



Preparing for the New Era of Laboratories

MATERIAL SAFETY DATA SHEET (MSDS)

According to regulation (EU) no.1907/2006

AMMONIUM OXALATE MONOHYDRATE 99% AR

PRODUCT CODE : O-5028

CAS No : 6009-70-7

FORMULA : $(\text{COONH}_4)_2 \cdot \text{H}_2\text{O}$

UN No : Not Applicable

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MSDS Number : 0043

Date : Aug 16th, 2024

Version : 1.0

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

- 1.1 Product Name** : AMMONIUM OXALATE MONOHYDRATE 99% AR
Synonyms : Oxalic acid ammonium salt
CAS No. : 6009-70-7
HS Code : 2917 11 90
Chemical Formula : $(\text{COONH}_4)_2 \cdot \text{H}_2\text{O}$
Molecular Weight : 142.11 g/mol
Product Code : O-5028
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

Classification according to Regulation (EC) No 1272/2008

Acute toxicity, Oral (Category 4), H302

Acute toxicity, Dermal (Category 4), H312

Eye irritation (Category 2), H319

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

H319

Harmful if swallowed or in contact with skin
Causes serious eye irritation.

Precautionary statement(s)

P264

P270

P280

P301 + P312

P302 + P352 + P312 I

Wash skin thoroughly after handling.
Do not eat, drink or smoke when using this product.
Wear protective gloves/ protective clothing/ eye protection/ face protection.
IF SWALLOWED: Call a POISON CENTER/ doctor if you feel unwell.
F ON SKIN: Wash with plenty of water.Call a POISON CENTER/ doctor if you feel unwell.

MATERIAL SAFETY DATA SHEET (SDS/MSDS)

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MSDS Number : 0043

Date : Aug 16th, 2024

Version : 1.0

P305 + P351 + P338

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

Supplemental Hazard Statements

none

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.

SECTION 3: Composition/information on ingredients

3.1 Substances

Synonyms : Oxalic acid diammonium salt
 Formula : $(\text{COONH}_4)_2 \cdot \text{H}_2\text{O}$
 Molecular weight : 142.11 g/mol
 CAS-No. : 6009-70-7
 EC-No. : 238-135-4
 Index-No. : 607-007-00-3

3.2 Mixture

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

Component	Classification	Concentration
Oxalic acid, ammonium salt monohydrate CAS-No. 6009-70-7 EC-No. 238-135-4 Index-No. 607-007-00-3	Acute Tox. 4; H302, H312	<=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.

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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

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

Water, Foam, Carbon dioxide (CO₂), Dry powder

Unsuitable extinguishing media

For this substance/mixture no limitations of extinguishing agents are given.

5.2 Special hazards arising from the substance or mixture

Carbon oxides, Nitrogen oxides (NO_x), Combustible.

Development of hazardous combustion gases or vapours possible in the event of fire.

5.3 Advice for firefighters

Stay in danger area only with self-contained breathing apparatus. Prevent skin contact by keeping a safe distance or by wearing suitable protective clothing.

5.4 Further information

Suppress (knock down) gases/vapors/mists with a water spray jet. Prevent fire extinguishing water from contaminating surface water or the ground water system.

SECTION 6: Accidental release measures

6.1 Personal precautions, protective equipment and emergency procedures

Advice for non-emergency personnel: Avoid inhalation of dusts. Avoid substance contact. Ensure adequate ventilation. Evacuate the danger area, observe emergency procedures, consult an expert. For personal protection see section 8.

6.2 Environmental precautions

Do not let product enter drains.

6.3 Methods and materials for containment and cleaning up

Cover drains. Collect, bind, and pump off spills. Observe possible material restrictions (see sections 7 and 10). Take up dry. Dispose of properly. Clean up affected area. Avoid generation of dusts.

6.4 Reference to other sections

For disposal see section 13.

SECTION 7: Handling and storage

7.1 Precautions for safe handling

Advice on safe handling

Work under hood. Do not inhale substance/mixture.

MATERIAL SAFETY DATA SHEET (SDS/MSDS)
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Hygiene measures

Immediately change contaminated clothing. Apply preventive skin protection. Wash hands and face after working with substance. For precautions see section 2.2.

7.2 Conditions for safe storage, including any incompatibilities

Storage conditions, Tightly closed. Dry.

Storage class, Storage class (TRGS 510): 13: Non Combustible Solids

7.3 Specific end use(s)

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

SECTION 8: Exposure controls/personal protection**8.1 Control parameters****8.2 Exposure control****Appropriat 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:Dermatril® (KCL 740, Size M)

Splash contact

Material: Nitrile rubber

Minimum layer thickness: 0.11 mm

Break through time: 480 min

Material tested:Dermatril® (KCL 740, Size M)

Body Protection

protective clothing

Respiratory protection

required when dusts are generated. Our recommendations on filtering respiratory protection are based on the following standards: DIN EN 143, DIN 14387 and other accompanying standards relating to the used respiratory protection system.

