



**ELMA RED 1:9**

Print date 23.05.2025  
Revision date 23.05.2025  
Version 4.5 (en)  
replaces version of 22.09.2022 (4.4)

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

**1.1 Product identifier**

**Trade name/designation** ELMA RED 1:9  
**Unique Formula Identifier** UFI: N940-G08X-9004-WRA3  
**Product category** PC-CLN-OTH Other cleaning, care and maintenance products (excludes biocidal products)

**Hazard components**

1-methoxy-2-propanol, ammonia ...%

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

**Sector of uses [SU]**

SU22 Professional use of non-reactive processing aid (administration, education, entertainment, services, craftsmen)  
SU3 Industrial uses

**Process categories [PROC]**

PROC8a Transfer of substance or mixture (charging and discharging) at non- dedicated facilities  
PROC9 Transfer of substance or mixture into small containers (dedicated filling line, including weighing)  
PROC13 Treatment of articles by dipping and pouring

**Environmental release categories [ERC]**

ERC8a Widespread use of non-reactive processing aid (no inclusion into or onto article, indoor)  
ERC8b Widespread use of reactive processing aid (no inclusion into or onto article, indoor)  
ERC6b Use of reactive processing aid at industrial site (no inclusion into or onto article)

**Product Categories [PC]**

PC35 Washing and cleaning products

**Use of the substance/mixture**

Cleaning concentrate for aqueous cleaning of disassembled watches and metal precision parts in devices for watch cleaning.

**Uses advised against**

Do not use for injecting or spraying.

**1.3 Details of the supplier of the safety data sheet**

**Supplier**

Elma Schmidbauer GmbH  
Gottlieb-Daimler-Str. 17  
D-78224 Singen (Htwl.)  
Telephone +49 7731 882-0  
Telefax +49 7731 882-266  
E-mail info@elma-ultrasonic.com  
Website www.elma-ultrasonic.com

Department responsible for information:  
Chemie/Labor: Email: chemlab@elma-ultrasonic.com

**1.4 Emergency telephone number**

Vergiftungs-Informationen-Zentrale Freiburg (Sprache/Language: DE, +49 761 19240  
EN)

**\* SECTION 2: Hazards identification**

**2.1 Classification of the substance or mixture**

Classification according to Regulation (EC) No 1272/2008 [CLP]	Classification procedure
Skin Irrit. 2, H315	Calculation method.
Eye Irrit. 2, H319	Calculation method.
STOT SE 3, H336	Calculation method.
Aquatic Chronic 3, H412	Calculation method.



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**Hazard statements for health hazards**

H315 Causes skin irritation.  
H319 Causes serious eye irritation.  
H336 May cause drowsiness or dizziness.

**Hazard statements for environmental hazards**

H412 Harmful to aquatic life with long lasting effects.

**2.2 Label elements**

**Labelling according to Regulation (EC) No 1272/2008 [CLP]**

**Hazard components**

1-methoxy-2-propanol, ammonia ...%

**Hazard pictograms**



GHS07

**Signal word**

Warning

**Hazard statements**

H315 Causes skin irritation.  
H319 Causes serious eye irritation.  
H336 May cause drowsiness or dizziness.  
H412 Harmful to aquatic life with long lasting effects.

**Precautionary statements**

P233 Keep container tightly closed.  
P271 Use only outdoors or in a well-ventilated area.  
P280 Wear protective gloves/eye protection.  
P312 Call a POISON CENTER/doctor if you feel unwell.  
P305 + P351 + P338 IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.  
P337 + P313 If eye irritation persists: Get medical advice/attention.  
P302 + P352 IF ON SKIN: Wash with plenty of water.  
P332 + P313 If skin irritation occurs: Get medical advice/attention.  
P301 + P330 + P331 IF SWALLOWED: rinse mouth. Do NOT induce vomiting.

