1. **GRANTEE:** (See individual authorization letter)

2. **PURPOSE AND LIMITATION:**
   
   a. This special permit authorizes the transportation in commerce of certain non-DOT specification packaging, described as actuators, charged with limited quantities of various hazardous materials. The actuators are transported separately or as part of a valve assembly. This special permit provides no relief from the Hazardous Materials Regulations (HMR) or the International Civil Aviation Organization’s Technical Instructions for the Safe Transport of Dangerous Goods by Air (ICAO TI) 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.

   c. Unless otherwise stated herein, this special permit consists of the special permit authorization letter issued to the grantee together with this document.

   d. This special permit serves as a “Competent Authority Approval” as defined in 49 CFR § 107.1 and as an “exemption” as defined in ICAO TI.

3. **REGULATORY SYSTEM AFFECTED:** 49 CFR Parts 106, 107 and 171-180 and the ICAO TI.

4. **REGULATIONS FROM WHICH EXEMPTED:** 49 CFR §§ 173.150(b), 173.306(a) and ICAO TI 3.4.3.2 in that the gross weight of the valve assembly containing the actuator exceeds the 66-
Continuation of DOT-SP 13102 (8th Rev.)

pound limitation; § 173.306(a)(1) in that the largest actuator exceeds the 4-ounce limit, § 173.222(c) and ICAO TI 3; 4.3.1 in that each actuator may contain more than the authorized weight of hazardous material, and § 173.322, in that the actuator is not an authorized packaging.

5. BASIS: This special permit is based on the Pipeline and Hazardous Materials Safety Administration’s (PHMSA) editorial review under § 107.121 initiated on May 16, 2012 and additional information received March 28, 2014.

6. HAZARDOUS MATERIALS (49 CFR § 172.101):

<table>
<thead>
<tr>
<th>Hazardous Materials Description*</th>
<th>Hazard Class/Division</th>
<th>Identification Number</th>
<th>Packing Group</th>
</tr>
</thead>
<tbody>
<tr>
<td>Acetone</td>
<td>3</td>
<td>UN1090</td>
<td>II</td>
</tr>
<tr>
<td>Butane see also Petroleum gases, liquefied</td>
<td>2.1</td>
<td>UN1011</td>
<td>N/A</td>
</tr>
<tr>
<td>Butanols</td>
<td>3</td>
<td>UN1120</td>
<td>II, III</td>
</tr>
<tr>
<td>Ethyl alcohol see Ethanol</td>
<td>3</td>
<td>UN1170</td>
<td>II, III</td>
</tr>
<tr>
<td>Ethyl chloride</td>
<td>2.1</td>
<td>UN1037</td>
<td>N/A</td>
</tr>
<tr>
<td>Ethyl ether see Diethyl ether</td>
<td>3</td>
<td>UN1155</td>
<td>I</td>
</tr>
<tr>
<td>Compressed gas, n.o.s. (contains 2,2-dichloro-1,1,1-trifluoroethane)</td>
<td>2.2</td>
<td>UN1956</td>
<td>N/A</td>
</tr>
<tr>
<td>Methyl chloride or Refrigerant gas R40</td>
<td>2.1</td>
<td>UN1063</td>
<td>N/A</td>
</tr>
<tr>
<td>Isobutane</td>
<td>2.1</td>
<td>UN1969</td>
<td>N/A</td>
</tr>
<tr>
<td>Isobutyl Alcohol</td>
<td>3</td>
<td>UN1212</td>
<td>III</td>
</tr>
<tr>
<td>Pentane (Isopentane)</td>
<td>3</td>
<td>UN1265</td>
<td>I, II</td>
</tr>
<tr>
<td>Isopropyl alcohol</td>
<td>3</td>
<td>UN1219</td>
<td>II</td>
</tr>
<tr>
<td>Proper Shipping Name</td>
<td>Hazard Class/Division</td>
<td>Identification Number</td>
<td>Packing Group</td>
</tr>
<tr>
<td>----------------------</td>
<td>-----------------------</td>
<td>-----------------------</td>
<td>---------------</td>
</tr>
<tr>
<td>Methyl Alcohol</td>
<td>3</td>
<td>UN1230</td>
<td>II</td>
</tr>
<tr>
<td>n-Propanol or Propyl alcohol, normal</td>
<td>3</td>
<td>UN1274</td>
<td>II, III</td>
</tr>
<tr>
<td>Dangerous Goods in Machinery or Dangerous Goods in Apparatus**</td>
<td>9</td>
<td>UN3363</td>
<td>N/A</td>
</tr>
</tbody>
</table>

