Section 1: Identification of the Substance/Mixture and of the Company/Undertaking

1.1 Product identifier

Product Name
- Diammonium Phosphate Food Grade

Synonyms
- Ammonium Phosphate, Dibasic; Ammonium Phosphate, Secondary; DAP

CAS Number
- 7783-28-0

SDS Number/Grade
- 31a

EC Number
- 231-987-8

REACH Registration Number
- 01-2119490974-22-0057

Product Description
- White powder solid with ammonia-like odor.

Molecular Formula
- (NH4)2HPO4

Molecular Weight
- 132.06

1.2 Relevant identified uses of the substance or mixture and uses advised against

Relevant identified use(s)

1.3 Details of the supplier of the safety data sheet

Manufacturer
- Innophos
  259 Prospect Plains Rd. Bldg A
  Cranbury, NJ 08512-3706
  United States

Telephone (Technical)
- 609-495-2495

Responsible Party - EU
- LSR Associates Ltd
  Woolley Road
  Alconbury, Cambridgeshire PE28 4HS
  United Kingdom

Telephone (General)
- +44 (0) 1954 212132

1.4 Emergency telephone number

Manufacturer
- 800-424-9300 - Chemtrec - within USA and Canada

Manufacturer
- +1 703-527-3887 - Chemtrec - outside USA and Canada (collect calls accepted)

Manufacturer
- 615-386-7816 - Innophos Emergency Communication Team (ECT)
EU/EEC
According to EU Directive 67/548/EEC (DSD) or 1999/45/EC (DPD)

2.1 Classification of the substance or mixture

- CLP: Not classified
- DSD/DPD: Not classified

2.2 Label Elements

**Hazard statements**
- CLP: No label element(s) required.
- DSD/DPD: No label element(s) required.

2.3 Other Hazards

- CLP: According to Regulation (EC) No. 1272/2008 (CLP) this material is not considered hazardous.
- DSD/DPD: This product is not considered dangerous under the European Directive 67/548/EEC

United States (US)
According to OSHA 29 CFR 1910.1200 HCS

2.1 Classification of the substance or mixture

- OSHA HCS 2012: Not classified

2.2 Label elements

- OSHA HCS 2012: No label element(s) required.

2.3 Other hazards


Canada
According to WHMIS

2.1 Classification of the substance or mixture

- WHMIS: Not classified

2.2 Label elements

- WHMIS: No label element(s) required.

2.3 Other hazards

- WHMIS: In Canada, the product mentioned above is not considered hazardous under the Workplace Hazardous Materials Information System (WHMIS)

Section 3 - Composition/Information on Ingredients

3.1 Substances

Preparation Date: 14/October/2014
Revision Date: 14/October/2014

Preparation Date: 14/October/2014
Revision Date: 14/October/2014
3.2 Mixtures

- Material does not meet the criteria of a mixture in accordance with Regulation (EC) No 1272/2008.

Section 4 - First Aid Measures

4.1 Description of first aid measures

Inhalation
- Move victim to fresh air. Administer oxygen if breathing is difficult. Give artificial respiration if victim is not breathing. If signs/symptoms continue, get medical attention.

Skin
- IF ON SKIN: Wash with plenty of soap and water. If skin irritation occurs: Get medical advice/attention. Take off contaminated clothing and wash before reuse.

Eye
- Flush eyes with water for at least 15 minutes while holding eyelids open. Remove contact lenses if worn. If eye irritation persists: Get medical advice/attention.

Ingestion
- If swallowed, do NOT induce vomiting unless directed to do so by medical personnel. If swallowed give 2-3 glasses of water if victim is conscious and alert. Do not give anything by mouth to an unconscious person. Rinse mouth. Vomiting may occur spontaneously. To prevent aspiration of swallowed product, lay victim on side with head lower than waist. If vomiting occurs and the victim is conscious, give water to further dilute the chemical.

4.2 Most important symptoms and effects, both acute and delayed
- Refer to Section 11 - Toxicological Information.

4.3 Indication of any immediate medical attention and special treatment needed

Notes to Physician
- All treatments should be based on observed signs and symptoms of distress in the patient. Consideration should be given to the possibility that overexposure to materials other than this product may have occurred.

Section 5 - Firefighting Measures

5.1 Extinguishing media

Suitable Extinguishing Media
- Not combustible. Use extinguishing media suitable for surrounding fire.

Unsuitable Extinguishing Media
- None known.

5.2 Special hazards arising from the substance or mixture

Unusual Fire and Explosion Hazards
- Non-combustible.

