

Revision date 19-Dec-2023

1. Identification

SAFETY DATA SHEET

Version 5

Product identifier Adenosine 5'-Triphosphate **Product name** Other means of identification **Product No** P0756 Synonyms None Recommended use of the chemical and restrictions on use **Recommended use** This product is for research and development only **Restrictions on use** Details of the supplier of the safety data sheet Supplier Address New England BioLabs 240 County Road Ipswich, MA 01938 **ÚSA** Emergency telephone number **Company Phone Number** 978-927-5054, 800-632-5227 (toll free) Telefax 978-921-1350 E-mail address info@neb.com 24 Hour Emergency Phone Number Chemtrec +1 703-741-5970

2. Hazard(s) identification

Classification

Label elements

Hazard statements

0 % of the mixture consists of ingredient(s) of unknown acute oral toxicity.

0 % of the mixture consists of ingredient(s) of unknown acute dermal toxicity.

0 % of the mixture consists of ingredient(s) of unknown acute inhalation toxicity (gas).

0 % of the mixture consists of ingredient(s) of unknown acute inhalation toxicity (vapor).

0 % of the mixture consists of ingredient(s) of unknown acute inhalation toxicity (dust/mist).

Other information

Causes mild skin irritation.

3. Composition/information on ingredients

Substance

Not applicable.

Mixture

Chemical name	CAS No.	Weight-%	Hazardous Material Information Review Act registry number (HMIRA registry #)	Date HMIRA filed and date exemption granted (if applicable)
Sodium Hydroxide	1310-73-2	0.1 - 1	-	-

4. First-aid measures

Description of first aid measures

Inhalation	Remove to fresh air.			
Eye contact	Rinse thoroughly with plenty of water for at least 15 minutes, lifting lower and upper eyelids. Consult a physician.			
Skin contact	Wash skin with soap and water.			
Ingestion	Rinse mouth.			
Most important symptoms and effects, both acute and delayed				
Symptoms	Prolonged contact may cause redness and irritation.			
Effects of Exposure	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.
Large Fire	CAUTION: Use of water spray when fighting fire may be inefficient.
Unsuitable extinguishing media	Do not scatter spilled material with high pressure water streams.
Specific hazards arising from the chemical	No information available.
Explosion data Sensitivity to mechanical impac Sensitivity to static discharge	t None. None.
Special protective equipment and precautions for fire-fighters	Firefighters should wear self-contained breathing apparatus and full firefighting turnout gear. Use personal protection equipment.

6. Accidental release measures

Personal precautions, protective equipment and emergency procedures

Personal precautions Ensure adequate ventilation.

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	Pick up and transfer to properly labeled containers.

7. Handling and storage

Precautions for safe handling

Advice on safe handling Handle in accordance with good industrial hygiene and safety practice.

Conditions for safe storage, including any incompatibilities

Storage Conditions Keep containers tightly closed in a dry, cool and well-ventilated place.

8. Exposure controls/personal protection

Control parameters

Exposure Limits

Chemical name	ACGIH	ACGIH TLV		OSHA PEL		NIOSH
Sodium Hydroxide 1310-73-2	Ceiling: 2	Ceiling: 2 mg/m ³		TWA: 2 mg/m ³ (vacated) Ceiling: 2 mg/m ³		IDLH: 10 mg/m ³ Ceiling: 2 mg/m ³
Chemical name	Alberta	British C	olumbia	Ontario		Quebec

Sodium Hydroxide Ceiling: 2 mg/m ³ Ceiling: 2 mg/m ³ CEV: 2 mg/m	eiling: 2 mg/m ³
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Chemical name	Manitoba	New Brunswick	Newfoundland and Labrador	Nova Scotia
Sodium Hydroxide	Ceiling: 2 mg/m ³			

Chemical name	Nunavut	Prince Edward Island	Saskatchewan	Yukon
Sodium Hydroxide	Ceiling: 2 mg/m ³			

Appropriate engineering controls

Engineering controls	Showers
	Eyewash stations
	Ventilation systems.

