

1. PRODUCT AND COMPANY IDENTIFICATION

Product Code: DS88
Product Name: DS-88
Company Name: Shepard Bros. Inc.
503 S. Cypress St.
La Habra, CA 90631
Phone Number: +1 (562)697-1366
Web site address: www.shepardbros.com
Emergency Contact: CHEMTREC +1 (800)424-9300

Product Category:

2. HAZARDS IDENTIFICATION

Skin Corrosion/Irritation, Category 1B

Serious Eye Damage/Eye Irritation, Category 2

Specific Target Organ Toxicity (single exposure), Category 3



GHS Signal Word: **Danger**

GHS Hazard Phrases: H314 - Causes severe skin burns and eye damage.
H319 - Causes serious eye irritation.
H335 - May cause respiratory irritation.

GHS Precautionary Phrases: P260 - Do not breathe dust/fume/gas/mist/vapors/spray.
P264 - Wash hands thoroughly after handling.
P280 - Wear protective gloves/protective clothing/eye protection/face protection.
P261 - Avoid breathing dust/fume/gas/mist/vapors/spray.
P271 - Use only outdoors or in a well-ventilated area.

GHS Response Phrases: P303+361+353 - IF ON SKIN (or hair): Remove/take off immediately all contaminated clothing. Rinse skin with water/shower. P363 - Wash contaminated clothing before reuse.
P305+351+338 - IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. P337+313 - If eye irritation persists, get medical advice/attention.
P301+330+331 - IF SWALLOWED: Rinse mouth. Do NOT induce vomiting. P310 - Immediately call a POISON CENTER or doctor/physician.
P304+340 - IF INHALED: Remove victim to fresh air and keep at rest in a position comfortable for breathing. P312 - Call a POISON CENTER or doctor/physician if you feel unwell.
P321 - Specific treatment see Section 4 reference to supplemental first aid instruction - if immediate measures are required.

GHS Storage and Disposal Phrases: P501 - Dispose of contents and containers in accordance with local, regional, national, and international regulations.
P403+233 - Store container tightly closed in well-ventilated place.



SAFETY DATA SHEET

DS-88

Inhalation:	May be harmful if inhaled. May cause coughing, sneezing, or other symptoms of upper respiratory tract irritation.
Skin Contact:	May cause skin irritation. May cause redness, burns, and tissue destruction.
Eye Contact:	Causes redness and pain. May cause severe irritation and can cause deep chemical burns.
Ingestion:	Harmful if swallowed. May cause irritation of the digestive tract. Can cause burns of the mucous membranes in the mouth, throat, esophagus, and stomach.

3. COMPOSITION/INFORMATION ON INGREDIENTS

CAS #	Hazardous Components (Chemical Name)	Concentration
6834-92-0	Sodium metasilicate	30.0 -50.0 %
7758-29-4	Sodium phosphate, Tribasic	10.0 -30.0 %

4. FIRST AID MEASURES

Emergency and First Aid

Procedures:

In Case of Inhalation:	Remove from exposure and move to fresh air immediately. If breathing is difficult, give oxygen. If breathing has ceased apply artificial respiration using oxygen and a suitable mechanical device such as a bag and a mask. Get medical attention immediately.
In Case of Skin Contact:	Flush skin with plenty of water for at least 15 minutes while removing contaminated clothing and shoes. Gently wash with plenty of soap and water. Wash contaminated clothing separately before reuse. Get medical aid if irritation develops and persists.
In Case of Eye Contact:	Flush eyes with plenty of water for at least 15 minutes, occasionally lifting the upper and lower eyelids. Remove contact lenses, if present and easy to do after 5 minutes and continue rinsing for an additional 15 minutes. Get medical aid if irritation develops and persists.
In Case of Ingestion:	Do NOT induce vomiting. If conscious and alert, rinse mouth and drink 2-4 cupfuls of milk or water. Never give anything by mouth to an unconscious person. Get immediate medical advice/attention.
Note to Physician:	Treat symptomatically and supportively. Show this safety data sheet to the doctor in attendance.

5. FIRE FIGHTING MEASURES

Flash Pt:	NA
Explosive Limits:	LEL: No data. UEL: No data.
Autoignition Pt:	NA
Suitable Extinguishing Media:	Foam, CO2, water fog, sand/earth.
Fire Fighting Instructions:	As in any fire, wear a self-contained breathing apparatus in pressure-demand, MSHA/NIOSH approved (or equivalent), and full protective gear. Containers can build up pressure if exposed to heat (fire). Use water spray to keep fire-exposed containers cool.
Flammable Properties and Hazards:	Contact of this product with many "active" metals such as aluminum, copper and zinc, can cause formation of flammable hydrogen gas. High temperatures and fire conditions can result in the formation of carbon monoxide and carbon dioxide, and oxides of: silicon, phosphorus, sodium.
Hazardous Combustion Products:	High temperatures and fire conditions can result in the formation of carbon monoxide and carbon dioxide, and oxides of: silicon, phosphorus, sodium, Contact of this product with many "active" metals such as aluminum, copper and zinc, can cause formation of flammable hydrogen gas.



