SAFETY DATA SHEET

SECTION 1: Identification

Product identifier: UC 8425 Special
Other means of identification: Alkali
SDS number: 1333
Recommended use: Alkali
Recommended restrictions: Not for personal care

Manufacturer/Importer/Supplier/Distributor information

Company name: UNX Industries, Inc.
Address: 707 Arlington Blvd
Greenville, NC 27858
Telephone: Office hour (Mon-Fri)
8:00a.m. – 4:00p.m. (Eastern Time)
OFFICE NUMBER: 252-756-8616
E-mail: unx@unxinc.com

Emergency phone number: CHEMTEL (800) 255-3924 (24 HOURS)

SECTION 2: Hazard(s) identification

Classification of the Substance or Mixture:

Physical hazards

Corrosive to metals	Category 1

Health hazards

Acute toxicity; Oral/Dermal:	Category 4
Skin corrosion/irritation:	Category 1B
Serious eye damage/eye irritation:	Category 1

Label elements:

Signal word: Danger

Hazard statements

H290	May be corrosive to metals
H302	Harmful if swallowed.
H312	Harmful in contact with skin.
H314	Causes severe skin burns and eye damage.
H318	Causes serious eye damage.

SECTION 2: Hazard(s) identification (continued)

Precautionary statements

Prevention:

P101	If medical advice is needed, have product container or label at hand.
P102	Keep out of reach of children.
P103	Read label before use.
P234	Keep only in original container.
P260	Do not breathe dust/fume/gas/mist/vapors/spray.
P262	Do not get in eyes, skin, or on clothing.
P264	Wash hands, arms, face and exposed skin thoroughly after handling.
P270	Do not eat, drink or smoke when using this products.
P271	Use only outdoors or in a well-ventilated area.
P273	Avoid release to the environment.
P280	Wear protective gloves/protective clothing/eye protection/face protection.

Response:

P301+312	IF SWALLOWED: Call a POISON CENTER or doctor/physician if you feel unwell.
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 comfortable for breathing.
P305+P351+P338	IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
P308+P313	IF exposed or concerned: Get medical advice/attention.
P362+P364	Take off contaminated clothing and wash it before reuse.

Storage:

P405	Store locked up.
P406	Store in corrosive resistant container or in a container with a resistant inner liner.

Disposal:

P501	Dispose of contents/container in accordance with local/regional/national/ international regulations.

Hazard(s) not otherwise Classified (HNOC): Not Classified

SECTION 3: Composition/information on ingredients

Substance/Mixtures:

Chemical name	CAS No.	Concentration (%)
Water	7732-18-5	50-70
Sodium Hydroxide	1310-73-2	40-60

Section 4: First-aid measures

Description of first aid measures:

Non-emergency personnel

General advice: safely remove victims from the danger zone. Provide emergency services with this safety data sheet.

Eye contact: rinse with plenty of water for at least 15 minutes. Get medical attention immediately.

Skin contact: rinse with plenty of water while removing any contaminated clothing. For small amounts of exposure, get medical attention if any discomfort or symptoms persists. For large amounts of exposure, get medical attention immediately.

Ingestion: rinse mouth with plenty of water if the person is conscious. Do not induce vomiting unless directed by medical personnel. Get medical attention immediately.

Inhalation: bring victim out to fresh air. If the victim is not breathing, give artificial respiration. In case of unconsciousness, place the person on their side for transport, get medical attention immediately.

Emergency personnel

Personal Protection: refer to Section 8 for specific personal protective equipment

Notes to physician: the concentration and length of exposure impacts the severity of the symptoms.

Most important symptoms/effects, acute and delayed:

Refer to Section 2 for hazards and Section 11 for information on health effects and symptoms. Treat symptomatically.

Indication of immediate medical attention and special treatment needed, if necessary: provide general supportive measures. Eye contact, inhalation, and ingestion cases should be treated immediately. Have procedures and facilities in place to treat these cases of exposure.

SECTION 5: Fire-fighting measures

Suitable Extinguishing Media: Use carbon dioxide, foam, or extinguishing powder at the source of the fire. Use any means necessary for extinguishing surrounding fire. If water is used, use in abundance to control heat; also, be cautious that this might splatter the corrosive product and water would only serve the purpose of keeping fire-exposed containers cool on large fires.

Unsuitable Extinguishing Media: do not use water jets as this will spread the fire. Do not use carbon dioxide in enclosed spaces with insufficient

Specific hazards arising from chemical: burning releases carbon monoxide, carbon dioxide, oxides of nitrogen and traces of hydrogen cyanide. Do not breath in fumes/vapors from the fire. Move containers that are not exposed to the fire out of the area if able to do so safely. Be cautious that the product containers can melt in the heat and the combustible packaging material will provide fuel for the fire. Withdraw immediately in cases of rising sound from venting safety device or discoloration of tanks. For massive fire in cargo, use unmanned hose holder or monitor nozzles. If not, withdraw and let fire burn out.

