U.S. Department of Transportation
Research and Special Programs Administration

400 Seventh Street S.W.
Washington, D.C. 20590

DOT-E 9400
(SEVENTH REVISION)

SEP 1 1998

EXPIRATION DATE: JULY 31, 2000

(FOR RENEWAL, SEE 49 CFR 107.109)

1. GRANTEE: Poly Processing Company, Inc.
Monroe, Louisiana

2. PURPOSE AND LIMITATIONS: This exemption authorizes the manufacture, mark, and sale of a non-DOT specification rotationally molded, spherical polyethylene portable tank enclosed in a steel skid unit having a nominal capacity of 1,080 gallons, used for the transportation of the hazardous materials listed in paragraph 6 below and provides no relief from any regulation other than as specifically stated herein.

3. REGULATORY SYSTEM AFFECTED: 49 CFR Part 106, 107 and 171-180.

4. REGULATIONS FROM WHICH EXEMPTED: 49 CFR 172.101 and the word "NONE", in that the entry for Explosive, blasting, type E, does not authorize bulk packaging, 172.102(c)(3) Note B53, 173.242, 173.243, 176.83, 176.415, Part 178, Subpart H.

5. BASIS: This exemption is based on Poly Processing Company, Inc.'s application dated November 24, 1997, submitted in accordance with 107.109 and supplemental information dated August 11, 1998.

6. HAZARDOUS MATERIALS (49 CFR 172.101):

Hazardous materials authorized	Hazard Class/ Division	Identi-fication Number	Packing Group
Class 8 liquids for which a DOT specification UN1H1 reusable polyethylene container is prescribed in 49 CFR Part 173, and which have no secondary hazards and a pressure of no greater than 14.7 psia at 130°F.	8	as appli-cable	as appli-cable

Hazardous materials authorized	Hazard Class/ Division	Identi-fication Number	Packing Group
Nitric acid solutions, *with not more than 10% nitric acid.* (not authorized for shipment by cargo vessel.)	8	UN2031	II
Hydrogen peroxide, aqueous solutions, *with more than 40 percent but not more than 60 percent hydrogen peroxide (stabilized as necessary).*	5.1	UN 2014	II
Hydrogen peroxide, aqueous solutions, *with not less than 20 percent but not more than 40 percent hydrogen peroxide (stabilized as necessary).*	5.1	UN 2014	II
Isoproponal, and class 3 materials which are compatible with polyethylene and have no secondary hazards, a flash point of 73°F or higher and a vapor pressure of no greater than 14.7 psia at 130°F; and other class 3 materials which are specifically identified to, and acknowledged in writing, by the Office of Hazardous Materials Exemptions and Approvals (OHMEA) prior to the first shipment. Isopropanol may not be shipped by cargo vessel.	3	as appli-cable	as appli-cable
Explosive, blasting, type E *or* Agent blasting, type E.	1.5D	UN 0332	II

7. SAFETY CONTROL MEASURES:

a. Packaging prescribed is a non-DOT specification rotationally-molded, spherical polyethylene portable tank enclosed in a steel skid unit as described in Poly Processing drawings on file with OHMEA. The polyethylene portable tank has nominal capacity of 1,080 gallons and may be provided with a bottom discharge opening. When provided, the bottom discharge opening is equipped with three serially-mounted closures consisting of an internal discharge valve, an external valve and leak tight cover. The outlet of the external valve must be covered with a leak tight cover capable of retaining the tank test pressure without leakage or distortion. The cover must be equipped with a positive mechanical means to prevent unintentional loosening of the cover. The polyethylene portable tank and steel skid unit must be as shown on the Poly Processing drawings included in the petitioner's application and Poly Processing drawing entitled "Tank Top Product Removal System", dated December 19, 1985. Each portable tank must be made from high density cross-linkable polyethylene which has been specifically identified and is acceptable to the OHMEA.

(i) Each portable tank must be permanently marked by embossment or with a metal certification plate permanently affixed to each tank. Where the tank is marked by embossment on the polyethylene unit, the Serial Number and Date of Manufacture may be etched or stamped into the polyethylene. Where stamping or etching is performed on the tank, the marked area may not be reduced below the minimum thickness prescribed herein. The markings must be in letters and numbers at least ¼-inch high located on the side of the tank. The markings shall be understood to certify that the portable tank complies with all requirements of this exemption and must contain at least the following information:

DOT-E 9400 portable tank
Tank manufacturer _____
Test pressure 25 psig.
Serial number _____
Date of manufacture (month and year) _____
Tare weight _____ lbs.
Rated gross weight _____ lbs.
Capacity _____ U.S. gal.