MATERIAL SAFETY DATA SHEET (SDS/MSDS)

AMMONIUM OXALATE MONOHYDRATE 99% AR



MSDS Number : 0043

Date : Aug 16th, 2024

Version : 1.0

Recommended Filter type: Filter type P2 The entrepreneur has to ensure that maintenance, cleaning and testing of respiratory protective devices are carried out according to the instructions of the producer. These measures have to be properly documented.

Control of environmental exposure

Do not let product enter drains.

SECTION 9: Physical and chemical properties

9.1 Information on basic physical and chemical properties

Appearance	Form: crystalline
	Colour: white
Odour	odorless
Odour Threshold	No data available
pH	6,0 - 7,0 at 14,2 g/l at 25 °C
Melting point/freezingpoint	Melting point/range: 133 °C - dec.
Initial boiling point and boiling range	(decomposition)
Flash point	No data available
Evaporation rate	No data available
Flammability (solid, gas)	The product is not flammable. - Flammability (solids)
Upper/lower flammability or explosive limits	No data available
Vapour pressure	< 0,1 hPa at 20 °C - OECD Test Guideline 104
Vapour density	No data available
Relative density	1,50 g/cm ³ at 20,1 °C - OECD Test Guideline 109
Water solubility	41,8 g/l at 20 °C - OECD Test Guideline 105
Partition coefficient: noctanol/water	log Pow: < -4,8 at 20 °C - OECD Test Guideline 107 - Bioaccumulation is not expected.
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

The following applies in general to flammable organic substances and mixtures: in correspondingly fine distribution, when whirled up a dust explosion potential may generally be assumed.

10.2 Chemical stability

The product is chemically stable under standard ambient conditions (room temperature) .

10.3 Possibility of hazardous reactions

Risk of explosion with: sodium hypochlorite,

Violent reactions possible with: Oxidizing agents, Strong acids

MATERIAL SAFETY DATA SHEET (SDS/MSDS)

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MSDS Number : 0043

Date : Aug 16th, 2024

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10.4 Conditions to avoid

No data available

10.5 Incompatible materials

Iron, Mild steel, Lead

10.6 Hazardous decomposition products

In the event of fire: see section 5

SECTION 11: Toxicological information

11.1 Information on toxicological effects

Acute toxicity

LD50 Oral - Rat - male and female - 375 mg/kg

Remarks: (in analogy to similar compounds) (ECHA)

The value is given in analogy to the following substances: Oxalic acid

Inhalation: No data available

Acute toxicity estimate

Dermal - 1.100,1 mg/kg (Expert judgment)

Acute toxicity estimate

Dermal - 1.100,1 mg/kg (Expert judgment)

Skin corrosion/irritation

Skin - reconstructed human epidermis (RhE)

Result: No skin irritation - 42 min (OECD Test Guideline 439)

Remarks: (in analogy to similar products)

Serious eye damage/eye irritation

Eyes - Human

Result: Eye irritation - 6 h (OECD Test Guideline 492)

Remarks: (in analogy to similar products)

Respiratory or skin sensitisation

Local lymph node assay (LLNA) - Mouse Result: negative (OECD Test Guideline 429)

Germ cell mutagenicity

No data available(Oxalic acid, ammonium salt monohydrate)

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

Local lymph node assay (LLNA) - Mouse

Result: negative (OECD Test Guideline 429)

Specific target organ toxicity - single exposure

No data available(Oxalic acid, ammonium salt monohydrate)

Specific target organ toxicity - repeated exposure

No data available

MATERIAL SAFETY DATA SHEET (SDS/MSDS)
AMMONIUM OXALATE MONOHYDRATE 99% AR

MSDS Number : 0043

Date : Aug 16th, 2024

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Aspiration hazard

No data available(Oxalic acid, ammonium salt monohydrate)

Additional Information

RTECS: Not available

Cough, Shortness of breath, Headache, Nausea, Vomiting(Oxalic acid, ammonium salt monohydrate)

SECTION 12: Ecological information**12.1 Toxicity**

Toxicity to daphnia and other aquatic invertebrates

semi-static test EC50 - Daphnia magna (Water flea) - > 33 mg/l - 48 h (OECD Test Guideline 202)

Toxicity to algae

static test ErC50 - Pseudokirchneriella subcapitata (green algae) - > 78 mg/l - 72 h (OECD Test Guideline 201)

12.2 Persistence and degradability

Biodegradability aerobic - Exposure time 20 d

Result: 89 % - Readily biodegradable.

Remarks: (in analogy to similar compounds) (ECHA)

The value is given in analogy to the following substances: Oxalic acid

12.3 Bioaccumulative potential

No data available

12.4 Mobility in soil

No data available(Oxalic acid, ammonium salt monohydrate)

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

No data available

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: -

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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

Full text of R-, H- and EUH-statements:

H302 Harmful if swallowed.

H302 + H312 Harmful if swallowed or in contact with skin.

H312 Harmful in contact with skin.

H319 Causes serious eye irritation.

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

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