



Preparing for the New Era of Laboratories

MATERIAL SAFETY DATA SHEET (MSDS)

According to regulation (EU) no.1907/2006

AMMONIUM THIOCYANATE 98,5% AR

PRODUCT CODE : O-5035

CAS No : 1762-95-4

FORMULA : NH_4SCN

UN No : Not Applicable

MATERIAL SAFETY DATA SHEET (SDS/MSDS)

AMMONIUM THIOCYANATE 98,5% AR



MSDS Number : 0051

Date : Aug 19th, 2024

Version : 1.0

SECTION 1: Identification of the substance/mixture and of the company/undertaking

- 1.1 Product Name** : AMMONIUM THIOCYANATE 98,5% AR
Synonyms : Ammonium sulfocyanide, Ammonium rhodanide, Thiocyanic acid ammonium salt, Ammonium sulfocyanate
CAS No. : 1762-95-4
HS Code : 2842 90 90
Chemical Formula : NH_4SCN $\text{CH}_4\text{N}_2\text{S}$ Hill
Molecular Weight : 76.12 g/mol
Product Code : 0-5035
Brand : Labotiq
1.2 Manufacturer : Labotiq
Address : Jl.Terapi Raya AD2-Bumi Menteng Asri Bogor, Jawa Barat Indonesia – 16111
Website : www.labotiq.net
Email : labotiq.id@gmail.com
For information : Phone : (+62-251) 839110, 8311662, Fax : (+62-251) 83135710
Emergency number : +6281316894650
1.3 Application : Laboratory chemicals, Manufacture of substances, General Chemical reagent

SECTION 2: Hazards identification

2.1 Classification of the substance or mixture

Acute toxicity, Inhalation (Category 4), H332
 Acute toxicity, Dermal (Category 4), H312
 Acute toxicity, Oral (Category 4), H302
 Chronic aquatic toxicity (Category 3), H412

For the full text of the H-Statements mentioned in this Section, see Section 16

2.2 Label elements

Labelling according Regulation (EC) No 1272/2008

Pictogram



Signal word

Warning

Hazard statement(s)
 H302 + H312 + H332
 H412

Harmful if swallowed, in contact with skin or if inhaled
 Harmful to aquatic life with long lasting effects.

Precautionary statement(s)
 P273
 P280

Avoid release to the environment.
 Wear protective gloves/ protective clothing.

Supplemental Hazard Statements
 EUH032

Contact with acids liberates very toxic gas.

MATERIAL SAFETY DATA SHEET (SDS/MSDS)

AMMONIUM THIOCYANATE 98,5% AR



MSDS Number : 0051

Date : Aug 19th, 2024

Version : 1.0

2.3 Other hazards

This substance/mixture contains no components considered to be either persistent, bioaccumulative and toxic (PBT), or very persistent and very bioaccumulative (vPvB) at levels of 0.1% or higher. Contact with acids liberates very toxic gas.

SECTION 3: Composition/information on ingredients

3.1 Substances

Synonyms	: Ammonium sulfocyanide, Ammonium rhodanide, Thiocyanic acid ammonium salt, Ammonium sulfocyanate, Ammonium rhodanide		
Formula	: NH ₄ SCN	CH ₄ N ₂ S	Hill
Molecular weight	: 76.12 g/mol		
CAS-No.	: 1762-95-4		
EC-No.	: 217-175-6		
Index-No.	: 615-004-00-3		

3.2 Mixture

Hazardous ingredients according to Regulation (EC) No 1272/2008

Component	Classification	Concentration
Ammonium thiocyanate CAS-No. 1762-95-4 EC-No. 217-175-6 Index-No 615-004-00-3	Acute Tox. 4; Aquatic Chronic 3; H332, H312, H302, H412	<=100 %

For the full text of the H-Statements mentioned in this Section, see Section 16.

SECTION 4: First aid measures

4.1 Description of first aid measures

General advice

Consult a physician. Show this safety data sheet to the doctor in attendance.

If inhaled

If breathed in, move person into fresh air. If not breathing, give artificial respiration. Consult a physician.

In case of skin contact

Wash off with polyethylene glycol and afterwards with plenty of water. Take victim immediately to hospital. Take off all contaminated clothing immediately. Wash off with soap and plenty of water. Take victim immediately to hospital. Consult a physician.

In case of eye contact

Flush eyes with water as a precaution.

If swallowed

Never give anything by mouth to an unconscious person. Rinse mouth with water. Consult a physician.

