



Centre Anti-Poison pour le Québec: (800) 463-5060

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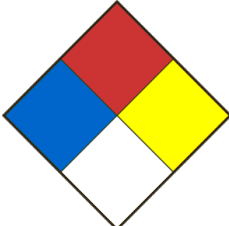
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## SAFETY DATA SHEET

### SECTION 01 - PRODUCT AND COMPANY IDENTIFICATION

Product Identifier SODIUM HYDROXIDE		Product Use Laboratory use	
Chemical formula NaOH		Product code SP-0140	Molar weight 40
Chemical name / Commercial name / Synonymous SODIUM HYDROXIDE, HYDRATE DE SODIUM, SOUDE CAUSTIQUE, LYE, CAUSTIQUE, GILLETTE			
Supplier's name Laboratoire MAT		Address-Street 610, Adanac Street	
City Québec		Province Québec	
Postal code G1C 7B7	Internet www.labmat.com	Phone number 418-660-8666 / 800-890-8666	
Emergency phone	CANUTEC: 613-996-6666 CENTRE ANTI-POISON DU QUÉBEC 800-463-5060		
Date SDS 11/2/2020	SDS Prepared by Laboratoire MAT	E-Mail labmat@labmat.com	

## SECTION 02 - HAZARDS IDENTIFICATION

<b>Classification WHIMS / GHS</b>	Skin corrosion/irritation - Skin corrosion category 1A Serious eye damage/eye irritation - Serious eye damage category 1 Corrosive to metals-Category 1	
<b>Signal Word</b>	DANGER	
<b>Hazards statements (H)</b>	H314 Causes severe skin burns and eye damage. H318 Causes serious eye damage. H290 May be corrosive to metals.	
<b>Precautionary statements (P)</b>	P260 Do not breathe dust / fume / gas / mist / vapors / spray. P264 Wash the areas of the body that have been in contact with the product after handling. P280 Wear protective gloves/protective clothing/eye protection/face protection. P301 + P330 + P331 IF SWALLOWED: rinse mouth. Do NOT induce vomiting. P303 + P361 + P353 IF ON SKIN (or hair): Remove/Take off immediately all contaminated clothing. Rinse skin with water/shower. P304 + P340 IF INHALED: Remove victim to fresh air and keep at rest in a position 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. P310 Immediately call a POISON CENTER or doctor/physician. P321 Specific treatment (see section 4 of the SDS and on this label). P363 Wash contaminated clothing before reuse. P405 Store locked up. P501 Dispose of contents/container in accordance with local / regional / national / international regulations or contact a specialist waste disposal company. P234 Keep only in original container. P390 Absorb spillage to prevent material damage. P406 Store in a corrosion resistant container / or a container with corrosion resistant liner.	
<b>PICTOGRAMS</b>		
<b>Other dangers</b>	NFA (Risk: 0=No risk; 1=Slight; 2=Moderate; 3=Signifiant; 4=Extreme)	
	<b>Health</b> 3 <b>Fire</b> 0 <b>Reactivity</b> 1 <b>Special danger</b>	

## SECTION 03 - COMPOSITION/INFORMATION ON INGREDIENTS

Ingrédients (Dénomination chimique / synonymes)	Numéro CAS et tout identificateur unique	Concentration (%)
HYDROXYDE DE SODIUM	1310-73-2	>=97

## SECTION 04 - FIRST AID MEASURES

<b>Eye contact</b>	Wash eyes with large amounts of water for at least 15 minutes while holding eyelids apart to rinse eyes. If irritation persists, seek medical attention.
<b>Skin contact</b>	Wash skin with plenty of water for at least 15 minutes. Remove soiled clothing. If irritation persists, seek medical attention.
<b>Inhalation</b>	If breathed in, move person into fresh air. If breathing is difficult, give oxygen. Consult a physician.
<b>Ingestion</b>	If the person is conscious, give water to drink. Do NOT induce vomiting. Never give anything by mouth to an unconscious person. Consult a physician.
<b>Most important symptoms and effects (acute and delayed)</b>	The product is a material corrosive. Main symptoms of high exposure: Skin irritation. Eyes irritation. Irritation of the respiratory system. Chemical burns of the skin, eyes and respiratory and digestive mucous membranes. Ref. section 11.
<b>Immediate medical attention and special treatment, if necessary</b>	In case of medical consultation, keep this sheet available.
<b>General advice</b>	Show this safety data sheet to the doctor in attendance.

