

Shine HF Plus



Technical Dossier

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S H E P A R D B R O S . I N C .

SHINE HF PLUS

ACID CLEANER

PRODUCT DESCRIPTION

SHINE HF PLUS is a liquid, high foaming acid detergent formulated for the spray, soak, and foam cleaning of dairy and food processing equipment.

BENEFITS

- Exhibits high foam with good foam retention.
- Wetting agents provide rapid soil penetration, dispersion and suspension.
- Non-volatile and miscible with water in all proportions.
- Non-corrosive to stainless steel processing equipment at recommended use dilutions.
- Powerful cleaning action, rapidly removing milkstone, soils, and mineral films.
- Dissolves and helps prevent lime and other mineral deposits when used alternately with an alkaline cleaner.
- Free rinsing.
- Stable in hot or cold water; non-fuming.

DIRECTIONS

SHINE HF PLUS is recommended for spray, soak and/or foam cleaning of various equipment in dairy and food processing environments.

Typical use dilution range 1 to 5 fluid oz. per gallon of water, depending on the soil or mineral deposit.

Consult your Shepard Bros., Inc. representative for specific use instructions and recommended dispensing equipment.

SAFE HANDLING

A Safety Data Sheet containing detailed information regarding the properties and safe handling of **SHINE HF PLUS** able on request and should be reviewed prior to using this product.

(Rev. 02/20)

The technical information and use suggestions herein are presented in good faith and are believed to be reliable. They do not constitute a part of our terms and conditions of sale unless specifically incorporated in our Order Acknowledgement. Nothing herein shall be deemed to constitute a warranty, expressed or implied, that said information or data are correct, or that the product described is merchantable or fit for a particular purpose, or that said information, data or product can be used without infringing patents of a third party. The purchaser must determine individually, by preliminary tests or otherwise, the suitability of this product for the intended purpose.

Shepard Bros., Inc.

503 S. Cypress St. La Habra, CA 90631

(800) 645-3594

1. PRODUCT AND COMPANY IDENTIFICATION

Product Code: SHIHFPLUS
Product Name: Shine HF Plus
Company Name: Shepard Bros., Inc.
 503 S. Cypress St.
 La Habra, CA 90631
Web site address: www.shepardbros.com
Emergency Contact: CHEMTREC
Phone Number: +1 (562)697-1366
Product Category: Foaming Acid Cleaner

2. HAZARDS IDENTIFICATION

Skin Corrosion/Irritation, Category 1B



GHS Signal Word: **Danger**
GHS Hazard Phrases: H314 - Causes severe skin burns and eye damage.
GHS Precaution Phrases: P260 - Do not breathe dust/fume/gas/mist/vapours/spray.
 P264 - Wash hands thoroughly after handling.
 P280 - Wear protective gloves/protective clothing/eye protection/face protection.
GHS Response Phrases: P304+340 - IF INHALED: Remove victim to fresh air and keep at rest in a position comfortable for breathing. P315 - Get immediate medical advice/attention.
 P301+330+331 - IF SWALLOWED: Rinse mouth. Do NOT induce vomiting. P315 - Get immediate medical advice/attention.
 P302+352 - IF ON SKIN: Wash with plenty of soap and water. P315 - Get immediate medical advice/attention.
 P305+351+338 - IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. P315 - Get immediate medical advice/attention.
 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/containers in accordance with local / regional / national / international regulations.

Hazard Rating System:



Potential Health Effects (Acute and Chronic): Chronic: High concentrations may cause acute pulmonary edema.

Inhalation: Aerosols and mists may severely damage contacted tissue and produce scarring. Exposure to high concentrations may cause pulmonary edema and pneumonia.

Skin Contact: Direct contact may result in redness, swelling, burns, and severe skin damage.

Eye Contact: May cause severe eye irritation. Can cause chemical burn. May cause eye damage.

Ingestion: May cause harmful to fatal chemical burns of the mouth, throat, esophagus, and stomach.



SAFETY DATA SHEET

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3. COMPOSITION/INFORMATION ON INGREDIENTS

CAS #	Hazardous Components (Chemical Name)	Concentration
7664-38-2	Phosphoric acid	40.0 - 60.0 %
68584-22-5	Benzenesulfonic acid, C10-16-alkyl derivs.	1.00 - 5.00 %

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 attention immediately.
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 attention immediately.
In Case of Ingestion:	Do NOT induce vomiting. If victim is conscious and alert, give 2-4 cupfuls of milk or water. Never give anything by mouth to an unconscious person. Get medical attention immediately.
Note to Physician:	Treat symptomatically and supportively. Show this safety data sheet to the doctor in attendance.

5. FIRE FIGHTING MEASURES

Flash Pt:	NA	Method Used:	Not Applicable
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.		
Flammable Properties and Hazards:	High temperatures and fire conditions can result in the formation of carbon monoxide and carbon dioxide, and oxides of: sulfur, phosphorus, 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:	Spills/Leaks: 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. Neutralize with sodium carbonate or sodium bicarbonate.