4.2 Most important symptoms and effects, both acute and delayed

The most important known symptoms and effects are described in the labelling (see section 2.2) and/or in section 11

MATERIAL SAFETY DATA SHEET (SDS/MSDS)

AMMONIUM THIOCYANATE 98,5% AR



MSDS Number : 0051

Date : Aug 19th, 2024

Version : 1.0

4.3 Indication of any immediate medical attention and special treatment needed

No data available

SECTION 5: Firefighting measures

5.1 Extinguishing media

Suitable extinguishing media

Dry powder

5.2 Special hazards arising from the substance or mixture

Carbon oxides, Nitrogen oxides (NO_x), Sulphur oxides

5.3 Advice for firefighters

Wear self-contained breathing apparatus for firefighting if necessary.

5.4 Further information

No data available

SECTION 6: Accidental release measures

6.1 Personal precautions, protective equipment and emergency procedures

Wear respiratory protection. Avoid dust formation. Avoid breathing vapours, mist or gas. Ensure adequate ventilation. Avoid breathing dust. For personal protection see section 8.

6.2 Environmental precautions

Prevent further leakage or spillage if safe to do so. Do not let product enter drains. Discharge into the environment must be avoided.

6.3 Methods and materials for containment and cleaning up

Pick up and arrange disposal without creating dust. Sweep up and shovel. Do not flush with water. Keep in suitable, closed containers for disposal.

6.4 Reference to other sections

For disposal see section 13..

SECTION 7: Handling and storage

7.1 Precautions for safe handling

Avoid contact with skin and eyes. Avoid formation of dust and aerosols. Provide appropriate exhaust ventilation at places where dust is formed. For precautions see section 2.2.

7.2 Conditions for safe storage, including any incompatibilities

Store in cool place. Keep container tightly closed in a dry and well-ventilated place. Never allow product to get in contact with water during storage. Do not store near acids. hygroscopic Air sensitive. Handle and store under inert gas. Storage class (TRGS 510): Non Combustible Solids

7.3 Specific end use(s)

Apart from the uses mentioned in section 1.2 no other specific uses are stipulated

MATERIAL SAFETY DATA SHEET (SDS/MSDS)
AMMONIUM THIOCYANATE 98,5% AR

MSDS Number : 0051

Date : Aug 19th, 2024

Version : 1.0

SECTION 8: Exposure controls/personal protection**8.1 Control parameters****8.2 Exposure control****Appropriate engineering controls**

Handle in accordance with good industrial hygiene and safety practice. Wash hands before breaks and at the end of workday.

Personal protective equipment**Eye/face protection**

Safety glasses with side-shields conforming to EN166 Use equipment for eye protection tested and approved under appropriate government standards such as NIOSH (US) or EN 166(EU).

Skin protection

Handle with gloves. Gloves must be inspected prior to use. Use proper glove removal technique (without touching glove's outer surface) to avoid skin contact with this product. Dispose of contaminated gloves after use in accordance with applicable laws and good laboratory practices. Wash and dry hands.

The selected protective gloves have to satisfy the specifications of EU Directive 89/686/EEC and the standard EN 374 derived from it.

Full contact

Material: Nitrile rubber
Minimum layer thickness: 0.11 mm
Break through time: 480 min
Material tested: Dermatrill® (KCL 740, Size M)

Splash contact

Material: Nitrile rubber
Minimum layer thickness: 0.11 mm
Break through time: 480 min
Material tested: Dermatrill® (KCL 740, Size M)

Body Protection

Complete suit protecting against chemicals, The type of protective equipment must be selected according to the concentration and amount of the dangerous substance at the specific workplace.

Respiratory protection

Where risk assessment shows air-purifying respirators are appropriate use (EN 143) respirator cartridges as a backup to engineering controls. If the full-face supplied air respirator. Use respirators and components tested and approved under appropriate government standards such as NIOSH (US) or CEN (EU).

Control of environmental exposure

Prevent further leakage or spillage if safe to do so. Do not let product enter drains. Discharge into the environment must be avoided.

SECTION 9: Physical and chemical properties

MATERIAL SAFETY DATA SHEET (SDS/MSDS)

AMMONIUM THIOCYANATE 98,5% AR



MSDS Number : 0051

Date : Aug 19th, 2024

Version : 1.0

9.1 Information on basic physical and chemical properties

Appearance	Form: solid
Odour	odourless
Odour Threshold	No data available
pH	4.0 - 5.5 at 76.1 g/l at 25 °C
Melting point/freezingpoint	Melting point/range: 152 - 154 °C - lit.
Initial boiling point and boiling range	No data available
Flash point	Not applicable
Evaporation rate	No data available
Flammability (solid, gas)	not auto-flammable
Upper/lower flammability or explosive limits	No data available
Vapour pressure	0.000114 hPa at 20 °C
Vapour density	No data available
Relative density	1.300 g/cm ³
Water solubility	ca.76.1 g/l at 20 °C
Partition coefficient: noctanol/water	log Pow: -2.287 – The preceding data, or interpretation of data, was determined using Quantitative Structure Activity Relationship (QSAR) modeling.
Auto-ignition temperature	No data available
Decomposition temperature	No data available
Viscosity	No data available
Explosive properties	No data available
Oxidizing properties	No data available

9.2 Other safety information

No data available

SECTION 10: Stability and reactivity

10.1 Reactivity

No data available

10.2 Chemical stability

Stable under recommended storage conditions.