**Other labelling**

Labelling for contents according to regulation (EC) No. 648/2004:  
< 5% anionic surfactants  
15 - 30% soap

**\* 2.3 Other hazards**

**\* Adverse human health effects and symptoms**

May cause respiratory irritation.  
Vapours of the concentrate may cause drowsiness and dizziness.  
This product does not contain a substance that has endocrine disrupting properties with respect to humans as no components meets the criteria.

**\* Adverse environmental effects**

Aquatic Acute 2 H401: Toxic to aquatic life.  
This product does not contain a substance that has endocrine disrupting properties with respect to non-target organisms as no components meets the criteria.

**Results of PBT and vPvB assessment**

The product does not contain any PBT-/vPvB-substances according to the recipe.



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**\* SECTION 3: Composition / information on ingredients**

**3.1 Substances**

not applicable

**\* 3.2 Mixtures**

**Hazardous ingredients**

CAS No	EC No	Index No	Substance name	Concentration	Classification according to Regulation (EC) No 1272/2008 [CLP]	SCL/ M/ ATE
68604-33-1	271-685-3		Fatty acids, C14-18 and C16-18-unsatd., ammonium salts	15 - 30 weight-%	Aquatic Chronic 3; H412	
107-98-2	203-539-1	603-064-00-3	1-methoxy-2-propanol	15 - 25 weight-%	Flam. Liq. 3; H226 STOT SE 3; H336	
15763-76-5	239-854-6		sodium cumenesulphonate	< 5 weight-%	Eye Irrit. 2; H319	
164524-02-1	629-764-9		potassium cumenesulphonate	< 5 weight-%	Eye Irrit. 2; H319	
1336-21-6	215-647-6	007-001-01-2	ammonia ...%	< 3 weight-%	Met. Corr. 1; H290 Acute Tox. 4; H302 Acute Tox. 4; H332 Skin Corr. 1B; H314 Eye Dam. 1; H318 STOT SE 3; H335 Aquatic Acute 1; H400 Aquatic Chronic 2; H411	STOT SE 3; H335: C>=5% M=1 (Aquatic Acute 1)

REACH No.	Substance name
01-2120770276-50	Fatty acids, C14-18 and C16-18-unsatd., ammonium salts
01-2119457435-35	1-methoxy-2-propanol
01-2119489411-37	sodium cumenesulphonate
01-2119489427-24	potassium cumenesulphonate
01-2119488876-14	ammonia ...%

**Additional information**

Aqueous mixture with surfactants, complexing agent, ammonium hydroxide with cosolvent and dyestuff.

**SECTION 4: First aid measures**

**4.1 Description of first aid measures**

**General information**

Remove contaminated, saturated clothing immediately.  
Remove casualty to fresh air and keep warm and at rest.

**Following inhalation**

Remove casualty to fresh air and keep warm and at rest.  
In the event of symptoms refer for medical treatment.

**Following skin contact**

In case of contact with skin wash off immediately with plenty of water.  
In case of skin irritation, consult a physician.

**After eye contact**

After contact with the eyes, rinse with water with the eyelids open for a sufficient length of time, then consult an ophthalmologist immediately.

**Following ingestion**

Do NOT induce vomiting.  
Seek medical advice immediately.  
Rinse mouth immediately and drink plenty of water.



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

**Symptoms**

No further informations available.

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

**Notes for the doctor**

No further informations available.

**SECTION 5: Firefighting measures**

**5.1 Extinguishing media**

**Suitable extinguishing media**

Water  
alcohol resistant foam  
Carbon dioxide (CO<sub>2</sub>)  
Water spray jet  
Water mist

**5.2 Special hazards arising from the substance or mixture**

**Hazardous combustion products**

In the event of fire the following can be released:  
Ammonia (NH<sub>3</sub>)  
Nitrogen oxides (NO<sub>x</sub>)  
Carbon monoxide  
Sulphur dioxide (SO<sub>2</sub>)

**5.3 Advice for firefighters**

**Special protective equipment for firefighters**

Do not inhale explosion and combustion gases.

