1. **GRANTEE:** EMD Performance Materials Corp.  
   Philadelphia, PA

2. **PURPOSE AND LIMITATIONS:**
   a. This special permit authorizes the manufacture, mark, sale, and use of specially designed combination packagings for the transportation in commerce of certain pyrophoric hazardous materials. This special permit provides no relief from the Hazardous Materials Regulations (HMR) or the International Maritime Dangerous Goods (IMDG) Code other than as specifically stated herein. The most recent revision supersedes all previous revisions.
   
   b. The safety analyses performed in development of this special permit only considered the hazards and risks associated with transportation in commerce. The safety analyses did not consider the hazards and risks associated with consumer use, use as a component of a transport vehicle or other device, or other uses not associated with transportation in commerce.
   
   c. This special permit serves as an “exemption” under Section 7.9.1 of the IMDG Code (see IMO MSC/Circ. 1075-Granting Exemptions from the Provisions of the IMDG Code), and as a “Competent Authority Approval” as defined under 49 CFR § 107.1.  
   
   d. In accordance with 49 CFR 107.107(a), party status may not be granted to a manufacturing permit. These packagings may be used in accordance with 49 CFR 173.22a.

3. **REGULATORY SYSTEM AFFECTED:** 49 CFR Parts 106, 107 and 171-180 and the IMDG Code.
4. **REGULATIONS FROM WHICH EXEMPTED**: 49 CFR § 173.181(b) and Packing Instruction P400, paragraph (2) of the IMDG Code in that the inner receptacles (inner packagings) of metal may not exceed 1 L (0.3 gallon) each, except as specified herein.

5. **BASIS**: This special permit is based on the application of EMD Performance Materials Corp. dated January 12, 2022, submitted in accordance with § 107.109 and additional information dated September 19, 2023.

6. **HAZARDOUS MATERIALS (49 CFR § 172.101)**:

<table>
<thead>
<tr>
<th>Hazardous Material Description</th>
<th>Hazard Class/Division</th>
<th>Identification Number</th>
<th>Packing Group</th>
</tr>
</thead>
<tbody>
<tr>
<td>Organometallic substance, liquid, pyrophoric</td>
<td>4.2</td>
<td>UN3392</td>
<td>I</td>
</tr>
<tr>
<td>Organometallic substance, liquid, pyrophoric, water-reactive</td>
<td>4.2</td>
<td>UN3394</td>
<td>I</td>
</tr>
<tr>
<td>Pyrophoric liquid, inorganic, n.o.s.</td>
<td>4.2</td>
<td>UN3194</td>
<td>I</td>
</tr>
<tr>
<td>Pyrophoric liquids, organic, n.o.s.</td>
<td>4.2</td>
<td>UN2845</td>
<td>I</td>
</tr>
</tbody>
</table>

7. **SAFETY CONTROL MEASURES**:

   a. **PACKAGING**: Packaging prescribed is a combination packaging consisting of the following:

   (1) **Outer packaging**: The prescribed outer packaging is a UN 4G fiberboard box filled with sufficient dunnage to prevent shifting and movement of the intermediate packaging.

   (2) **Intermediate packaging**: The prescribed intermediate packaging is a 7 gallon UN 1A2 open-head steel drum containing the inner packaging. The steel drum must be hermetically sealed.

   (3) **Inner packaging**:

   (i) The prescribed inner packaging is a stainless steel bubbler having threaded closures with gaskets and capacity not exceeding 5 L (1.32 gallons).
(ii) The bubbler must have been pressure tested to a minimum of 175 psig.

(iii) The headspace of each bubbler must be filled with an inert gas to a positive pressure not to exceed 5 psig.

(iv) Each bubbler may not be filled to more than 90% of its capacity.

(v) All closures must be closed and secured by a positive means of closure.

(vi) No more than one inner packaging is authorized per package.

(vii) The inner packaging must be cushioned on all sides with dry, absorbent, non-combustible material in a quantity sufficient to absorb the entire contents.

b. **TESTING:**

(1) The intermediate packaging must successfully pass all tests required for a UN 1A2 drum containing an inner packaging at the Packing Group I performance level.

(2) The completed packaging must successfully pass all tests required for a UN 4G fiberboard box containing inner and intermediate packagings at the Packing Group I performance level.

c. **MARKING:** Each package must be plainly and durably marked “DOT-SP 16601” as specified in § 172.301(c).

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 packaging covered by this special permit, may reoffer it for transportation provided no modification or change is made to the packaging and it is offered for transportation in conformance with this special permit, the HMR, and the IMDG Code.
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 Safety Approvals and Permits Division for a specific manufacturing facility.

e. A current copy of this special permit must be maintained at each facility where the packaging is manufactured under this special permit. It must be made available to a DOT representative upon request.

f. This special permit in no way affects the need to obtain any required authorizations from other agencies of the United States Government or from the competent authorities of countries of origin, transit, and destination.

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 cargo vessel or motor vehicle 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.:

[Signature]

for William Schoonover
Associate Administrator for Hazardous Materials Safety


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: Jephthah Nti