

# MATERIAL SAFETY DATA SHEET

MSDS

## Sun Stain & Scale Inhibitor

**Date-Issued:** 06/18/2005  
**MSDS Ref. No:** ASUN23470  
**Date-Revised:** 06/18/2005  
**Revision No:** New MSDS

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### 1. PRODUCT AND COMPANY IDENTIFICATION

**PRODUCT NAME:** Sun Stain & Scale Inhibitor  
**GENERAL USE:** Prevents stains caused by metals.  
**CHEMICAL FAMILY:** Phosphonates

#### MANUFACTURER

Asepsis, Inc.  
Sun  
P.O. Box 1788  
Suwanee, GA 30024-0973  
**Customer SERVICE:** (800)959-7946

#### 24 HR. EMERGENCY TELEPHONE NUMBERS

**Poison Control Center (Medical) :** (877) 800 - 5553  
**CHEMTREC (US Transportation) :** (800) 424 - 9300

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### 2. COMPOSITION / INFORMATION ON INGREDIENTS

<u>Chemical Name</u>	<u>CAS#</u>	<u>Wt. %</u>
1-Hydroxyethylidene-1,1-diphosphonic acid	2809-21-4	36
Phosphorous acid	10294-56-1	1.8

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### 3. HAZARDS IDENTIFICATION

#### EMERGENCY OVERVIEW

**PHYSICAL APPEARANCE:** Clear, colorless liquid.

**IMMEDIATE CONCERNS: DANGER:** Corrosive. Causes eye burns. May cause skin irritation. Do not get in eyes, on skin, or on clothing.  
Wear safety glasses and rubber gloves when handling this product. May be irritating to nose and throat. Avoid breathing vapors. If product gets on clothing, remove and wash before reuse. Do not mix with other chemicals.

#### POTENTIAL HEALTH EFFECTS

**EYES:** Causes eye burns. Do not get in eyes.

**SKIN:** May cause skin irritation. Avoid contact with skin.

**INGESTION:** May be harmful if swallowed.

**INHALATION:** May be irritating to nose and throat. Avoid breathing vapors.

**CHRONIC:** There are no known chronic hazards.

**ROUTES OF ENTRY:** Skin Contact, Inhalation, Ingestion, Eye Contact.

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### 4. FIRST AID MEASURES

**EYES:** If contact with eyes occurs: Immediately flush with cold water for at least 15 minutes. Then get immediate medical attention.

**SKIN:** If contact with skin: Wash with plenty of soap and water. Get medical attention if irritation persists.

**INGESTION:** If swallowed: Drink large amounts of water. Do not induce vomiting. Avoid alcohol. NEVER GIVE ANYTHING BY MOUTH TO AN UNCONSCIOUS PERSON. Call a physician or poison control center immediately.

**INHALATION:** Remove to fresh air. Get medical attention if breathing is difficult.

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## 5. FIRE FIGHTING MEASURES

**FLASHPOINT AND METHOD:** None

**GENERAL HAZARD:** There are no unusual fire and explosion hazards known.

**EXTINGUISHING MEDIA:** Water fog, carbon dioxide, dry chemical, or foam.

**FIRE FIGHTING EQUIPMENT:** Firefighters should wear full protective clothing and self contained breathing apparatus (SCBA).

Thoroughly decontaminate fire fighting equipment including all fire fighting wearing apparel after the incident.

**HAZARDOUS DECOMPOSITION PRODUCTS:** Oxides of phosphorous, carbon and nitrogen may be formed.

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## 6. ACCIDENTAL RELEASE MEASURES

**GENERAL PROCEDURES: STEPS TO BE TAKEN IN CASE MATERIAL IS RELEASED OR SPILLED:** Utilizing appropriate clothing and safety equipment, contain spilled material. Cover the liquid with an inert absorbent. Using clean, dedicated equipment, sweep and scoop all spilled material, contaminated soil, and other contaminated material and place into clean dry plastic containers for disposal. Dispose of according to local, municipal, state, provincial, and federal regulations.

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## 7. HANDLING AND STORAGE

**GENERAL PROCEDURES:** Avoid contact with eyes, skin or clothing. Avoid breathing vapors.

**HANDLING:** Do not mix with other chemicals.

**STORAGE:** Keep this product dry in tightly closed container when not in use. Store in a cool, dry, well ventilated area away from heat or open flame. Do not reuse empty container, but place in trash collection.

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## 8. EXPOSURE CONTROLS / PERSONAL PROTECTION

**EXPOSURE GUIDELINES:**

**OSHA HAZARDOUS COMPONENTS (29 CFR 1910.1200)**

		<u>EXPOSURE LIMITS</u>					
		<u>OSHA PEL</u>		<u>ACGIH TLV</u>		<u>SUPPLIER OEL</u>	
		<u>ppm</u>	<u>mg/m<sup>3</sup></u>	<u>ppm</u>	<u>mg/m<sup>3</sup></u>	<u>ppm</u>	<u>mg/m<sup>3</sup></u>
1-Hydroxyethylidene-1,1-diphosphonic acid	TWA	N/E [1]		N/E			
Phosphorous acid	TWA	N/E		N/E			

**OSHA TABLE COMMENTS:**

1. N/E = Not Established

**ENGINEERING CONTROLS:** General room ventilation plus local exhaust should be used to minimize exposure to vapors.

**PERSONAL PROTECTIVE EQUIPMENT:**

**EYES AND FACE:** Wear goggles or safety glasses with side shields when handling this product.

**SKIN:** Wear rubber gloves when handling this product. Avoid contact with skin.

**RESPIRATORY:** A respiratory protection program that meets OSHA 1910.134 and ANSI Z88.2 requirements must be followed whenever workplace conditions warrant a respirator's use.