**SECTION 6: Accidental release measures**

**6.1 Personal precautions, protective equipment and emergency procedures**

**For non-emergency personnel**

Provide adequate ventilation.  
Use personal protection equipment.  
Special danger of slipping by leaking/spilling product.

**For emergency responders**

Ensure adequate ventilation.  
Personal protection equipment  
Use personal protection.  
Forms slippery surfaces with water.  
Special danger of slipping by leaking/spilling product.

**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 containment**

Suitable material for taking up:  
Sand  
Sawdust  
Universal binder  
Kieselguhr  
Flush away residues with water.  
After taking up the material dispose according to regulation.



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**6.4 Reference to other sections**

Safe handling: see section 7  
Personal protection equipment: see section 8

**SECTION 7: Handling and storage**

**7.1 Precautions for safe handling**

**Protective measures**

Avoid:

generation/formation of aerosols

Do not inhale gases/vapours/aerosols.

Use only in well-ventilated areas.

If local exhaust ventilation is not possible or not sufficient, the entire working area should be ventilated by technical means.

Take the usual precautions when handling with chemicals.

Avoid contact with eyes and skin.

No special fire protection measures are necessary.

**Advices on general occupational hygiene**

Make available sufficient washing facilities

Keep away from food and drink.

**7.2 Conditions for safe storage, including any incompatibilities**

**Requirements for storage rooms and vessels**

Keep/Store only in original container.

Keep container tightly closed.

**Materials to avoid**

Do not store together with:

Acid

alkali

**Further information on storage conditions**

Keep in a cool, well-ventilated place.

Keep locked up and out of reach of children.

Protect from heat and direct solar radiation.

Do not keep at temperatures below 5°C.

Storage time: 3 years.

**7.3 Specific end use(s)**

**Recommendation**

no further

**\* SECTION 8: Exposure controls/personal protection**

**\* 8.1 Control parameters**

**\* Occupational exposure limit values**

CAS No	EC No	Substance name	occupational exposure limit value
107-98-2	203-539-1	1-Methoxypropanol-2	100 [ml/m <sup>3</sup> (ppm)] 375 [mg/m <sup>3</sup> ] Short-term(ml/m <sup>3</sup> ) 150 Short-term(mg/m <sup>3</sup> ) 568 skin resorptive 2000/39/EC
107-98-2	203-539-1	1-Methoxypropan-2-ol	100 [ml/m <sup>3</sup> (ppm)] 375 [mg/m <sup>3</sup> ] Short-term(ml/m <sup>3</sup> ) 150 (1) Short-term(mg/m <sup>3</sup> ) 568 (1) (1) 15 minutes reference period (IE)



# Safety Data Sheet according to Regulation (EC) No 1907/2006 (REACH)

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CAS No	EC No	Substance name	occupational exposure limit value
107-98-2	203-539-1	1-Methoxypropan-2-ol	100 [ml/m <sup>3</sup> (ppm)] 375 [mg/m <sup>3</sup> ] Short-term(ml/m <sup>3</sup> ) 150 Short-term(mg/m <sup>3</sup> ) 560 (UK)
7664-41-7	231-635-3	ammonia	20 [ml/m <sup>3</sup> (ppm)] 14 [mg/m <sup>3</sup> ] Short-term(ml/m <sup>3</sup> ) 50 Short-term(mg/m <sup>3</sup> ) 36 EU