6. ACCIDENTAL RELEASE MEASURES

Protective Precautions, Protective Equipment and Emergency Procedures: Use proper personal protective equipment as indicated in Section 8.

Environmental Precautions: Do not let product enter drains, sewers, watersheds or water systems.

Steps To Be Taken In Case Material Is Released Or Spilled: Provide ventilation. Isolate hazard area. Keep unnecessary and unprotected personnel from entering. ELIMINATE all ignition sources (no smoking, flares, sparks or flames in immediate area). Contain spill using an inert diking material. Transfer material into an approved container for possible recovery and reuse or for disposal.

7. HANDLING AND STORAGE

Precautions To Be Taken in Handling: Use with adequate ventilation. Avoid contact with eyes, skin, and clothing. Avoid ingestion and inhalation. Wash thoroughly after handling. Remove contaminated clothing and wash before reuse.

Precautions To Be Taken in Storing: Store in a cool, dry, well-ventilated area away from incompatible substances. Keep away from sources of ignition. Do not store in direct sunlight. Keep away from oxidizing agents. Store in a tightly closed container. Keep container closed when not in use. Protect containers against damage.

Other Precautions: Handle in accordance with good industrial hygiene and safety practices. Keep out of reach of children.

8. EXPOSURE CONTROLS/PERSONAL PROTECTION

CAS #	Partial Chemical Name	OSHA TWA	ACGIH TWA	Other Limits
6834-92-0	Sodium metasilicate	No data.	No data.	No data.
7758-29-4	Sodium phosphate, Tribasic	PEL: 15 mg/m3	TLV: 10 mg/m3	No data.

Respiratory Equipment (Specify Type): Avoid breathing dusts and mists. Use a NIOSH/MSHA approved respirator, with a full-facepiece or a full-facepiece respirator with organic vapor cartridges when concentrations are unknown.

Eye Protection: Wear safety glasses with side shields or chemical splash goggles.

Protective Gloves: Wear appropriate protective gloves to prevent skin exposure. Rubber or neoprene gloves. nitrile gloves.

Other Protective Clothing: Wear appropriate protective clothing to prevent skin exposure. Chemical resistant apron. Rubber or neoprene boots.

Engineering Controls (Ventilation etc.): Ensure adequate ventilation, especially in confined areas. Local exhaust is usually adequate. Facilities storing or utilizing this material should be equipped with an eyewash facility and a safety shower.

Work/Hygienic/Maintenance Practices: Handle in accordance with good industrial hygiene and safety practice.

9. PHYSICAL AND CHEMICAL PROPERTIES

Physical States:	[] Gas	[] Liquid	[X] Solid
Appearance and Odor:	Appearance: White. Free flowing. Powder. Odor: Mild solvent.		
pH:	NA		
Melting Point:	NA		
Boiling Point:	NA		
Flash Pt:	NA		
Evaporation Rate:	NA		
Flammability (solid, gas):	No data available.		
Explosive Limits:	LEL: No data.	UEL: No data.	
Vapor Pressure (vs. Air or mm Hg):	NA		
Vapor Density (vs. Air = 1):	NA		
Specific Gravity (Water = 1):	NA		
Density:	NA		
Bulk density:	1.10		
Solubility in Water:	Appreciable		
Saturated Vapor Concentration:	NA		
Octanol/Water Partition Coefficient:	No data.		
Percent Volatile:	NA		
VOC / Volume:	NA		
HAP / Volume:	NA		
Autoignition Pt:	NA		
Decomposition Temperature:	NA		
Viscosity:	NA		
Particle Size:	NA		
Heat Value:	NA		
Corrosion Rate:	NA		
Molecular Formula & Weight:	Proprietary mixture	0.0	

10. STABILITY AND REACTIVITY

Reactivity:	Contact of this product with many "active" metals such as aluminum, copper and zinc, can cause formation of flammable hydrogen gas. High temperatures and fire conditions can result in the formation of carbon monoxide and carbon dioxide, and oxides of: silicon, phosphorus, sodium.
Stability:	Unstable [] Stable [X]
Conditions To Avoid - Instability:	High temperatures, Incompatible materials, Ignition sources.
Incompatibility - Materials To Avoid:	Strong acids, Strong oxidizing agents, Contact of this product with many "active" metals such as aluminum, copper and zinc, can cause formation of flammable hydrogen gas.
Hazardous Decomposition or Byproducts:	High temperatures and fire conditions can result in the formation of carbon monoxide and carbon dioxide, and oxides of: silicon, phosphorus, sodium.
Possibility of Hazardous Reactions:	Will occur [] Will not occur [X]
Conditions To Avoid - Hazardous Reactions:	No data available.

