

SAFETY DATA SHEET

according to Regulation (EC) No. 1907/2006, as amended



MANUDISH ESSENTIAL

WM 0715230

Order number: 0715230

Version 9.0

Revision Date 13.07.2026

Print Date 14.07.2026

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

1.1 Product identifier

Trade name : MANUDISH ESSENTIAL
UFI : QSU2-P0CY-J00N-1CXH

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

Use of the Substance/Mixture : Cleaning agent
Restricted to professional users.

1.3 Details of the supplier of the safety data sheet

Company : Tana Chemie GmbH
Rheinallee 96
55120 Mainz
Telephone : +49613196403
Telefax : +4961319642526
E-mail address : Produktsicherheit@werner-mertz.com
Responsible/issuing person
Contact person : Product development / product safety

1.4 Emergency telephone

EU: 112

SECTION 2: Hazards identification

2.1 Classification of the substance or mixture

Classification (REGULATION (EC) No 1272/2008)

Skin irritation, Category 2 H315: Causes skin irritation.

Eye irritation, Category 2 H319: Causes serious eye irritation.

2.2 Label elements

Labeling (REGULATION (EC) No 1272/2008)

Hazard pictograms :



Signal Word : Warning

Hazard Statements : H315 Causes skin irritation.
H319 Causes serious eye irritation.

Precautionary Statements : P102 Keep out of reach of children.

Response:

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

MANUDISH ESSENTIAL

WM 0715230

Order number: 0715230

Version 9.0

Revision Date 13.07.2026

Print Date 14.07.2026

P337 + P313

If eye irritation persists: Get medical advice/
attention.

Safety data sheet available on request.

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.

Ecological information: The substance/mixture does not contain components considered to have endocrine disrupting properties according to REACH Article 57(f) or Commission Delegated regulation (EU) 2017/2100 or Commission Regulation (EU) 2018/605 at levels of 0.1% or higher.

Toxicological information: The substance/mixture does not contain components considered to have endocrine disrupting properties according to REACH Article 57(f) or Commission Delegated regulation (EU) 2017/2100 or Commission Regulation (EU) 2018/605 at levels of 0.1% or higher.

The substance/mixture does not contain components considered to have endocrine disrupting properties according to REACH Article 57(f) or Commission Delegated regulation (EU) 2017/2100 or Commission Regulation (EU) 2018/605 at levels of 0.1% or higher.

SECTION 3: Composition/information on ingredients

3.2 Mixtures

Components

Chemical name	CAS-No. EC-No. Index-No. Registration number	Classification	Concentration (% w/w)
Alcohols, C12-14, ethoxylated, sulfates, sodium salts	68891-38-3 500-234-8 01-2119488639-16	Skin Irrit. 2; H315 Eye Dam. 1; H318 Aquatic Chronic 3; H412 specific concentration limit Eye Irrit. 2; H319 5 - < 10 % Eye Dam. 1; H318 >= 10,0 %	>= 10 - < 15
1-Propanaminium, 3-amino-N-(carboxymethyl)-N,N-dimethyl-, N-(C8-18 and C18-unsatd. acyl) derivs., hydroxides, inner salts	147170-44-3 931-333-8 01-2119489410-39	Eye Dam. 1; H318 Aquatic Chronic 3; H412 specific concentration limit Eye Irrit. 2; H319 > 4 - 10 % Eye Dam. 1; H318 > 10 %	>= 5 - < 10
sodium octyl sulphate	142-31-4 205-535-5 01-2119966154-35		>= 1 - < 3

MANUDISH ESSENTIAL

WM 0715230

Order number: 0715230

Version 9.0

Revision Date 13.07.2026

Print Date 14.07.2026

SECTION 4: First aid measures

4.1 Description of first-aid measures

- | | | |
|-------------------------|---|--|
| General advice | : | Move out of dangerous area.
Consult a physician.
Show this material safety data sheet to the doctor in attendance. |
| If inhaled | : | Move to fresh air.
If symptoms persist, call a physician. |
| In case of skin contact | : | Take off contaminated clothing and shoes immediately.
Wash off with soap and plenty of water.
If symptoms persist, call a physician. |
| In case of eye contact | : | Protect unharmed eye.
If easy to do, remove contact lens, if worn.
Rinse immediately with plenty of water, also under the eyelids, for at least 15 minutes.
If eye irritation persists, consult a specialist. |
| If swallowed | : | Clean mouth with water and drink afterwards plenty of water.
Do not give milk or alcoholic beverages.
Never give anything by mouth to an unconscious person.
Obtain medical attention. |

4.2 Most important symptoms and effects, both acute and delayed

- | | | |
|----------|---|---------------------------|
| Symptoms | : | Irritation |
| Risks | : | No information available. |