7. HANDLING AND STORAGE

Precautions To Be Taken in Handling:	Use as directed. 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. Do not store in direct sunlight. Keep away from heat, sparks and flame. 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
7664-38-2	Phosphoric acid	PEL: 1 mg/m3	TLV: 1 mg/m3 STEL: 3 mg/m3	No data.
68584-22-5	Benzenesulfonic acid, C10-16-alkyl derivs.	No data.	No data.	No data.
Respiratory Equipment (Specify Type):	Avoid breathing vapors and mists. If ventilation is not sufficient to effectively prevent buildup of vapors or mists and the exposure limit is exceeded, use a NIOSH/MSHA approved respirator. NIOSH/MSHA organic vapor respirator.			
Eye Protection:	Wear chemical splash goggles and a full-face shield where there is potential for eye contact.			
Protective Gloves:	Wear appropriate protective gloves to prevent skin exposure. Acid resistant gloves. 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. Local exhaust is suggested for use in enclosed or confined areas. 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 [X] Liquid [] Solid		
Appearance and Odor:	Appearance: orange. Liquid.		
	Odor: Odorless.		
Melting Point:	< 32.0 F (0 C)		
Boiling Point:	> 212 F (100 C)		
Decomposition Temperature:	NA		
Autoignition Pt:	NA		
Flash Pt:	NA Method Used: Not Applicable		
Explosive Limits:	LEL: No data.		UEL: No data.
Specific Gravity (Water = 1):	~ 1.27		
Density:	NA		



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Bulk density: NA
Vapor Pressure (vs. Air or mm Hg): NA
Vapor Density (vs. Air = 1): NA
Evaporation Rate: NA
Solubility in Water: Complete
Saturated Vapor Concentration: NA
Viscosity: NA
pH: 1.72 - (1% soln)
Percent Volatile: NA
VOC / Volume: NA
Particle Size: NA
Heat Value: NA
Corrosion Rate: NA

10. STABILITY AND REACTIVITY

Reactivity: High temperatures and fire conditions can result in the formation of carbon monoxide and carbon dioxide, and oxides of: sulfur, phosphorus, Contact of this product with many "active" metals such as aluminum, copper and zinc, can cause formation of flammable hydrogen gas.

Stability: Unstable [] Stable [X]

Conditions To Avoid - Instability: High temperatures, Incompatible materials, Ignition sources.

Incompatibility - Materials To Avoid: Avoid contact with sodium tetrahydroborate. Exothermic reactions may occur with aldehydes, amines, amides, alcohols, glycols, azo-compounds, carbamates, esters, caustics, phenols, cresols, ketones, organophosphates, epoxides, explosives, combustible materials, unsaturated halides, organic peroxides and halogenated organics. organic peroxides, Mixtures with nitromethane are explosive. 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: sulfur, phosphorus.

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 data available.
Mutagenicity: No information available.
Neurotoxicity: No data available.
Other Studies: CAS# 7664-38-2:
Acute toxicity, LD50, Oral, Rat, 1530 mg/kg
Acute toxicity, LD50, Skin, Rabbit, 2740 mg/kg
Acute toxicity, LC50, Inhalation, Rat, 850.0 mg/m³, 1 H.

Irritation or Corrosion: Other Studies: CAS# 7664-38-2:
Standard Draize Test, Eyes, Species: Rabbit, 119.0 mg.

Carcinogenicity/Other Information: CAS# 7664-38-2: Not listed by ACGIH, IARC, NTP, or CA Prop 65.

Carcinogenicity: NTP? No IARC Monographs? No OSHA Regulated? No

12. ECOLOGICAL INFORMATION

General Ecological Information: Environmental: No information available.
Physical: No information available.

Results of PBT and vPvB assessment: Other Studies: CAS# 7664-38-2:
Not reported. Rainbow Trout (*Oncorhynchus mykiss*), fingerling, 5.190%, 27 W.

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.

14. TRANSPORT INFORMATION**LAND TRANSPORT (US DOT):**

DOT Proper Shipping Name: Phosphoric acid solution.
DOT Hazard Class: 8 CORROSIVE
UN/NA Number: UN1805 **Packing Group:** III





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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)
7664-38-2	Phosphoric acid	No	Yes 5000 LB	No
68584-22-5	Benzenesulfonic acid, C10-16-alkyl derivs.	No	No	No

CAS #	Hazardous Components (Chemical Name)	Other US EPA or State Lists
7664-38-2	Phosphoric acid	TSCA: Inventory; CA PROP.65: No; CA TAC, Title 8: TAC, Title 8
68584-22-5	Benzenesulfonic acid, C10-16-alkyl derivs.	TSCA: Inventory; CA PROP.65: No; CA TAC, Title 8: No

Regulatory Information: PROPOSITION 65 (Chemicals known to the state of California to cause cancer or reproductive toxicity): This product may contain traces of: ethylene oxide (CAS 75-21-8).

