# Material Safety Data Sheet

**Phospholine Iodide**

## 1. PRODUCT AND COMPANY IDENTIFICATION

<table>
<thead>
<tr>
<th>Product Name</th>
<th>Phospholine Iodide</th>
</tr>
</thead>
<tbody>
<tr>
<td>Common Name</td>
<td>Not available</td>
</tr>
<tr>
<td>Chemical Name</td>
<td>Not applicable</td>
</tr>
<tr>
<td>Synonyms</td>
<td>Echothiophate Iodide, Echothiophate Iodide Ophthalmic Solution, Phospholine Iodide</td>
</tr>
<tr>
<td>Product Use</td>
<td>Pharmaceutical product</td>
</tr>
<tr>
<td>Classification</td>
<td>Eyes, Ears, Nose, and Throat Preparations</td>
</tr>
<tr>
<td>Supplier</td>
<td>Wyeth</td>
</tr>
<tr>
<td></td>
<td>P.O. Box 8299</td>
</tr>
<tr>
<td></td>
<td>Philadelphia, PA 19101 USA.</td>
</tr>
<tr>
<td></td>
<td>Telephone: 1-610-688-4400</td>
</tr>
</tbody>
</table>

| Emergency Telephone Number | Chemtrec USA, Puerto Rico, Canada 1-800-424-9300 |
|                          | Chemtrec International 1-703-527-3887 |

## 2. HAZARDS IDENTIFICATION

**Emergency Overview**

This contains an active pharmaceutical ingredient that can affect body functions; handle with caution.

<table>
<thead>
<tr>
<th>Appearance</th>
<th>Biopharmaceutical liquid</th>
</tr>
</thead>
<tbody>
<tr>
<td>Physical State</td>
<td>Liquid</td>
</tr>
<tr>
<td>Odor</td>
<td>Not available</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Potential Physical Hazards</th>
<th>Not available</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Potential Health Effects</strong></td>
<td></td>
</tr>
<tr>
<td><strong>Eyes</strong></td>
<td>May cause burning, redness, stinging, or other irritations of eyes. Systemic absorption via eyes.</td>
</tr>
<tr>
<td><strong>Skin</strong></td>
<td>May cause abnormal heartbeat, diarrhea, muscle weakness, profuse sweating, respiratory difficulties, shock, and urinary incontinence as a result of systemic absorption after excessive skin contact.</td>
</tr>
<tr>
<td><strong>Inhalation</strong></td>
<td>Systemic absorption via lungs.</td>
</tr>
<tr>
<td><strong>Ingestion</strong></td>
<td>The most common effects following systemic absorption may include slow heartbeat, shortness of breath, tightness of chest or wheezing, severe hypotension, increased sweating, loss of bladder control, muscle weakness, nausea, vomiting, diarrhea or stomach cramps or pain, and watering of the mouth. Blurred vision or change in near or distance vision, browache, headache, difficulty in seeing at night or in dim light, twitching of eyelids, and watering of eyes may also occur.</td>
</tr>
<tr>
<td></td>
<td>May cause harm to breastfed babies.</td>
</tr>
</tbody>
</table>

Please see Patient Package Insert for further information.

<table>
<thead>
<tr>
<th>Therapeutic Target Organ(s)</th>
<th>Nervous system.</th>
</tr>
</thead>
</table>

| Potential Environmental Effects | There is no known ecological information for this product. |

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**Page 1**
3. COMPOSITION/INFORMATION ON INGREDIENTS

<table>
<thead>
<tr>
<th>Common Name</th>
<th>CAS-No</th>
<th>Composition</th>
</tr>
</thead>
<tbody>
<tr>
<td>Echothiophate Iodide</td>
<td>513-10-0</td>
<td>0.03 - 0.25%</td>
</tr>
<tr>
<td>Inactive Ingredients</td>
<td>Not applicable</td>
<td>.? mg/tablet</td>
</tr>
</tbody>
</table>

4. FIRST AID MEASURES

**Eye Contact**
Irrigate copiously with clean, fresh water for at least 10 minutes, holding the eyelids apart. Immediate medical attention is required.

