

Safety Data Sheet

according to Regulation (EC) No 1907/2006

NATURAL ETHYL OCTANOATE (CAPRYLATE)

Revision date: 24.07.2023

Product code: 244900

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

1.1. Product identifier

NATURAL ETHYL OCTANOATE (CAPRYLATE)

| | |
|-----------------|-------------------------------------|
| Substance name: | NATURAL ETHYL OCTANOATE (CAPRYLATE) |
| CAS No: | 106-32-1 |
| EC No: | 203-385-5 |

1.2. Relevant identified uses of the substance or mixture and uses advised against

Use of the substance/mixture

For Flavour use for food and feed only

1.3. Details of the supplier of the safety data sheet

| | | |
|-------------------------|----------------------------|-------------------------------|
| Company name: | Axxence Aromatic GmbH | |
| Street: | Tackenweide 28 | |
| Place: | D-46446 Emmerich am Rhein | |
| Telephone: | + 49 2822 68561 0 | Telefax: + 49 2822 68561 39 |
| e-mail: | info@axxence.com | |
| Contact person: | Andreas Goertz | Telephone: + 49 2822 68561 37 |
| e-mail: | andreas.goertz@axxence.com | |
| Internet: | www.axxence.de | |
| Responsible Department: | QM - Regulatory Affairs | |

1.4. Emergency telephone number:

+49 2822 68561 99

SECTION 2: Hazards identification

2.1. Classification of the substance or mixture

Regulation (EC) No 1272/2008
Aquatic Chronic 2; H411

Full text of hazard statements: see SECTION 16.

2.2. Label elements

Regulation (EC) No 1272/2008

Pictograms:



Hazard statements

H411 Toxic to aquatic life with long lasting effects.

Precautionary statements

| | |
|------|------------------------------------|
| P273 | Avoid release to the environment. |
| P391 | Collect spillage. |
| P501 | Dispose of contents/container to . |

2.3. Other hazards

No information available.

SECTION 3: Composition/information on ingredients

3.1. Substances

Sum formula: C10 H20 O2

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Molecular weight: 172,27

Hazardous components

| CAS No | Chemical name | | | Quantity |
|----------|---|----------|----------|----------|
| | EC No | Index No | REACH No | |
| | Classification (Regulation (EC) No 1272/2008) | | | |
| 106-32-1 | NATURAL ETHYL OCTANOATE (CAPRYLATE) | | | 100 % |
| | 203-385-5 | | | |
| | Aquatic Chronic 2; H411 | | | |

Full text of H and EUH statements: see section 16.

Specific Conc. Limits, M-factors and ATE

| CAS No | EC No | Chemical name | Quantity |
|----------|--|-------------------------------------|----------|
| | Specific Conc. Limits, M-factors and ATE | | |
| 106-32-1 | 203-385-5 | NATURAL ETHYL OCTANOATE (CAPRYLATE) | 100 % |
| | dermal: LD50 = >5000 mg/kg; oral: LD50 = 34640 mg/kg | | |

SECTION 4: First aid measures

4.1. Description of first aid measures

After inhalation

Provide fresh air.

After contact with skin

Wash with plenty of water. Take off contaminated clothing and wash it before reuse.

After contact with eyes

Rinse immediately carefully and thoroughly with eye-bath or water.

After ingestion

Observe risk of aspiration if vomiting occurs. Rinse mouth immediately and drink 1 glass of water.

4.2. Most important symptoms and effects, both acute and delayed

No information available.

4.3. Indication of any immediate medical attention and special treatment needed

Treat symptomatically.

SECTION 5: Firefighting measures

5.1. Extinguishing media

Suitable extinguishing media

Co-ordinate fire-fighting measures to the fire surroundings.

5.2. Special hazards arising from the substance or mixture

Non-flammable. Vapours can form explosive mixtures with air.

5.3. Advice for firefighters

In case of fire: Wear self-contained breathing apparatus.

Additional information

Use water spray jet to protect personnel and to cool endangered containers. Collect contaminated fire extinguishing water separately. Do not allow entering drains or surface water.

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

General advice

Use personal protection equipment.

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6.2. Environmental precautions

Do not allow to enter into surface water or drains.

6.3. Methods and material for containment and cleaning up

For cleaning up

Absorb with liquid-binding material (sand, diatomaceous earth, acid- or universal binding agents). Treat the recovered material as prescribed in the section on waste disposal.

Other information

Absorb with liquid-binding material (sand, diatomaceous earth, acid- or universal binding agents). Treat the recovered material as prescribed in the section on waste disposal.

6.4. Reference to other sections

Safe handling: see section 7

Personal protection equipment: see section 8

Disposal: see section 13

SECTION 7: Handling and storage

7.1. Precautions for safe handling

Advice on safe handling

No special measures are necessary.