4.3 Indication of any immediate medical attention and special treatment needed

- | | | |
|-----------|---|--|
| Treatment | : | For specialist advice physicians should contact the Poisons Information Service. |
|-----------|---|--|

SECTION 5: Firefighting measures

5.1 Extinguishing media

- | | | |
|------------------------------|---|---|
| Suitable extinguishing media | : | Use extinguishing measures that are appropriate to local circumstances and the surrounding environment. |
|------------------------------|---|---|

5.2 Special hazards arising from the substance or mixture

- | | | |
|---------------------------------------|---|---|
| Specific hazards during fire fighting | : | Do not allow run-off from fire fighting to enter drains or water courses. |
| Hazardous combustion products | : | No hazardous combustion products are known |

5.3 Advice for firefighters

- | | | |
|--|---|---|
| Special protective equipment for fire-fighters | : | In the event of fire, wear self-contained breathing apparatus. |
| Further information | : | Collect contaminated fire extinguishing water separately. This must not be discharged into drains.
Fire residues and contaminated fire extinguishing water must be disposed of in accordance with local regulations. |

MANUDISH ESSENTIAL

WM 0715230

Order number: 0715230

Version 9.0

Revision Date 13.07.2026

Print Date 14.07.2026

SECTION 6: Accidental release measures

6.1 Personal precautions, protective equipment and emergency procedures

Personal precautions : Use personal protective equipment.
Ensure adequate ventilation.

6.2 Environmental precautions

Environmental precautions : Do not flush into surface water or sanitary sewer system.

6.3 Methods and material for containment and cleaning up

Methods for cleaning up : Soak up with inert absorbent material (e.g. sand, silica gel, acid binder, universal binder, sawdust).
Keep in suitable, closed containers for disposal.

6.4 Reference to other sections

For personal protection see section 8., Treat recovered material as described in the section "Disposal considerations"., Refer to section 15 for specific national regulation.

SECTION 7: Handling and storage

7.1 Precautions for safe handling

Advice on safe handling : Avoid contact with skin and eyes.
For personal protection see section 8.
Smoking, eating and drinking should be prohibited in the application area.
Dispose of rinse water in accordance with local and national regulations.

Advice on protection against fire and explosion : Normal measures for preventive fire protection.

Hygiene measures : Handle in accordance with good industrial hygiene and safety practice. When using do not eat or drink. When using do not smoke.
Wash hands before breaks and at the end of workday.

7.2 Conditions for safe storage, including any incompatibilities

Requirements for storage areas and containers : Store in original container. Keep container tightly closed in a dry and well-ventilated place. Store at room temperature in the original container.

Further information on storage stability : No decomposition if stored and applied as directed.

7.3 Specific end use(s)

Specific use(s) : Cleaning agent

MANUDISH ESSENTIAL

WM 0715230

Order number: 0715230

Version 9.0

Revision Date 13.07.2026

Print Date 14.07.2026

SECTION 8: Exposure controls/personal protection

8.1 Control parameters

Contains no substances with occupational exposure limit values.

Derived No Effect Level (DNEL) according to Regulation (EC) No. 1907/2006:

Substance name	End Use	Routes of exposure	Potential health effects	Value
Alcohols, C12-14, ethoxylated, sulfates, sodium salts	Workers	Inhalation	Long-term systemic effects	175 mg/m3
	Consumers	Inhalation	Long-term systemic effects	52 mg/m3
	Consumers	Ingestion	Long-term systemic effects	15 mg/kg bw/day
	Consumers	Skin contact	Long-term local effects	0,079 mg/cm2
	Workers	Skin contact	Long-term systemic effects	5830 mg/kg bw/day
	Consumers	Skin contact		2500 mg/kg bw/day
1-Propanaminium, 3-amino-N-(carboxymethyl)-N,N-dimethyl-, N-(C8-18 and C18-unsatd. acyl) derivs., hydroxides, inner salts	Workers	Inhalation	Long-term systemic effects	44 mg/m3
	Workers	Dermal	Long-term systemic effects	12,5 mg/kg
	Consumers	Oral	Long-term systemic effects	7,5 mg/kg
	Consumers	Dermal	Long-term systemic effects	7,5 mg/kg
sodium octyl sulphate	Workers	Skin contact	Long-term systemic effects	4060 mg/kg
	Workers	Inhalation	Long-term systemic effects	285 mg/m3
	Consumers	Skin contact	Long-term systemic effects	2440 mg/kg