**Skin Contact**
Wash off immediately with soap and plenty of water removing all contaminated clothes and shoes. Emergency responders should wear gloves when assisting with removal of clothes. Immediate medical attention is required.

**Inhalation**
Move to fresh air. If not breathing, give artificial respiration. If breathing is difficult, give oxygen. Immediate medical attention is required.

**Ingestion**
Immediate medical attention is required. Do not induce vomiting without medical advice. If vomiting occurs, position head to avoid aspiration. Provide artificial respiration with a ball valve mask or similar barrier device if needed. Do not perform direct mouth to mouth.

**Notes to Physician**
Treat as an organophosphate.

5. FIRE-FIGHTING MEASURES

**Flammable Properties**
Presumed to be a combustible particulate solid.

**Extinguishing Media**
- **Suitable Extinguishing Media**: Use water spray, foam, dry chemical or carbon dioxide.
- **Unsuitable Extinguishing Media**: Do NOT use water jet.

**Fire Fighting**
Evacuate area and fight fire from a safe distance. Cool closed containers exposed to fire with water spray. In the event of fire and/or explosion do not breathe fumes.

**Hazardous Combustion Products**
Carbon oxides, nitrogen oxides.

**Protective Equipment and Precautions for Firefighters**
In the event of fire, wear self-contained breathing apparatus and special protective equipment for fire fighters.

6. ACCIDENTAL RELEASE MEASURES

**Personal Precautions**
Refer to protective measures listed in Sections 7 and 8.

**Environmental Precautions**
Prevent product from entering drains. Local authorities should be advised if a significant spill cannot be contained.

**Methods for Containment**
Not available

**Methods for Cleaning up**
Take up mechanically and collect in suitable container for disposal. Clean contaminated surface thoroughly. Avoid formation of dust and aerosols.
7. HANDLING AND STORAGE

Handling
For personal protection see Section 8. Handle in accordance with good industrial hygiene and safety practice. Skin should be washed after contact. Avoid formation of dust and aerosols.

Storage
No special safety precautions required. Keep container tightly closed.

8. EXPOSURE CONTROLS / PERSONAL PROTECTION

Engineering Controls
No special precautions required.

Personal Protective Equipment

Eye/face Protection
Provide eye protection based on risk assessment.

Skin Protection
Wear nitrile or latex gloves. Wear protective garment.

Respiratory Protection
Base respirator selection on a risk assessment.

General Hygiene
When using, do not eat, drink or smoke. General industrial hygiene practice. Wash hands before breaks and at the end of workday.

Other
Limit access to only personnel trained in the safe handling of this material. Consult a health and safety professional for specific PPE, respirator, and risk assessment guidance.

9. PHYSICAL AND CHEMICAL PROPERTIES

<table>
<thead>
<tr>
<th>Appearance</th>
<th>Biopharmaceutical liquid</th>
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<tbody>
<tr>
<td>Color</td>
<td>Clear</td>
</tr>
<tr>
<td>Odor Threshold</td>
<td>Not available</td>
</tr>
<tr>
<td>pH</td>
<td>Not available</td>
</tr>
<tr>
<td>Specific Gravity</td>
<td>Not available</td>
</tr>
<tr>
<td>Solubility</td>
<td>Not applicable</td>
</tr>
<tr>
<td>Partition Coefficient (n-octanol/water)</td>
<td>Not available</td>
</tr>
<tr>
<td>Boiling Point</td>
<td>Not available</td>
</tr>
<tr>
<td>Flash Point</td>
<td>Not applicable</td>
</tr>
<tr>
<td>Melting Point</td>
<td>Not applicable</td>
</tr>
<tr>
<td>Flammability Limits in Air</td>
<td>Upper Not applicable</td>
</tr>
<tr>
<td>Explosion Limits</td>
<td>Upper Not applicable</td>
</tr>
<tr>
<td>Autoignition Temperature Method</td>
<td>Not applicable</td>
</tr>
<tr>
<td>Water Solubility</td>
<td>Not available</td>
</tr>
<tr>
<td>Evaporation Rate</td>
<td>Not applicable</td>
</tr>
<tr>
<td>Vapor Pressure</td>
<td>Not applicable</td>
</tr>
<tr>
<td>Flash Point</td>
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Phospholine Iodide
10. STABILITY AND REACTIVITY