SECTION 5: Fire-fighting measures (Continued)

Special protective equipment for fire-fighters: wear full protective airtight garment and NIOSH approved self-contained breathing apparatus with independent air-supply. Fight the fire in early stages if safe to do so. Provide sufficient ventilation and be aware of hydrogen generation upon reactions with some metals. Do not allow contaminated extinguishing water to enter the soil, ground-water or surface waters.

SECTION 6: Accidental release measures

Personal precautions, protective equipment and emergency procedures: ventilate and restrict access to the area of leak or spill. Have emergency procedures in place for treating incidents, evacuation and informing the emergency services. Refer to Section 8 for personal protective equipment.

Environment precautions: clean up spills/leaks immediately and prevent it from spreading. Large or uncontrolled spills to water systems must be reported to appropriate regulatory body.

Methods and materials for containment and cleaning up: absorb spills with non-combustible absorbent. Dam and absorb with sand, earth or other inert material for large spills/leaks. Collect spillage in containers with labeled contents and dispose according to local regulations. Flush the contaminated area with lots of water.

SECTION 7: Handling and storage

Precautions for safe handling: Refer to Section 8 for personal protective equipment. Do not eat, drink or smoke when handling the product. Avoid skin and eye contact. Follow general hygiene routines after working with the product. When handling large amounts of the product, be sure to have a safety shower nearby.

Conditions for safe storage: store in a suitable, closed and labeled container upright at temperature between 40°F and 100°F in a well-ventilated area. Opened containers must be properly resealed to avoid spillage. Store away from heat, direct sunlight and moisture. It is preferred to keep the container on sump pallets. Store in high-density polyethylene containers. See Section 10 for incompatible materials.

SECTION 8: Exposure control/personal protection

Control Parameters

Occupational exposure limits

US.OSHA Table Z-1 Limits for Air Contaminants (29 CFR 1910.1000)

U.S. ACGIH Threshold Limit Values

Chemical Name	CAS-No.	OSHA PEL	ACGIH- TLV
Sodium Hydroxide	1310-73-2	2 mg/m^3	2 mg/m^3

Appropriate engineering controls/ventilation system:

A general exhaust system is recommended to keep employee exposures below the limits. An additional local exhaust system is preferred in order to control emissions at its source.

SECTION 8: Exposure control/personal protection (Continued)

Personal Protective Equipment (PPE)

Respiratory Protection: A NIOSH approved full-face respirator with high efficiency dust/mist filter is recommended. For emergencies or when dealing with unknown exposure measures, use a full-face piece positive-pressure, air-supplied respirator fitted with a suitable cartridge for the chemical. Consult respirator supplier regarding the compatibility of the equipment. CAUTION: Air purifying respirators do not protect the user in oxygen deficient atmospheres, use an air supply system.

Hand Protection: impervious gloves, with suitable protection for workplace, are recommended any time the product is being handled. Consult glove supplier for details on suitability, breakthrough time and permeability. Frequent change of the glove is advisable. Be aware that latex gloves can trigger an allergic reaction to sensitive individuals.

Eye Protection: use chemical safety goggles and/or full-face shield when handling the product.

Skin/Body Protection: wear impervious protective clothing, boots, gloves, lab coat, apron or coveralls, as appropriate, to prevent skin contact. Take additional precaution if handling amounts past the exposure limits.

Thermal Hazard: wear thermal protective clothing when necessary

General Hygiene: change out of clothes, thoroughly wash your hands and clothes, and shower/bathe as soon as possible. Do not eat, drink, smoke or use the bathroom while handling the product.

Other Protective Measures: have an eye wash and safety shower station close by. Routinely wash all equipment to remove contaminants.

SECTION 9: Physical and chemical properties

Appearance:	Liquid
Colour:	Clear liquid
Odour:	No odour
Odour Threshold:	No data available
pH:	12.5 - Above
Melting point/range:	No data available
Boiling point/range:	No data available
Flash point:	No data available
Evaporation rate:	No data available
Flammability (solid, gas):	No data available
Upper/lower flammability of explosive limits:	No data available
Vapour pressure (mm Hg):	No data available
Vapour density (Air=1):	No data available
Relative density:	No data available
Solubility(ies):	Excellent
Partition coefficient (n-octanol/water):	No data available
Auto-ignition temperature:	No data available
Decomposition temperature:	No data available
Viscosity, dynamic:	No data available
Other Information:	This product does not contain phosphates.

SECTION 10: Stability and reactivity

Reactivity: No hazardous reactions are known under normal storage conditions and if handled according to standard industrial practices.

Chemical Stability: Stable if under normal storage conditions and handled according to standard industrial practices.

Possibility of hazardous reactions: Hazardous polymerization will not occur.

Conditions to avoid: No hazardous conditions are known.

Incompatible materials: Oxidizing or reducing materials, and acids.

Hazardous decomposition products: Releases corrosive gases/vapors upon heating. No hazardous decomposition under normal conditions.

SECTION 11: Toxicological information

Acute toxicity: Toxicological testing has not been conducted with this material. The toxicology information listed below us based on the components of this material.