### DNEL worker

CAS No	Substance name	DNEL value	DNEL type	Remark
107-98-2	1-methoxy-2-propanol	183 mg/kg bw/day	long-term dermal (systemic)	
107-98-2	1-methoxy-2-propanol	369 mg/m <sup>3</sup>	long-term inhalative (systemic)	
1336-21-6	ammonia ...%	6.8 mg/kg	long-term dermal (systemic)	Assessment factor 10
1336-21-6	ammonia ...%	14 mg/m <sup>3</sup>	long-term inhalative (local)	
1336-21-6	ammonia ...%	47.6 mg/m <sup>3</sup>	long-term inhalative (systemic)	Assessment factor 10
15763-76-5	sodium cumenesulphonate	191 mg/kg bw/day	long-term dermal (systemic)	Assessment factor 100
15763-76-5	sodium cumenesulphonate	37.4 mg/m <sup>3</sup>	long-term inhalative (systemic)	Assessment factor 25
164524-02-1	potassium cumenesulphonate	191 mg/kg bw/day	long-term dermal (systemic)	Assessment factor 100
164524-02-1	potassium cumenesulphonate	37.4 mg/m <sup>3</sup>	long-term inhalative (systemic)	Assessment factor 25

### PNEC

CAS No	Substance name	PNEC Value	PNEC type	Remark
107-98-2	1-methoxy-2-propanol	10 mg/L	aquatic, freshwater	Assessment factor 100
107-98-2	1-methoxy-2-propanol	100 mg/L	sewage treatment plant (STP)	Assessment factor 10
1336-21-6	ammonia ...%	0.001 mg/L	aquatic, freshwater	Assessment factor 20
15763-76-5	sodium cumenesulphonate	0.1 mg/L	aquatic, freshwater	Assessment factor 1000
15763-76-5	sodium cumenesulphonate	100 mg/L	sewage treatment plant (STP)	Assessment factor 10
164524-02-1	potassium cumenesulphonate	0.1 mg/L	sediment, freshwater	Assessment factor 1000
164524-02-1	potassium cumenesulphonate	100 µg/kg	sewage treatment plant (STP)	Assessment factor 10

## 8.2 Exposure controls

### Appropriate engineering controls

#### Technical measures to prevent exposure

Technical exhaustion if there is a long-term exposition

### Personal protection equipment

#### Eye/face protection

tightly fitting goggles

#### Hand protection

Gloves (alkali- and solvent-resistant)

Glove material specification [make/type, thickness, permeation time/life]: Butyl, 0,5mm, >=8h.



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**Respiratory protection**

Respiratory protection necessary at:  
aerosol or mist formation  
high concentrations  
Suitable respiratory protection apparatus:  
Multi-purpose filter ABEK/P3

**Environmental exposure controls**

**Technical measures to prevent exposure**

Avoid penetration into the subsoil/soil.  
Do not discharge into surface waters.  
Neutralization is necessary before a waste water is discharged into sewage treatment plants.

**SECTION 9: Physical and chemical properties**

**9.1 Information on basic physical and chemical properties**

**Physical state**

liquid

**Colour**

light red

**Odour**

like:  
Ammonia

**Safety relevant basis data**

	Value	Method	Source, Remark
Odour threshold:			1-methoxy-2-propanol: 38 - 360 mg/m <sup>3</sup> (10 - 96 ppm). ammonia: 5ppm (3.5mg/m <sup>3</sup> ).
Melting point/freezing point	solidifying range ≤ -5 °C		
Boiling point or initial boiling point and boiling range	≥ 100 °C		
flammability	solid		not applicable
flammability	gaseous		not applicable
Lower and upper explosion limit	Upper explosion limit 13.7 Vol-%		Value of 1-methoxy-2-propanol.
Lower and upper explosion limit	Lower explosion limit 1.5 Vol-%		Value of 1-methoxy-2-propanol.
Flash point	> 65 °C	DIN 51755 part 1	Does not maintain the combustion.
Auto-ignition temperature	270 °C		Value of 1-methoxy-2-propanol.
Decomposition temperature			not determined
pH	in delivery state 10.6 (20°C)		
Viscosity	dynamic 14.4 mPa*s (20°C)		
Solubility(ies)	Water solubility		miscible
Partition coefficient n-octanol/water (log value)	-0.437		Value of 1-methoxy-2-propanol.
Vapour pressure	approx. 81 hPa (20°C)		



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	Value	Method	Source, Remark
Density and/or relative density	1.008 g/cm <sup>3</sup> (20°C)		
Relative vapour density	3.11		Value of 1-methoxy-2-propanol.
particle characteristics			not applicable (liquid).