**WORK HYGIENIC PRACTICES:** Remove and wash contaminated clothing before reuse.

**OTHER USE PRECAUTIONS:** Facilities storing or utilizing this material should be equipped with an eyewash and safety shower.

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## 9. PHYSICAL AND CHEMICAL PROPERTIES

**PHYSICAL STATE:** Liquid

**ODOR:** Odorless

**APPEARANCE:** Clear  
**COLOR:** Colorless  
**pH:** < 3.5  
**VAPOR PRESSURE:** Not Established  
**VAPOR DENSITY:** Not Established  
**BOILING POINT:** Not Established  
**FREEZING POINT:** Not Established  
**SOLUBILITY IN WATER:** Miscible in Water  
**SPECIFIC GRAVITY:** 1.17 g/ml

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## 10. STABILITY AND REACTIVITY

**CONDITIONS TO AVOID:** High temperature. Poor ventilation. Contamination.

**STABILITY:** This product is stable under normal conditions.

**POLYMERIZATION:** Hazardous polymerization will not occur under normal conditions.

**HAZARDOUS DECOMPOSITION PRODUCTS:** Oxides of phosphorous, carbon, and nitrogen may be produced.

**INCOMPATIBLE MATERIALS:** Avoid direct contact with alkaline materials and reactive metals. Also avoid contact with other swimming pool/spa chemicals in their concentrated forms.

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## 11. TOXICOLOGICAL INFORMATION

### ACUTE

**DERMAL LD<sub>50</sub>:** > 7940 mg/kg of body weight in rabbits.  
Toxicological information given is for main constituent.

**ORAL LD<sub>50</sub>:** 2400 mg/kg of body weight in rats  
Toxicological information given is for main constituent.

**EYE EFFECTS:** This product is corrosive to eyes.

**SKIN EFFECTS:** This product may be irritating to skin.

### CARCINOGENICITY:

This product is not listed as a carcinogen by IARC.

This product is not listed as a carcinogen by NTP.

This product is not listed as a carcinogen by OSHA.

**MUTAGENICITY:** Mutagenicity studies were negative.

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## 12. ECOLOGICAL INFORMATION

**ECOTOXICOLOGICAL INFORMATION:** This product may be toxic to fish and aquatic organisms. Keep product from entering waterways and watersheds.

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## 13. DISPOSAL CONSIDERATIONS

**DISPOSAL METHOD:** Do not put product, spilled product, or filled or partially filled containers into the trash or waste compactor. Contact with incompatible materials could cause a reaction or fire.

**PRODUCT DISPOSAL:** Disposal of unused, uncontaminated product is regulated according to local, state, and federal regulations.

**EMPTY CONTAINER:** Do not reuse container, but place in trash collection. Rinse thoroughly before discarding in trash.

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## 14. TRANSPORT INFORMATION

### DOT (DEPARTMENT OF TRANSPORTATION)

**PROPER SHIPPING NAME:** Corrosive Liquids, N.O.S. (Contains Phosphonic Acid)

**PRIMARY HAZARD CLASS/DIVISION:** 8 (Corrosive)  
**UN/NA NUMBER:** 1760  
**PACKING GROUP:** III  
**OTHER SHIPPING INFORMATION:** Limited Quantity

## 15. REGULATORY INFORMATION

### UNITED STATES

#### SARA TITLE III (SUPERFUND AMENDMENTS AND REAUTHORIZATION ACT)

**313 REPORTABLE INGREDIENTS:** This product or its components are not listed.

#### CERCLA (COMPREHENSIVE RESPONSE, COMPENSATION, AND LIABILITY ACT)

**CERCLA REGULATORY:** This product or its components are not listed.

#### TSCA (TOXIC SUBSTANCE CONTROL ACT)

**TSCA REGULATORY:** This product or its components are not subject to export notification.

**TSCA STATUS:** This product or its components are listed on the TSCA Inventory.

**OSHA HAZARD COMM. RULE:** Product is hazardous by definition of the Hazardous Communication Standard.

**FIFRA (FEDERAL INSECTICIDE, FUNGICIDE, AND RODENTICIDE ACT):** This product is not a registered pesticide.

## 16. OTHER INFORMATION

**PREPARED BY:** Regulatory Affairs Department

**REVISION SUMMARY** New MSDS

### HMIS RATING

<b>HEALTH:</b>		3
<b>FLAMMABILITY:</b>		1
<b>PHYSICAL HAZARD:</b>		1
<b>PERSONAL PROTECTION:</b>		B

### NFPA RATING

<b>HEALTH:</b>		3
<b>FIRE:</b>		1
<b>REACTIVITY:</b>		1

### Key

- 4 = Severe
- 3 = Serious
- 2 = Moderate
- 1 = Slight
- 0 = Minimal

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