MANUDISH ESSENTIAL

WM 0715230

Order number: 0715230

Version 9.0

Revision Date 13.07.2026

Print Date 14.07.2026

	Consumers	Inhalation	Long-term systemic effects	85 mg/m3
	Consumers	Ingestion	Long-term systemic effects	24 mg/kg
sodium chloride	Workers	Skin contact	Acute systemic effects	295,52 mg/kg bw/day
	Workers	Inhalation	Acute systemic effects	2068,62 mg/m3
	Workers	Skin contact	Long-term systemic effects	295,52 mg/kg bw/day
	Workers	Inhalation	Long-term systemic effects	2068,62 mg/m3
	Consumer use	Skin contact	Acute systemic effects	126,65 mg/kg
	Consumer use	Inhalation	Acute systemic effects	443,28 mg/m3
	Consumer use	Ingestion	Acute systemic effects	126,65 mg/kg
	Consumer use	Oral	Long-term systemic effects	126,65 mg/kg bw/day
	Consumer use	Inhalation	Long-term systemic effects	443,28 mg/m3
	Consumer use	Skin contact	Long-term systemic effects	126,65 mg/kg bw/day

Predicted No Effect Concentration (PNEC) according to Regulation (EC) No. 1907/2006:

Substance name	Environmental Compartment	Value
Alcohols, C12-14, ethoxylated, sulfates, sodium salts	Fresh water	0,129 mg/l
	Sea water	0,024 mg/l
	Fresh water sediment	4,835 mg/kg dry weight (d.w.)
	Sea sediment	0,4835 mg/kg dry weight (d.w.)
	Soil	7,5 mg/kg dry weight (d.w.)
	STP	10000 mg/l
	intermittent release	0,071 mg/l

MANUDISH ESSENTIAL

WM 0715230

Order number: 0715230

Version 9.0

Revision Date 13.07.2026

Print Date 14.07.2026

1-Propanaminium, 3-amino-N-(carboxymethyl)-N,N-dimethyl-, N-(C8-18 and C18-unsatd. acyl) derivs., hydroxides, inner salts	Fresh water	0,0135 mg/l
	Sea water	0,00135 mg/l
	Fresh water sediment	1 mg/kg
	Sea sediment	0,1 mg/kg
	STP	3000 mg/l
	Soil	0,8 mg/kg
sodium octyl sulphate	Fresh water	0,1357 mg/l
	Sea water	0,01357 mg/l
	STP	1,35 mg/l
	Fresh water sediment	1,5 mg/kg
	Sea sediment	0,15 mg/kg
	Soil	0,22 mg/kg
sodium chloride	Fresh water	5 mg/l
	Soil	4,86 mg/kg dry weight (d.w.)
	STP	500 mg/l

8.2 Exposure controls

Personal protective equipment

Eye/face protection : If splashes are likely to occur, wear:
Tightly fitting safety goggles

Hand protection

Material : For prolonged or repeated contact use protective gloves.

It is suggested the usage of chemical resistant gloves made of butyl rubber or nitrile rubber category III according to EN 374.

As alternative, a different type of gloves might be used if, accordingly to the recommendations of the producer, guarantee the same level of protection.

MANUDISH ESSENTIAL

WM 0715230

Order number: 0715230

Version 9.0

Revision Date 13.07.2026

Print Date 14.07.2026

Remarks : Take note of the information given by the producer concerning permeability and break through times, and of special workplace conditions (mechanical strain, duration of contact).

Skin and body protection : not required under normal use

Respiratory protection : Not required; except in case of aerosol formation.

Recommended Filter type:

ABEK-P3-filter

SECTION 9: Physical and chemical properties

9.1 Information on basic physical and chemical properties

Physical state	: liquid
Color	: green
Odor	: pleasant
Melting point/freezing point	: No data available
Boiling point/boiling range	: No data available
Flammability (solid, gas)	: No data available
Flammability (liquids)	: No data available
Lower explosion limit	: No data available
Upper explosion limit	: No data available
Flash point	: does not flash
Ignition temperature	: No data available
Decomposition temperature	: No data available
pH	: ca. 5,2, 100 % at 20 °C
Viscosity, dynamic	: ca. 1.000 mPa.s at 20 °C
Viscosity, kinematic	: No data available
Water solubility	: soluble
Solubility in other solvents	: No data available
Partition coefficient: n-	: No data available

MANUDISH ESSENTIAL

WM 0715230

Order number: 0715230

Version 9.0

Revision Date 13.07.2026

Print Date 14.07.2026

octanol/water

Vapor pressure : No data available

Density : ca. 1,036 g/cm³ at 20 °C

Relative density : No data available

Relative vapor density : No data available

Particle characteristics : No data available

9.2 Other information

none

SECTION 10: Stability and reactivity

10.1 Reactivity

Stable under recommended storage conditions.
No dangerous reaction known under conditions of normal use.

10.2 Chemical stability

No decomposition if stored and applied as directed.

10.3 Possibility of hazardous reactions

Hazardous reactions : Stable under recommended storage conditions.
No decomposition if used as directed.

