

U.S.Department of Transportation

Research and Special Programs Administration DOT-E 11915

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

EXPIRATION DATE: June 30, 2000

(FOR RENEWAL, SEE 49 CFR 107.109)

- 1. <u>GRANTEE:</u> Lockheed Martin Aeronautical Systems Marietta, GA
- 2. PURPOSE AND LIMITATION: This exemption authorizes an alternative maintenance/inspection program in lieu of that required in 49 CFR \$173.34(e) for certain DOT specification cylinders used as components in aircraft fire suppressant systems and authorizes the transportation in commerce of cylinders maintained and inspected in accordance with this exemption. This exemption provides no relief from any regulation other than as specifically stated herein.
- 3. <u>REGULATORY SYSTEM AFFECTED:</u> 49 CFR Parts 106, 107 and 171-180.
- 4. <u>REGULATIONS FROM WHICH EXEMPTED:</u> 49 CFR Section 173.34(e) in that an alternative maintenance/inspection program is authorized in lieu of hydrostatic testing.
- 5. <u>BASIS:</u> This exemption is based on the application of Lockheed Martin Aeronautical Systems dated May 14, 1997, and supplemental information dated February 17, 1998, submitted in accordance with 49 CFR 107.105 and the public proceeding thereon.
- 6. HAZARDOUS MATERIALS (49 CFR 172.101):

Hazardous materials description/proper shipping name	Hazard Class/ Division	Identification number	Packing Group
Dibromodifluoromethane	9	UN 1941	III

7. PACKAGING AND SAFETY CONTROL MEASURES:

a. <u>PACKAGING</u> - Packaging prescribed is a DOT 4DS specification cylinder, and is subjected to the alternate maintenance program described herein. This alternate maintenance program is authorized in lieu of the retest requirements prescribed in 49 CFR \$173.34(e).

- (1) The cylinders covered under this exemption are used exclusively in fire suppressant systems for engines or in Auxiliary Power Units (APU), in the C-5A and C-5B Galaxy military cargo aircraft operated and maintained by the US Air Force.
- (2) Each charged cylinder is installed as a part of a specific design type installation by the original airframe manufacturer, or in accordance with an installation procedure approved by the US Air Force.
- (3) Each cylinder must be identified by its part and serial number and the DOT specification.
- (4) Periodic maintenance/inspection program:
 - (i) The US Air Force shall establish a written periodic maintenance/inspection program for the cylinders covered by this exemption which shall comply with the airframe and cylinder manufacturer's recommended maintenance/inspection programs. The periodic maintenance/inspection program shall identify the new hydrostatic test requirements, allowing a 14 year hydrostatic test cycle. The periodic maintenance/inspection program must be a supplementary part to FAA certificate holder's manual required to be prepared and maintained per 14 CFR Subpart L Section 121.369. A copy of the maintenance/inspection program must be on file with the US Air Force.
 - (ii) Each cylinder shall be periodically inspected to ensure that the required internal pressure and weight of contents is maintained, and that the valving, safety relief devices, mounting brackets, and associated instrumentation are secure and acceptable for continued safe service.
 - (iii) Any cylinder removed from an aircraft for any reason must be inspected to determine that the required internal pressure and weight of contents is within acceptable limits and that there is no visual evidence of degradation of the cylinder or attached appurtenances. Cylinders showing degradation or loss of contents must be retested and requalified as prescribed in 49 CFR \$173.34(e).

- (iv) Cylinders discharged for any reason must be retested as prescribed in 49 CFR \$173.34(e).
- (v) Cylinders may remain in service without the required periodic retesting, reinspection and marking as prescribed in 49 CFR 173.34(e) so long as they meet the criteria contained in paragraphs 7(a)(4)(i), 7(a)(4)(ii) and 7(a)(4)(iii), and are not discharged for any reason.
- (vi) The US Air Force shall institute a monitoring program to routinely collect information pertaining to discrepancies, and action taken on each cylinder under the maintenance/inspection program as well as detailed information on all cylinders in the population which must be retested as required by 49 CFR §173.34(e). The data must be entered on the "High Pressure Cylinder Maintenance Data Sheet" attached as Appendix A to this exemption.

8. SPECIAL PROVISIONS:

- a. Packages covered by this exemption, which are removed from aircraft, may be offered for transportation for repair, reconditioning, retest, or maintenance. Persons who may use this provision are Lockheed Martin Aeronautical Systems or US Air Force personnel, and personnel at a DOT approved repair, retest and refill facility.
- b. 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.
- c. MARKING Each cylinder covered by this exemption must be plainly and durably marked "DOT-E 11915" in proximity to existing DOT markings.
- 9. MODES OF TRANSPORTATION AUTHORIZED: Motor vehicle, rail freight, cargo aircraft, and passenger aircraft.
- 10. <u>MODAL REGUIREMENTS:</u> A copy of this exemption must be maintained as a part of the maintenance/inspection and retest records by US Air Force.
- 11 <u>COMPLIANCE</u>: 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 <u>et seq</u>:

continuation of DOT-E 11915

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- 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 seg., 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.

12. REPORTING REQUIREMENTS:

- At least once a year, the US Air Force shall submit a report of the information collected as required in paragraph 7 to the AAHMS. A hard copy of the same must be made available to a designated DOT official upon request.
- In addition to any FAA requirement, each operator covered under this exemption is required to report to the AAHMS as soon as practicable, when any incident involving loss of packaging contents or packaging failure occurs. (49 CFR 171.15 and 171.16 apply to any activity undertaken under the authority of this exemption.)

Issued at Washington, D.C.:

JUL 28 1998

(DATE)

Alan I. Roberts

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.

Dist: FHWA, FRA, and FAA.

APPENDIX A

HIGH PRESSURE CYLINDER MAINTENANCE DATA SHEET

A copy of this appendix must be copied from the original issue of this exemption and attached to any revision thereto.

HIGH PRESSURE CYLINDER MAINTENANCE DATA SHEET

Part	Serial	Size	Test	Volum	Volumetric Expansion	nolstre	Visual	Removall	Teated	Remarks
	MUMBER	(volume)	rressure	Total	Perm	Efastic	Inspection	Disposition Codes	<u>a</u>	(Include Component Replacement/Repair)
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Disposition Codes:

I hereby cause when all of the above leats were made under my supervision and its eccondance with DOT regulations and DOT-E-19990. (Shnature, The of Responsible Individual) Reason For Russival Codes:
1. Discharged
2. Low Pressure
3. Desiraged
4. Oher Matteration
5. Scheduled Maintenance
5. Scheduled Maintenance