Advice on protection against fire and explosion

No special fire protection measures are necessary.

Advice on general occupational hygiene

Take off contaminated clothing. Wash hands before breaks and after work. When using do not eat, drink, smoke, sniff. Take off contaminated clothing. Wash hands before breaks and after work. When using do not eat, drink, smoke, sniff.

7.2. Conditions for safe storage, including any incompatibilities

Requirements for storage rooms and vessels

Keep container tightly closed.

Hints on joint storage

No special measures are necessary.

7.3. Specific end use(s)

For Flavour use for food and feed only

SECTION 8: Exposure controls/personal protection

8.1. Control parameters

PNEC values

| CAS No | Name of agent | |
|----------|--|-------------|
| | Environmental compartment | Value |
| 106-32-1 | NATURAL ETHYL OCTANOATE (CAPRYLATE) | |
| | Freshwater | 0,001 mg/l |
| | Marine water | 0,0001 mg/l |
| | Freshwater sediment | 0,168 mg/kg |
| | Marine sediment | 0,017 mg/kg |
| | Micro-organisms in sewage treatment plants (STP) | 2,93 mg/l |
| | Soil | 0,033 mg/kg |

8.2. Exposure controls

Individual protection measures, such as personal protective equipment

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Eye/face protection

Wear eye/face protection.

Hand protection

When handling with chemical substances, protective gloves must be worn with the CE-label including the four control digits. The quality of the protective gloves resistant to chemicals must be chosen as a function of the specific working place concentration and quantity of hazardous substances. For special purposes, it is recommended to check the resistance to chemicals of the protective gloves mentioned above together with the supplier of these gloves.

Skin protection

Use of protective clothing.

Respiratory protection

In case of inadequate ventilation wear respiratory protection.

SECTION 9: Physical and chemical properties

9.1. Information on basic physical and chemical properties

| | | |
|---|------------|------------------------|
| Physical state: | Liquid | |
| Colour: | colourless | |
| Melting point/freezing point: | | -48 °C |
| Boiling point or initial boiling point and boiling range: | | 208 °C |
| Flammability: | | not determined |
| Lower explosion limits: | | 0,67 |
| Upper explosion limits: | | not determined |
| Flash point: | | 79 °C |
| Auto-ignition temperature: | | 325 °C |
| Decomposition temperature: | | not determined |
| pH-Value: | | not determined |
| Water solubility: (at 25 °C) | | 0,07 g/L |
| Solubility in other solvents | | not determined |
| Partition coefficient n-octanol/water: | | 4,47 |
| Vapour pressure: (at 20 °C) | | 0,82 hPa |
| Vapour pressure: (at 50 °C) | | 4,17 hPa |
| Density (at 20 °C): | | 0,87 g/cm ³ |
| Relative vapour density: (at 20 °C) | | 1 |

9.2. Other information

Information with regard to physical hazard classes

Explosive properties

The product is not: Explosive.

Oxidizing properties

The product is not: oxidising.

Other safety characteristics

| | |
|-------------------|----------------|
| Evaporation rate: | not determined |
| Solvent content: | 0% |
| Solid content: | 0% |

SECTION 10: Stability and reactivity

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10.1. Reactivity

No hazardous reaction when handled and stored according to provisions.

10.2. Chemical stability

The product is stable under storage at normal ambient temperatures.

10.3. Possibility of hazardous reactions

No known hazardous reactions.

10.4. Conditions to avoid

none

10.5. Incompatible materials

No information available.

10.6. Hazardous decomposition products

No known hazardous decomposition products.

SECTION 11: Toxicological information

11.1. Information on hazard classes as defined in Regulation (EC) No 1272/2008

Acute toxicity

Based on available data, the classification criteria are not met.

| CAS No | Chemical name | | | | |
|----------|-------------------------------------|------------------------|---------|---------------|--------|
| | Exposure route | Dose | Species | Source | Method |
| 106-32-1 | NATURAL ETHYL OCTANOATE (CAPRYLATE) | | | | |
| | oral | LD50 mg/kg 34640 | Rat | REACH Dossier | |
| | dermal | LD50 mg/kg >5000 | Rabbit | REACH Dossier | |

Irritation and corrosivity

Based on available data, the classification criteria are not met.

Sensitising effects

Based on available data, the classification criteria are not met.

Carcinogenic/mutagenic/toxic effects for reproduction

Based on available data, the classification criteria are not met.

STOT-single exposure

Based on available data, the classification criteria are not met.

STOT-repeated exposure

Based on available data, the classification criteria are not met.

Aspiration hazard

Based on available data, the classification criteria are not met.

11.2. Information on other hazards

Endocrine disrupting properties

No information available.

