



U.S. Department  
of Transportation

**Pipeline and Hazardous  
Materials Safety  
Administration**

**June 24, 2022**

1200 New Jersey Avenue, SE  
Washington, DC 20590

DOT-SP 13963  
(SEVENTH REVISION)

**EXPIRATION DATE: 2026-05-31**

(FOR RENEWAL, SEE 49 CFR 107.109)

1. GRANTEE: EnergySolutions, Inc.  
Columbia, SC
2. PURPOSE AND LIMITATIONS:
  - a. This special permit authorizes the manufacture, marking, sale and use of a specially designed device containing Class 7 radioactive materials. The device is a Duratek Reactor Head Package (DTKHP) to be used to transport commercial nuclear power plants reactor vessel heads with or without the control rod drive mechanisms attached. This special permit authorizes the DTKHP to be classed as low specific activity material (LSA-II) conforming with all regulations applicable to a DOT specification IP-2, except as specified herein, for the transportation in commerce of the materials authorized by this special permit under a transport plan that provides an equivalent level of safety to the packages and procedures specified in Title 49 of the Code of Federal Regulations. 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. In accordance with 49 CFR 107.107(a) party status may not be granted to a manufacturing permit. These packaging may be used in accordance with 49 CFR 173.22a.
3. REGULATORY SYSTEM AFFECTED: 49 CFR Parts 106, 107 and 171- 180.

4. REGULATIONS FROM WHICH EXEMPTED:

- a. 49 CFR § 173.403 insofar as the DTKHP and its contents containing Low Specific Activity and Surface Contaminated Object radioactive material may be considered LSA-II.
- b. 49 CFR § 173.427(b)(1) insofar as the requirement that LSA-II must be transported in authorized packaging is waived. The reactor heads specified in the special permit application are authorized to be transported in non-specification packages under a specified transport plan that provides the equivalent safety to the packages and procedures required by the HMR.
- c. 49 CFR § 173.465(c) and (d) in that modified mechanical testing is acceptable.

5. BASIS: This special permit is based on the application of EnergySolutions Inc. dated April 8, 2022, submitted in accordance with § 107.109.

6. HAZARDOUS MATERIALS (49 CFR 172.101):

Hazardous Material Description			
Proper Shipping Name	Hazard Class/ Division	Identification Number	Packing Group
Radioactive material, low specific activity (LSA-II) <i>non fissile or fissile excepted</i>	7	UN3321	N/A

7. SAFETY CONTROL MEASURES:

a. PACKAGING: The DTKHP must be as described in EnergySolutions, Inc. documentation on file with the Office of Hazardous Materials Safety (OHMS).

b. OPERATIONAL CONTROLS:

(1) Transportation is limited to the continental United States and inland waterways and waters along the coasts of the continental United States.

(2) The total activity of the DTKHP must not exceed 5A<sub>2</sub>. A<sub>2</sub> is to be calculated in accordance with § 173.433.

(3) The DTKHP must meet the requirement for fissile material – exceptions, in accordance with § 173.453.

(4) Package preparation and transportation must be conducted in accordance with the contents of a project specific Transportation and Emergency Response Plan (TERP), which conforms with the model TERP provided to OHMS.

(5) The DTKHP shall be consigned as exclusive under the provisions of § 173.427(a)(6)(i)-(v) including placarding.

c. COMMUNICATIONS:

(1) The OHMS must be notified at least 24 hours prior to DTKHP commencement of transportation and upon completion of transit.

(2) The outside of the DTKHP package must be plainly and durably marked “DOT-SP 13963”. Letters and numerals must be at least 0.25 inches wide and 4.0 inches high.

(3) The outside of the DTKHP package must be marked and labeled according to the applicable provisions of 49 CFR Part 172 for bulk packaging.

8. SPECIAL PROVISIONS:

a. In accordance with the provisions of Paragraph (b) of § 173.22a, persons may use the packaging authorized by this special permit for the transportation of the hazardous materials specified in paragraph 6, only in conformance with the terms of this special permit.

b. A person who is not a holder of this special permit, but receives a package covered by this special permit, may reoffer it for transportation provided no modification or change is made to the package or its contents and it is offered for transportation in conformance with this special permit and the HMR.

c. A current copy of this special permit must be maintained at each facility where the package is offered or reoffered for transportation.

d. Each packaging manufactured under the authority of this special permit 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 by the Office of Hazardous Materials Special Permits and Approvals for a specific manufacturing facility.

- e. A current copy of this special permit must be maintained at each facility where the package is manufactured under this special permit. It must be made available to a DOT representative upon request.
9. MODES OF TRANSPORTATION AUTHORIZED: Motor vehicle, cargo vessel, rail freight.
10. MODAL REQUIREMENTS: A current copy of this special permit must be carried aboard each motor vehicle, rail freight or 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 this 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 William Schoonover  
Associate Administrator for Hazardous Materials Safety

Address all inquiries to: Associate Administrator for Hazardous Materials Safety, Pipeline and Hazardous Materials Safety Administration, U.S. Department of Transportation, East Building PHH-13, 1200 New Jersey Avenue, Southeast, Washington, D.C. 20590.

Copies of this special permit may be obtained by accessing the Hazardous Materials Safety Homepage at <https://www.phmsa.dot.gov/approvals-and-permits/hazmat/special-permits-search>. Photo reproductions and legible reductions of this special permit are permitted. Any alteration of this special permit is prohibited.

PO: JW/TG