10.4 Conditions to avoid

Conditions to avoid : No data available

10.5 Incompatible materials

Materials to avoid : No data available

10.6 Hazardous decomposition products

No hazardous decomposition products are known.

SECTION 11: Toxicological information

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

Our company is strongly against animal testing.
Our company does not place any orders for animal testing for the finished product or the ingredients.
However, as a result of EU legislation (REACH Regulation), the manufacturers of ingredients or EU importers are obliged to test ingredients with regard to their effects on human health and the environment before they are brought onto the market. Some of the tests made necessary by this took place decades ago.

Acute toxicity

Acute toxicity : Not Rated

Components:

Alcohols, C12-14, ethoxylated, sulfates, sodium salts

68891-38-3:

SAFETY DATA SHEET

according to Regulation (EC) No. 1907/2006, as amended



MANUDISH ESSENTIAL

WM 0715230

Order number: 0715230

Version 9.0

Revision Date 13.07.2026

Print Date 14.07.2026

Acute oral toxicity	:	LD50 (Rat): 2.000 - 5.000 mg/kg Method: OECD Test Guideline 401
Acute dermal toxicity	:	LD50 Dermal (Rat): > 2.000 mg/kg Method: OECD Test Guideline 402 GLP: yes

1-Propanaminium, 3-amino-N-(carboxymethyl)-N,N-dimethyl-, N-(C8-18 and C18-unsatd. acyl) derivs., hydroxides, inner salts

147170-44-3:

Acute oral toxicity	:	LD50 Oral (Rat): > 5.000 mg/kg Method: OECD Test Guideline 401 LD50 Oral (Rat): 2.335 mg/kg LD50 (Rat): > 2.000 mg/kg Method: OECD Test Guideline 402
Acute dermal toxicity	:	LD50 Dermal (Rat): > 2.000 mg/kg Method: OECD Test Guideline 402

sodium octyl sulphate

142-31-4:

Acute oral toxicity	:	LD50 Oral (Rat): > 2.000 mg/kg Method: OECD Test Guideline 423
Acute dermal toxicity	:	LD50 Dermal (Rabbit): > 2.000 mg/kg Method: OECD Test Guideline 402

Skin corrosion/irritation

Product:

Remarks	:	May cause skin irritation and/or dermatitis.
---------	---	--

Components:

Alcohols, C12-14, ethoxylated, sulfates, sodium salts

68891-38-3:

Species	:	Rabbit
Assessment	:	Irritating to skin.
Method	:	OECD Test Guideline 404

1-Propanaminium, 3-amino-N-(carboxymethyl)-N,N-dimethyl-, N-(C8-18 and C18-unsatd. acyl) derivs., hydroxides, inner salts

147170-44-3:

Species	:	Rabbit
Method	:	OECD Test Guideline 404
Result	:	No skin irritation

sodium octyl sulphate

142-31-4:

Result	:	Skin irritation
--------	---	-----------------

MANUDISH ESSENTIAL

WM 0715230

Order number: 0715230

Version 9.0

Revision Date 13.07.2026

Print Date 14.07.2026

Serious eye damage/eye irritation

Product:

Remarks : Vapors may cause irritation to the eyes, respiratory system and the skin.
Causes serious eye irritation.

Components:

Alcohols, C12-14, ethoxylated, sulfates, sodium salts

68891-38-3:

Species : Rabbit
Assessment : Risk of serious damage to eyes.
Method : OECD Test Guideline 405

1-Propanaminium, 3-amino-N-(carboxymethyl)-N,N-dimethyl-, N-(C8-18 and C18-unsatd. acyl) derivs., hydroxides, inner salts

147170-44-3:

Result : Causes serious eye damage.

sodium octyl sulphate

142-31-4:

Result : Causes serious eye damage.

Respiratory or skin sensitization

Product:

Remarks : No data available

Components:

Alcohols, C12-14, ethoxylated, sulfates, sodium salts

68891-38-3:

Routes of exposure : Dermal
Species : Guinea pig
Result : Does not cause skin sensitization.

1-Propanaminium, 3-amino-N-(carboxymethyl)-N,N-dimethyl-, N-(C8-18 and C18-unsatd. acyl) derivs., hydroxides, inner salts

147170-44-3:

Species : Guinea pig
Method : OECD Test Guideline 406
Result : Not a skin sensitizer.

Germ cell mutagenicity

Germ cell mutagenicity : Not Rated

Components:

Alcohols, C12-14, ethoxylated, sulfates, sodium salts

68891-38-3:

MANUDISH ESSENTIAL

WM 0715230

Order number: 0715230

Version 9.0

Revision Date 13.07.2026

Print Date 14.07.2026

Genotoxicity in vitro	: Method: OECD Test Guideline 471 Result: negative
Carcinogenicity	: Not Rated
Reproductive toxicity	: Not Rated
STOT-single exposure	: The substance or mixture is not classified as specific target organ toxicant, single exposure.
STOT-repeated exposure	: The substance or mixture is not classified as specific target organ toxicant, repeated exposure.