SECTION 12: Ecological information

12.1. Toxicity

Toxic to aquatic life with long lasting effects.

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| CAS No | Chemical name | | | | | |
|----------|-------------------------------------|---------------|-----------|---------|---------------------------------|---------------------------|
| | Aquatic toxicity | Dose | [h] [d] | Species | Source | Method |
| 106-32-1 | NATURAL ETHYL OCTANOATE (CAPRYLATE) | | | | | |
| | Acute fish toxicity | LC50 mg/l | 1,38 | 96 h | Danio rerio (zebrafish) | REACH Dossier OECD 203 |
| | Acute algae toxicity | ErC50 mg/l | 5,57 | 72 h | Pseudokirchneriella subcapitata | REACH Dossier OECD 201 |
| | Acute crustacea toxicity | EC50 | 7,9 mg/l | 48 h | Daphnia magna (Big water flea) | REACH Dossier OECD 202 |

12.2. Persistence and degradability

The product has not been tested.

| CAS No | Chemical name | | | | |
|----------|-------------------------------------|-------|----|---------------|--|
| | Method | Value | d | Source | |
| | Evaluation | | | | |
| 106-32-1 | NATURAL ETHYL OCTANOATE (CAPRYLATE) | | | | |
| | OECD 301B | 90,2% | 28 | REACH Dossier | |
| | Readily biodegradable | | | | |
| | OECD 301B | 88,3% | 21 | REACH Dossier | |
| | Readily biodegradable | | | | |
| | OECD 301B | 63,8% | 7 | REACH Dossier | |
| | Readily biodegradable | | | | |

12.3. Bioaccumulative potential

The product has not been tested.

Partition coefficient n-octanol/water

| CAS No | Chemical name | Log Pow |
|----------|-------------------------------------|---------|
| 106-32-1 | NATURAL ETHYL OCTANOATE (CAPRYLATE) | 4,47 |

12.4. Mobility in soil

The product has not been tested.

12.5. Results of PBT and vPvB assessment

This substance does not meet the PBT/vPvB criteria of REACH, annex XIII.

The product has not been tested.

12.6. Endocrine disrupting properties

This substance does not have endocrine disrupting properties with respect to non-target organisms.

12.7. Other adverse effects

No information available.

Further information

Do not allow to enter into surface water or drains. Do not allow to enter into soil/subsoil.

SECTION 13: Disposal considerations

13.1. Waste treatment methods

Disposal recommendations

Do not allow to enter into surface water or drains. Do not allow to enter into soil/subsoil. Dispose of waste according to applicable legislation.

List of Wastes Code - residues/unused products

160305 WASTES NOT OTHERWISE SPECIFIED IN THE LIST; off-specification batches and unused products; organic wastes containing hazardous substances; hazardous waste

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List of Wastes Code - used product

160305 WASTES NOT OTHERWISE SPECIFIED IN THE LIST; off-specification batches and unused products; organic wastes containing hazardous substances; hazardous waste

List of Wastes Code - contaminated packaging

150110 WASTE PACKAGING; ABSORBENTS, WIPING CLOTHS, FILTER MATERIALS AND PROTECTIVE CLOTHING NOT OTHERWISE SPECIFIED; packaging (including separately collected municipal packaging waste); packaging containing residues of or contaminated by hazardous substances; hazardous waste

Contaminated packaging

Non-contaminated packages may be recycled. Handle contaminated packages in the same way as the substance itself.

SECTION 14: Transport information

Land transport (ADR/RID)

| | |
|---|---|
| <u>14.1. UN number or ID number:</u> | UN 3082 |
| <u>14.2. UN proper shipping name:</u> | ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S. |
| <u>14.3. Transport hazard class(es):</u> | 9 |
| <u>14.4. Packing group:</u> | III |
| Hazard label: | 9 |



| | |
|--------------------------|-----------------|
| Classification code: | M6 |
| Special Provisions: | 274 335 375 601 |
| Limited quantity: | 5 L |
| Excepted quantity: | E1 |
| Transport category: | 3 |
| Hazard No: | 90 |
| Tunnel restriction code: | - |

Inland waterways transport (ADN)

| | |
|---|---|
| <u>14.1. UN number or ID number:</u> | UN 3082 |
| <u>14.2. UN proper shipping name:</u> | ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S. |
| <u>14.3. Transport hazard class(es):</u> | 9 |
| <u>14.4. Packing group:</u> | III |
| Hazard label: | 9 |



| | |
|----------------------|-----------------|
| Classification code: | M6 |
| Special Provisions: | 274 335 375 601 |
| Limited quantity: | 5 L |
| Excepted quantity: | E1 |