## 9.2 Other information

### Information with regard to physical hazard classes

#### Explosives

**Assessment/classification**

The mixture does not contain any explosive substances (CLP I 2.1.4.3 a).

CLP I 2.1.4.3 a: The classification procedure needs not to be applied because there are no chemical groups present in the molecule which are associated with explosive properties.

#### flammable gases

**Assessment/classification**

not applicable (liquid).

#### Aerosols

**Assessment/classification**

not relevant - no aerosol.

The classification criteria for this hazard class are not met by definition.

#### Oxidising gas

**Assessment/classification**

not applicable (liquid).

#### Gases under pressure

**Assessment/classification**

not applicable (liquid, no dissolved gas under pressure).

#### flammable liquids

**Assessment/classification**

Flash point > 35 °C, does not maintain the combustion.

The mixture is not classified as flammable liquids.

#### flammable solids

**Assessment/classification**

not applicable (liquid).

#### Self-reactive substances and mixtures

**Assessment/classification**

The mixture does not contain any self-reactive substances (CLP I 2.8.4.2 a).

CLP I 2.8.4.2 a: There are no chemical groups present in the molecule associated with explosive or self reactive properties.

#### Pyrophoric liquids

**Assessment/classification**

The mixture does not contain any pyrophoric substances - not spontaneously flammable (CLP I 2.9.4.1).

CLP I 2.9.4.1: The classification procedure for pyrophoric liquids need not be applied when experience in manufacture or handling shows that the substance or mixture does not ignite spontaneously on coming into contact with air at normal temperatures (i.e. the substance is known to be stable at room temperature for prolonged periods of time (days)).

#### Pyrophoric solids

**Assessment/classification**

not applicable (liquid).



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**self-heating substances and mixtures**

**Assessment/classification**

The mixture does not contain any self-heating substances.

**Substances or mixtures which, in contact with water, emit flammable gases**

**Assessment/classification**

not relevant - in contact with water releases no flammable gases (CLP I 2.12.4.1).

CLP I 2.12.4.1: The classification procedure for this class need not be applied if: (a) the chemical structure of the substance or mixture does not contain metals or metalloids; or (b) experience in production or handling shows that the substance or mixture does not react with water, e.g. the substance is manufactured with water or washed with water; or (c) the substance or mixture is known to be soluble in water to form a stable mixture.

**Oxidising liquids**

**Assessment/classification**

The mixture does not contain any oxidising substances.

**Oxidising solids**

**Assessment/classification**

not applicable (liquid).

**Organic peroxides**

**Assessment/classification**

The mixture does not contain any organic peroxides.

**Corrosive to metals**

**Safety characteristics**

	Value	Method, Result	Source, Remark
Corrosion rate (mm aluminium/year)	< 6.25 mm/a	Expert judgement and weight of evidence determination.	
Corrosion rate (mm steel/year)	< 6.25 mm/a	Expert judgement and weight of evidence determination.	

**Assessment/classification**

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

**Desensitised explosives**

**Assessment/classification**

The mixture does not contain any desensitised explosive substances.

**Other safety characteristics**

	Value	Method	Source, Remark
Evaporation rate			Water: 0.36 (ASTM D3539). 1-methoxy-2-propanol: 0.75 (ASTM D3539).
Solvent content	< 25 weight-%		
Explosive properties			none
Oxidising properties			none

**Other information**

No further relevant informations available.



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**SECTION 10: Stability and reactivity**

**10.1 Reactivity**

Exothermic reaction with:  
Acid  
No further hazardous reactions known if used as directed.

