry ice" and marked with an indication that the material being refrigerated is used for diagnostic or treatment purposes (e.g., frozen medical specimens).

[Amdt. 173-224, 55 FR 52643, Dec. 21, 1990, as amended by Amdt. 173-138, 59 FR 49133, Sept. 26, 1994]

**§ 173.218 Fish meal or fish scrap.**

(a) Except as provided in Column (7) of the HMT in §172.101 of this subchapter, fish meal or fish scrap, containing at least 6%, but not more than 12% water, is authorized for transportation by vessel only when packaged as follows:

- (1) Burlap (jute) bag;
- (2) Multi-wall paper bag;
- (3) Polyethylene-lined burlap or paper bag;
- (4) Cargo tank;
- (5) Portable tank;
- (6) Rail car; or
- (7) Freight container.

(b) [Reserved]

(c) When fish scrap or fish meal is offered for transportation by vessel in bulk in freight containers, the fish meal must contain at least 100 ppm of anti-oxidant (ethoxyquin) at the time of shipment.

[Amdt. 173-224, 55 FR 52643, Dec. 21, 1990, as amended at 68 FR 45034, July 31, 2003]

**§ 173.219 Life-saving appliances.**

(a) A life-saving appliance, self-inflating or non-self-inflating, containing