(ii) Each portable tank shall be tested by retaining for 15 minutes, hydrostatic pressure of at least 25 psig at equilibrium without leakage or pressure drop.

b. Each tank must be fitted with pressure relief devices that will limit the pressure in the tank to 20 psig. Each tank must be equipped with a spring-loaded pressure relief valve which meets 49 CFR 178.270-11(d)(1).

(i) The total venting capacity of each portable tank must be in accordance with 49 CFR 178.270-11(d)(2). The spring-loaded pressure relief valve must open at not less than 15 psig and not over 20 psig.

c. Portable tanks must be capable of satisfactorily withstanding the following tests:

(i) Hydrostatic pressure test as specified in paragraph 7.a.(ii) above.

(ii) Drop Test. A container filled to 98% capacity with a solution compatible with polyethylene and which remains liquid at 0°F and dropped from a height of 4 feet. The container may be dropped onto a one-inch thick steel plate on any part of the container when container and contents are at or slightly below 0°F. Filled container shall be stored at 0°F or lower temperature, for at least 4 hours immediately preceding test.

(iii) Vibration Test. The test must be performed for 1 hour using a minimum double amplitude of 1 inch at a frequency that causes the test tank to be raised from the floor of the testing table so a piece of flat steel strap may be passed between the tank and the table. The tank must be restrained so that all horizontal motion is permitted.

d. The nominal thickness of the portable tank, is 0.625 inch with a minimum thickness measured at any point on the container of 0.4375 inch.

e. Additionally, each portable tank must possess the chemical and physical properties as reported to the OHMEA by enclosures to petitioner's application.

f. Any changes in design, resin, or process methods must be approved by the OHMEA. Prototype test results for the test required in paragraph 7.c. of this exemption must accompany any request for changes in design, resin, or process methods.

g. Reuse of any portable tank must be in accordance with the applicable requirements of 49 CFR 173.28. Additionally, each portable tank must be hydrostatically retested at least once every two and a half years and visually inspected as specified in 49 CFR 173.32(e) for DOT Specification 57 portable tanks except as modified herein:

(i) Hydrostatic test- Each tank must be tested at a minimum pressure of 25 psig for 15 minutes with no drop in pressure of leakage.

(ii) Visual inspection- The visual inspection must include the following:

(1) The tank, and steel skid unit must be carefully inspected for corroded areas, dents, distortions, defeats in welds, and other conditions that might render the tank unsafe for service;

(2) The piping, valves, and gaskets shall be carefully inspected for corroded areas, defects in welds, and other conditions, including leakage, that might render the tank unsafe for service;

(3) Missing or loose bolts or nuts on any flanged connection or blank flange must be replaced or tightened;

(4) All emergency devices and valves must be free from corrosion, distortion and any damage or defect that could prevent their normal operation;

(5) Required markings on the tank must be legible;

(6) Spring-loaded pressure relief valves must be removed from the tank and tested to ensure operation at the set pressure specified in this exemption.

Any tank that fails must be rejected and may not be used again for the transportation of hazardous materials. The date of the most recent periodic retest must be marked on the tank near the tank identification markings required in paragraph 7.a.(i) of this exemption. The owner of the tank or his authorized agent must retain a written record indicating the date and result of all required tests and the name and address of the tester, until the next retest has been satisfactorily completed and recorded.

h. Portable tanks with repaired bodies are not authorized.

i. Commodities must be compatible with the polyethylene (PE) portable tank, and may not permeate the PE to an extent that a hazardous condition could be caused during transportation and handling.

j. Portable tanks for hydrogen peroxide must have a vented closure to prevent accumulation of internal pressure.

k. Each fitting which could be damaged sufficiently to result in leakage of tank contents must be protected by suitable guards or protective housings. Fittings include valves, closure devices, safety relief devices and other accessories through which contents could leak from the tank.

l. Tanks must always be filled and shipped while enclosed in the steel skid unit as show in the petitioner's application.

m. The portable tank must be sealed using the procedure specified in Appendix I of the exemption application.

8. SPECIAL PROVISIONS:

a. Offerors for transportation of the hazardous materials specified in this exemption may use the packaging described in this exemption for the transportation of such hazardous materials so long as no modifications or changes are made to the packages, all terms of this exemption are complied with, and a copy of the current exemption is maintained at each facility from which such offering occurs.

b. Each portable tank must be plainly marked on both sides near the middle, in letters at least two inches high on a contrasting background, "DOT-E 9400.

c. Shipments by rail must be in compliance with the requirements of 49 CFR 174.63(a) and (c).

d. No corrosive liquids for which bottom outlets are prohibited by 49 CFR 172.101, Column 7, T Codes, may be transported by vessel in polyethylene portable tanks that have bottom openings.

e. Each portable tank used to ship Nitric acid solution must be visually inspected once every four months for evidence of oxidation, embrittlement, discoloration, stress cracking or crazing, container collapse, or any other condition which would adversely affect the tanks structural integrity. Any tank showing such evidence must be immediately removed from service and have its serial number reported to the OHMEA.

f. When a blasting agent is transported in a portable tank under this exemption:

(i) The bulk blasting agent may not be allowed to remain in the portable for any time period that could result in caking. The equipment must be cleaned frequently enough to assure against any accumulation of product in or on the packaging.

