SAFETY DATA SHEET (SDS)

SECTION 1 - IDENTIFICATION

Product name	**Bar Keepers Friend Soft Cleanser**
Supplier name:	Servaas Laboratories
Address:	5240 Walt Place Indianapolis, In 46254 United States
Telephone number:	1-800-433-5818 (for USA callers) 1-317-636-7760 (non-USA callers)
Emergency phone number:	1-800-424-9300 (CHEMTREC)
Recommended use:	Household Cleaner
Restrictions on use:	None Known
Original date of preparation:	March 3, 2019
Date of revision:	November 10, 2020

SECTION 2 - HAZARD(S) IDENTIFICATION

Note: This product is a consumer product and is labeled in accordance with the US Consumer Product Safety Commission regulations which take precedence over OSHA Hazard Communication labeling. The actual container label will not include the label elements below. The labeling below applies to industrial/professional products.

Classification:	**Physical**	**Health**
	Not Hazardous	Skin Damage Category 1C Eye Damage Category 1

Hazard statement(s): **Danger**

Causes severe skin burns and eye damage.

Precautionary phrases: **Prevention**

Do not breathe dusts or mists.

Wash thoroughly after handling.
Wear protective gloves, protective clothing, eye protection and face protection.
Store locked up.
Dispose of contents and container in accordance with local and national regulations.

Precautionary phrases: **Response**

IF SWALLOWED: Rinse mouth. Do NOT induce vomiting. Immediately call a POISON CENTER or doctor.
IF ON SKIN (or hair): Take off immediately all contaminated clothing. Rinse skin with soap and water. Wash contaminated clothing before reuse. Immediately call a
POISON CENTER or doctor.
IF INHALED: Remove person to fresh air and keep comfortable for breathing. Immediately call a POISON CENTER or doctor.
IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Immediately call a POISON CENTER or doctor.

SECTION 3 - COMPOSITION / INFORMATION ON THE INGREDIENTS

Chemical Name	CAS No.	Percent
Feldspar	68476-25-5	30-40
Oxalic Acid Dihydrate	6153-56-6	1-5
Ethoxylated Fatty Alcohols	68439-46-3	1-5
Glycerin	56-81-5	1-5
Crystalline Silica, Quartz*	14808-60-7	0.1-0.5
Non-Hazardous Ingredients	Mixture	Balance

*The crystalline silica in this product is inextricably bound in a manner that no exposure occurs during normal use and handling. Therefore, this product is not classified as a carcinogen.

The specific identity and/or exact concentration has been withheld as a trade secret.

SECTION 4 - FIRST AID MEASURES

Inhalation: None required under normal use conditions. If mists are generated, move to fresh

air. If breathing has stopped give artificial respiration. If breathing is difficult have qualified personnel administer oxygen. Get immediate medical attention.

Skin contact: Immediately remove contaminated clothing. Flush skin with water for at least 15 minutes. Get immediate medical attention. Launder clothing before reuse.

Eye contact: Immediately flush eye with water for at least 20 minutes while lifting the upper and lower lids. Remove contact lenses if present and easy to do after the first 5 minutes then continue flushing. Get immediate medical attention.

Ingestion: If conscious, rinse mouth with water. Do not induce vomiting. Never give anything by mouth to a person who is unconscious or convulsing. Get immediate medical attention.

Most important symptoms/effects, acute and delayed: May cause severe irritation or burns to eye and skin. Permanent eye damage may occur. Ingestion may cause burns to the mouth, throat and stomach with nausea, vomiting and diarrhea.

Indication of immediate medical attention and special treatment, if necessary: Medical treatment is recommended for all incidents of contact or exposure.

SECTION 5 - FIREFIGHTING MEASURES

Suitable (and unsuitable extinguishing media: Use any media that is suitable for the surrounding fire. **Specific hazards arising from the chemical:** This material is not flammable. Oxalic acid may decompose producing carbon oxides and formic acid under fire conditions.

Special protective equipment and precautions for fire-fighters: Firefighters should wear full emergency equipment and NIOSH approved positive pressure self-contained breathing apparatus. Cool fire exposure containers with water.

SECTION 6 - ACCIDENTAL RELEASE MEASURES

Personal precautions, protective equipment, and emergency procedures: Wear appropriate protective clothing and equipment to prevent eye and skin

contact. Ventilate the area. Evacuate spill area.

Environmental precautions: Avoid release to the environment. Report spill as required by local and federal regulations.

Methods and materials for containment and cleaning up: Wipe up small spills with a sponge or paper towel. Collect and contain large spills with an inert absorbent. Neutralize spill with sodium bicarbonate or other dilute alkaline material. Place into appropriate containers for disposal.

SECTION 7 - HANDLING AND STORAGE

Precautions for safe handling: Prevent eye and skin contact. Use with protective equipment as described in section 8. Wash thoroughly after handling. Remove contaminated clothing and launder before reuse.
Empty containers retain product residues. Follow all SDS precautions in handling empty containers.

