SAFETY DATA SHEET

SDS according to OSHA CFR 1910.1200

Section 1: Identification

Product identifier:
Farm-Foam EVO
Recommended use of the chemical and restrictions on use:
Foaming alkaline cleaner for use in poultry, swine, veal, dairy, cattle, canine, and equine operations and in food-processing plants.
Details of the supplier of the safety data sheet:
Neogen Corporation
944 Nandino Blvd
Lexington, KY 40511 Phone: +1 859/254-1221 / 800.477.8201 (USA/Canada)
USA
Responsible for SDS (e-mail): inform@neogen.com
Emergency phone number:
Poison Emergency call 1-800-222-1222 (anywhere in the US)
CHEMTREC Tel. No.US: 1-800-424-9300

Section 2: Hazard(s) identification

The label elements below were prepared in accordance with OSHA Hazard Communication Standard, 29 CFR 1910.1200.

Classification of the chemical:
Skin Corr. 1B;H314 Eye Dam. 1;H318

Signal word
Danger

Pictogram(s)/Symbol(s)

Contain
Sodium hydroxide

Hazard statement(s)
H314: Causes severe skin burns and eye damage.

Precautionary statement(s)

General	P101: If medical advice is needed, have product container or label at hand. P102: Keep out of reach of children.
Prevention	P280: Wear protective gloves/protective clothing/eye protection/face protection.
Response	P301+P330+P331+P310: IF SWALLOWED: Rinse mouth. Do NOT induce vomiting. Immediately call a POISON CENTER/doctor. P303+P361+P353+P310: IF ON SKIN (or hair): Remove/take off immediately all contaminated clothing. Rinse skin with water/shower. Immediately call a POISON CENTER/doctor. P305+P351+P338+P310: 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/doctor.
Storage	P405: Store locked up.
Disposal	P501: Dispose of contents/container to an approved waste disposal plant in accordance with local regulation.

Other hazards not otherwise classified:
May be corrosive to metals.

Ingredients with unknown acute toxicity:
None.

Section 3: Composition/Information on Ingredients

Identity of chemical ingredients:

% w/w	Substance name	CAS	Note
<15	Sodium hydroxide	1310-73-2	1
<10	D-Glucopyranose, oligomers, decyl octyl glycosides	68515-73-1	1
<5	Alcohols, C10-16, ethoxylated, sulfates, sodium salts	68585-34-2	1
<5	Tetrasodium ethylenediamine tetraacetate (EDTA)	64-02-8	1
<1	2,2'-iminodiethanol	111-42-2	1

1) Substance on TSCA inventory.

Section 4: First-Aid Measures

Description of necessary measures:

Inhalation: Move the affected person to fresh air. **Mild cases**: Keep at rest. If needed: get medical attention. **Severe cases**: Place the person in recovery position and keep warm. If respiration has stopped, administer artificial respiration. Seek medical advice immediately.

Skin contact: Remove contaminated clothing and wash skin thoroughly with water for at least 30 minutes. Seek medical advice; continue to flush on the way.

Eye contact: Immediately flush with water or physiological salt water for at least 15 minutes, holding eye lids open, remember to remove contact lenses, if any. Get medical attention; continue to flush on the way.

Ingestion: Rinse mouth and drink plenty of water. **Do not induce vomiting,** unless this is recommended by a doctor. If vomiting occurs keep head down to avoid vomit in the lungs. Seek medical advice immediately.

Most important symptoms/effects, acute and delayed:

Causes severe corrosion of mucous membranes, skin and eyes. There is a risk of permanent eye damage and loss of sight. Ingestion may cause severe abdominal pain, vomiting, nausea and permanent damage of the gastro intestinal tract.

Indication of immediate medical attention and special treatment needed:

If exposed or concerned: Get immediate medical advice/attention. Show this safety data sheet to a physician or emergency ward.

Section 5: Fire-Fighting Measures

Suitable (and unsuitable) extinguishing media:

Use water spray (never water jet), dry chemical, foam or carbon dioxide.

Specific hazards arising from the chemical:

Do not breathe smoke fumes. In case of strong heat or fire, the product may form hazardous decomposition product such as oxides of carbon.

Special protective equipment and precautions for fire-fighters:

Wear self-contained breathing apparatus when generation of smoke is vigorous.

Section 6: Accidental Release Measures

Personal precautions, protective equipment, and emergency procedures:

Use personal protective equipment - see section 8. Avoid further spreading. Ventilate area of leak or spill.

Methods and materials for containment and cleaning up:

Absorb and place in a suitable container. Flush with water and ventilate spill area. Further handling of spillage - see section 13.

Section 7: Handling and Storage

Precautions for safe handling:

AVOID ALL CONTACT! Provide adequate ventilation in working area. Avoid contact with skin, eyes and clothing. Rinse immediately if skin is contaminated. Change contaminated clothing immediately. Prevent formation of aerosols. Do not breathe aerosols/vapors. Wash hands and contaminated areas with water and soap after end of work. Required access to water and eye wash fountain.