Repeated dose toxicity

Components:

sodium octyl sulphate

142-31-4:

Species	: Rat
NOAEL	: 488 mg/kg
Application Route	: Oral
Method	: OECD Test Guideline 408

Species	: Rat
LOAEL	: 1016 mg/kg
Application Route	: Oral
Method	: OECD Test Guideline 408

Species	: Mouse
NOAEL	: 400 mg/kg
Application Route	: Dermal
Method	: OECD Test Guideline 411

Aspiration toxicity	: Not Rated
---------------------	-------------

11.2 Information on other hazards

Endocrine disrupting properties

Product:

Assessment	: The substance/mixture does not contain components considered to have endocrine disrupting properties according to REACH Article 57(f) or Commission Delegated regulation (EU) 2017/2100 or Commission Regulation (EU) 2018/605 at levels of 0.1% or higher.
------------	---

Further information

Product:

Remarks	: No data available
---------	---------------------

MANUDISH ESSENTIAL

WM 0715230

Order number: 0715230

Version 9.0

Revision Date 13.07.2026

Print Date 14.07.2026

SECTION 12: Ecological information

12.1 Toxicity

Components:

Alcohols, C12-14, ethoxylated, sulfates, sodium salts

68891-38-3:

Toxicity to fish	: LC50 (Danio rerio (zebra fish)): 7,1 mg/l Exposure time: 96 h Test Type: flow-through test Method: OECD Test Guideline 203 GLP: yes LC50 (Fish): > 1 - 10 mg/l Test Type: flow-through test Method: OECD Test Guideline 203 LC50 (Leuciscus idus (Golden orfe)): 10 - 100 mg/l Method: OECD Test Guideline 203 NOEC (Oncorhynchus mykiss (rainbow trout)): 0,14 mg/l Exposure time: 28 d Test Type: flow-through test Method: OECD Test Guideline 204 LC50 (Brachydanio rerio (zebrafish)): 1 - 10 mg/l Exposure time: 96 h Test Type: flow-through test Method: OECD Test Guideline 203 LC50 (Brachydanio rerio (zebrafish)): 7,1 mg/l Exposure time: 96 h NOEC (Fish): 0,1 - 1 mg/l Exposure time: 28 Days
Toxicity to daphnia and other aquatic invertebrates	: EC50 (Daphnia pulex (Water flea)): 7,4 mg/l Exposure time: 48 h Test Type: Immobilization Method: OECD Test Guideline 202 EC50 (Daphnia magna (Water flea)): > 1 - 10 mg/l Exposure time: 48 h Test Type: static test Method: OECD Test Guideline 202 NOEC (Daphnia magna (Water flea)): 0,27 mg/l Exposure time: 21 d Test Type: flow-through test Method: OECD Test Guideline 211 EC50 (Daphnia): 1 - 10 mg/l Exposure time: 48 h NOEC (Daphnia): 0,1 - 1 mg/l Exposure time: 21 Days
Toxicity to algae/aquatic plants	: EC50 (Desmodesmus subspicatus (green algae)): 27,7 mg/l Exposure time: 72 h

MANUDISH ESSENTIAL

WM 0715230

Order number: 0715230

Version 9.0

Revision Date 13.07.2026

Print Date 14.07.2026

	Test Type: Growth inhibition Method: OECD Test Guideline 201 GLP: yes EC50 (Desmodesmus subspicatus (green algae)): > 10 - 100 mg/l Exposure time: 72 h Test Type: static test Method: OECD Test Guideline 201 NOEC : 0,95 mg/l Test Type: Growth inhibition Method: OECD Test Guideline 201 NOEC (Desmodesmus subspicatus (green algae)): 0,93 mg/l Exposure time: 72 h Test Type: static test Method: OECD Test Guideline 201 EC50 (algae): 27,7 mg/l Exposure time: 72 h Test Type: Growth inhibition NOEC (algae): 0,93 mg/l Exposure time: 72 h EC50 (algae): 10 - 100 mg/l Exposure time: 72 h NOEC (algae): 0,1 - 1 mg/l Exposure time: 72 h
Toxicity to microorganisms	: EC50 (Pseudomonas putida): > 10 g/l Exposure time: 16 h Test Type: Cell multiplication inhibition test Method: DIN 38412 GLP: yes EC10 (Pseudomonas putida): > 10 g/l Exposure time: 16 h Test Type: Cell multiplication inhibition test
Toxicity to fish (Chronic toxicity)	: NOEC: 1 - 10 mg/l Species: Leuciscus idus (Golden orfe) NOEC: 0,14 mg/l Exposure time: 28 d Species: Oncorhynchus mykiss (rainbow trout) Method: OECD Test Guideline 204 NOEC: 0,2 mg/l Exposure time: 28 d Species: Fish NOEC: > 0,1 - 1 mg/l Exposure time: 28 d Species: Oncorhynchus mykiss (rainbow trout) Method: OECD Test Guideline 204
Toxicity to daphnia and other aquatic invertebrates (Chronic toxicity)	: NOEC: > 0,1 - 1 mg/l Exposure time: 21 d Species: Daphnia magna (Water flea)