Individual protection measures, such as personal protective equipment

Eye/face protection	Wear safety glasses with side shields (or goggles).
Hand protection	Wear suitable gloves.
Skin and body protection	Wear suitable protective clothing.
Respiratory protection	No protective equipment is needed under normal use conditions. If exposure limits are exceeded or irritation is experienced, ventilation and evacuation may be required.

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
Appearance	Colorless
Color	No information available
Odor	Mild
Odor threshold	No information available
Property	Values
рН	No data available
Melting point / freezing point	No data available
Initial boiling point and boiling range	eNo data available
Flash point	No data available
Evaporation rate	No data available
Flammability (solid, gas)	No data available
Flammability Limit in Air	
Upper flammability or explosive	No data available
limits	
Lower flammability or explosive	No data available
limits	

Remarks • Method None known None known None known None known None known None known

Vapor pressure	No data available	None known
Vapor density	No data available	None known
Relative density	No data available	None known
Water solubility	No data available	None known
Solubility(ies)	No data available	None known
Partition coefficient	No data available	None known
Autoignition temperature	No data available	None known
Decomposition temperature	No data available	None known
Kinematic viscosity	No data available	None known
Dynamic viscosity	No data available	None known
Other information		
Explosive properties	No information available	
Oxidizing properties	No information available	
Softening point	No information available	
Molecular weight	No information available	
VOC content	No information available	
Liquid Density	No information available	
Bulk density	No information available	
10. Stability and reactivity	1	

To. Stability and reactivity

Reactivity	No information available.
Chemical stability	Stable under normal conditions.
Possibility of hazardous reactions	None under normal processing.
Conditions to avoid	None known based on information supplied.
Incompatible materials	None known based on information supplied.
Hazardous decomposition products	None known based on information supplied.

11. Toxicological information

Information on likely routes of exposure

Specific test data for the substance or mixture is not available.
Specific test data for the substance or mixture is not available.
Specific test data for the substance or mixture is not available. Causes mild skin irritation.
Specific test data for the substance or mixture is not available.
chemical and toxicological characteristics_ Prolonged contact may cause redness and irritation.
based on chapter 3.1 of the GHS document 99,999.00 mg/kg 99,999.00 ppm 99,999.00 mg/l 99,999.00 mg/l 99,999.00 mg/l

- 0 % of the mixture consists of ingredient(s) of unknown acute oral toxicity
- 0 % of the mixture consists of ingredient(s) of unknown acute dermal toxicity
- 0 % of the mixture consists of ingredient(s) of unknown acute inhalation toxicity (gas)
- 0 % of the mixture consists of ingredient(s) of unknown acute inhalation toxicity (vapor)
- 0 % of the mixture consists of ingredient(s) of unknown acute inhalation toxicity (dust/mist)

Component Information

Chemical name	Oral LD50	Dermal LD50	Inhalation LC50
Sodium Hydroxide	= 325 mg/kg (Rat)	= 1350 mg/kg (Rabbit)	-
1310-73-2			

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

 Skin corrosion/irritation
 Classification based on data available for ingredients. Causes mild skin irritation.

 Serious eye damage/eye irritation
 No information available.

 Respiratory or skin sensitization
 No information available.

Germ cell mutagenicity	No information available.
Carcinogenicity	No information available.
Reproductive toxicity	No information available.
STOT - single exposure	No information available.
STOT - repeated exposure	No information available.
Aspiration hazard	No information available.

12. Ecological information

Ecotoxicity

Chemical name	Algae/aquatic plants	Fish	Toxicity to microorganisms	Crustacea
Sodium Hydroxide 1310-73-2	-	LC50: =45.4mg/L (96h, Oncorhynchus mykiss)	-	-

Persistence and degradabilityNo information available.BioaccumulationThere is no data for this product.Mobility in soilNo information available.

Other adverse effects No information available.

13. Disposal considerations	
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waste treatment methods	
Waste from residues/unused products	Dispose of in accordance with local regulations. Dispose of waste in accordance with environmental legislation.
Contaminated packaging	Do not reuse empty containers.
California waste information	This product contains one or more substances that are listed with the State of California as a hazardous waste.