## SECTION 05 - FIREFIGHTING MEASURES

<b>Flammability</b>	No
<b>Ignition conditions</b>	Not flammable or combustible.
<b>Suitable extinguishing media</b>	Use water spray, alcohol-resistant foam, dry chemical or carbon dioxide.
<b>Unsuitable extinguishing media</b>	Not applicable.
<b>Hazardous combustion products</b>	Hazardous combustion products formed under fire conditions: - Sodium oxides.
<b>Special fire and explosion hazards</b>	May react violently with incompatible products (Ref Section 10).
<b>Special protective equipment and precautions for firefighters</b>	Discard incompatible substances if this can be done without risk. Firefighters should be equipped with standard protective equipment, fireproof clothing, face mask, gloves, protective boots and, where appropriate, self-contained breathing apparatus.

## SECTION 06 - ACCIDENTAL RELEASE MEASURES

<b>Methods and materials for containment and cleaning up / Personnel precautions, protective equipment</b>	Evacuate personnel to safe areas. Pick up with a shovel or broom, taking care not to scatter dust. When handling, wear appropriate safety equipment. Neutralize residues with dilute acid, then rinse with water. Ensure adequate ventilation. Avoid dust formation. Avoid breathing dust. Avoid breathing vapors, mist or gas. Use a respirator as needed. Dispose of residues in a container provided for the disposal of hazardous materials.
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## SECTION 07 - HANDLING AND STORAGE

<b>Conditions for safe storage</b>	Store in a cool, dry place. Keep container tightly closed and store away from heat, water, moisture, and incompatible products. Hygroscopic.
<b>Methods of handling</b>	This product is corrosive to metals. Avoid contact with the skin, eyes and clothes. Wear personal protective equipment when handling. Always ensure good ventilation. Transport according to TDG (ref Section 14)

## SECTION 08 - EXPOSURE CONTROLS/PERSONAL PROTECTION

### Workplace control parameters

Components	CAS-No.	Value	Control parameters	Basis
Sodium hydroxide	1310-73-2	C	2.000000 mg/m <sup>3</sup>	Canada. British Columbia OEL
		CEV	2.000000 mg/m <sup>3</sup>	Canada. Ontario OELs
		(c)	2.000000 mg/m <sup>3</sup>	Canada. Alberta, Occupational Health and Safety Code (table 2: OEL)
Remarks	Occupational exposure limit is based on irritation effects and its adjustment to compensate for unusual work schedules is not required			
		C	2.000000 mg/m <sup>3</sup>	USA. ACGIH Threshold Limit Values (TLV)
		C	2 mg/m <sup>3</sup>	USA. ACGIH Threshold Limit Values (TLV)

Data source	Sigma-Aldrich (Millipore Sigma)
Ventilation	Fan.
Respiratory	If the permissible levels are exceeded, use a mechanical filter / cartridge against NIOSH vapors or a respirator with air supply.
Gloves	Gloves resistant to basic corrosive materials.
Eyes	Safety goggles with safety shutters.
Shoes	Safety shoes.
Clothing	Labcoat. The type of protective equipment must be selected according to the concentration and amount of the dangerous substance at the specific workplace.
Engineering control	Have safety showers and eyewash stations in the workplace in case of an emergency and a ventilation system to maintain the level of concentrations in the air below the exposure limit values.

## SECTION 09 - PHYSICAL AND CHEMICAL PROPERTIES

Physical state	Solid.
Appearance	granulés blanc-
Odour	inodore.
Odour threshold	Data not available
pH	14 @ 50 g/l @ 20 °C (68 °F) (NaOH).
Melting point / Freezing point	318.4°C
Initial boiling point	1390°C
Boiling range	Data not available
Flash point	Non applicable-
Evaporation rate	Data not available
Flammability	No
Lower flammable / Explosive limit	Data not available
Upper flammable / Explosive limit	Data not available
Vapour pressure	< 24.00 hPa (<18.00 mmHg) à 20°C / 4.00 hPa ( 3.00 mmHg) à 37°C (NaOH)-
Vapour density	1.38-
Relative density	2.1300g/cm <sup>3</sup>
Solubility	1 g / 0.9 mL eau ; 1 g / 7.2 mL alcool absolu, 4.2 mL méthanol; soluble dans glycérol (NaOH).
Partition coefficient water/n-octanol	Data not available
Auto-ignition temperature	Data not available
Decomposition temperature	Data not available
Viscosity	4.0 cP at 350 deg C (NaOH)-