Chemical Stability
Stable at room temperature.

Conditions to Avoid
No data available

Materials to Avoid
No materials to be especially mentioned.

Hazardous Decomposition Products
None under normal use.

Possibility of Hazardous Reactions
None under normal use.

11. TOXICOLOGICAL INFORMATION

The following effects are based on the Active Pharmaceutical Ingredient.

Acute Toxicity

Echothiophate Iodide
LD50 Oral 174 mcg/kg rats
Acute Dermal Irritation Not applicable
Primary Eye Irritation Not applicable
Sensitization Not applicable

Multiple Dose Toxicity

Echothiophate Iodide
No Toxicologic Effect See Carcinogenicity
Dose/Species/Study Length:

Maximum Tolerated Dose (MTD), Oral

Echothiophate Iodide
Carcinogenicity Long-term animal toxicity studies to evaluate the carcinogenic potential have not been conducted.
Genetic Toxicity No studies to assess the mutagenic potential have been performed.
Reproductive Toxicity Animal studies to evaluate effects on fertility have not been conducted.
Developmental Toxicity Animal reproduction studies have not been conducted.

Echothiophate Iodide
Target Organ(s) of Toxicity No data available

12. ECOLOGICAL INFORMATION

The following effects are based on the Active Pharmaceutical Ingredient.

Chemical Fate Information
Not available

Ecotoxicity
Not available
13. DISPOSAL CONSIDERATIONS

Waste Disposal Method
Dispose of in accordance with local and national regulations.

14. TRANSPORT INFORMATION

Transport Information
This material is not classified as hazardous for transport.

- U.S. Department of Transport (DOT) Not regulated
- Canadian Transport of Dangerous Goods (TDG) Not regulated
- International Civil Aviation Organization (ICAO) Not regulated
- International Air Transport Association (IATA) Not regulated
- International Maritime Dangerous Goods (IMDG)/International Maritime Organization (IMO) Not regulated
- Transport of Dangerous Goods by Rail (RID) Not regulated
- Transport of Dangerous Goods by Road (ADR) Not regulated
- Transportation of Dangerous Goods via Inland Waterways (ADN) Not regulated

15. REGULATORY INFORMATION

USA

Federal Regulations

OSHA Regulatory Status
This material is not considered hazardous by the OSHA Hazard Communication Standard (29 CFR 1910.1200)

SARA 313
Section 313 of Title III of the Superfund Amendments and Reauthorization Act of 1986 (SARA). This product does not contain any chemicals which are subject to the reporting requirements of the Act and Title 40n of the Code of Federal Regulations, Part 372.

SARA 311/312 Hazardous Categorization
- Acute Health Hazard No
- Chronic Health Hazard No
- Fire Hazard No
- Sudden Release of Pressure Hazard No
- Reactive Hazard No

This product does not contain any HAPs.

State Regulations

California Proposition 65
This product does not contain any Proposition 65 chemicals.

Canada
Not classified
WHMIS Hazard Class
Non-controlled

European Union
In accordance with EC directives or respective national laws, the product does not need to be classified nor labeled.

16. OTHER INFORMATION

Prepared By
Wyeth Department of Environment, Health & Safety

Format
This MSDS was prepared in accordance with ANSI Z400.1-2004.

List of References
See Patient Package Insert for more information.

Revision Summary
Not applicable

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End of MSDS