10.3 Possibility of hazardous reactions

No data available

10.4 Conditions to avoid

Avoid moisture. Exposure to air may affect product quality.

10.5 Incompatible materials

Strong oxidizing agents, Strong acids, Forms shock-sensitive mixtures with certain other materials., Lead nitrate

10.6 Hazardous decomposition products

Hazardous decomposition products formed under fire conditions. - Carbon oxides, Nitrogen oxides (NO_x), Sulphur oxides

Other decomposition products - No data available

In the event of fire: see section 5

MATERIAL SAFETY DATA SHEET (SDS/MSDS)

AMMONIUM THIOCYANATE 98,5% AR



MSDS Number : 0051

Date : Aug 19th, 2024

Version : 1.0

SECTION 11: Toxicological information

11.1 Information on toxicological effects

Acute toxicity

LD50 Oral - Rat - 750 mg/kg(Ammonium thiocyanate)

Skin corrosion/irritation

Skin - EPISKIN Human Skin Model Test(Ammonium thiocyanate)

Result: No skin irritation

Serious eye damage/eye irritation

Classified according to Regulation (EU) 1272/2008, Annex VI (Table 3.1/3.2)
(Ammonium thiocyanate)

Respiratory or skin sensitisation

No data available(Ammonium thiocyanate)

Germ cell mutagenicity

No data available(Ammonium thiocyanate)

Carcinogenicity

IARC: No component of this product present at levels greater than or equal to 0.1% is identified as probable, possible or confirmed human carcinogen by IARC.

Reproductive toxicity

No data available(Ammonium thiocyanate)

Specific target organ toxicity - single exposure

No data available(Ammonium thiocyanate)

Specific target organ toxicity - repeated exposure

No data available

Aspiration hazard

No data available(Ammonium thiocyanate)

Additional Information

RTECS: Not available

To the best of our knowledge, the chemical, physical, and toxicological properties have not been thoroughly investigated.

SECTION 12: Ecological information

12.1 Toxicity

Toxicity to fish

static test LC50 - Oncorhynchus mykiss (rainbow trout) - 65 mg/l - 96 h
(Ammonium thiocyanate)

12.2 Persistence and degradability

No data available

12.3 Bioaccumulative potential

No data available

MATERIAL SAFETY DATA SHEET (SDS/MSDS)

AMMONIUM THIOCYANATE 98,5% AR



MSDS Number : 0051

Date : Aug 19th, 2024

Version : 1.0

12.4 Mobility in soil

No data available(Ammonium thiocyanate)

12.5 Results of PBT and vPvB assessment

This substance/mixture contains no components considered to be either persistent, bioaccumulative and toxic (PBT), or very persistent and very bioaccumulative (vPvB) at levels of 0.1% or higher.

12.6 Other adverse effects

Harmful to aquatic life with long lasting effects.

SECTION 13: Disposal considerations

13.1 Waste treatment methods**Product**

Offer surplus and non-recyclable solutions to a licensed disposal company. Dissolve or mix the material with a combustible solvent and burn in a chem scrubber.

Contaminated packaging

Dispose of as unused product.

SECTION 14: Transport information

14.1 UN number

ADR/RID: -

IMDG: -

IATA: -

14.2 UN proper shipping name

ADR/RID: Not dangerous goods

IMDG: Not dangerous goods

IATA: Not dangerous goods

14.3 Transport hazard class(es)

ADR/RID: -

IMDG: -

IATA: -

14.4 Packaging group

ADR/RID: -

IMDG: -

IATA: -

14.5 Environmental hazards

ADR/RID: no

IMDG Marine pollutant: no

IATA: no

14.6 Special precautions for user**Further information**

No data available

SECTION 15: Regulatory information

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

This safety datasheet complies with the requirements of Regulation (EC) No. 1907/2006.

15.2 Chemical safety assessment

For this product a chemical safety assessment was not carried out

SECTION 16: Other information

MATERIAL SAFETY DATA SHEET (SDS/MSDS)

AMMONIUM THIOCYANATE 98,5% AR



MSDS Number : 0051

Date : Aug 19th, 2024

Version : 1.0

Full text of H-Statements referred to under sections 2 and 3.

H302 Harmful if swallowed.

H312 Harmful in contact with skin.

H332 Harmful if inhaled.

H412 Harmful to aquatic life with long lasting

National Fire Protection Association (U.S.A.):

Health: 2

Flammability: 0

Reactivity: 0

Further information

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. Labotiq shall not be held liable for any damage resulting from handling or from contact with the above product.

Version : 1.0

Revision Date : August 19, 2024