SAFETY DATA SHEET

according to Regulation (EC) No. 1907/2006, as amended



MANUDISH ESSENTIAL

WM 0715230

Order number: 0715230

Version 9.0

Revision Date 13.07.2026

Print Date 14.07.2026

	Method: OECD Test Guideline 211
	EC50: 0,37 mg/l
	Exposure time: 21 d
	0,74 mg/l
	Exposure time: 21 d
	NOEC: 0,27 mg/l
	Exposure time: 21 d
Toxicity to soil dwelling organisms	: NOEC: 750 mg/kg
	Exposure time: 56 d
	Species: Eisenia fetida (earthworms)
	Method: OECD Test Guideline 222
	Remarks: Information taken from reference works and the literature.

1-Propanaminium, 3-amino-N-(carboxymethyl)-N,N-dimethyl-, N-(C8-18 and C18-unsatd. acyl) derivs., hydroxides, inner salts

147170-44-3:

Toxicity to fish	: LC50 (Pimephales promelas (fathead minnow)): 2 mg/l
	Exposure time: 96 h
	Method: OECD Test Guideline 203
	LC50 (Brachydanio rerio): > 1 - 10 mg/l
	Method: ISO 7346/2
	NOEC (Oncorhynchus mykiss (rainbow trout)): > 0,1 - 1 mg/l
	LC50 (Fish): 1,1 mg/l
Toxicity to daphnia and other aquatic invertebrates	: EC50 (Daphnia magna (Water flea)): 1 - 10 mg/l
	Method: OECD Test Guideline 202
	NOEC (Daphnia magna (Water flea)): > 0,1 - 1 mg/l
	Method: OECD Test Guideline 211
Toxicity to algae/aquatic plants	: EC50 (Desmodesmus subspicatus (green algae)): > 1 - 10 mg/l
	Method: OECD Test Guideline 201
	ErC50 (algae): 2,4 mg/l
Toxicity to microorganisms	: EC0 (Pseudomonas putida): > 100 mg/l
	Method: OECD Test Guideline 209
Toxicity to fish (Chronic toxicity)	: NOEC: > 0,1 - 1 mg/l
	Species: Oncorhynchus mykiss (rainbow trout)
	Method: OECD Test Guideline 210
	NOEC: 0,135 mg/l
Toxicity to daphnia and other aquatic invertebrates (Chronic toxicity)	: NOEC: > 0,1 - 1 mg/l
	Species: Daphnia magna (Water flea)
	Method: OECD Test Guideline 211

sodium octyl sulphate

142-31-4:

Toxicity to fish	: LC50 (Brachydanio rerio (zebrafish)): > 100 mg/l
	Exposure time: 96 h

SAFETY DATA SHEET

according to Regulation (EC) No. 1907/2006, as amended



MANUDISH ESSENTIAL

WM 0715230

Order number: 0715230

Version 9.0

Revision Date 13.07.2026

Print Date 14.07.2026

	Method: OECD Test Guideline 203
Toxicity to daphnia and other aquatic invertebrates	: EC50 (Daphnia magna (Water flea)): > 100 mg/l Exposure time: 48 h Method: OECD Test Guideline 202
Toxicity to algae/aquatic plants	: EC50 : > 100 mg/l EC50 (Desmodesmus subspicatus (green algae)): > 511 mg/l Exposure time: 72 h
Toxicity to microorganisms	: EC0 : > 100 mg/l
Toxicity to fish (Chronic toxicity)	: Lowest Observed Effect Concentration: > 1,357 mg/l Exposure time: 42 d Species: Pimephales promelas (fathead minnow)
Toxicity to daphnia and other aquatic invertebrates (Chronic toxicity)	: NOEC: 1,4 mg/l Exposure time: 21 d Species: Daphnia magna (Water flea) Method: OECD Test Guideline 211

12.2 Persistence and degradability

Product:

Biodegradability	: Remarks: The surfactant(s) contained in this preparation complies (comply) with the biodegradability criteria as laid down in Regulation (EC) No. 648/2004 on detergents.
------------------	---

Components:

Alcohols, C12-14, ethoxylated, sulfates, sodium salts

68891-38-3:

