IDENTITY (As Used on Label & List): L-350  Boiler Water Treatment Compound

Section I – Manufacturer

CASCADE WATER SERVICES
113 BLOOMINGDALE ROAD.
HICKSVILLE, NY 11801

Date Prepared: 07/05/07  Preparer: J. Nemetz

Section II – Hazardous Ingredients/Identity Information

<table>
<thead>
<tr>
<th>Hazardous Components</th>
<th>OSHA PEL</th>
<th>ACGIH/TLV</th>
<th>Other Limits Recommend</th>
<th>% (Opt)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Potassium Hydroxide</td>
<td>2mg/m3</td>
<td>2mg/m3</td>
<td>NIOSH; 2 mg/m3 Ceiling; 15 min</td>
<td></td>
</tr>
<tr>
<td>CAS# 1310-58-3</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Water</td>
<td>CAS# 7732-18-5</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Section III – Physical/Chemical Characteristics

<table>
<thead>
<tr>
<th>Characteristic</th>
<th>Value/Details</th>
</tr>
</thead>
<tbody>
<tr>
<td>Boiling Point</td>
<td>-107°C</td>
</tr>
<tr>
<td>Vapor Pressure (mm Hg)</td>
<td>unknown</td>
</tr>
<tr>
<td>Vapor Density (Air = 1)</td>
<td>unknown</td>
</tr>
<tr>
<td>Solubility in Water</td>
<td>complete</td>
</tr>
<tr>
<td>Appearance and Odor</td>
<td>Clear liquid with no odor; 7.5% solution has pH of 14.0.</td>
</tr>
<tr>
<td>Specific Gravity (H₂O = 1)</td>
<td>1.24</td>
</tr>
<tr>
<td>Melting Point</td>
<td>unknown</td>
</tr>
<tr>
<td>Evaporation Rate</td>
<td>unknown</td>
</tr>
<tr>
<td>(Butyl Acetate = 1)</td>
<td></td>
</tr>
</tbody>
</table>

Section IV – Fire and Explosion Hazard Data

Flash Point (Method Used) – not applicable
Flammable Limits – not flammable
LEL – none
UEL – none

Extinguishing Media – This product is not combustible. CO₂, foam, dry chemical
Special Fire Fighting Procedures – Do not use water as this material can cause a violent exothermic reaction when mixed with water. NIOSH/MSHA approved positive pressure self-contained breathing apparatus and protective clothing should be worn.
Unusual Fire and Explosion Hazards – May generate heat when mixed with water.

Section V – Reactivity Data
Stability – Stable: X Conditions to Avoid – Use caution when making solutions as Unstable: heat may be generated during mixing.

Incompatibility (Materials to Avoid) – Do not mix with strong acids without dilution and agitation to prevent violent or explosive reaction. Avoid contact with leather and wool, or aluminum, tin, zinc and alloys containing these metals. Flammable hydrogen gas may evolve with contact with aluminum.

Hazardous Decomposition of Byproducts – none

Hazardous Polymerization –
May Occur: Conditions to Avoid –
Will Not Occur: X none

Section VI – Health Hazard Data

Routes of Entry – (Inhalation?) (Skin?) (Ingestion?) Skin, Eye, Inhalation, and Ingestion

Health Hazards (Acute and Chronic –
Inhalation may damage upper respiratory tract and lung tissue which could produce chemical pneumonia. Ingestion can cause severe burns and tissue perforation of mucous membranes of the mouth, throat, esophagus, and stomach. Corrosive to all tissues on contact and causes severe burns of eyes and skin. May severely burn eyes or cause blindness.


Signs and Symptoms of Exposure – Burning, irritation, itching, soreness of effected area. May at first feel slippery to skin. Object when exposed is to take IMMEDIATE action.

Medical Conditions Generally Aggravated by Exposure – None known

Emergency and First Aid Procedures –
Eyes – immediately flush with lots of water for at least 15 minutes holding lids apart to ensure flushing of entire surface. Seek medical attention.
Skin – Immediately wash with lots of water, which may be followed by rinsing with 3% vinegar solution. Remove contaminated clothes & footwear and wash before reuse.
Ingestion – DO NOT INDUCE VOMITING. If conscious, give lots of water or milk. Get immediate medical help.
Inhalation – Remove to fresh air. If breathing has stopped, apply artificial respiration or O2. Seek immediate medical aid.

Section VII – Precautions for Safe Handling and Use

Steps to be Taken in Case Material is Released or Spilled –
Wear all protective equipment when handling. Clean up spills immediately by absorbing with appropriate material. Neutralize remaining traces with dilute inorganic acid, such as hydrochloric, sulfuric, nitric, phosphoric, and acetic. The spill should then be flushed with water followed by liberal covering of sodium bicarbonate. Clean-up material should be put in approved containers. See Below.

Waste Disposal Method –
Clean-up materials may be hazardous wastes and subject to state, local and federal health &
environmental regulations. Disposal should conform to these regulations. DAT Shipping: Sodium Hydroxide, Corrosive material, UN1823.

Precautions to be Taken in Handling and Storing –

DANGER! Causes severe burns to skin and eyes. Do NOT get in eyes or on skin or on clothing. Avoid breathing dust, mist, or spray. Do NOT take internally. Use with adequate ventilation and respiratory protection. Wear all protective equipment when handling. Avoid contact with strong acids to prevent explosive reaction. Keep container closed when not in use. Wash thoroughly after handling. CORROSIVE! Hazardous carbon monoxide gas can form upon contact with food and beverage products and in enclosed spaces lead to death.

Other Precautions –

Avoid contamination by air and water. Keep away from heat and open flame. Do not freeze. Keep container closed when not in use. Store in a cool, dry, ell ventilated area. Do not reuse empty container. All residual caustic should be removed from container before disposal in accordance with all local, state, and federal laws.

Section VIII – Control Measures

Respiratory Protection (Specify Type) –

Use NIOSH approved respirator for dusts and mists.

Ventilation –

Local Exhaust: Necessary where CO or H2 may be generated
Mechanical (General): Necessary where CO or H2 may be generated
Special: Other:

Protective Gloves: Chemical impermeable, rubber gloves
Eye Protection: Face shield or chemical goggles
Other Protective Clothing or Equipment –

Clothing must protect areas of the body that risk contact. Safety shoes, rubber boots, rubber apron are all recommended. Have an Eyewash and Safety Shower on hand.

Work/Hygienic Practices –

Wash thoroughly after handling.