

March 17, 2006



U.S. Department  
of Transportation

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

**Pipeline and  
Hazardous Materials  
Safety Administration**

DOT-SP 10497  
(EIGHTH REVISION)

EXPIRATION DATE: January 31, 2010

(FOR RENEWAL, SEE 49 CFR § 107.109)

1. GRANTEE: Lockheed Martin Commercial Space Systems  
Newtown, PA
2. PURPOSE AND LIMITATION:
  - a. This special permit authorizes the transportation in commerce of certain non-DOT specification stainless steel tanks containing dinitrogen tetroxide. This special permit provides no relief from the Hazardous Materials Regulations (HMR) other than as specifically stated herein.
  - b. The safety analyses performed in development of this special permit only considered the hazards and risks associated with transportation in commerce.
  - c. Party status will not be granted to this special permit.
3. REGULATORY SYSTEM AFFECTED: 49 CFR Parts 106, 107 and 171-180.
4. REGULATIONS FROM WHICH EXEMPTED: 49 CFR § 173.336 in that a non-DOT specification packaging is not authorized, except as specified herein; § 177.834(m), except as specified herein.
5. BASIS: This special permit is based on the application of Lockheed Martin Commercial Space Systems dated February 1, 2006 submitted in accordance with § 107.109.

6. HAZARDOUS MATERIALS (49 CFR § 172.101):

Hazardous materials description - - proper shipping name	Hazard Class/ Division	Identi- fication Number	Packing Group
Dinitrogen tetroxide	2.3	UN1067	N/A

7. SAFETY CONTROL MEASURES:a. PACKAGING -

(1) Prescribed packaging for liquid dinitrogen tetroxide consists of a stainless steel tank approximately 30 inches in diameter and 7 feet long, provided with two stainless steel valves for filling and discharging dinitrogen tetroxide, located on one end and protected by a gas tight end cap; and a stainless steel plug on the other end. This tank is similar to a specification DOT-110AW multi-unit tank car tank. The tank must be designed and constructed fully in compliance with requirements of the ASME Code for unfired pressure vessels, Section VIII, Division 1. The tank assembly must conform to Malcolm Industries Drawing No. 2021M, dated June 5, 1987, or Grano Steel Corp. Drawing No. M-231, dated January 16, 1990 submitted with and forming a part of the application. No new construction is authorized.

(2) Prior to each shipment, all outlets and inlets must be capped or plugged on each tank containing any amount of Dinitrogen Tetroxide. When shipped with residual dinitrogen tetroxide, the tank assembly must be drained so that the residual amount contained therein is 5 pounds or less.

b. OPERATIONAL CONTROLS -

(1) Transportation is only authorized between the facilities and locations specified in the application in addition to the Mississippi Chemical Company, Yazzo City, Mississippi, and between Yazzo City, Mississippi and Port Everglade, Florida; White Sands, New Mexico; San Clemente, California; Titusville, Florida; Cape

Canaveral, Florida; Marysville, Washington; Long Beach, California; Charleston, South Carolina and Sunnyvale, California. These shipments must be made by motor vehicle in exclusive use service only.

(2) Chemtrec and the Coast Guard Captain of the Port (COTP) at which the materials are being loaded, must be notified in advance of transport operations and effective communication must be in effect during the transport operation. A current copy of this special permit must be provided to the COTP at least 24 hours in advance of each shipment.

(3) The provisions of § 177.834(m) (1) and (2) must be met.

(4) Motor vehicle drivers and cargo vessel personnel must have been instructed as to necessary safeguards and proper procedures in the event of unusual delay, fire, or other accident. Such instruction must include, as a minimum, the provisions of the "Nitrogen Tetroxide Emergency Response Plan" submitted with the application, and with publication DOT P 5800.5, "2000 Emergency Response Guidebook."

(5) Motor carriers operating under terms of this special permit must have a "Satisfactory" safety rating as prescribed in 49 CFR Part 385.

8. SPECIAL PROVISIONS:

a. Each tank must be marked, on opposite sides, "INHALATION HAZARD" and "DOT-SP 10497" in letters and numerals at least 2 inches in height on a contrasting background.

b. Packagings permanently marked 'DOT-E 10497', prior to October 1, 2007 may continue to be used under this special permit for the remaining service life of the packaging or until the special permit is no longer valid. Packagings marked on or after October 1, 2007 must be marked 'DOT-SP 10497'.

c. Shipping papers displaying 'DOT-E 10497' may continue to be used until October 1, 2007, provided the special permit remains valid.

9. MODES OF TRANSPORTATION AUTHORIZED: Motor vehicle and cargo vessel.
10. MODAL REQUIREMENTS: A current copy of this special permit must be carried aboard each motor vehicle and cargo vessel used to transport packages covered by this special permit.
11. COMPLIANCE: Failure by a person to comply with any of the following may result in suspension or revocation of this special permit and penalties prescribed by the Federal hazardous materials transportation law, 49 U.S.C. 5101 et seq:
  - o All terms and conditions prescribed in this special permit and the Hazardous Materials Regulations, 49 CFR Parts 171-180.
  - o Persons operating under the terms of this special permit must comply with the security plan requirement in Subpart I of Part 172 of the HMR, when applicable.
  - o Registration required by § 107.601 et seq., when applicable.

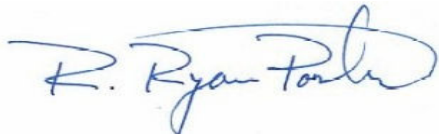
Each "Hazmat employee", as defined in § 171.8, who performs a function subject to this special permit must receive training on the requirements and conditions of this special permit in addition to the training required by §§ 172.700 through 172.704.

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

Under Title VII of the Safe, Accountable, Flexible, Efficient Transportation Equity Act: A Legacy for Users (SAFETEA-LU)- 'The Hazardous Materials Safety and Security Reauthorization Act of 2005' (Pub. L. 109-59), 119 Stat. 1144 (August 10, 2005), amended the Federal hazardous materials transportation law by changing the term 'exemption' to 'special permit' and authorizes a special permit to be granted up to two years for new special permits and up to four years for renewals.

12. REPORTING REQUIREMENTS: Shipments or operations conducted under this special permit are subject to the Hazardous Materials Incident Reporting requirements specified in 49 CFR §§ 171.15 - Immediate notice of certain hazardous materials incidents, and 171.16 - Detailed hazardous materials incident reports. In addition, the grantee(s) of this special permit must notify the Associate Administrator for Hazardous Materials Safety, in writing, of any incident involving a package, shipment or operation conducted under terms of this special permit.

Issued in Washington, D.C.:



for Robert A. McGuire  
Associate Administrator  
for Hazardous Materials Safety

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

Copies of this special permit may be obtained by accessing the Hazardous Materials Safety Homepage at [http://hazmat.dot.gov/sp\\_app/special\\_permits/spec\\_perm\\_index.htm](http://hazmat.dot.gov/sp_app/special_permits/spec_perm_index.htm) Photo reproductions and legible reductions of this special permit are permitted. Any alteration of this special permit is prohibited.

PO: sln