



U.S. Department  
of Transportation

Research and  
Special Programs  
Administration

AUG 12 1994

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

DOT-E 8956  
(THIRD REVISION)

EXPIRATION DATE: August 31, 1995

(FOR RENEWAL, SEE 49 CFR 107.105.)

1. GRANTEE: Texsteam, Incorporated  
Houston, Texas
2. PURPOSE AND LIMITATIONS: This exemption authorizes the manufacture, marking and sale of non-DOT specification cylinders, used in oil well sampling operations, for the transportation in commerce of certain Class 3, Division 2.1 and 2.2 materials. This exemption provides no relief from any regulation other than as specifically stated herein.
3. REGULATORY SYSTEM AFFECTED: 49 CFR Parts 106, 107 and 171-180.
4. REGULATIONS FROM WHICH EXEMPTED: 49 CFR Sections 173.201; 173.304(a)(1), and (b)(1); 175.3; 178.42.
5. BASIS: This exemption is based on Texsteam, Incorporated's (formerly Clif Mock Co.) application dated September 1, 1993 submitted in accordance with 49 CFR 107.105 and supplemental letter dated December 20, 1993 and July 15, 1994.
6. HAZARDOUS MATERIALS (49 CFR 172.101):

Hazardous materials description/proper shipping name	Hazard Class/ Division	Identification Number	Packing Group
Argon, compressed	Division 2.2	UN1006	N/A
Helium, compressed	Division 2.2	UN1046	N/A
Hydrocarbon gases, compressed, n.o.s.	Division 2.1	UN1964	N/A
Nitrogen, compressed	Division 2.2	UN1066	N/A
Liquefied petroleum gas	Division 2.1	UN1075	N/A
Petroleum oil	Class 3	UN1270	I

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7. PACKAGING(S) and SAFETY CONTROL MEASURES: Packaging prescribed is a stainless steel non-DOT specification cylinder having a marked service pressure of 1800 psi, constructed from seamless stainless steel tubing, with threaded end caps or with flanged flat head end closures at each end restrained by tie rods, and containing a floating piston which forms two pressure chambers. Cylinder must conform with drawings and calculations on file with the Office of Hazardous Materials Exemptions and Approvals (OHMEA) and with DOT 3E specification (49 CFR 178.42) except as follows:

§ 178.42-2 Type, size and service pressure.

(a) Type and size. Seamless cylinder conforming with the following:

(1) One model piston style receptacle has flat heads on each end threaded into main body, maximum volume may not exceed 1,000 cc.

(2) Two models piston style receptacle has flat heads restrained with tie rods secured at each end by nuts or with tie rods threaded into an end cap and secured by nuts on the other end; maximum volume may not exceed 1,000 cc.

(3) Dimensions are as follows:

<u>Drawings</u> <u>(inch)</u>	<u>No. and size of</u> <u>tie rods.</u>	<u>Maximum O.D.</u> <u>x length</u>	<u>Minimum Side wall</u> <u>thickness</u>
8500322		2.0 x 24	.105 if threaded, .083 if not threaded,
5014-2381676	6 x 5/16	2.0 x 18	.083
5014-2881650	6 x 5/16	2.0 x 12.5	.083

(b) \* \* \*

§ 178.42-5 Steel.

(a) All cylinder components must be Types 304 or 316 stainless steel.

§ 178.42-10 Safety devices and protection for valves,  
safety devices and other connections if  
applied.

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(b) (added) Each head must be equipped with safety relief devices.

§ 178.42-11 Hydrostatic test.

(a) Hydrostatic test must be as follows:

(1) Each compartment of each piston style receptacle must be subjected to a pneumatic test of at least 500 psi without leakage.

(2) Each cylinder (the seamless tube with end caps but without pistons, and with tie bolts, if applicable) must be tested to a hydrostatic test of 3,600 psig and show no defect.

(3) In addition, one cylinder (seamless tube with end caps but without pistons, and with tie bolts, if applicable) out of each lot of 500 cylinders or less, must be pressurized to failure. The pressure at which the cylinder fails to hold test pressure shall be recorded. This pressure must not be less than 5,000 psi. Rate of pressurization must not exceed 200 psi per second.

§ 178.42-12 Leakage test.

Does not apply. Instead, the tube body of one cylinder from each lot that has passed the tests prescribed in § 178.42-11(a)(2) of this exemption, must be flattened to at least 10 times wall thickness without cracking.

§ 178.42-14 Marking.

(a) \* \* \*

(1) DOT-E 8956 1800 in lieu of DOT 3E 1800.

\* \* \* \* \*

§ 178.42-15 Inspector's report.

(a) (added) The inspectors report may be revised to accommodate the tests required by this exemption.

(b) (added) A copy of the inspector's report on the first lot out of each design must be submitted to the OHMEA.

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8. SPECIAL PROVISIONS:

a. Each cylinder must be visually reinspected at least once a year for deterioration of seals, scratches, dents and gouges. At this time the end caps, tie rods and indicating rods must be thoroughly cleaned with an appropriate solvent recommended by the manufacturer.

b. Each cylinder must be overpacked for shipment in accordance with 49 CFR 173.301(k)(1).

c. The cylinder may be used only for oil-well and LP gas sampling service.

d. The cylinder must be filled so that the cylinder is not liquid full with lading at 130 degrees F.

e. 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.

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

g. 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.

h. Shippers using the packaging covered by this exemption must comply with all provisions of this exemption, and all other applicable requirements contained in 49 CFR Parts 171-180.

9. MODES OF TRANSPORTATION AUTHORIZED: Motor vehicle, cargo vessel, or cargo aircraft only.

10. MODAL REQUIREMENTS: A copy of this exemption must be carried aboard each cargo vessel, or aircraft used to transport packages covered by this exemption. In accordance with the provisions of 49 CFR Part 107, Appendix B to Subpart B, paragraph 3, the shipper shall furnish a copy of this exemption to the air carrier before or at the time the shipment is tendered.

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 laws:

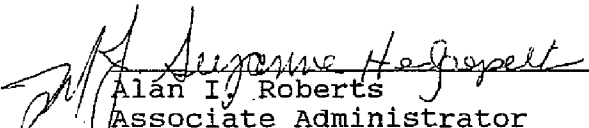
- o All terms and conditions prescribed in this exemption and the Hazardous Materials Regulations, 49 CFR Parts 171-180.
- o Registration required by 49 CFR 107.601 et seq., when applicable.

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 unless a regulation has been amended making the exemption no longer necessary.

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 also inform the AAHMS, in writing, as soon as practicable of any incidents involving the package and shipments made under this exemption.

Issued at Washington, D.C.

AUG 12 1994

  
Alan I. Roberts  
Associate Administrator  
for Hazardous Materials Safety

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(DATE)

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.

Dist: FHWA, FAA, USCG