Hazardous Combustion Products
- Ammonia
- Oxides of nitrogen, oxides of phosphorus.

5.3 Advice for firefighters
- Wear positive pressure self-contained breathing apparatus (SCBA). Structural firefighters' protective clothing will only provide limited protection. Move containers from fire area if you can do it without risk.
LARGE FIRES: Dike fire-control water for later disposal.
LARGE FIRES: Do not scatter spilled material with high pressure water streams.

Section 6 - Accidental Release Measures

6.1 Personal precautions, protective equipment and emergency procedures

Personal Precautions  
- Do not touch or walk through spilled material. Wear appropriate personal protective equipment, avoid direct contact.

Emergency Procedures  
- Ventilate closed spaces before entering. Keep unauthorized personnel away.

6.2 Environmental precautions  
- Runoff from fire control or dilution water may cause pollution. Prevent material from entering public sewer system or any waterways. Spills may be reportable to the National Response Center (800-424-8802) and to state and/or local agencies.

6.3 Methods and material for containment and cleaning up

Containment/Clean-up Measures  
- Sweep or vacuum up and place in an appropriate closed container. Avoid generating dust. Clean up residual material by washing area with water and detergent. Collect washings for disposal.

6.4 Reference to other sections

- Refer to Section 8 - Exposure Controls/Personal Protection and Section 13 - Disposal Considerations.

Section 7 - Handling and Storage

7.1 Precautions for safe handling

Handling  
- Keep containers closed when not in use. Avoid breathing dust. Avoid direct or prolonged contact with skin and eyes. Do not ingest. Do not use in areas without adequate ventilation. Wash hands and face carefully before eating, drinking, using tobacco, applying cosmetics, or using the toilet.

7.2 Conditions for safe storage, including any incompatibilities

Storage  
- Store in a cool/low-temperature, well-ventilated, dry place. Store in a tightly closed container. Product is hygroscopic and tends to cake on storage.

7.3 Specific end use(s)

- Refer to Section 1.2 - Relevant identified uses.

Section 8 - Exposure Controls/Personal Protection

8.1 Control parameters

Exposure Limits/Guidelines  
- No exposure limits were found for this product or any of its ingredients.

8.2 Exposure controls

Engineering Measures/Controls  
- Adequate ventilation systems as needed to control concentrations of airborne contaminants below applicable threshold limit values.

Personal Protective Equipment

Respiratory  
- For limited exposure use an N95 dust mask. For prolonged exposure use an air-purifying respirator with high efficiency particulate air (HEPA) filters. Follow the OSHA respirator regulations found in 29 CFR 1910.134 or European Standard EN 149. Use a NIOSH/MSHA or European Standard EN 149 approved respirator if exposure limits are exceeded or symptoms are experienced.

Eye/Face  
- Wear safety glasses.

Skin/Body  
- Wear appropriate gloves.
Environmental Exposure Controls

Follow best practice for site management and disposal of waste.

Section 9 - Physical and Chemical Properties

9.1 Information on Physical and Chemical Properties

<table>
<thead>
<tr>
<th>Material Description</th>
<th>Physical Form</th>
<th>Appearance/Description</th>
<th>General Properties</th>
</tr>
</thead>
<tbody>
<tr>
<td>Physical Form</td>
<td>Solid</td>
<td>White powder solid with ammonia-like odor.</td>
<td></td>
</tr>
<tr>
<td>Color</td>
<td>White</td>
<td>Odor Ammonia-like</td>
<td></td>
</tr>
<tr>
<td>Odor Threshold</td>
<td>Data lacking</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

| Boiling Point        | Data lacking | Melting Point Data lacking |
| Decomposition Temperature | Data lacking | pH 8 |
| Specific Gravity/Relative Density | Data lacking | Water Solubility Soluble 41 % |
| Viscosity            | Data lacking | Explosive Properties Not relevant. |
| Oxidizing Properties | Not relevant. |                     |

| Volatility           | Vapor Pressure Data lacking | Vapor Density Data lacking |
| Evaporation Rate      | Data lacking                |                           |

| Flammability          | Flash Point Data lacking | UEL Data lacking |
| LEL                   | Data lacking              | Autoignition Data lacking |
| Flammability (solid, gas) | Not relevant. |                     |

| Environmental         | Octanol/Water Partition coefficient Data lacking |                           |

9.2 Other Information

No additional physical and chemical parameters noted.

Section 10: Stability and Reactivity

10.1 Reactivity

No dangerous reaction known under conditions of normal use.

10.2 Chemical stability

Stable under normal temperatures and pressures.