**10.2 Chemical stability**

No decomposition if used as directed.

**10.3 Possibility of hazardous reactions**

Reactions with strong oxidising agents.  
Reactions with strong acids and alkalies.  
Evolution of ammonia under influence of alkalies.

**10.4 Conditions to avoid**

Heat and direct solar radiation.

**10.5 Incompatible materials**

Reactions with strong acids.  
Oxidising agent  
Alkali (lye)

**10.6 Hazardous decomposition products**

Ammonia

**SECTION 11: Toxicological information**

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

**Acute toxicity**

**Animal data**

	Effective dose	Method,Evaluation	Source, Remark
Acute oral toxicity	> 5000 mg/kg CAS No1336-21-6 ammonia ...% LD50: 350 mg/kg Species Rat	ATE: Acute Toxicity Estimate	
Acute dermal toxicity	> 5000 mg/kg	ATE: Acute Toxicity Estimate	
Acute inhalation toxicity	Acute inhalation toxicity (vapour) > 50 mg/L CAS No107-98-2 1-methoxy-2-propanol Acute inhalation toxicity (vapour) 25.5 mg/L Species Rat Exposure time 4 h	ATE: Acute Toxicity Estimate OECD 403	LCLo
	CAS No1336-21-6 ammonia ...% Acute inhalation toxicity (vapour) LC50: 11.59 mg/L Species Rat Exposure time 1 h		

**Assessment/classification**

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



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**Skin corrosion/irritation**

**Animal data**

Result / Evaluation	Method	Source, Remark
Irritant.	Calculation method.	

**Serious eye damage/irritation**

**Animal data**

Result / Evaluation	Method	Source, Remark
Irritant.	Calculation method.	

**Sensitisation to the respiratory tract**

**Assessment/classification**

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

**Skin sensitisation**

**Animal data**

Result / Evaluation	Dose / Concentration	Method	Source, Remark
not sensitising.		Calculation method.	

**Germ cell mutagenicity**

**Assessment/classification**

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

**Carcinogenicity**

**Assessment/classification**

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

**Reproductive toxicity**

**Assessment/classification**

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

**Overall Assessment on CMR properties**

The mixture is not classified as mutagen / not classified as carcinogen / not classified as reproductive toxicant.

**STOT-single exposure**

**STOT SE 1 and 2**

**Assessment/classification**

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

**STOT SE 3**

**Irritation to respiratory tract**

**Other information**

May cause respiratory irritation.

**Assessment/classification**

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

**Narcotic effects**

**Assessment/classification**

Narcotic effect: STOT SE 3 H336: May cause drowsiness or dizziness.

**STOT-repeated exposure**

**Assessment/classification**

The mixture is not classified as specific target organ toxicant (repeated exposure).  
Based on available data, the classification criteria are not met.



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**Aspiration hazard**

**Assessment/classification**

The mixture is not classified as aspiration hazardous.  
Based on available data, the classification criteria are not met.

**11.2 Information on other hazards**

**Information on other hazards**

	Effective dose	Method,Evaluation	Source, Remark
Endocrine disrupting properties			This product does not contain a substance that has endocrine disrupting properties with respect to humans as no components meets the criteria.

**Other information**

Has degreasing effect on the skin.

