

# SAFETY DATA SHEET

**Date Printed:** 05/24/2024 **Date Revised:** 01/15/2022

## **SECTION 1. IDENTIFICATION**

Product Identifier: (5N) 99.999% Sodium bis(trimethylsilyl)amide

Product Code: NA-TMSAM-05-LIQ

**CAS Number:** 1070-89-9

Relevant identified uses of the substance: Scientific research and development

Supplier details:

American Elements 10884 Weyburn Ave. Los Angeles, CA 90024 Tel: +1 310-208-0551

Fax: +1 310-208-0351 Emergency telephone number:

+1 800-424-9300

## **SECTION 2. HAZARDS IDENTIFICATION**

Classification of the substance or mixture in accordance with 29 CFR 1910 (OSHA HCS) GHS02 Flame

Water-react. 2 H261 In contact with water releases flammable gas.

**GHS05 Corrosion** 

Skin Corr. 1B H314 Causes severe skin burns and eye damage.

Eye Dam. 1 H318 Causes serious eye damage. Hazards not otherwise classified No data available

GHS label elements, including precautionary statements



Hazard pictograms
GHS02 GHS05
Signal word Danger
Hazard statements
H261 In contact with water releases flammable gas.
H314 Causes severe skin burns and eye damage.
Precautionary statements

P280 Wear protective gloves/protective clothing/eye protection/face protection.

P305+P351+P338 IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.

P309 IF exposed or if you feel unwell:

P310 Immediately call a POISON CENTER/doctor

P370+P378 In case of fire: Use for extinction: CO2, sand, extinguishing powder.

P402 Store in a dry place.

WHMIS classification

B6 - Reactive flammable material

D2B - Toxic material causing other toxic effects

E - Corrosive material

Classification system

HMIS ratings (scale 0-4)

(Hazardous Materials Identification System)

HEALTH

**FIRE** 

**REACTIVITY** 

3

1

2

Health (acute effects) = 3

Flammability = 1

Physical Hazard = 2

Other hazards

Results of PBT and vPvB assessment

PBT: N/A vPvB: N/A

#### **SECTION 3. COMPOSITION/INFORMATION ON INGREDIENTS**

Substances

CAS No. / Substance Name:

1070-89-9 Sodium bis(trimethylsilyl)amide

Identification number(s): EC number: 213-983-8

## **SECTION 4. FIRST AID MEASURES**

Description of first aid measures

General information Immediately remove any clothing soiled by the product.

If inhaled:

Supply patient with fresh air. If not breathing, provide artificial respiration. Keep patient warm.

Seek immediate medical advice.

In case of skin contact:

Immediately wash with soap and water; rinse thoroughly.

Seek immediate medical advice.

In case of eye contact:

Rinse opened eye for several minutes under running water. Consult a physician.

If swallowed:

Seek medical treatment.

Information for doctor

Most important symptoms and effects, both acute and delayed

Causes severe skin burns.

Causes serious eye damage.

Indication of any immediate medical attention and special treatment needed:

No data available

# **SECTION 5. FIREFIGHTING MEASURES**

Extinguishing media

Suitable extinguishing agents In case of fire, use sand, carbon dioxide or powdered extinguishing agent. Never use water.

For safety reasons unsuitable extinguishing agents Water

Special hazards arising from the substance or mixture

Reacts violently with water

If this product is involved in a fire, the following can be released:

Carbon monoxide and carbon dioxide

Silicon oxide

Sodium oxide

Nitrogen oxides (NOx)

Advice for firefighters

Protective equipment:

Wear self-contained respirator.

Wear fully protective impervious suit.

# **SECTION 6. ACCIDENTAL RELEASE MEASURES**

Personal precautions, protective equipment and emergency procedures

Use personal protective equipment. Keep unprotected persons away.

Ensure adequate ventilation

Keep away from ignition sources

Environmental precautions: Do not allow product to enter drains, sewage systems, or other water courses.

Methods and materials for containment and cleanup:

Use neutralizing agent.

Dispose of contaminated material as waste according to section 13.

Ensure adequate ventilation.

Do not flush with water or aqueous cleansing agents

Prevention of secondary hazards: Keep away from ignition sources.

Reference to other sections

See Section 7 for information on safe handling

See Section 8 for information on personal protection equipment.

See Section 13 for disposal information.

## **SECTION 7. HANDLING AND STORAGE**

Handling

Precautions for safe handling

Handle under dry protective gas.