(ii) Drivers must have been instructed as to necessary safeguards and proper procedure in the event of unusual delay, fire, or accident. A copy of written instructions must be provided to the master of cargo vessels used to transport bulk blasting agents under this exemption.

g. For transportation of blasting agents by cargo vessel:

(i) The portable tanks must be stowed "on deck only".

(ii) The blasting agents must be segregated from other hazardous materials in accordance with the requirements for Division 1.5 Explosives. In addition, the blasting agents must be stowed "separate from" non-regulated readily combustible materials, as defined in 49 CFR 176.83(d).

(iii) The portable tanks must be stowed in a readily accessible location which can be reached by at least two streams of water from separate fire hydrants or if carried on an unmanned barge by an effective stream of water from a vessel alongside.

(iv) Before packages of a blasting agent covered by this exemption are loaded on or discharged from a vessel at any place in the United States, the carrier must obtain a permit from the Coast Guard Captain of the Port. A copy of this exemption must be provided to the Captain of the Port when requesting a permit.

h. For transportation by motor vehicle:

(i) The portable tank must be secured to the motor vehicle by a system which conforms to the requirements of 49 CFR 393.100 through 393.106 and must be located at least six inches forward of the motor vehicle's rear bumper;

(ii) The portable tank may be filled or discharged while attached to the motor vehicle. Additionally, when provided, each bottom outlet must be fitted with an internal valve as specified in paragraph 7(a). The internal valve must be fitted with a remote means of closure located as far as possible from the loading/unloading hose connection. The remote means of closure must be activated manually. For other than corrosive service, the remote means of closure must also be activated thermally. Thermally activated closures must be operated at a temperature between 230° F and 250° F.

i. The portable tank assembly must be lifted by a forklift or by use of a spreader bar as shown on the Poly Processing drawing submitted November 22, 1985. Additionally, each portable tank assembly must be marked "Lifting devices must have a five ton minimum rating".

j. A copy of this exemption, in its current status, must be maintained at each manufacturing facility at which this packaging is manufactured and must be made available to a DOT representative upon request.

k. Each packaging manufactured under the authority of this exemption must be either (1) marked with the name of the manufacturer and location (city & state) of the facility at which it is manufactured or (2) marked with a registration symbol designated for a specific manufacturing facility.

9. MODES OF TRANSPORTATION AUTHORIZED. Motor vehicle, rail freight, and cargo vessel.

10. MODAL REQUIREMENTS: A copy of this exemption must be carried aboard each vessel used to transport packages covered by this exemption.

11. COMPLIANCE: Failure by a person to comply with any of the following may result in suspension or revocation of this exemption and penalties prescribed by the Federal hazardous materials transportation law, 49 U.S.C. Section 5101 et seq:

    - All terms and conditions prescribed in this exemption and the Hazardous Materials Regulations, Parts 171-180.

    - Registration required by 49 CFR 107.601 et seq., when applicable.

    Each "Hazmat employee", as defined in 49 CFR 171.8, who performs a function subject to this exemption must receive training on the requirements and conditions of this exemption in addition to the training required by 49 CFR 172.700 through 172.704.

    No person may use or apply this exemption, including display of its number, when the exemption has expired or is otherwise no longer in effect.

12. REPORTING REQUIREMENTS: The carrier is required to report any incident involving loss of packaging contents or packaging failure to the Associate Administrator for Hazardous Materials Safety (AAHMS) as soon as practicable. (49 CFR 171.15 and 171.16 apply to any activity undertaken under the authority of this exemption.) In addition, the holder(s) of this exemption must inform the AAHMS, in writing, of any incident involving the package and shipments made under the terms of this exemption.

Issued at Washington, D.C.

Ann Mazzullo 9/1/98

Alan I. Roberts (DATE)
Associate Administrator
for Hazardous Materials Safety

Address all inquiries to: Associate Administrator for Hazardous Materials Safety, Research and Special Programs Administration, Department of Transportation, Washington, D.C. 20590. Attention: DHM-31.

The original of this exemption is on file at the above office. Photo reproductions and legible reductions of this exemption are permitted. Any alteration of this exemption is prohibited.

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