**SECTION 12: Ecological information**

**12.1 Toxicity**

**Aquatic toxicity**

	Effective dose	Method,Evaluation	Source, Remark
Acute (short-term) fish toxicity	LC50: 5.2 mg/L	calculated.	After neutralisation, reduction in toxic effects is observed.
	CAS No1336-21-6 ammonia ...% LC50: 0.16- 1.1 mg/L Species Oncorhynchus mykiss (Rainbow trout) Test duration 96 h		
	CAS No68604-33-1 Fatty acids, C14-18 and C16-18-unsatd., ammonium salts LC50: $\geq$ 21 mg/L Test duration 96 h		
Chronic (long-term) fish toxicity	CAS No1336-21-6 ammonia ...% NOEC 0.022 mg/L Species Oncorhynchus mykiss (Rainbow trout) Test duration 73 d		
Acute (short-term) toxicity to crustacea	EC50 18.1 mg/L	calculated.	
	CAS No1336-21-6 ammonia ...% EC50 2.94 mg/L Species Daphnia magna (Big water flea) Test duration 48 h		
	CAS No68604-33-1 Fatty acids, C14-18 and C16-18-unsatd., ammonium salts EC50 $\geq$ 4.2 mg/L		
Chronic (long-term) toxicity to aquatic invertebrate	CAS No1336-21-6 ammonia ...% NOEC 0.79 mg/L Species Daphnia magna (Big water flea) Test duration 96 h		



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	Effective dose	Method, Evaluation	Source, Remark
Acute (short-term) toxicity to algae and cyanobacteria	CAS No68604-33-1 Fatty acids, C14-18 and C16-18-unsatd., ammonium salts NOEC 0.11 mg/L Test duration 21 d	calculated.	
	EC50 161 mg/L		
Chronic (long-term) toxicity to aquatic algae and cyanobacteria	CAS No1336-21-6 ammonia ...% EC50 330 mg/L Species Chlorella vulgaris Test duration 5 d		
	CAS No68604-33-1 Fatty acids, C14-18 and C16-18-unsatd., ammonium salts EC50 > 44 mg/L Test duration 72 h		
Toxicity to other aquatic plants/organisms	CAS No68604-33-1 Fatty acids, C14-18 and C16-18-unsatd., ammonium salts NOEC: 20 mg/L Test duration 72 h		
Toxicity to microorganisms	not determined		

**Assessment/classification**

Toxic to aquatic life.  
 Harmful to aquatic life with long lasting effects.

**12.2 Persistence and degradability**

	Value	Method	Source, Remark
Biodegradation	Degradation rate > 90 %	calculated.	DOC reduction Readily biodegradable (according to OECD criteria).
Biodegradation	Degradation rate 100 %	Neutralization, pH-measurement	Alkaline properties can be eliminated up to 100% by neutralization.
Biodegradation	Degradation rate 96 % Test duration 28 d	OECD 301E/ EEC 92/69/V, C.4-B	CAS No107-98-2 1-methoxy-2-propanol
Biodegradation			CAS No1336-21-6 ammonia ...%  The methods for determining the biological degradability are not applicable to inorganic substances.
Biodegradation	Degradation rate 93 % Test duration 28 d	OECD 301B/ ISO 9439/ EEC 92/69/V, C.4-C	CAS No68604-33-1 Fatty acids, C14-18 and C16-18-unsatd., ammonium salts
Biodegradation	Degradation rate 99 % Test duration 28 d	OECD 301B/ ISO 9439/ EEC 92/69/V, C.4-C	CAS No15763-76-5 sodium cumenesulphonate
Biodegradation	Degradation rate > 60 % Test duration 28 d	OECD 301B/ ISO 9439/ EEC 92/69/V, C.4-C	CAS No164524-02-1 potassium cumenesulphonate



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**12.3 Bioaccumulative potential**

**Assessment/classification**

Fatty acids, C14-18 and C16-18-unsatd., ammonium salts: Because of the n-octanol/water partition coefficient accumulation in organisms is possible (log Pow >3).

1-methoxy-2-propanol: Accumulation in organisms is not expected.

sodium cumenesulphonate: Bioaccumulation is improbable.

potassium cumenesulphonate: Bioaccumulation is improbable.

ammonia: Accumulation in organisms is not expected.

**12.4 Mobility in soil**

**Assessment/classification**

Fatty acids, C14-18 and C16-18-unsatd., ammonium salts: strong adsorption on soil, immobile.