Category 4- Oral: Harmful if swallowed.
Category 4- Dermal: Harmful in contact with skin.

Sodium Hydroxide - Acute Toxicity Estimate (ATE)	
Oral LD_{50} 500 mg/kg (Rat)	Dermal LD_{50} 1,350 mg/kg (Rabbit)

Skin Corrosion/ irritation: Category 1: Causes severe skin burns and eye damage due to an alkaline pH.

Serious eye damage/irritation: Category 1: Causes serious eye damage due to an alkaline pH.

Respiratory or skin sensitization: Classification not possible.

Germ cell mutagenicity: Classification not possible**.**

Carcinogenicity: Classification not possible.

Reproductive toxicity: Classification not possible.

Specific Target Organ Toxicity - Single Exposure: Classification not possible.

Specific Target Organ Toxicity - Repeated Exposure: Classification not possible.

Aspiration hazard: Classification not possible.

SECTION 12: Ecological information

Toxicity: Do not allow to escape into waterways, wastewater or soil. Ecotoxicological studies of the product are not available. Please find below the data available to us from raw materials:

Aquatic ecotoxicity:

Sodium Hydroxide		
LC_{100} (Cyprimus carpio) 180 ppm/24hr/25°C	TL_m (mosquito fish) 125ppm/96hr (fresh water)	TL_m (bluegill) 99mg/L/48hr/ (tap water)

Persistence and degradability: Sodium hydroxide will rapidly dissolve and dissociate in water.

Bioaccumulative potential: Accumulation in organism is not to be expected.

Mobility in soil: High water solubility indicates that sodium hydroxide will be found predominately in aquatic environment. During movement through soil some ion exchange will occur. Also, some of the hydroxide may remain in the aqueous phase and will move downward through soil in the direction of groundwater flow. Sodium hydroxide does not cause biological oxygen deficit.

Other adverse effects: No other adverse environmental effects (e.g. ozone depletion, photochemical ozone creation potential, endocrine disruption, global warming potential) are expected from this component.

SECTION 13: Disposal considerations

General Information: Do not allow the product to contaminate any body of water. Refer to Section 8 for personal protection equipment.

Disposal Methods: Avoid unauthorized disposal. Do not dump into any body of water. Comply with federal, state/provincial and local laws/regulations. Do not reuse empty containers.

SECTION 14: Transport information

UN Number: NA 1760
UN Proper Shipping Name: Compound, Cleaning liquid (Sodium Hydroxide)
Transport hazard class(es):
- **DOT Hazard Class:** 8
- **DOT Subsidiary Hazard Class:** Not Available
- **Label:** Corrosive

Packing group, if available: II
Environmental Hazards: Yes
Special precautions for user: Not available.
Transport in bulk according to Annex II of MARPOL 73/78[3] and the IBC Code [3]: Not applicable

SECTION 15: Regulatory information

Safety, health and environmental regulations/legislation specific for the substance or mixture

Unless otherwise noted, no components are SARA TITLE 3 SECTION 313 40 CFR listed materials.
The ingredients of this product are listed on the TSCA inventory.
This product is not made with VOC'S that could cause damage to the ozone layer.

CERCLA Reportable Quantity (RQ): Sodium Hydroxide= 1,000 lbs.

State Regulatory Information: Components of this product are covered under specific state regulations, as denoted below:
Alaska- Designated toxic and hazardous substances: Sodium Hydroxide
California- Permissible Exposure Limits for Chemical Contaminants: Sodium Hydroxide
Florida- Substance List: Sodium Hydroxide
Illinois- Toxic Substance List: Sodium Hydroxide
Kansas- Toxic Substance List: Sodium Hydroxide
Minnesota- List of Hazardous Substances: Sodium Hydroxide
Missouri- Employer Information/Toxic Substance List: Sodium Hydroxide
New Jersey- Right to Know Hazardous Substance List: Sodium Hydroxide
North Dakota- List of Hazardous Chemicals, Reportable Quantities: Sodium Hydroxide
Pennsylvania- Hazardous Substance List: Sodium Hydroxide
Rhode Island- Hazardous Substance List: Sodium Hydroxide
Texas- Hazardous Substance List: Sodium Hydroxide
West Virginia- Substance List: Sodium Hydroxide
Wisconsin- Toxic and Hazardous Substances: Sodium Hydroxide

Other Regulations: OSHA: Hazardous by definition of Hazard Communication Standard (29 CFR 1910.1200).

SECTION 16: Other information including date of preparation or last revision

Chemical State: Liquid
Chemical Type: Mixture

Issue Date: 10-19-2020
Revision Date: -
Version #: 01

3	Health
0	Flammability
1	Physical Hazard
C	Personal Protection

To the best of our knowledge, the information contained herein is accurate. **However, neither UNX Industries, Inc. nor any of its subsidiaries assumes any liability whatsoever for the accuracy or completeness of the information contained herein.** Final determination of suitability of any material is the sole responsibility of the user. All materials may represent unknown hazards and should be used within caution. Although certain hazards are described herein, we cannot guarantee that these are the only hazards which exist.