10.3 Possibility of hazardous reactions

Hazardous polymerization will not occur.

10.4 Conditions to avoid

Dusting conditions, extreme heat, extreme humidity.

10.5 Incompatible materials

Strong bases, strong oxidizing agents. Sodium hypochlorite.

10.6 Hazardous decomposition products


Section 11 - Toxicological Information
11.1 Information on toxicological effects

<table>
<thead>
<tr>
<th>CAS</th>
<th>Acute Toxicity: Ingestion/Oral-Rat LD50 • &gt;1000 mg/kg; Irritation: Skin-Rabbit • Mild irritation</th>
</tr>
</thead>
<tbody>
<tr>
<td>Diammonium Phosphate Food Grade</td>
<td>7783-28-0</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>GHS Properties</th>
<th>Classification</th>
</tr>
</thead>
<tbody>
<tr>
<td>Acute toxicity</td>
<td>EU/CLP • Data lacking</td>
</tr>
<tr>
<td></td>
<td>OSHA HCS 2012 • Acute Toxicity - Data lacking</td>
</tr>
<tr>
<td>Aspiration Hazard</td>
<td>EU/CLP • Data lacking</td>
</tr>
<tr>
<td></td>
<td>OSHA HCS 2012 • Data lacking</td>
</tr>
<tr>
<td>Carcinogenicity</td>
<td>EU/CLP • Data lacking</td>
</tr>
<tr>
<td></td>
<td>OSHA HCS 2012 • Data lacking</td>
</tr>
<tr>
<td>Germ Cell Mutagenicity</td>
<td>EU/CLP • Data lacking</td>
</tr>
<tr>
<td></td>
<td>OSHA HCS 2012 • Data lacking</td>
</tr>
<tr>
<td>Skin corrosion/Irritation</td>
<td>EU/CLP • Data lacking</td>
</tr>
<tr>
<td></td>
<td>OSHA HCS 2012 • Inconclusive data</td>
</tr>
<tr>
<td>Skin sensitization</td>
<td>EU/CLP • Data lacking</td>
</tr>
<tr>
<td></td>
<td>OSHA HCS 2012 • Data lacking</td>
</tr>
<tr>
<td>STOT-RE</td>
<td>EU/CLP • Data lacking</td>
</tr>
<tr>
<td></td>
<td>OSHA HCS 2012 • Data lacking</td>
</tr>
<tr>
<td>STOT-SE</td>
<td>EU/CLP • Data lacking</td>
</tr>
<tr>
<td></td>
<td>OSHA HCS 2012 • Data lacking</td>
</tr>
<tr>
<td>Toxicity for Reproduction</td>
<td>EU/CLP • Data lacking</td>
</tr>
<tr>
<td></td>
<td>OSHA HCS 2012 • Data lacking</td>
</tr>
<tr>
<td>Respiratory sensitization</td>
<td>EU/CLP • Data lacking</td>
</tr>
<tr>
<td></td>
<td>OSHA HCS 2012 • Data lacking</td>
</tr>
<tr>
<td>Serious eye damage/Irritation</td>
<td>EU/CLP • Data lacking</td>
</tr>
<tr>
<td></td>
<td>OSHA HCS 2012 • Inconclusive data</td>
</tr>
</tbody>
</table>

Route(s) of entry/exposure: Inhalation, Skin, Eye, Ingestion

Potential Health Effects

Inhalation
  - Acute (Immediate): May cause respiratory irritation.
  - Chronic (Delayed): No data available.

Skin
  - Acute (Immediate): May cause irritation.
  - Chronic (Delayed): No data available.

Eye
  - Acute (Immediate): May cause irritation.
  - Chronic (Delayed): No data available.

Ingestion
  - Acute (Immediate): Low acute oral toxicity. Ingestion of large quantities may cause abdominal pain, abdominal cramps, nausea, vomiting, diarrhea.
  - Chronic (Delayed): No data available.
Carcinogenic Effects

- This product does not contain any ingredient designated by IARC, NTP, ACGIH or OSHA as probable or suspected human carcinogens.

Key to abbreviations

LD = Lethal Dose

**Section 12 - Ecological Information**

12.1 Toxicity

<table>
<thead>
<tr>
<th>Diammonium Phosphate Food Grade</th>
<th>7783-28-0</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Dosage</strong></td>
<td><strong>Species</strong></td>
</tr>
<tr>
<td>155 mg/L</td>
<td>Fish: Pimephales promelas</td>
</tr>
</tbody>
</table>

12.2 Persistence and degradability

- No data found for product.