Conditions for safe storage, including any incompatibilities: Store in a cool, well-ventilated area. Keep in original containers. Protect containers from physical damage.

SECTION 8 - EXPOSURE CONTROLS / PERSONAL PROTECTION

Exposure guidelines:

Feldspar	5 mg/m3 (respirable fraction) TWA OSHA PEL 15 mg/m3 (total dust) TWA OSHA PEL (as PNOC)
Oxalic Acid Dihydrate	1 mg/m3 TWA OSHA PEL 1 mg/m3 TWA, 3 mg/m3 STEL ACGIH TLV
Ethoxylated Fatty Alcohols	None Established
Glycerin	5 mg/m3 TWA (respirable fraction), 15 mg/m3 TWA (total dust) OSHA PEL
Crystalline Silica, Quartz*	0.005 mg/m3 TWA (respirable fraction) OSHA PEL 0.025 mg/m3 TWA (respirable fraction of the aerosol) ACGIH TLV

Appropriate engineering controls: Use in a well-ventilated area. For operations where exposures are excessive

increased mechanical ventilation such as local exhaust may be required.

Personal protective equipment:

Respiratory protection: None required for normal use. For large jobs where exposures may be excessive an approved respirator with dust/mist cartridges may be required. Selection of respiratory protection depends on the contaminant type, form and concentration. Select in accordance with OSHA 1910.134 and good Industrial Hygiene practice.

Skin protection: Impervious gloves such as rubber, neoprene or nitrile are recommended to prevent skin contact.

Eye protection: Wear chemical safety goggles and faceshield to prevent contact.

Other: Wear impervious clothing as needed to prevent contact and contamination of personal clothing. A safety shower and an eye wash facility should be available in the immediate work area.

SECTION 9 - PHYSICAL AND CHEMICAL PROPERTIES

Appearance (physical state, color, etc.): Off white liquid dispersion

Odor: Citrus odor.

Odor Threshold: Not applicable	**pH:** 1.4
Melting / freezing point: Not available	**Boiling point / boiling range:** Not available
Flash Point: Not flamable	**Evaporation Rate**: Not available
Flammability (solid, gas): Not applicable	
Flammability limits LEL: Not applicable	**UEL:** Not applicable
Vapor pressure Not available	**Vapor density:** Not available
Relative density: Not available	**Solubility(ies):** Partial
Partition coefficient: n-octanol/water:	**Autoignition temperature:** Not available
Decomposition temperature: Not available	**VOC:** Not available

SECTION 10 - STABILITY AND REACTIVITY

Reactivity: Not reactive under normal conditions of use.

Chemical stability: Stable.

Possibility of hazardous reactions: Reacts with bases generating heat.

Conditions to avoid: Avoid excessive heat.

Incompatible materials: Avoid oxidizing agents, alkaline solutions, ammonia. May attack some plastic. **Hazardous decomposition products:** Thermal decomposition may produce carbon oxides and formic acid.

SECTION 11 - TOXICOLOGICAL INFORMATION

Inhalation: None expected under normal use conditions.

Skin contact: May cause severe irritation or burns.

Eye contact: May cause severe irritation or burns with redness, pain and swelling. Permanent damage may occur.

Ingestion: Swallowing may cause gastrointestinal irritation or burns, nausea, vomiting and abdominal pain.

Chronic Effects: None known.

Sensitization: None of the components are sensitizing to animals or humans.

Germ Cell Mutagenicity: None of the components have been shown to cause germ cell mutagenicity.

Reproductive Toxicity: None of the components have been shown to cause reproductive or developmental toxicity.

Carcinogenicity: Respirable crystalline silica is classified as a Group 1 carcinogen by IARC, and
"Known to be a Human Carcinogen" by NTP. However, the crystalline silica in this
product is inextricably bound in a manner and dust exposure would not be expected.
None of the other components present at 0.1% or greater are listed as a carcinogen
by NTP, IARC, ACGIH or OSHA.

Acute toxicity values: Acute Toxicity Estimates (ATE) calculated: Oral 62,500 mg/kg, Dermal >2000 mg/kg,
Oxalic Acid Dihydrate: Oral rat LD50 375 mg/L, Dermal rabbit LD50 20,000 mg/kg

Ethoxylated Fatty Alcohols: Oral rat LD50 3488 mg/kg, Inhalation rat LC50 >1.6
mg/L/4 hr (maximum attainable concentration); Dermal rabbit LD50 >2000 mg/kg
Glycerin: Oral rat LD50 23,000 mg/kg, Inhalation rat LC50 >2.75 mg/L/4 hr, Dermal guinea pig LD50 56,750 mg/kg
Crystalline Silica, Quartz: Oral rat LD50 >22,500 mg/kg