Biodegradability	: Test Type: aerobic Result: rapidly biodegradable Biodegradation: > 70 % Exposure time: 28 d Method: OECD 301 A Test Type: anaerobic Result: Biodegradable Biodegradation: > 60 % Exposure time: 41 d Method: OECD 301 D Result: Readily biodegradable. Biodegradation: 93 % Exposure time: 28 d
Biochemical Oxygen Demand (BOD)	: 285 mg/g Incubation time: 5 d
Chemical Oxygen Demand (COD)	: 518 mg/g

1-Propanaminium, 3-amino-N-(carboxymethyl)-N,N-dimethyl-, N-(C8-18 and C18-unsatd. acyl) derivs., hydroxides, inner salts

147170-44-3:

Biodegradability	: Result: rapidly biodegradable
------------------	---------------------------------

MANUDISH ESSENTIAL

WM 0715230

Order number: 0715230

Version 9.0

Revision Date 13.07.2026

Print Date 14.07.2026

		Biodegradation: 86 % Method: OECD 301 D
Biochemical Oxygen Demand (BOD)	:	365 mg/g Method: see user defined free text
Chemical Oxygen Demand (COD)	:	704 mg/g Method: DIN 38409-H-41

sodium octyl sulphate

142-31-4:

Biodegradability	:	Biodegradation: 98,2 % Remarks: Expected to be biodegradable
------------------	---	---

12.3 Bioaccumulative potential

Components:

Alcohols, C12-14, ethoxylated, sulfates, sodium salts

68891-38-3:

Bioaccumulation	:	Remarks: Bioaccumulation is unlikely.
-----------------	---	---------------------------------------

12.4 Mobility in soil

No data available

12.5 Results of PBT and vPvB assessment

Product:

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.
------------	---	--

Components:

Alcohols, C12-14, ethoxylated, sulfates, sodium salts

68891-38-3:

Assessment	:	Not very persistent and very bioaccumulative (vPvB).. Not persistent, bioaccumulative, and toxic (PBT).
------------	---	---

12.6 Endocrine disrupting properties

Product:

Assessment	:	The substance/mixture does not contain components considered to have endocrine disrupting properties according to REACH Article 57(f) or Commission Delegated regulation (EU) 2017/2100 or Commission Regulation (EU) 2018/605 at levels of 0.1% or higher.
------------	---	---

12.7 Other adverse effects

Product:

Additional ecological information	:	There is no data available for this product.
-----------------------------------	---	--

SECTION 13: Disposal considerations

13.1 Waste treatment methods

MANUDISH ESSENTIAL

WM 0715230

Order number: 0715230

Version 9.0

Revision Date 13.07.2026

Print Date 14.07.2026

Product	: Do not dispose of waste into sewer. Do not contaminate ponds, waterways or ditches with chemical or used container. In accordance with local and national regulations.
Contaminated packaging	: Empty remaining contents. Dispose of as unused product. Do not re-use empty containers.
Waste Code	European Waste Catalog 20 01 29* According to the European Waste Catalog, Waste Codes are not product specific, but application specific. Waste codes should be assigned by the user, preferably in discussion with the waste disposal authorities.

SECTION 14: Transport information

14.1 UN number or ID number

ADR

Not dangerous goods

IMDG

Not dangerous goods

IATA

Not dangerous goods

14.2 UN proper shipping name

Not regulated as a dangerous good

14.3 Transport hazard class(es)

ADR

Not dangerous goods

IMDG

Not dangerous goods

IATA

Not dangerous goods

14.4 Packing group

ADR

Not dangerous goods

IMDG

Not dangerous goods

IATA

Not dangerous goods

14.5 Environmental hazards

ADR

Not dangerous goods

IMDG

Not regulated as a dangerous good

IATA

Not dangerous goods

14.6 Special precautions for user

Remarks : Not classified as dangerous in the meaning of transport regulations.

For personal protection see section 8.

14.7 Maritime transport in bulk according to IMO instruments

Not applicable for product as supplied.

SAFETY DATA SHEET

according to Regulation (EC) No. 1907/2006, as amended



MANUDISH ESSENTIAL

WM 0715230

Order number: 0715230

Version 9.0

Revision Date 13.07.2026

Print Date 14.07.2026

SECTION 15: Regulatory information

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

Regulation (EC) No 649/2012 of the European Parliament and the Council concerning the export and import of dangerous chemicals : Not applicable

REACH - Restrictions on the manufacture, placing on the market and use of certain dangerous substances, mixtures and articles (Annex XVII) : See Annex XVII to Regulation (EC) no 1907/2006 for Conditions of restriction

Seveso III: Directive 2012/18/EU of the European Parliament and of the Council on the control of major-accident hazards involving dangerous substances. : Not applicable