12.3 Bioaccumulative potential

- No data found for product.

12.4 Mobility in Soil

- No data found for product.

12.5 Results of PBT and vPvB assessment

- PBT and vPvB assessment has not been carried out.

12.6 Other adverse effects

Ecological Fate

- No data found for product.

**Section 13 - Disposal Considerations**

13.1 Waste treatment methods

**Product waste**

- Dispose of content and/or container in accordance with local, regional, national, and/or international regulations.

**Packaging waste**

- Dispose of content and/or container in accordance with local, regional, national, and/or international regulations.

**Section 14 - Transport Information**

<table>
<thead>
<tr>
<th>14.1 UN number</th>
<th>14.2 UN proper shipping name</th>
<th>14.3 Transport hazard class(es)</th>
<th>14.4 Packing group</th>
<th>14.5 Environmental hazards</th>
</tr>
</thead>
<tbody>
<tr>
<td>DOT</td>
<td>NDA</td>
<td>Not Regulated</td>
<td>NDA</td>
<td>NDA</td>
</tr>
<tr>
<td>TDG</td>
<td>NDA</td>
<td>Not Regulated</td>
<td>NDA</td>
<td>NDA</td>
</tr>
<tr>
<td>IMO/IMDG</td>
<td>NDA</td>
<td>Not Regulated</td>
<td>NDA</td>
<td>NDA</td>
</tr>
<tr>
<td>IATA/ICAO</td>
<td>NDA</td>
<td>Not Regulated</td>
<td>NDA</td>
<td>NDA</td>
</tr>
</tbody>
</table>

14.6 Special precautions for user

- None known.

14.7 Transport in bulk according to Annex II of MARPOL 73/78 and the IBC Code

- Not relevant.
Section 15 - Regulatory Information

15.1 Safety, health and environmental regulations/legislation specific for the substance or mixture

SARA Hazard Classifications

- Acute

<table>
<thead>
<tr>
<th>Component</th>
<th>CAS</th>
<th>Canada DSL</th>
<th>Canada NDSL</th>
<th>China</th>
<th>EU EINECS</th>
<th>EU ELNICS</th>
</tr>
</thead>
<tbody>
<tr>
<td>Phosphoric acid, ammonium salt (1:2)</td>
<td>7783-28-0</td>
<td>Yes</td>
<td>No</td>
<td>Yes</td>
<td>Yes</td>
<td>No</td>
</tr>
</tbody>
</table>

Inventory (Con't.)

<table>
<thead>
<tr>
<th>Component</th>
<th>CAS</th>
<th>New Zealand</th>
<th>Philippines PICCS</th>
<th>TSCA</th>
</tr>
</thead>
<tbody>
<tr>
<td>Phosphoric acid, ammonium salt (1:2)</td>
<td>7783-28-0</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
</tr>
</tbody>
</table>

Canada

Labor

- Canada - WHMIS - Classifications of Substances
  - Phosphoric acid, ammonium salt (1:2) 7783-28-0 Not Listed

- Canada - WHMIS - Ingredient Disclosure List
  - Phosphoric acid, ammonium salt (1:2) 7783-28-0 Not Listed

Environment

- Canada - 2004 NPRI (National Pollutant Release Inventory)
  - Phosphoric acid, ammonium salt (1:2) 7783-28-0 Not Listed

- Canada - 2005 NPRI (National Pollutant Release Inventory)
  - Phosphoric acid, ammonium salt (1:2) 7783-28-0 Not Listed

- Canada - CEPA - Greenhouse Gases Subject to Mandatory Reporting
  - Phosphoric acid, ammonium salt (1:2) 7783-28-0 Not Listed

- Canada - CEPA - Priority Substances List
  - Phosphoric acid, ammonium salt (1:2) 7783-28-0 Not Listed

- Canada - DWQ (Drinking Water Quality) - IMACs
  - Phosphoric acid, ammonium salt (1:2) 7783-28-0 Not Listed

Other

- Canada - Accelerated Reduction/Elimination of Toxics (ARET)
  - Phosphoric acid, ammonium salt (1:2) 7783-28-0 Not Listed

Canada New Brunswick

Environment

- Canada - New Brunswick - Ozone Depleting Substances - Schedule A
  - Phosphoric acid, ammonium salt (1:2) 7783-28-0 Not Listed

- Canada - New Brunswick - Ozone Depleting Substances - Schedule B
  - Phosphoric acid, ammonium salt (1:2) 7783-28-0 Not Listed
### China
#### Other

