1. GRANTEE: (See individual authorization letter)

2. PURPOSE AND LIMITATION:

   a. This special permit authorizes the transportation in commerce of non-DOT specification permeation devices with a maximum volume of 6cc containing anhydrous ammonia without shipping papers, labeling and placarding. This special permit provides no relief from the Hazardous Materials Regulations (HMR) other than as specifically stated herein.

   b. The safety analyses performed in the development of this special permit only considered the hazards and risks associated with the transportation in commerce. The safety analyses did not consider the hazards and risks associated with use as a component of a transport vehicle or other device, or other uses not 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.


4. REGULATIONS FROM WHICH EXEMPTED: 49 CFR § Part 172, Subparts C, D, E and F in that shipping papers, marking (except for § 172.301(c)), labeling and placarding are not required; and § 172.101 Hazardous Materials Table, Column (9B) in that anhydrous ammonia is forbidden on cargo aircraft except as provided herein.

5. BASIS: This special permit is based on the application of Real Sensors, Inc. dated December 28, 2006 submitted in accordance with § 107.105 and the public proceeding thereon.
6. **HAZARDOUS MATERIALS (49 CFR § 172.101):**

<table>
<thead>
<tr>
<th>Proper Shipping Name</th>
<th>Hazard Class/Division</th>
<th>Identification Number</th>
<th>Packing Group</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ammonia, anhydrous</td>
<td>2.2</td>
<td>UN1005</td>
<td>N/A</td>
</tr>
</tbody>
</table>

7. **SAFETY CONTROL MEASURES:**

   a. **PACKAGING** - Packaging prescribed is a non-DOT specification container described as a permeation device. The device must be in accordance with Real Sensors, Inc. drawing numbers RSI-1614, 1614-600, 1614-SCB, and 1614-PIPE on file with the Office of Hazardous Materials Special Permits and Approvals (OHMSPA). The permeation device assembly consists of the following:

   (1) An inner receptacle made of stainless steel tubing with a maximum volume of 6cc. The inner tubing must be able to withstand a pressure of 2,000 psig without leakage.

   (2) The inner receptacle must be connected to a scrubber cartridge which contains sufficient absorbent material to absorb the entire contents of the inner receptacle.

   (3) The inner receptacle and the scrubber cartridge must be placed inside a 1 inch schedule 40 PVC pipe with one end threaded and the other end permanently sealed with a slip cap. Additional scrubber material must be included inside the PVC slip cap. The device must be hermetically sealed as shown on Real Sensors Inc. drawing RSI-1614 on file with OHMSPA.

   (4) The complete permeation device assembly must be placed in a DOT Specification UN 4G fiberboard box to protect against damage during transportation.

   b. **OPERATIONAL CONTROLS** -

   (1) The permeation device must contain no more than 4.0 grams of anhydrous ammonia.
(2) The maximum pressure in the permeation device at 70°F must be 150 psig.

(3) More than one permeation device assembly may be contained within the DOT Specification UN 4G fiberboard box.

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 or its contents and it is reoffered for transportation in conformance with this special permit and the HMR.

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

c. Each outer fiberboard box must be marked “DOT-SP 14460” as specified in § 172.301(c).

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

10. MODAL REQUIREMENTS: A current copy of this special permit must be carried aboard each aircraft, cargo vessel or motor vehicle used to transport packages covered by this special permit. The shipper must furnish a 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:

   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 Bob Richard
Deputy Associate Administrator
for Hazardous Materials Safety

March 20, 2007

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: CWFreeman