Always pour the mixture into the water when diluting – never the other way around!

Conditions for safe storage, including any incompatibilities:

In tightly closed container of same material as the original container.

Store locked up and out of reach of unauthorized personnel and separated from food, feed, drugs etc.

Section 8: Exposure Controls/Personal Protection

OSHA Permissible Exposure Limits (PEL):

Substance	OSHA PEL	Cal/OSHA PEL	NIOSH REL	ACGIH TLV
Sodium hydroxide	2 mg/m^3 Ceiling	2 mg/m^3 Ceiling	2 mg/m^3 Ceiling	2 mg/m^3 Ceiling

National Institute for Occupational Safety and Health = NIOSH Recommended Exposure Limit = REL
American Conference of Governmental Industrial Hygienists = ACGIH Threshold Limit Value = TLV
Other exposure limit used or recommended: None known.

Appropriate engineering controls (e.g., use local exhaust ventilation, or use only in an enclosed system):
Provide adequate ventilation in working area.
Showers and eye wash fountains should be clearly marked.

Individual protection measures, such as personal protective equipment (PPE):
PPE are necessary during foreseeable use conditions.

Eye/face protection
Wear tight fitting face screen/ safety glasses with side shields.

Skin/hand protection
Wear protective gloves of nitrile rubber (>0.3 mm). Breakthrough time for sodium hydroxide: 8 hours.
In case of long term skin contact – wear protective gloves of butyl rubber (>0,7 mm) including clothes and footwear which is impervious to corrosive substances.

Respiratory protection
Not required when sufficient ventilation is provided. In case of inadequate ventilation: use an approved mask respiratory protection: Half facepiece or full facepiece air purifying respirator suitable for particulates.

Section 9: Physical and Chemical Properties

Appearance (physical state, color, etc.):	Gold/brown viscous liquid
Odor:	Not determined
Odor threshold:	Not determined
pH:	13,57
Melting point/freezing point (°C):	Not determined
Initial boiling point and boiling range (°C):	Not determined
Flash point (°C):	Not determined
Evaporation rate:	Not determined
Flammability (solid, gas):	Not relevant
Upper/lower flammability or explosive limits (vol.-%):	Not relevant
Vapor pressure:	Not determined
Vapor density:	Not determined
Relative density:	Not determined
Solubility(ies):	Soluble in water
Partition coefficient: n-octanol/water:	Not determined
Auto-ignition temperature (°C):	Not determined
Decomposition temperature (°C):	Not determined
Viscosity:	Not determined

Section 10: Stability and Reactivity

Reactivity:
No available information.
Chemical stability:
Stable under normal conditions – see section 7.
Possibility of hazardous reactions:
None known.
Conditions to avoid:
Do not expose to any form of heat (e.g. solar radiation).
Incompatible materials:
Reacts with acids. Keep away from metals
Hazardous decomposition products:
Thermal decomposition may produce oxides of carbon.

Section 11: Toxicological Information

Information on toxicological (health) effects:

Likely routes of exposure:
Skin, lungs and gastro intestinal tract.

Symptoms:

Inhalation:
Inhalation of spray mists causes strong irritation to mucous membranes and upper respiratory tract with breathing difficulties, coughing and discomfort including symptoms like nausea, headache and dizziness.

Skin Contact:
Corrosive to skin with symptoms like redness, pain and wounds.

Eye Contact:
Corrosive to eyes with symptoms like redness, pain, swelling and blurred vision. Risk of permanent eye damage.

Ingestion:
Corrosion of the digestive system with burning pain in mouth, throat and stomach with nausea, vomiting and diarrhoea.

Delayed (chronic) effects:
None known.

Toxicity data:
Acute Toxicity

Hazard class	Data	Test	Data source
Acute toxicity:			
Inhalation	No available/applicable data	-	-
Dermal	LD_{50} (rabbit) = 1350 mg/kg (Sodium hydroxide)	No info	IUCLID
	LD_{50} (rabbit) = >2000 mg/kg (D-Glucopyranose…)	OECD 402	ECHA
Oral	LD_{50} (rat) = 500 mg/kg (Sodium hydroxide)	No info	IUCLID
	LD_{50} (rat) = >5000 mg/kg (D-Glucopyranose…)	OECD 401	ECHA
	LD_{50} (rat) = >1780 mg/kg (EDTA)	No info	ECHA
Corrosion/irritation:	Corrosive to skin and eyes, rabbit (Sodium hydroxide)	No info	IUCLID
	Corrosive to eyes, irritates skin (D-Glucopyranose…)	OECD 404, 405	ECHA
	Irritates eyes, rabbit (EDTA)	OECD 405	ECHA
Sensitization:	No sensitisation, guinea pig (Sodium hydroxide)	Intra cutaneous	IUCLID
	No sensitization (D-Glucopyranose…)	OECD 406	ECHA

Mutagenic toxicity
Sodium hydroxide: No genotoxicity by vitro test (AMES, IUCLID).
D-Glucopyranose, oligomers, decyl octyl glycosides: Based on similar substances: No effects are expected (Literature)

Reproductive toxicity
D-Glucopyranose, oligomers, decyl octyl glycosides: No effects (OECD 421, ECHA)
No further available/applicable data.