## SECTION 10 - STABILITY AND REACTIVITY

<b>Reactivity</b>	Basic product, reacts violently with strong acids. Reacts strongly with metals.
<b>Chemical stability</b>	Stable under recommended storage conditions.
<b>Possibility of hazardous reactions</b>	Stable under normal conditions. May react violently with incompatible substances. On contact with certain metals, the product may generate hydrogen gas.
<b>Conditions of instability (Including sensitivity to shock / static discharge / vibration)</b>	Avoid contact with incompatible materials and extreme temperatures. Hygroscopic.
<b>Incompatible material</b>	Strong oxidizing agents, Strong acids, Organic materials, reactive metals (zinc, aluminum or tin). Acid anhydrides, Alkali metals.
<b>Hazardous decomposition products</b>	Hazardous decomposition products formed under fire conditions. - Sodium oxides.

## SECTION 11 - TOXICOLOGICAL INFORMATION

### SODIUM HYDROXIDE

<b>Routes of exposure</b>	Ingestion, inhalation, skin and eyes.
<b>Acute exposition effects / symptoms:</b>	By exposure route below.
<b>- Eyes</b>	Severe burns and destruction of ocular tissue that can lead to corneal ulceration and blindness.
<b>- Skin</b>	May be harmful if absorbed through skin. Causes skin burns.
<b>- Inhalation</b>	May be harmful if inhaled. Material is extremely destructive to the tissue of the mucous membranes and upper respiratory tract.
<b>Acute toxicity (Ingestion)</b>	Corrosion of the digestive tract, bloody vomiting with mucous membrane fragments, diarrhea, inflammation of the larynx and possibility of oesophageal and gastric perforation, death.
<b>Chronic exposure effects / symptoms</b>	Burning sensation, dermatitis, conjunctivitis, lung and eye damage, nerve disorders, chest pain, cough, dyspnea, laryngitis, headache, dizziness, confusion, irritability, sweating, salivation, tearing, fatigue, alopecia, loss weight loss and loss of appetite, seizures, nausea and vomiting.
<b>DL50 (specify species and route of entry)</b>	Oral rat: 140mg/kg Dermal rabbit: 1350mg/kg
<b>CL50 (specify species and route of entry)</b>	LC50 - Inhalation - Data not available.

## SECTION 12 - ECOLOGICAL INFORMATION

<b>Ecotoxicity</b>	Toxicity to fish: LC50 - Gambusia affinis (Mosquito fish) - 125 mg/l - 96 h Toxicity to daphnia and other aquatic invertebrates: CL50 - Oncorhynchus mykiss (Truite arc-en-ciel) - 45.4 mg/l - 96 h Immobilisation CE50 - Immobilization EC50 - Daphnia - 40.38 mg/l - 48 h.
<b>Persistence and degradability</b>	Data not available.
<b>Bioaccumulative potential</b>	Data not available.
<b>Mobility in soil</b>	Data not available.
<b>Other adverse effects</b>	An environmental hazard cannot be excluded in the event of unprofessional handling or disposal. Harmful to aquatic life.

## SECTION 13 - DISPOSAL CONSIDERATIONS

<b>Waste Disposal Method</b>	Neutralize by slowly adding a solution of low hydrochloric acid concentration to avoid sudden temperature rise and vapor emission. Neutralization can cause the formation of heat or vapors that must be controlled by the rate at which solutions are added. The solution thus neutralized can be disposed as a household waste. For large quantities, contact a specialist waste disposal company.
<b>Contaminated Packaging</b>	Dispose of as unused product.

## SECTION 14 - TRANSPORT INFORMATION

UN Number	1823
UN Proper shipping name	HYDROXYDE DE SODIUM SOLIDE
Transport hazard class(es)	8 Corrosive substances
Packing group	II
Limited quantity index	1kg
ERAP Index	-
Special precautions	-

## SECTION 15 - REGULATORY INFORMATION

WHIMS CANADA	Skin corrosion/irritation - Skin corrosion category 1A Serious eye damage/eye irritation - Serious eye damage category 1 Corrosive to metals-Category 1
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## SECTION 16 - OTHER INFORMATION

### Further information

The information in this document is based on the present state of our knowledge and is applicable to the product with regard to appropriate safety precautions. The above information is believed to be correct but does not purport to be all inclusive and shall be used only as a guide. It does not represent any guarantee of the properties of the product. Laboratoire MAT Inc. shall not be held liable for any damage resulting from handling or from contact with the above product.

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