China - Classification and Labeling of Dangerous Chemical Substances Commonly Used
- Phosphoric acid, ammonium salt (1:2) 7783-28-0 Not Listed

### Germany

#### Environment

Germany - TA Luft - Types and Classes
- Phosphoric acid, ammonium salt (1:2) 7783-28-0 Not Listed

Germany - Water Classification (VwVwS) - Annex 1
- Phosphoric acid, ammonium salt (1:2) 7783-28-0 Not Listed

Germany - Water Classification (VwVwS) - Annex 2 - Water Hazard Classes
- Phosphoric acid, ammonium salt (1:2) 7783-28-0 Not Listed

Germany - Water Classification (VwVwS) - Annex 3
- Phosphoric acid, ammonium salt (1:2) 7783-28-0 ID Number 7150, hazard class 1 - low hazard to waters

### Philippines

#### Other

Philippines - Priority Chemical List
- Phosphoric acid, ammonium salt (1:2) 7783-28-0 Not Listed

### Singapore

#### Other

Singapore - Corrosive and Explosive Substances - Corrosive Substances
- Phosphoric acid, ammonium salt (1:2) 7783-28-0 Not Listed

### United States

#### Labor

U.S. - OSHA - Process Safety Management - Highly Hazardous Chemicals
- Phosphoric acid, ammonium salt (1:2) 7783-28-0 Not Listed

U.S. - OSHA - Specifically Regulated Chemicals
- Phosphoric acid, ammonium salt (1:2) 7783-28-0 Not Listed

#### Environment

U.S. - CAA (Clean Air Act) - 1990 Hazardous Air Pollutants
- Phosphoric acid, ammonium salt (1:2) 7783-28-0 Not Listed

U.S. - CAA (Clean Air Act) - Class II Ozone Depletors
- Phosphoric acid, ammonium salt (1:2) 7783-28-0 Not Listed

U.S. - CERCLA/SARA - Hazardous Substances and their Reportable Quantities
- Phosphoric acid, ammonium salt (1:2) 7783-28-0 Not Listed

U.S. - CERCLA/SARA - Radionuclides and Their Reportable Quantities
- Phosphoric acid, ammonium salt (1:2) 7783-28-0 Not Listed

U.S. - CERCLA/SARA - Section 302 Extremely Hazardous Substances EPCRA RQs

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Preparation Date: 14/October/2014
Revision Date: 14/October/2014
• Phosphoric acid, ammonium salt (1:2)  7783-28-0  Not Listed

U.S. - CERCLA/SARA - Section 302 Extremely Hazardous Substances TPQs
• Phosphoric acid, ammonium salt (1:2)  7783-28-0  Not Listed

U.S. - CERCLA/SARA - Section 313 - Emission Reporting
• Phosphoric acid, ammonium salt (1:2)  7783-28-0  Not Listed

U.S. - CERCLA/SARA - Section 313 - PBT Chemical Listing
• Phosphoric acid, ammonium salt (1:2)  7783-28-0  Not Listed

United States - California

Environment
U.S. - California - Proposition 65 - Carcinogens List
• Phosphoric acid, ammonium salt (1:2)  7783-28-0  Not Listed

U.S. - California - Proposition 65 - Developmental Toxicity
• Phosphoric acid, ammonium salt (1:2)  7783-28-0  Not Listed

U.S. - California - Proposition 65 - Maximum Allowable Dose Levels (MADL)
• Phosphoric acid, ammonium salt (1:2)  7783-28-0  Not Listed

U.S. - California - Proposition 65 - No Significant Risk Levels (NSRL)
• Phosphoric acid, ammonium salt (1:2)  7783-28-0  Not Listed

U.S. - California - Proposition 65 - Reproductive Toxicity - Female
• Phosphoric acid, ammonium salt (1:2)  7783-28-0  Not Listed

U.S. - California - Proposition 65 - Reproductive Toxicity - Male
• Phosphoric acid, ammonium salt (1:2)  7783-28-0  Not Listed

Vietnam

Environment
Vietnam - Industrial Wastewater Discharge Standards - Specific Permitted Water Bodies
• Phosphoric acid, ammonium salt (1:2)  7783-28-0  Not Listed

15.2 Chemical Safety Assessment
• No Chemical Safety Assessment has been carried out.

Section 16 - Other Information

Last Revision Date
• 14/October/2014

Preparation Date
• 14/October/2014

Disclaimer/Statement of Liability
• The information herein is given in good faith but no warranty, expressed or implied, is made.

Key to abbreviations
NDA = No Data Available