Keep container tightly sealed.

Store in cool, dry place in tightly closed containers.

Ensure good ventilation at the workplace.

Information about protection against explosions and fires: No data available

Conditions for safe storage, including any incompatibilities

Requirements to be met by storerooms and receptacles: No special requirements.

Information about storage in one common storage facility:

Store away from water/moisture.

Do not store together with acids.

Store away from oxidizing agents.

Further information about storage conditions:

Store under dry inert gas.

This product is moisture sensitive.

Protect from humidity and water.

Keep container tightly sealed.

Store in cool, dry conditions in well-sealed containers.

Specific end use(s) No data available

#### SECTION 8. EXPOSURE CONTROLS/PERSONAL PROTECTION

Additional information about design of technical systems:

Properly operating chemical fume hood designed for hazardous chemicals and having an average face velocity of at least 100 feet per minute.

Control parameters

Components with limit values that require monitoring at the workplace:

None.

Additional information: No data

Exposure controls

Personal protective equipment

Follow typical protective and hygienic practices for handling chemicals.

Keep away from foodstuffs, beverages and feed.

Remove all soiled and contaminated clothing immediately.

Wash hands before breaks and at the end of work.

Avoid contact with the eyes and skin.

Maintain an ergonomically appropriate working environment.

Breathing equipment: Use suitable respirator when high concentrations are present.

Recommended filter device for short term use:

Use a respirator with type P100 (USA) or P3 (EN 143) cartridges as a backup to engineering controls.

Risk assessment should be performed to determine if airpurifying

respirators are appropriate. Only use equipment tested and approved under appropriate government standards.

Protection of hands:

Impervious gloves

Inspect gloves prior to use.

The selection of suitable gloves not only depends on the material, but also on quality. Quality will vary from manufacturer to manufacturer.

Material of gloves Nitrile rubber, NBR

Penetration time of glove material (in minutes) 480

Glove thickness 0.11 mm

Eve protection:

Tightly sealed goggles

Full face protection

Body protection: Protective work clothing.

## **SECTION 9. PHYSICAL AND CHEMICAL PROPERTIES**

Information on basic physical and chemical properties

Appearance: Form: Crystalline Color: White Odor: Odorless

Odor threshold: No data available.

pH: N/A

Melting point/Melting range: 171-175 °C (340-347 °F)

Boiling point/Boiling range: No data available Sublimation temperature / start: No data available

Flammability (solid, gas) Contact with water liberates extremely flammable gases.

Ignition temperature: No data available

Decomposition temperature: No data available

Autoignition: No data available.

Danger of explosion: No data available.

**Explosion limits:** 

Lower: No data available Upper: No data available Vapor pressure: N/A Density: No data available

Relative density No data available.

Vapor density N/A Evaporation rate N/A Solubility in / Miscibility with Water: Reacts violently

Contact with water releases flammable gases

Partition coefficient (n-octanol/water): No data available.

Viscosity: Dynamic: N/A Kinematic: N/A

Other information No data available

## **SECTION 10. STABILITY AND REACTIVITY**

Reactivity

Reacts violently with water.

In contact with water releases flammable gases which may ignite spontaneously.

Chemical stability Stable under recommended storage conditions.

Thermal decomposition / conditions to be avoided: Decomposition will not occur if used and stored according to specifications.

Possibility of hazardous reactions

Reacts with strong oxidizing agents

Contact with water releases flammable gases

Reacts violently with water

Conditions to avoid No data available

Incompatible materials:

Acids

Oxidizing agents

Water/moisture

Hazardous decomposition products: Carbon monoxide and carbon dioxide Silicon oxide Sodium oxide Nitrogen oxides

# **SECTION 11. TOXICOLOGICAL INFORMATION**

Information on toxicological effects

Acute toxicity: Swallowing will lead to a strong corrosive effect on mouth and throat and to the danger of perforation of esophagus and stomach.

LD/LC50 values that are relevant for classification: No data Skin irritation or corrosion: Causes severe skin burns. Eye irritation or corrosion: Causes serious eye damage.

Sensitization: No sensitizing effects known. Germ cell mutagenicity: No effects known.

Carcinogenicity: No classification data on carcinogenic properties of this material is available from the

EPA, IARC, NTP, OSHA or ACGIH. Reproductive toxicity: No effects known.

Specific target organ system toxicity - repeated exposure: No effects known. Specific target organ system toxicity - single exposure: No effects known.