SECTION 12 - ECOLOGICAL INFORMATION

Ecotoxicity values: Oxalic Acid Dihydrate: 48 hr LC50 Leuciscus idus melanotus 160 mg/L, 48 hr EC50 daphnia magna 162.2 mg/L,
72 hr EC50 Pseudokirchneriella subcapitata 20.58 mg/L
Ethoxylated Fatty Alcohols: 96 hr LC50 Oncorhynchus mykiss 5-7 mg/L, 48 hr
EC50 daphnia magna 2.5 mg/L, 72 hr EC50 Desmodesmus subspicatus 1.978 mg/L
Glycerin: 96 hr LC50 Oncorhynchus mykiss 54,000 mg/L,
48 hr LC50 daphnia magna 1955 mg/L
Crystalline Silica, Quartz: 72 hr LC50 carp >10,000 mg/L

Persistence and degradability: Oxalic acid dihydrate, glycerin and ethoxylated fatty alcohols are readily biodegradable.

Bioaccumulative potential: Oxalic acid dihydrate has a BCF of <3. This suggests the potential for bioaccumulation is low.

Mobility in soil: Oxalic acid is highly mobile in soil.

Other adverse effects: None known.

SECTION 13 - DISPOSAL CONSIDERATIONS

Waste Disposal Recommendations: Dispose of in accordance with all local, regional, national, provincial, territorial and international regulations.

SECTION 14 - TRANSPORT INFORMATION

	UN-No.	Proper Shipping Name	Hazard Class	Packing Group	Environmental Hazard
DOT	**-.**	Not Regulated	**-**	**-**	**-**

IMDG	**-**	Not Regulated	**-**	**-**	**-**

Note: GHS classification is based on pH, which is not a criteria for transport Class 8.

Transport in bulk (according to Annex II of MARPOL 73/78 and the IBC Code):
Not applicable – product is transported only in packaged form.

Special precautions: None known

SECTION 15 - REGULATORY INFORMATION

Safety, health and environmental regulations specific for the product in questions.

CERCLA Hazardous Substances (Section 103)/RQ: This product is not subject to CERCLA reporting requirements. Many states have more stringent release reporting requirements. Report spills required under federal, state and local regulations.

Section 302 Extremely Hazardous Substances (TPQ): None

SARA Hazard Category (311/312): Refer to Section 2 for OSHA Hazard Classification

EPA SARA 313: This product contains the following chemicals regulated under SARA Title III, section 313: None

California Proposition 65 This product the following chemicals known to the State of California to cause cancer or reproductive toxicity:

Ethylene oxide	75-21-8	<24 ppm	Cancer, female reproductive toxicity, male reproductive toxicity, developmental
Ethylene glycol	107-21-1	<24 ppm	Developmental
Acetaldehyde	75-07-0	<24 ppm	Cancer
Arsenic compounds		<0.1 ppm	Cancer, developmental
Lead compounds		<0.1 ppm	Cancer
Myrcene	123-35-3	<12 ppm	Cancer, female reproductive toxicity, male reproductive toxicity, developmental

California SB-258 Compliance

CAS#	Ingredient Name	Function	California List/Website Active Link Reference
7732-18-5	Water	Ingredient Coupler	No
65997-17-3	Glass	Oxide Abrasive	No
68439-46-3	Alcohol Ethoxylates	Surfactant	No
6153-56-6	Oxalic Acid	Rust Remover	No
1302-78-9	Smectite Clay	Thickening Agent	No

9003-04-7	Acrylic Polymer Dispersant	No	
77-92-9	Citric Acid	Descaler	No
11138-66-2	Xanthan Gum	Thickening Agent	No
9005-64-5	Polysorbate 20	Fragrance Ingredient	No
8008-57-9	Citrus Aurantium Dulcis Peel	Fragrance Ingredient	No
8008-56-8	Citrus Limon Peel	Fragrance Ingredient	No

EPA TSCA Inventory: All of the components of this product are listed on the TSCA inventory.

SECTION 16 - OTHER INFORMATION

NFPA RATING:	Health = 3	Fire = 0	Instability = 0
HMIS RATING:	Health = 3	Fire = 0	Physical Hazard = 0

SDS Revision History: Update formula – Sections 3 and 8

Date of Revision: November 10, 2020

Date of Previous Edition: August 3, 2020

Disclaimer: The information presented herein is based on available data from reliable sources and is correct to the best of SerVaas Laboratories, Inc. knowledge. SerVaas Laboratories, Inc. makes no warranty, express nor implied, regarding the accuracy of the data or the results obtained from the use of this product. The user is solely responsible for determining the suitability of any material or product for a specific purpose and for adopting any appropriate safety precautions. SerVaas Laboratories, Inc. disclaims all liability for injury or damage stemming from any improper use of the material or product described herein.