

S A F E T Y D A T A S H E E T



3141 Clifty Drive • Madison, IN 47250

SECTION 1: PRODUCT AND COMPANY IDENTIFICATION

NAME:

STEAM CLEANER SN

TYPE:

Alkaline Cleaner

PRODUCT #

839401

FOR INDUSTRIAL USE ONLY – KEEP OUT OF THE REACH OF CHILDREN

EMERGENCY RESPONSE INFORMATION:

CHEMTREC	800-424-9300	24-Hour Service
Company Offices:	812-273-6000	Weekdays
Cara Cyrus:	812-599-3611	Evenings and Weekends
Bill Torline:	812-599-4976	Evenings and Weekends

PREPARED DATE:

04-01-15

PREPARED BY:

Marjorie E. Hare

SECTION 2: HAZARDS IDENTIFICATION

GHS Classification

Corrosive to Metals	Category 1	H290
Acute Toxicity, Oral	Category 4	H302
Skin Corrosion/Irritation	Category 1A	H314
Serious Eye Damage/Eye Irritation	Category 1	H318
Specific Target Organ Toxicity	Category 2	H373
Aquatic Toxicity (Acute)	Category 3	H402

Signal Word

DANGER

Symbol



Hazard Statements

H290	May be corrosive to metals.
H302	Harmful if swallowed.
H314	Causes severe skin burns and eye damage.
H318	Causes serious eye damage.
H373	May cause damage to organs (testes, thymus, kidneys, brain and hematopoietic tissues) through prolonged or repeated use.
H402	Harmful to aquatic life.

Precautionary Statements

P260	Do not breathe mist, spray, vapors.
P264	Wash hands, forearms, and exposed areas thoroughly after handling.
P270	Do not eat, drink or smoke when using this product.
P273	Avoid release to the environment.
P280	Wear eye protection, face protection, protective clothing, protective gloves.
P301 + P330 + P331	IF SWALLOWED: rinse mouth. Do NOT induce vomiting.
P303 + P361 + P353	IF ON SKIN (or hair): Take off immediately all contaminated clothing. Rinse skin with water / shower.
P304 + P340	IF INHALED: Remove person to fresh air and keep at rest in a position comfortable for breathing.

SAFETY DATA SHEET

Precautionary Statements Continued

P305 + P351 + P338 IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
P310 Immediately call a POISON CENTER or doctor / physician.
P314 Get medical advice/attention if you feel unwell.
P321 Specific treatment (see Section 4).
P363 Wash contaminated clothing before reuse.
P405 Store locked up.
P501 Dispose of contents / container according to local, regional, national and international regulations.

SECTION 3: COMPOSITION / INFORMATION ON INGREDIENTS

<u>COMPONENT</u>	<u>SYNONYM</u>	<u>CAS NO.</u>	<u>% BY WEIGHT</u>
Sodium hydroxide	Caustic soda	1310-73-2	15 – 25
Potassium hydroxide	Caustic potash	1310-58-3	15 – 25
Diethylene glycol methyl ether	None	111-77-3	1 – 10

SECTION 4: FIRST AID MEASURES

DESCRIPTION OF FIRST AID MEASURES:

EYES: Immediately flush with large quantities of cool water continuously for at least 15 minutes. Call a physician.

SKIN: Immediately flush with large quantities of cool water continuously for at least 15 minutes. Call a physician. Remove contaminated clothing and shoes. Do not put contaminated clothing and shoes back on. Wash clothing and shoes thoroughly in soap and water; rinse repeatedly in clean water and dry before reuse.

INGESTION: If conscious, immediately give large quantities of water. DO NOT INDUCE VOMITING. Call a physician at once. DO NOT give anything by mouth if the person is unconscious or if having convulsions.

INHALATION: Remove subject to fresh air. Give artificial respiration if necessary. Get medical attention immediately.

PRIMARY ROUTE(S) OF ENTRY: Eyes, skin, inhalation.

MOST IMPORTANT SYMPTOMS / EFFECTS, ACUTE AND DELAYED:

EYE CONTACT: Causes serious eye damage.

SKIN CONTACT: Corrosive. Causes burns.

INGESTION: Harmful if swallowed.

INHALATION: May cause nasal and respiratory irritation.

CHRONIC SYMPTOMS: Repeated oral or inhalation exposure to diethylene glycol methyl ether can cause effects in the testes, thymus, kidneys, brain and hematopoietic tissues.

INDICATION OF ANY IMMEDIATE MEDICAL ATTENTION AND SPECIAL TREATMENT NEEDED, IF NECESSARY:

If you experience any of the symptoms / effects listed above seek medical advice.

SECTION 5: FIRE FIGHTING MEASURES

EXTINGUISHING MEDIA:

Use extinguishing media as appropriate for surrounding fire.

SPECIFIC HAZARDS ARISING FROM THE SUBSTANCE OR MIXTURE:

Not considered flammable or explosive. Hazardous reactions will not occur under normal conditions.