TA Luft List (Germany) : Total dust: Not applicable
: Inorganic substances in powdered form: Not applicable
: Inorganic substances in vapor or gaseous form: : portionClass 3: 1,02 %
: Organic Substances: Not applicable
: Carcinogenic substances: Not applicable
: mutagenic: Not applicable
: Toxic to reproduction: Not applicable

Volatile organic compounds (VOC) content : Directive 2010/75/EU of 24 November 2010 on industrial and livestock rearing emissions (integrated pollution prevention and control)
Update: Not applicable

according to Detergents Regulation EC 648/2004 : 5 - <15% anionic surfactants, amphoteric surfactants, <5% non-ionic surfactants, SODIUM BENZOATE

15.2 Chemical Safety Assessment

SECTION 16: Other information

Full text of H-Statements

H315 : Causes skin irritation.
H318 : Causes serious eye damage.
H412 : Harmful to aquatic life with long lasting effects.

Full text of other abbreviations

Aquatic Chronic : Long-term (chronic) aquatic hazard
Eye Dam. : Serious eye damage
Skin Irrit. : Skin irritation

ADN - European Agreement concerning the International Carriage of Dangerous Goods by Inland Waterways; ADR - Agreement concerning the International Carriage of Dangerous Goods by Road; AIIIC - Australian Inventory of Industrial Chemicals; ASTM - American Society for the Testing of Materials; bw - Body weight; CLP - Classification Labelling Packaging Regulation; Regulation (EC) No 1272/2008; CMR - Carcinogen, Mutagen or Reproductive Toxicant; DIN - Standard of the German Institute for Standardization; DSL - Domestic Substances

SAFETY DATA SHEET

according to Regulation (EC) No. 1907/2006, as amended



MANUDISH ESSENTIAL

WM 0715230

Order number: 0715230

Version 9.0

Revision Date 13.07.2026

Print Date 14.07.2026

List (Canada); ECHA - European Chemicals Agency; EC-Number - European Community number; ECx - Concentration associated with x% response; ELx - Loading rate associated with x% response; EmS - Emergency Schedule; ENCS - Existing and New Chemical Substances (Japan); ErCx - Concentration associated with x% growth rate response; GHS - Globally Harmonized System; GLP - Good Laboratory Practice; IARC - International Agency for Research on Cancer; IATA - International Air Transport Association; IBC - International Code for the Construction and Equipment of Ships carrying Dangerous Chemicals in Bulk; IC50 - Half maximal inhibitory concentration; ICAO - International Civil Aviation Organization; IECSC - Inventory of Existing Chemical Substances in China; IMDG - International Maritime Dangerous Goods; IMO - International Maritime Organization; ISHL - Industrial Safety and Health Law (Japan); ISO - International Organization for Standardization; KECI - Korea Existing Chemicals Inventory; LC50 - Lethal Concentration to 50 % of a test population; LD50 - Lethal Dose to 50% of a test population (Median Lethal Dose); MARPOL - International Convention for the Prevention of Pollution from Ships; n.o.s. - Not Otherwise Specified; NO(A)EC - No Observed (Adverse) Effect Concentration; NO(A)EL - No Observed (Adverse) Effect Level; NOELR - No Observable Effect Loading Rate; NZIoC - New Zealand Inventory of Chemicals; OECD - Organization for Economic Co-operation and Development; OPPTS - Office of Chemical Safety and Pollution Prevention; PBT - Persistent, Bioaccumulative and Toxic substance; PICCS - Philippines Inventory of Chemicals and Chemical Substances; (Q)SAR - (Quantitative) Structure Activity Relationship; REACH - Regulation (EC) No 1907/2006 of the European Parliament and of the Council concerning the Registration, Evaluation, Authorization and Restriction of Chemicals; RID - Regulations concerning the International Carriage of Dangerous Goods by Rail; SADT - Self-Accelerating Decomposition Temperature; SDS - Safety Data Sheet; SVHC - substance of very high concern; TCSI - Taiwan Chemical Substance Inventory; TECI - Thailand Existing Chemicals Inventory; TRGS - Technical Rule for Hazardous Substances; TSCA - Toxic Substances Control Act (United States); UN - United Nations; vPvB - Very Persistent and Very Bioaccumulative

Further information

Classification of the mixture:

Skin Irrit. 2	H315
Eye Irrit. 2	H319

Classification procedure:

On basis of test data.
Calculation method

The information provided in this Safety Data Sheet is correct to the best of our knowledge, information and belief at the date of its publication. The information given is designed only as a guidance for safe handling, use, processing, storage, transportation, disposal and release and is not to be considered a warranty or quality specification. The information relates only to the specific material designated and may not be valid for such material used in combination with any other materials or in any process, unless specified in the text.

REG_EU / EN

500000004232