16. OTHER INFORMATION

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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.

SHINE HF PLUS

ACID CLEANER



DANGER

Causes severe skin burns and eye damage

Precautionary Statements: Do not breathe mist/vapors/spray. Wear protective gloves, protective clothing, eye protection, and face protection. Wash hands thoroughly after handling.

First Aid:

IF ON SKIN (or hair): Immediately remove all contaminated clothing. Rinse skin with water. Wash contaminated clothing before reuse.

IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.

IF SWALLOWED: Rinse mouth. Do NOT induce vomiting.

IF INHALED: Remove victim to fresh air and keep at rest in a position comfortable for breathing. Immediately call a POISON CENTER or a doctor.

SPECIFIC TREATMENT: See Section 4 of the SDS to reference supplemental first aid instruction if immediate measures are required.

Storage/Disposal: Dispose of contents and containers in accordance with local, regional, national, and international regulations.

Supplemental Information: This product may be fatal if swallowed in large amounts. Take proper precautions, especially when using this product in an enclosed or semi-enclosed area.

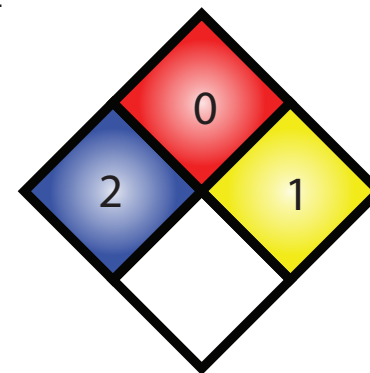
KEEP OUT OF REACH OF CHILDREN.



SHEPARD BROS., INC.
503 S. CYPRESS ST.
La Habra, CA 90631 • (562) 697-1366

CONTAINS: PHOSPHORIC ACID, DODECYLBENZENE SULFONIC ACID. DO NOT MIX WITH CHLORINATED COMPOUNDS, DETERGENTS, OR SANITIZERS.

Contact your Shepard Bros., Inc. representative for more specific use instructions and recommended dispensing equipment.



Read safety data sheets for more detailed information.

PROPER SHIPPING NAME:

UN1805,
PHOSPHORIC ACID SOLUTION, 8, PGIII

PRODUCT ID:

BATCH NO.:

NET CONTENTS:

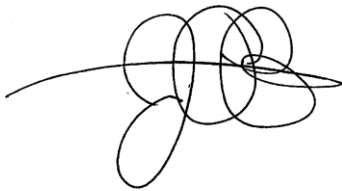
January 1, 2020

Based on current U.S. Food and Drug Administration Guidelines, this Letter of Guarantee certifies that the Shepard Bros., Inc. product, **Shine HF Plus**, is safe and suitable as an acid cleaner for use in all departments of establishments processing food for human or animal consumption.

When used according to the product label directions and in accordance with Good Manufacturing Practice this product will have no deleterious effects on the foods being processed.

This product must be used, handled and stored in a manner that will not adulterate food products. Before using this compound, food products and packaging materials must be removed from the room or carefully protected. After using this compound, surfaces in the area must be thoroughly rinsed with potable water. This product must always be used according to applicable label directions.

Sincerely,



Jose Arias
Director of Compliance & Regulatory Affairs
Shepard Bros., Inc.



SHEPARD BROS.

Shepard Bros., Inc.
503 S. Cypress St.
La Habra, CA 90631
(562) 697-1366

Shine HF Plus
Acidity Test Kit
SBRTK1000-Z

1. Rinse bottle 3 times with solution to be tested.
2. Fill bottle to the 5 or 10 mL mark with sample.
3. Add 3 drops of Phenolphthalein indicator (PH1605). Swirl to mix.
4. Add 1.0 N Sodium Hydroxide (SH6255) drop-wise while swirling until the sample color turns pink. Count the number of drops. Hold bottle vertically.

If using 5 mL sample multiply:

number of drops x 0.04 = to obtain % acidity as Phosphoric acid (by weight)

number of drops x 0.125 = to obtain % product in solution (by volume)

number of drops x 0.167 = to obtain fl-oz product/gallon

number of drops x 1250 = to obtain ppm product in solution (by volume)

Example: 1.0 fl-oz/ gal = 6 drops

2.0 fl-oz/ gal = 12 drops

1% product (by vol) = 8 drops

If using 10 mL sample multiply:

number of drops x 0.02 = to obtain % acidity as Phosphoric acid (by weight)

number of drops x 0.059 = to obtain % product in solution (by volume)

number of drops x 0.077 = to obtain fl-oz product/gallon

number of drops x 590 = to obtain ppm product in solution (by volume)

Example: 1.0 fl-oz/ gal = 13 drops

1.0 fl-oz/ 2 gal = 7 drops

1% product (by vol) = 17 drops

NOTE: For accuracy and consistency hold the dropper bottle in a vertical position during the titration.

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