Aspiration hazard: No effects known.

Subacute to chronic toxicity: No effects known.

Additional toxicological information: To the best of our knowledge the acute and chronic toxicity of this substance is not fully known.

# **SECTION 12. ECOLOGICAL INFORMATION**

**Toxicity** 

Aquatic toxicity: No data available

Persistence and degradability No data available Bioaccumulative potential No data available

Mobility in soil No data available Additional ecological information:

Do not allow undiluted product or large quantities to reach groundwater, water courses, or sewage systems.

Avoid transfer into the environment. Results of PBT and vPvB assessment

PBT: N/A vPvB: N/A

Other adverse effects No data available

## **SECTION 13. DISPOSAL CONSIDERATIONS**

Waste treatment methods

Recommendation Consult official regulations to ensure proper disposal.

Uncleaned packagings:

Recommendation: Disposal must be made according to official regulations.

#### **SECTION 14. TRANSPORT INFORMATION**

**UN-Number** 

DOT, IMDG, IATA UN3096

UN proper shipping name

DOT Corrosive solids, water-reactive, n.o.s. (Sodium bis(trimethylsilyl)amide)

IMDG, IATA CORROSIVE SOLID, WATER-REACTIVE, N.O.S. (Sodium bis(trimethylsilyl)

amide)

Transport hazard class(es)

DOT

Class 8 Corrosive substances.

Label 8+4.3

Class 8 (CW2) Corrosive substances

Label 8+4.3

IMDG, IATA

Class 8 Corrosive substances.

Label 8+4.3

Packing group

DOT, IMDG, IATA II

Environmental hazards: N/A

Special precautions for user Warning: Corrosive substances

EMS Number: F-G,S-L

Transport in bulk according to Annex II of MARPOL73/78 and the IBC Code N/A

Transport/Additional information:

DOT

Marine Pollutant (DOT): No

UN "Model Regulation": UN3096, Corrosive solids, water-reactive, n.o.s. (Sodium

bis(trimethylsilyl)amide),

8 (4.3), II

## **SECTION 15. REGULATORY INFORMATION**

Safety, health and environmental regulations/legislation specific for the substance or mixture GHS label elements, including precautionary statements

Hazard pictograms

GHS02 GHS05

Signal word Danger

Hazard statements

H261 In contact with water releases flammable gas.

H314 Causes severe skin burns and eve damage.

Precautionary statements

P280 Wear protective gloves/protective clothing/eye protection/face protection.

P305+P351+P338 IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.

P309 IF exposed or if you feel unwell:

P310 Immediately call a POISON CENTER/doctor

P370+P378 In case of fire: Use for extinction: CO2, sand, extinguishing powder.

P402 Store in a dry place.

National regulations

All components of this product are listed in the U.S. Environmental Protection Agency Toxic Substances Control Act Chemical substance Inventory.

All components of this product are listed on the Canadian Non-Domestic Substances List (NDSL).

SARA Section 313 (specific toxic chemical listings) Substance is not listed.

California Proposition 65

Prop 65 - Developmental toxicity, female Substance is not listed.

Prop 65 - Developmental toxicity, male Substance is not listed.

Information about limitation of use: For use only by technically qualified individuals.

Other regulations, limitations and prohibitive regulations

Substance of Very High Concern (SVHC) according to the REACH Regulations (EC) No. 1907/2006. Substance is not listed.

The conditions of restrictions according to Article 67 and Annex XVII of the Regulation (EC) No 1907/2006 (REACH) for the manufacturing, placing on the market and use must be observed.

Substance is not listed.

Annex XIV of the REACH Regulations (requiring Authorisation for use) Substance is not listed.

Chemical safety assessment: A Chemical Safety Assessment has not been carried out.

Prop 65 - Chemicals known to cause cancer Substance is not listed.

Prop 65 - Developmental toxicity Substance is not listed.

## **16. OTHER INFORMATION**

Safety Data Sheet according to Regulation (EC) No. 1907/2006 (REACH). The above information is believed to be correct but does not purport to be all inclusive and shall be used only as a guide. 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. It does not represent any guarantee of the properties of the product. American Elements shall not be held liable for any damage resulting from handling or from contact with the above product. See reverse side of invoice or packing slip for additional terms and conditions of sale. COPYRIGHT 1997-2022 AMERICAN ELEMENTS. LICENSED GRANTED TO MAKE UNLIMITED PAPER COPIES FOR INTERNAL USE ONLY.