* Only materials authorized as limited quantities in accordance with Table 3 of § 173.27 and Table 3-1 and 3;4 of the ICAO TI may be offered for transportation or transported as limited quantities aboard aircraft under the HMR and the ICAO TI.

** This proper shipping name is not authorized for actuators charged with butane, ethyl chloride, or methyl chloride.

7. **SAFETY CONTROL MEASURES: PACKAGING** - Prescribed packaging is a hermetically sealed metal actuator that opens or closes a valve assembly in response to temperature changes. The actuator contains no greater than 1.2 liters of hazardous material. The actuator is filled with all materials in the liquid state, with the specified gases being charged up to 60 psig. The actuator is shipped either separately, as part of the valve assembly, or as part of a valve assembly that is attached to a heat exchanger or other similar device. The maximum weight of the actuator is not over 30 pounds, and the total weight of the actuator/valve assembly is no more than 250 pounds. The actuator and valve assembly must be in conformance with the drawings and specifications submitted with Watts Regulator Company's application on file with the Approvals and Permits Division.

b. **OPERATIONAL CONTROLS** -

(1) Shipments are excepted from the requirements of subpart E (labeling) of part 172 of 49 CFR except when offered for transportation or transported by air.

(2) Shipments are excepted from the requirements of subpart F (placarding) of Part 172 of 49 CFR.
(3) Individual actuators, when shipped separately from the valve assembly, must be shipped in strong outside packaging.

(4) Each outside packaging containing an actuator or valve assembly must be marked “DOT-SP 13102” as specified in § 172.301(c).

8. SPECIAL PROVISIONS:

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

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

c. Transportation of Division 2.1 (flammable gases) is not authorized aboard aircraft unless specifically authorized in the Hazardous Materials Table (§ 172.101).

d. Prior to packaging for shipment, each actuator or actuator/valve assembly must be inspected for any defects that might compromise the integrity of the unit as a containment device for the specified hazardous material.

e. Prior to charging the actuator with hazardous material, each actuator must be leak-tested as described in the application for special permit on file with OHMSPA.

f. For purposes of transportation by aircraft, this special permit also constitutes an exemption to the ICAO TI in accordance with 1;1.1.3.

g. For international flights, the ICAO TI may require exemption authorization by the States of origin, transit, over flight, and destination of the consignment, as well as the State of the air operator.
h. 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 the States of origin, transit, over flight, and destination of the consignment, as well as the State of the air operator.

9. MODES OF TRANSPORTATION AUTHORIZED: Motor vehicle, rail freight, and cargo aircraft only.

10. MODAL REQUIREMENTS: A current copy of this special permit must be carried aboard each aircraft and motor vehicle used to transport packages covered by this special permit. The shipper must furnish a current copy of this special permit 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 special permit and penalties prescribed by the Federal hazardous materials transportation law, 49 U.S.C. 5101 et seq:

- All terms and conditions prescribed in this special permit and the Hazardous Materials Regulations, 49 CFR Parts 171-180.

- 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.

- 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 Dr. Magdy El-Sibaie
Associate Administrator for Hazardous Materials Safety


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 Photo reproductions and legible reductions of this special permit are permitted. Any alteration of this special permit is prohibited.

PO: Freeman/SGrey