



SAFETY DATA SHEET

Revision Date 01/30/2015

REVISION NUMBER: 2

1. IDENTIFICATION OF THE SUBSTANCE/PREPARATION AND OF THE COMPANY/UNDERTAKING

Product identifier

Product name FS HEAVY CLEAN

Other means of identification

Product code 118510

UN/ID No. 3266

Synonyms NONE

Recommended use of the chemical and restrictions on use

Recommended Use No information available.

Uses advised against No information available

Details of the supplier of the safety data sheet

Manufacturer Address

Rochester Midland Corporation
155 Paragon Drive
Rochester, New York 14624 USA

Emergency telephone number

EMERGENCY TELEPHONE INFOTRAC: 1-800-535-5053
OUTSIDE U.S.: +1-352-323-3500

2. HAZARDS IDENTIFICATION

Classification

OSHA Regulatory Status

This chemical is considered hazardous by the 2012 OSHA Hazard Communication Standard (29 CFR 1910.1200)

Skin corrosion/irritation	Category 1
Serious eye damage/eye irritation	Category 1
Corrosive to metals	Category 1

Label elements

Emergency Overview

DANGER

Hazard statements

Causes severe skin burns and eye damage

May be corrosive to metals



Appearance Clear Light yellow liquid.

Physical state Liquid

Odor MILD Glycol Ether-like odor.

Precautionary Statements - Prevention

Do not breathe dust/fume/gas/mist/vapors/spray
 Wash face, hands and any exposed skin thoroughly after handling
 Wear protective gloves/protective clothing/eye protection/face protection
 Keep only in original container

Precautionary Statements - Response

Immediately call a POISON CENTER or doctor/physician
 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/physician
 IF ON SKIN (or hair): Remove/Take off immediately all contaminated clothing. Rinse skin with water/shower
 Wash contaminated clothing before reuse
 IF INHALED: Remove victim to fresh air and keep at rest in a position comfortable for breathing
 Immediately call a POISON CENTER or doctor/physician
 IF SWALLOWED: Rinse mouth. DO NOT induce vomiting
 Absorb spillage to prevent material damage

Precautionary Statements - Storage

Store locked up
 Store in corrosive resistant container

Precautionary Statements - Disposal

Dispose of contents/container to an approved waste disposal plant

Hazards not otherwise classified (HNOC)

No information available

Other Information

Unknown Acute Toxicity 4.9% of the mixture consists of ingredient(s) of unknown toxicity

3. COMPOSITION/INFORMATION ON INGREDIENTS

PRODUCT COMPOSITION CAS#	CAS No.	%	TRADE SECRET
SODIUM HYDROXIDE	1310-73-2	1 - 10	*
2-BUTOXYETHANOL	111-76-2	1 - 5	*
Sodium metasilicate	6834-92-0	1 - 5	*

*The exact percentage (concentration) of composition has been withheld as a trade secret.

4. FIRST AID MEASURES

First aid measures

General advice Immediately call a POISON CENTER or doctor/physician.

Eye contact 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/physician.

Skin contact IF ON SKIN (or hair): Remove/Take off immediately all contaminated clothing. Rinse skin with water/shower. Wash contaminated clothing before reuse.

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

Ingestion IF SWALLOWED: Rinse mouth. DO NOT induce vomiting.

Most important symptoms and effects, both acute and delayed

Symptoms No information available.

Indication of any immediate medical attention and special treatment needed

Note to physicians Treat symptomatically.

5. FIRE-FIGHTING MEASURES

Suitable extinguishing media

Use extinguishing measures that are appropriate to local circumstances and the surrounding environment.

Unsuitable extinguishing media Caution: Use of water spray when fighting fire may be inefficient.

Specific hazards arising from the chemical

No information available.

Explosion data

Sensitivity to Mechanical Impact NONE.

Sensitivity to Static Discharge NONE.

Protective equipment and precautions for firefighters

As in any fire, wear self-contained breathing apparatus pressure-demand, MSHA/NIOSH (approved or equivalent) and full protective gear.

6. ACCIDENTAL RELEASE MEASURES

Personal precautions, protective equipment and emergency procedures

Personal precautions Ensure adequate ventilation, especially in confined areas.

Environmental precautions

Environmental precautions See Section 12 for additional ecological information.

Methods and material for containment and cleaning up

Methods for containment Prevent further leakage or spillage if safe to do so.

Methods for cleaning up Dike to contain. Pick up with absorbant material. Put in suitable container for disposal.

7. HANDLING AND STORAGE

Precautions for safe handling

Advice on safe handling DANGER: Concentrated, alkaline liquid. Avoid contact with eyes, skin and clothing. Do not breathe mist or vapors. Do not reuse container. Read and follow label instructions. Keep out of reach of children.

Conditions for safe storage, including any incompatibilities

Storage Conditions Keep containers tightly closed in a dry, cool and well-ventilated place. Keep/store only in original container. Keep from freezing. Empty containers may retain product residue, follow MSDS/label precautions even after container is emptied. Contact with certain food sugars can release hazardous amounts of carbon monoxide gas in enclosed vessels.