ADVICE FOR FIRE FIGHTERS:

Wear self-contained breathing apparatus and full protective clothing. Use water spray to keep containers cool.

Hazardous Combustion Products: Carbon monoxide, carbon dioxide.

SAFETY DATA SHEET

SECTION 6: ACCIDENTAL RELEASE MEASURES

PERSONAL PRECAUTIONS, PROTECTIVE EQUIPMENT, AND EMERGENCY PROCEDURES:

Avoid all contact with skin, eyes and clothing. Avoid breathing vapors. Wear impermeable gloves. Goggles and faceshield necessary. Wear suitable protective clothing. Use NIOSH / MSHA approved positive pressure self-contained breathing apparatus when any material is involved in a fire.

METHODS AND MATERIALS FOR CONTAINMENT AND CLEANING UP:

Contain liquid spills with sand and absorb on inert material. Ventilate area. Dispose with solid waste. See Waste Disposal Method. Do not discharge to sewers or waterways without proper treatment.

SECTION 7: HANDLING AND STORAGE

PRECAUTIONS FOR SAFE HANDLING:

Wear proper safety equipment when handling this product. Handle in accordance with good industrial hygiene and safety procedures.

CONDITIONS FOR SAFE STORAGE, INCLUDING INCOMPATIBILITIES:

Normal for alkaline materials. Store away from acids. Keep container closed when not in use.

SECTION 8: EXPOSURE CONTROLS / PERSONAL PROTECTION

EXPOSURE GUIDELINES:

CHEMICAL IDENTITY

CAS NO.

OSHA PEL

ACGIH TLV

Sodium hydroxide

1310-73-2

2 mg / M³

2 mg / M³*

Potassium hydroxide

1310-58-3

N.E.

2 mg / M³*

Diethylene glycol methyl ether

111-77-3

N.E.**

N.E.**

*Denotes ceiling limit. **Manufacturer recommends a workplace exposure limit of 30 ppm.

ENGINEERING CONTROLS:

Use good ventilation. Local exhaust is recommended if TLVs are exceeded.

INDIVIDUAL PROTECTION MEASURES:

Selection of personal protective equipment should be based upon the anticipated exposure and made in accordance with OSHA's Personal Protective Equipment Standard found in 29 CFR 1910 Subpart I. The following information may be used to assist in PPE selection.

RESPIRATORY PROTECTION:

In absence of proper environmental control, use NIOSH / MSHA approved respirator for dusts and mists where airborne exposure is excessive.

SKIN PROTECTION:

Impermeable gloves. Rubber apron and rubber boots required. Other equipment as required to avoid contact.

EYE PROTECTION:

Goggles and faceshield necessary.

GENERAL HYGIENE CONSIDERATIONS:

Eyewash facility and emergency shower should be in close proximity. Always wash hands after handling any chemical.

SAFETY DATA SHEET

SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES

APPEARANCE:	Dark brown liquid
ODOR:	Mild
ODOR THRESHOLD:	Not available.
pH (100%):	13.6 – 13.8
MELTING POINT/FREEZING POINT	38°F
INITIAL BOILING POINT AND BOILING RANGE	230°F (110°C)
FLASH POINT (METHOD USED)	Not available.
EVAPORATION RATE	Not available.
FLAMMABILITY (SOLID, GAS)	Not available.
UPPER/LOWER FLAMMABLE OR EXPLOSIVE LIMIT	Not available.
VAPOR PRESSURE	Not available.
VAPOR DENSITY	Not available.
SPECIFIC GRAVITY	1.37
SOLUBILITY IN WATER	Complete.
PARTITION COEFFICIENT: N-OCTANOL/WATER	Not available.
AUTO-IGNITION TEMPERATURE	Not available.
VISCOSITY, DYNAMIC	Not available.
DECOMPOSITION TEMPERATURE	Not available.
VISCOSITY	Not available.

SECTION 10: STABILITY AND REACTIVITY

REACTIVITY:	Hazardous reactions will not occur under normal conditions.
CHEMICAL STABILITY:	Stable under recommended handling and storage conditions (see Section 7).
POSSIBILITY OF HAZARDOUS REACTIONS:	Hazardous polymerization will not occur.
CONDITIONS TO AVOID:	No data found.
INCOMPATIBLE MATERIALS:	Aluminum, tin, zinc, and their alloys; strong acids. Avoid contact with leather and wool.
HAZARDOUS DECOMPOSITION PRODUCTS:	Carbon monoxide, carbon dioxide.