11. TOXICOLOGICAL INFORMATION

Toxicological Information:	Epidemiology: No information available. Teratogenicity: No information available. Reproductive Effects: No information available. Mutagenicity: No information available. Neurotoxicity: No information available. No information available. Teratogenicity: No information available. Reproductive Effects: No data available. Mutagenicity: No information available. Neurotoxicity: No information available. Other Studies: CAS# 6834-92-0: Acute toxicity, LD50, Oral, Rat, 1000 mg/kg. Other Studies: CAS# 7758-29-4: Acute toxicity, LD50, Oral, Rat, 3120 mg/kg.
Irritation or Corrosion:	Other Studies: CAS# 6834-92-0: Standard Draize Test, Skin, Species: Rabbit, 250.0 mg, 24H.
Carcinogenicity:	NTP? No IARC Monographs? No OSHA Regulated? No

12. ECOLOGICAL INFORMATION

General Ecological Information:	Environmental: No information available. Physical: No information available. Other: Do not empty into drains.
Results of PBT and vPvB assessment:	Other Studies: CAS# 7758-29-4: LC50, Medaka, High-Eyes (<i>Oryzias latipes</i>), 590000 ug/L, 24H.
Persistence and Degradability:	No data available.
Bioaccumulative Potential:	No data available.
Mobility in Soil:	No data available.

13. DISPOSAL CONSIDERATIONS

Waste Disposal Method:	Chemical waste generators must determine whether a discarded chemical is classified as a hazardous waste. US EPA guidelines for the classification determination are listed in 40 CFR Parts 261. Additionally, waste generators must consult state and local hazardous waste regulations to ensure complete and accurate classification. Observe all federal, state, and local environmental regulations. RCRA P-Series: None listed. RCRA U-Series: None listed.
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14. TRANSPORT INFORMATION**LAND TRANSPORT (US DOT):**

DOT Proper Shipping Name:	Corrosive solid, basic, inorganic, N.O.S. (Disodium trioxosilicate, Sodium tripolyphosphate)		
DOT Hazard Class:	8	CORROSIVE	
UN/NA Number:	UN3262	Packing Group:	II



15. REGULATORY INFORMATION

EPA SARA (Superfund Amendments and Reauthorization Act of 1986) Lists

CAS #	Hazardous Components (Chemical Name)	S. 302 (EHS)	S. 304 RQ	S. 313 (TRI)
6834-92-0	Sodium metasilicate	No	No	No
7758-29-4	Sodium phosphate, Tribasic	No	Yes 5000 LB	No

This material meets the EPA 'Hazard Categories' defined for SARA Title III Sections 311/312 as indicated:

<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	Explosive	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	Acute toxicity (any route of exposure)
<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	Flammable (gases, aerosols, liquid, or solid)	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	Skin Corrosion or Irritation
<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	Oxidizer (liquid, solid or gas)	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	Serious eye damage or eye irritation
<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	Self-reactive	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	Respiratory or Skin Sensitization
<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	Pyrophoric (liquid or solid)	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	Germ cell mutagenicity
<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	Pyrophoric gas	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	Carcinogenicity
<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	Self-heating	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	Reproductive toxicity
<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	Organic peroxide	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	Specific target organ toxicity (single or repeated exposure)
<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	Corrosive to metal	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	Aspiration Hazard
<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	Gas under pressure (compressed gas)	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	Simple Asphyxiant
<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	In contact with water emits flammable gas	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	(Health) Hazard Not Otherwise Classified (HNOC)
<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	Combustible Dust		
<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	(Physical) Hazard Not Otherwise Classified (HNOC)		

CAS #	Hazardous Components (Chemical Name)
6834-92-0	Sodium metasilicate
7758-29-4	Sodium phosphate, Tribasic

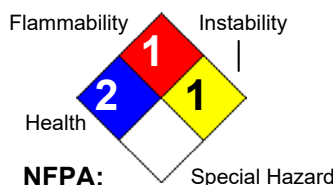
Other US EPA or State Lists

TSCA: Yes - Inventory; CA PROP.65: No; CA TAC, Title 8: No
TSCA: Yes - Inventory; CA PROP.65: No; CA TAC, Title 8: Title 8

16. OTHER INFORMATION

Revision Date: 12/03/2020

Hazard Rating System:



Additional Information About No data available.

This Product:

Company Policy or

Disclaimer:

Information presented herein is believed to be accurate and reliable to the best of our knowledge. However, we make no warranty or merchantability or any other warranty, express or implied, with respect to such information, and we assume no liability resulting from its use. The information relates only to the specific material designated and may not be valid for such material used in combination with any other material or in any process. Users should make their own investigations to determine the suitability of the information for their particular purposes.