Carcinogenic toxicity
No available/applicable data

Specific Target Organ Toxicity
No known effects.

Section 12: Ecological Information

Ecotoxicity:

Aquatic	Data	Test (Media)	Data source
Fish	LC_{50} (Oncorhynchus mykiss, 96h) = 45.5 mg/l (Sodium hydroxide) LC_{50} (fish, 96h) = 4.88 mg/l (D-Glucopyranose…) LC_{50} (Leopomis macrochirus, 96 h) > 100 mg/l (EDTA)	Static (FW) OECD 203 OPP 72-1 (FW)	IUCLID ECHA EPA Ecotox
Crustaceans	EC_{50} (Ceriodaphnia dubia, 48h) = 40.4 mg/l (Sodium hydroxide)	No data (FW)	EPA Ecotox
Algae	No available/applicable data	-	-

Persistence and degradability
Sodium hydroxide dissociates in water. Sodium hydroxide is an inorganic compound. Methods for the determination of the biological degradation is not applicable to inorganic substances.

Bioaccumulative potential
Sodium hydroxide and EDTA: Log K_{ow} < 0 (no significant bioaccumulative effect).

Mobility in soil
No available/applicable data

Other adverse effects
Emissions of larger quantities can alter the pH in water environment and upset the balance of ecosystems.

Section 13: Disposal Considerations

Disposal considerations
Dispose of contents/container in accordance with applicable local/regional/national regulations.
Incinerate and dispose of waste product in a permitted waste incineration facility/ industrial waste facility.
The product is considered to be hazardous waste.

Section 14: Transport Information

Regulated as dangerous goods according to US DOT (Title 49).
UN-no.: 1824
UN proper shipping name: SODIUM HYDROXIDE SOLUTION
Hazard Class: 8
Packing Group: II

IMDG:
UN-no.: 1824
UN proper shipping name: SODIUM HYDROXIDE SOLUTION
Hazard Class: 8
Packing Group: II
IMDG: F-A, S-B. Category A. “Separated from acids”.

IATA: Consult current IATA Regulations prior to shipping by air.
UN-no.: 1824
UN proper shipping name: SODIUM HYDROXIDE SOLUTION
Hazard Class: 8
Packing Group: II

Section 15: Regulatory Information

US Federal Regulations
NATIONAL INVENTORY STATUS - U.S. Inventory (TSCA): The components of this product are listed on TSCA.
SARA Title III (Superfund Amendments and Reauthorization Act)
SARA Title III Sect. 302 Extremely Hazardous Substances (40 CFR 355): Sodium hydroxide is listed
SARA Title III Sect. 311/312 Extremely Hazardous Categories (40 CFR 370.21): None
Immediate Hazard: No

STATE REGULATIONS:
Proposition 65: 2,2'-iminodiethanol is listed

This SDS has been prepared to meet the U.S. OSHA Hazard Communication Standard, 29 CFR 1910.1200.

Section 16: Other Information

Abbreviations:
CMR = Carcinogenicity, mutagenicity and reproductive toxicity.
EC_{50} = Effect Concentration 50%
LC_{50} = Lethal Concentration 50%
LD_{50} = Lethal Dose 50%
ACGIH = American Conference of Governmental Industrial Hygienists
CERCLA = Comprehensive Environmental Response Compensation and Liability Act
NFPA = National Fire Protection Association
OSHA = Occupational Safety and Health Administration
AICS = Australian Inventory of Chemical Substances
AIHA = American Industrial Hygiene Association Workplace Environmental Exposure Level (WEEL)
ECHA = European Chemical Agency
NIOSH = National Institute for Occupational Safety and Health
STEL = Short-term exposure limits
SWA = Safety Work Australia
HCIS = Hazardous Chemical Information System

Literature:
ECHA: REACH registration dossier from ECHA's website.
IUCLID: International Uniform ChemicaL Database Information.
EPA Ecotox = The US Environmental Protection Agency’s database on ecotoxicological effects for chemicals.

Other information:
No special training is required. However, the user should be well instructed in the execution of his/her task, be familiar with this Safety Data Sheet and have normal training in the use of personal protective equipment.

Disclaimer:
The information contained herein based on data considered accurate. However, no warranty is expressed or implied regarding the accuracy of these data or the results obtained from the use thereof.
The SDS is prepared based on the information available to Altox a/s May 2018.

Changes since the previous edition:
Not relevant (first edition).

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