Waste treatment methods

14. Transport information

DOT	Not regulated
TDG	Not regulated
<u>MEX</u>	Not regulated
ICAO (air)	Not regulated
IATA	Not regulated
IMDG	Not regulated
RID	Not regulated
ADR	Not regulated
ADN	Not regulated

15. Regulatory information

Regulatory information

International Regulations

The Montreal Protocol on Substances that Deplete the Ozone Layer Not applicable

The Stockholm Convention on Persistent Organic Pollutants Not applicable

The Rotterdam Convention Not applicable

International Inventories

DSL/NDSL	Contact supplier for inventory compliance status.
EINECS/ELINCS	Contact supplier for inventory compliance status.
ENCS	Contact supplier for inventory compliance status.
IECSC	Contact supplier for inventory compliance status.
KECL	Contact supplier for inventory compliance status.
PICCS	Contact supplier for inventory compliance status.
AIIC	Contact supplier for inventory compliance status.
NZIoC	Contact supplier for inventory compliance status.

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

NZIOC - New Zealand Inventory of Chemicals

US Federal Regulations

SARA 313

Section 313 of Title III of the Superfund Amendments and Reauthorization Act of 1986 (SARA). This product does not contain any chemicals which are subject to the reporting requirements of the Act and Title 40 of the Code of Federal Regulations, Part 372.

SARA 311/312 Hazard Categories

Should this product meet EPCRA 311/312 Tier reporting criteria at 40 CFR 370, refer to Section 2 of this SDS for appropriate classifications.

CWA (Clean Water Act)

This product contains the following substances which are regulated pollutants pursuant to the Clean Water Act (40 CFR 122.21 and 40 CFR 122.42).

Chemical name	CWA - Reportable Quantities	CWA - Toxic Pollutants	CWA - Priority Pollutants	CWA - Hazardous Substances
Sodium Hydroxide 1310-73-2	1000 lb	-	-	Х

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).

Chemical name	Hazardous Substances RQs	Extremely Hazardous Substances RQs	Reportable Quantity (RQ)
Sodium Hydroxide 1310-73-2	1000 lb	-	RQ 1000 lb final RQ RQ 454 kg final RQ

US State Regulations

California Proposition 65

This product does not contain any Proposition 65 chemicals.

U.S. State Right-to-Know Regulations

Chemical name	New Jersey	Massachusetts	Pennsylvania
Sodium Hydroxide	Х	Х	Х
1310-73-2			

U.S. EPA Label Information

EPA Pesticide Registration Number Not applicable

16. Other information					
NFPA HMIS	Health hazards 0 Health hazards 0	Flammability 0 Flammability 0	Instability 0 Physical hazards 0	Special hazards - Personal protection X	
Key or legend to abbreviations and acronyms used in the safety data sheet					
Legend Section 8: EXPOSURE CONTROLS/PERSONAL PROTECTION					
TWA TW	A (time-weighted average)) STEL	STEL (Short Tern	n Exposure Limit)	
Ceiling Max	ximum limit value	*	Skin designation		
Key literature references and sources for data used to compile the SDS Agency for Toxic Substances and Disease Registry (ATSDR)					

U.S. Environmental Protection Agency ChemView Database

European Food Safety Authority (EFSA) EPA (Environmental Protection Agency) Acute Exposure Guideline Level(s) (AEGL(s)) U.S. Environmental Protection Agency Federal Insecticide, Fungicide, and Rodenticide Act U.S. Environmental Protection Agency High Production Volume Chemicals Food Research Journal Hazardous Substance Database International Uniform Chemical Information Database (IUCLID) National Institute of Technology and Evaluation (NITE) Australia National Industrial Chemicals Notification and Assessment Scheme (NICNAS) NIOSH (National Institute for Occupational Safety and Health) National Library of Medicine's ChemID Plus (NLM CIP) National Library of Medicine's PubMed database (NLM PUBMED) National Toxicology Program (NTP) New Zealand's Chemical Classification and Information Database (CCID) Organization for Economic Co-operation and Development Environment, Health, and Safety Publications Organization for Economic Co-operation and Development High Production Volume Chemicals Program Organization for Economic Co-operation and Development Screening Information Data Set World Health Organization

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Revision note Disclaimer	No information available.

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End of Safety Data Sheet