SECTION 11: TOXOLOGICAL INFORMATION

ACUTE TOXICITY:	Not classified.
LD50 AND LC50 DATA:	Not available.
ROUTES OF EXPOSURE / SYMPTOMS	
EYES:	DANGER! Causes burns.
SKIN:	DANGER! Causes burns.
INGESTION:	WARNING! Harmful if swallowed.
INHALATION:	WARNING! Causes burns to alimentary canal and mucous membranes.
GERM CELL MUTAGENICITY:	Not classified.
TERATOGENICITY:	Not available.
CHRONIC EFFECTS / CARCINOGENICITY:	This material contains no ingredient above de minimus concentrations known or suspected to cause cancer. Repeated oral or inhalation exposure to diethylene glycol methyl ether can cause effects in the testes, thymus, kidneys, brain and hematopoietic tissues.
SPECIFIC TARGET ORGAN TOXICITY (Repeated exposure):	May cause damage to organs (testes, thymus, kidneys, brain and hematopoietic tissues) through prolonged or repeated use.
REPRODUCTIVE TOXICITY:	Acute or repeated oral, dermal or inhalation exposures to diethylene glycol methyl ether can cause reproductive toxicity and developmental effects.
SPECIFIC TARGET ORGAN TOXICITY (Single exposure):	Not classified.

SAFETY DATA SHEET

ASPIRATION HAZARD: Not classified.

COMPONENT INFORMATION:

Sodium hydroxide	LD50 Oral:	No Data
	LD50 Dermal Rabbit:	1350 mg/kg
	LD50 Inhalation:	No data
Potassium hydroxide	LD50 Oral Rat:	214 mg/kg
	LD50 Dermal:	No data
	LC50 Inhalation:	No data
Diethylene glycol methyl ether	LD50 Oral Rat:	2460 mg/kg
	LD50 Dermal Rabbit:	1290 mg/kg
	LC50 Inhalation Rat:	1480 ppm (7 hours)

SECTION 12: ECOLOGICAL INFORMATION

ECOTOXICITY The ecotoxicity of this product is not known

COMPONENT INFORMATION

Sodium hydroxide	LC50 Fish (<i>Oncorhynchus mykiss</i> [static]): 45.4 mg/L/96 hr
Potassium hydroxide	<u>Freshwater Fish Toxicity Data:</u>
	LC50 Mosquito fish: 80 mg/L/96 hr (static)
	LC50 Fathead minnow: 179 mg/L/96 hr (static)
	<u>Invertebrate Toxicity Data:</u>
	EC50 <i>Daphnia magna</i> : 60 mg/L/48 hr (static)
Diethylene glycol methyl ether	No data available.

PERSISTENCE AND DEGRADABILITY: Not available.

BIOACCUMULATIVE POTENTIAL: Not available.

MOBILITY IN SOIL: Not available.

OTHER ADVERSE EFFECTS: This material contains a glycol ether listed as a hazardous air pollutant under the Clean Air Act.

SECTION 13: DISPOSAL CONSIDERATIONS

WASTE DISPOSAL METHOD Normal for alkaline wastes. May require pH adjustment for neutralization. Dispose in accordance with local, state and federal regulations.

SECTION 14: TRANSPORTATION INFORMATION

DOT PROPER SHIPPING NAME: Corrosive liquid, basic, inorganic, n.o.s. (contains sodium hydroxide and potassium hydroxide)
HAZARD CLASS: 8
IDENTIFICATION NUMBER: UN3266
PACKING GROUP: III
EMERGENCY RESPONSE GUIDE: ERG #154

SAFETY DATA SHEET

SECTION 15: REGULATORY INFORMATION

VOC: 0.16 pounds per gallon (19 grams per liter).
TSCA STATUS All ingredients are listed on the TSCA inventory.
CERCLA REPORTABLE QUANTITY 1,000 pounds for sodium hydroxide (approximately 584 gallons).
1,000 pounds for potassium hydroxide (approximately 487 gallons).

SARA 311 / 312 HAZARD CLASSES

x	ACUTE HEALTH
	FIRE
	SUDDEN RELEASE OF PRESSURE
x	CHRONIC HEALTH
	REACTIVE

SARA 312 INFORMATION

Storage of 10,000 pounds or more may require filing a Tier 2 form. Threshold planning quantity for reporting is 10,000 pounds. This material is not an extremely hazardous substance (EHS).

SARA 313 INFORMATION

This material contains the following substances subject to the reporting requirements of Section 313 of the Superfund Amendments and Reauthorization Act of 1986 and 40 CFR Part 372

CHEMICAL NAME

Diethylene glycol methyl ether

CATEGORY CODE

N230

CAS NUMBER

111-77-3

% BY WEIGHT

2

STATE REGULATORY INFORMATION

CALIFORNIA PROPOSITION 65

California has not identified the ingredients listed in Section 3 as known to cause cancer or reproductive toxicity.

SECTION 16: OTHER INFORMATION

MSDS STATUS: Revised to GHS Standards on 04-01-15.

HEALTH	3
FLAMMABILITY	0
PHYSICAL HAZARD	0

FOR INDUSTRIAL USE ONLY – KEEP OUT OF THE REACH OF CHILDREN