Incompatible materials Do not mix with acidic materials. Neutralizes active ingredients. Avoid contact with aluminum, zinc, other soft metals or galvanized metals. Reaction will generate hydrogen gas. This gas is flammable and/or explosive in presence of ignition source.

8. EXPOSURE CONTROLS/PERSONAL PROTECTION

Control parameters

Exposure Guidelines

PRODUCT COMPOSITION CAS#	ACGIH TLV	OSHA PEL	NIOSH IDLH
SODIUM HYDROXIDE 1310-73-2	Ceiling: 2 mg/m ³	(vacated) Ceiling: 2 mg/m ³ TWA: 2 mg/m ³	10 mg/m ³
2-BUTOXYETHANOL 111-76-2	TWA: 20 ppm	S* (vacated) S* (vacated) TWA: 25 ppm (vacated) TWA: 120 mg/m ³ TWA: 50 ppm TWA: 240 mg/m ³	700 ppm

Appropriate engineering controls

ENGINEERING CONTROLS General mechanical and/or local exhaust as needed to meet exposure limits if mist in air. Showers. Eyewash stations.

Individual protection measures, such as personal protective equipment

- Eye/face protection** Wear safety glasses or goggles to protect against exposure.
- Skin and body protection** Chemical resistant gloves are recommended to minimize skin contact. Appropriate protective clothing as needed to prevent skin contact. It is the responsibility of the end user of this product to determine level of PPE required that is consistent with safe use of this product.
- RESPIRATORY PROTECTION** Not normally required. If mist or vapors in air exceed exposure limit, use NIOSH approved organic vapor respirator.

General Hygiene Considerations Handle in accordance with good industrial hygiene and safety practice.

9. PHYSICAL AND CHEMICAL PROPERTIES

Information on basic physical and chemical properties

Physical state	Liquid	Odor	MILD Glycol Ether-like odor.
Appearance	Clear Light yellow liquid.	Odor threshold	No information available
Color	No information available	Remarks • Method	+/- 0.5
Property	Values		
pH	14.0		
Melting point/freezing point	No information available		
Boiling point / boiling range	No information available		
Flash point	-		None to boiling.
Evaporation rate	No information available		
Flammability (solid, gas)	No information available		
Flammability Limit in Air			
Upper flammability limit:	No information available		
Lower flammability limit:	No information available		
Vapor pressure	No information available		
Vapor density	No information available		
Specific gravity	1.085 +/- 0.005		
Water solubility	No information available		
Solubility in other solvents	No information available		
Partition coefficient	No information available		
Autoignition temperature	No information available		
Decomposition temperature	No information available		
Kinematic viscosity	No information available		
Dynamic viscosity	No information available		
Explosive properties	No information available		
Oxidizing properties	No information available		

Other Information

Softening point No information available
 VOC (EPA METH.24) (G/L): No information available
 Density No information available
 Bulk density No information available

10. STABILITY AND REACTIVITY

REACTIVITY

No data available

Chemical stability

Stable under recommended storage conditions.

Possibility of Hazardous Reactions

None under normal processing.

CONDITIONS TO AVOID

Extremes of temperature and direct sunlight.

Incompatible materials

Do not mix with acidic materials. Neutralizes active ingredients. Avoid contact with aluminum, zinc, other soft metals or galvanized metals. Reaction will generate hydrogen gas. This gas is flammable and/or explosive in presence of ignition source.

Hazardous Decomposition Products

Oxides of Carbon. Oxides of Nitrogen.

11. TOXICOLOGICAL INFORMATION

Information on likely routes of exposure

Product Information Causes severe skin burns and eye damage

Inhalation Causes burns.

Eye contact Corrosive to the eyes and may cause severe damage including blindness.

Skin contact Causes burns.

Ingestion Causes burns.

PRODUCT COMPOSITION CAS#	Oral LD50	Dermal LD50	Inhalation LC50
SODIUM HYDROXIDE 1310-73-2	-	= 1350 mg/kg (Rabbit)	-
2-BUTOXYETHANOL 111-76-2	= 470 mg/kg (Rat)	= 220 mg/kg (Rabbit)	= 450 ppm (Rat) 4 h
Sodium metasilicate 6834-92-0	= 600 mg/kg (Rat)	-	-

Information on toxicological effects

Symptoms No information available.

Delayed and immediate effects as well as chronic effects from short and long-term exposure

Sensitization No information available.
Germ cell mutagenicity No information available.
Carcinogenicity The table below indicates whether each agency has listed any ingredient as a carcinogen.

PRODUCT COMPOSITION CAS#	ACGIH	IARC	NTP	OSHA

2-BUTOXYETHANOL 111-76-2	A3	Group 3	-	-
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Reproductive Toxicity No information available.
STOT - single exposure No information available.
STOT - repeated exposure No information available.
Aspiration hazard No information available.