Marine transport (IMDG)

| | |
|---|---|
| <u>14.1. UN number or ID number:</u> | UN 3082 |
| <u>14.2. UN proper shipping name:</u> | ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S. |
| <u>14.3. Transport hazard class(es):</u> | 9 |
| <u>14.4. Packing group:</u> | III |
| Hazard label: | 9 |

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| | |
|---------------------|-------------|
| Special Provisions: | 274 335 969 |
| Limited quantity: | 5 L |
| Excepted quantity: | E1 |
| EmS: | F-A, S-F |

Air transport (ICAO-TI/IATA-DGR)

| | |
|--|---|
| 14.1. UN number or ID number: | UN 3082 |
| 14.2. UN proper shipping name: | ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S. |
| 14.3. Transport hazard class(es): | 9 |
| 14.4. Packing group: | III |
| Hazard label: | 9 |



| | |
|--|--------------------|
| Special Provisions: | A97 A158 A197 A215 |
| Limited quantity Passenger: | 30 kg G |
| Passenger LQ: | Y964 |
| Excepted quantity: | E1 |
| IATA-packing instructions - Passenger: | 964 |
| IATA-max. quantity - Passenger: | 450 L |
| IATA-packing instructions - Cargo: | 964 |
| IATA-max. quantity - Cargo: | 450 L |

14.5. Environmental hazards

ENVIRONMENTALLY HAZARDOUS: Yes



Danger releasing substance: ETHYL OCTANOATE

14.6. Special precautions for user

No information available.

14.7. Maritime transport in bulk according to IMO instruments

not applicable

SECTION 15: Regulatory information

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

EU regulatory information

Restrictions on use (REACH, annex XVII):

Entry 3

| | |
|---|---|
| 2010/75/EU (VOC): | 100 % (870 g/l) |
| 2004/42/EC (VOC): | 100 % (870 g/l) |
| Information according to 2012/18/EU (SEVESO III): | E2 Hazardous to the Aquatic Environment |

Additional information

To follow: 850/2004/EC, 79/117/EEC, 689/2008/EC

National regulatory information

Employment restrictions: Observe restrictions to employment for juveniles according to the 'juvenile work protection guideline' (94/33/EC).

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Water hazard class (D): 2 - obviously hazardous to water

15.2. Chemical safety assessment

For this substance a chemical safety assessment has not been carried out.

SECTION 16: Other information

Changes

This data sheet contains changes from the previous version in section(s): 1,2,4,6,7,8,9,11,12,13,14,15,16.

Abbreviations and acronyms

ADR: Accord européen sur le transport des marchandises dangereuses par Route
(European Agreement concerning the International Carriage of Dangerous Goods by Road)

IMDG: International Maritime Code for Dangerous Goods

IATA: International Air Transport Association

GHS: Globally Harmonized System of Classification and Labelling of Chemicals

EINECS: European Inventory of Existing Commercial Chemical Substances

ELINCS: European List of Notified Chemical Substances

CAS: Chemical Abstracts Service

LC50: Lethal concentration, 50%

LD50: Lethal dose, 50%

CLP: Classification, labelling and Packaging

REACH: Registration, Evaluation and Authorization of Chemicals

GHS: Globally Harmonised System of Classification, Labelling and Packaging of Chemicals

UN: United Nations

DNEL: Derived No Effect Level

DMEL: Derived Minimal Effect Level

PNEC: Predicted No Effect Concentration

ATE: Acute toxicity estimate

LL50: Lethal loading, 50%

EL50: Effect loading, 50%

EC50: Effective Concentration 50%

ErC50: Effective Concentration 50%, growth rate

NOEC: No Observed Effect Concentration

BCF: Bio-concentration factor

PBT: persistent, bioaccumulative, toxic

vPvB: very persistent, very bioaccumulative

RID: Regulations concerning the international carriage of dangerous goods by rail

MARPOL: International Convention for the Prevention of Marine Pollution from Ships

IBC: Intermediate Bulk Container

VOC: Volatile Organic Compounds

SVHC: Substance of Very High Concern

For abbreviations and acronyms, see table at <http://abbrev.esdscom.eu>

ADN: European Agreement concerning the International Carriage of Dangerous Goods by Inland Waterways
(Accord européen relatif au transport international des marchandises dangereuses par voies de navigation intérieures)

EmS: Emergency Schedules

MFAG: Medical First Aid Guide

ICAO: International Civil Aviation Organization

For abbreviations and acronyms, see: ECHA Guidance on information requirements and chemical safety assessment, chapter R.20 (Table of terms and abbreviations).

Relevant H and EUH statements (number and full text)

H411 Toxic to aquatic life with long lasting effects.

Further Information

The information is based on the present level of our knowledge. It does not, however, give assurance of product properties and establishes no contract legal rights. The receiver of our product is singularly responsible

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for adhering to existing laws and regulations.