Numerical measures of toxicity - Product Information

Unknown Acute Toxicity 4.9% of the mixture consists of ingredient(s) of unknown toxicity
The following values are calculated based on chapter 3.1 of the GHS document .
ATEmix (oral) 6779 mg/kg
ATEmix (dermal) 18427 mg/kg
ATEmix (inhalation-dust/mist) 36.9 mg/l

12. ECOLOGICAL INFORMATION

Ecotoxicity

6.27% of the mixture consists of components(s) of unknown hazards to the aquatic environment

PRODUCT COMPOSITION CAS#	Algae/aquatic plants	Fish	Crustacea
SODIUM HYDROXIDE 1310-73-2	-	45.4: 96 h Oncorhynchus mykiss mg/L LC50 static	-
2-BUTOXYETHANOL 111-76-2	-	2950: 96 h Lepomis macrochirus mg/L LC50 1490: 96 h Lepomis macrochirus mg/L LC50 static	1000: 48 h Daphnia magna mg/L EC50
Sodium metasilicate 6834-92-0	-	210: 96 h Brachydanio rerio mg/L LC50 semi-static 210: 96 h Brachydanio rerio mg/L LC50	-

Persistence and degradability

No information available.

Bioaccumulation

PRODUCT COMPOSITION CAS#	Partition coefficient
2-BUTOXYETHANOL 111-76-2	0.81

Other adverse effects

No information available

13. DISPOSAL CONSIDERATIONS

Waste treatment methods

Disposal of wastes Disposal should be in accordance with applicable regional, national and local laws and regulations.

Contaminated packaging Do not reuse container.

14. TRANSPORT INFORMATION

UNID No. 3266
Proper shipping name CORROSIVE LIQUID, BASIC, INORGANIC, N.O.S., (SODIUM SILICATE)
Hazard Class 8
Packing Group III
Description 5 Liters (1.3 Gallons) and Less may be Classed as LTD. QTY.

15. REGULATORY INFORMATION

International Inventories

TSCA Complies
DSL/NDSL Complies
EINECS/ELINCS Complies
ENCS Does not Comply
IECSC Complies
KECL Does not Comply
PICCS Complies
AICS Complies

Legend:

TSCA - United States Toxic Substances Control Act Section 8(b) Inventory
DSL/NDSL - Canadian Domestic Substances List/Non-Domestic Substances List
EINECS/ELINCS - European Inventory of Existing Chemical Substances/European List of Notified Chemical Substances
ENCS - Japan Existing and New Chemical Substances
IECSC - China Inventory of Existing Chemical Substances
KECL - Korean Existing and Evaluated Chemical Substances
PICCS - Philippines Inventory of Chemicals and Chemical Substances
AICS - Australian Inventory of Chemical Substances

US Federal Regulations

SARA 313

Section 313 of Title III of the Superfund Amendments and Reauthorization Act of 1986 (SARA). This product contains a chemical or chemicals which are subject to the reporting requirements of the Act and Title 40 of the Code of Federal Regulations, Part 372

PRODUCT COMPOSITION CAS#	SARA 313 - Threshold Values %
2-BUTOXYETHANOL - 111-76-2	1.0

SARA 311/312 Hazard Categories

ACUTE HEALTH HAZARD YES
CHRONIC HEALTH HAZARD No
FIRE HAZARD No
Sudden release of pressure hazard No
REACTIVE HAZARD YES

CWA (Clean Water Act)

This product does not contain any substances regulated as pollutants pursuant to the Clean Water Act (40 CFR 122.21 and 40 CFR 122.42)

CERCLA

This material, as supplied, contains one or more substances regulated as a hazardous substance under the Comprehensive Environmental Response Compensation and Liability Act (CERCLA) (40 CFR 302)

PRODUCT COMPOSITION CAS#	Hazardous Substances RQs (in LBS)	U.S. - CERCLA/SARA - Section 302 Extremely Hazardous Substances TPQs

SODIUM HYDROXIDE 1310-73-2	1000	
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US State Regulations

California Proposition 65

This product does not contain any Proposition 65 chemicals

U.S. State Right-to-Know Regulations

PRODUCT COMPOSITION CAS#	NJRTK:	MARTK:	PARTK:
SODIUM HYDROXIDE 1310-73-2	1706	Listed	Listed
2-BUTOXYETHANOL 111-76-2	0275	Listed	Listed

U.S. EPA Label Information

EPA Pesticide Registration Number Not applicable

16. OTHER INFORMATION

NFPA

Health hazards 3

Flammability 0

Instability 1

Physical and Chemical Properties CORR

HMIS

Health hazards 3

Flammability 0

Physical hazards 1

Personal protection B

Prepared By

EH&S DEPARTMENT

Revision Date

01/30/2015

Revision Note

Disclaimer

The information provided in this Material Safety Data Sheet is correct to the best of our knowledge, information and belief at the date of its publication. The information given is designed only as a guidance for safe handling, use, processing, storage, transportation, disposal and release and is not to be considered a warranty or quality specification. The information relates only to the specific material designated and may not be valid for such material used in combination with any other materials or in any process, unless specified in the text.

*** END OF SDS ***