1-methoxy-2-propanol: Dissolves in water. Highly mobile in soil.

sodium cumenesulphonate: Adsorption on soil is not expected.

potassium cumenesulphonate: Adsorption on soil is not expected.

ammonia ...%: The ammonium ion will be adsorbed by the soil; very soluble in water.

**12.5 Results of PBT and vPvB assessment**

The product does not contain any PBT-/vPvB-substances according to the recipe.

**12.6 Endocrine disrupting properties**

	Effective dose	Method,Evaluation	Source, Remark
Endocrine disrupting properties			This product does not contain a substance that has endocrine disrupting properties with respect to non-target organisms as no components meets the criteria.

**12.7 Other adverse effects**

	Value	Method	Source, Remark
Ozone depletion potential (ODP):			Based on available data, the classification criteria are not met.

**Additional ecotoxicological information**

	Value	Method	Source, Remark
Chemical oxygen demand (COD) AOX	approx. 1.2 gO2/g	calculated.	The product does not contain any organically bound halogens according to the recipe.

**Additional information**

The surfactants in our product meet the criteria for biodegradation as laid down in Annex III of the Regulation (EC) No 648/2004 on detergents.

Acute aquatic environmental hazards: Aquatic Acute 2 H401: Toxic to aquatic life. After neutralization: Aquatic Acute 3 H402: Harmful to aquatic life.

Chronic aquatic environmental hazards: Aquatic Chronic 3 H412: Harmful to aquatic life with long lasting effects. After neutralization: not classified as chronic hazardous to the aquatic environment.

Do not allow uncontrolled discharge of product into the environment.

No further relevant informations available.

**\* SECTION 13: Disposal considerations**

**\* 13.1 Waste treatment methods**



Safety Data Sheet according to Regulation (EC) No 1907/2006 (REACH)

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**Waste codes/waste designations according to EWC/AVV**

Waste code product Waste name  
200129 \* detergents containing hazardous substances

Waste code packaging Waste name  
150110 \* packaging containing residues of or contaminated by hazardous substances

\* **Appropriate disposal / Product**  
Do not dispose with household waste. Do not discharge into the drains.  
Dispose of waste according to applicable legislation.

**Appropriate disposal / Package**  
Non-contaminated packages may be recycled.

\* **Other disposal recommendations**  
Application solution / cleaning solution :  
Suitable for neutralization are acetic acid (60%, liquid) or citric acid (solid powder, crystallized) if a stainless steel bath is used.  
Product is allowed to discharge into sewage treatment plants, but in accordance with official regulations.

**SECTION 14: Transport information**

	Land transport (ADR/RID)	Sea transport (IMDG)	Air transport (ICAO-TI / IATA-DGR)
14.1 UN number or ID number	-	-	-
14.2 UN proper shipping name	-	-	-
14.3 Transport hazard class(es)	-	-	-
14.4 Packing group	-	-	-
14.5 Environmental hazards	-	-	-

14.6 Special precautions for user  
none

14.7 Maritime transport in bulk according to IMO instruments  
not relevant

**Land transport (ADR/RID)**

**Remark**  
Not classified for this transport carrier.

**Sea transport (IMDG)**

**Remark**  
No hazardous material as defined by the prescriptions.

**Air transport (ICAO-TI / IATA-DGR)**

**Remark**  
No hazardous material as defined by the prescriptions.

\* **SECTION 15: Regulatory information**

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

\* **EU legislation**

**Authorisations**  
not relevant



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- \* **Restrictions on use**  
Regulation (EC) No 1907/2006 (REACH), Annex XVII No 3 + 40 - not relevant if used as directed.  
Regulation (EC) No 1907/2006 (REACH), Annex XVII No 75 - not relevant if used as directed.

**Restrictions of occupation**  
Observe restrictions to employment for juvenils according to the 'juvenile work protection guideline' (94/33/EC).

\* **Other regulations (EU)**

- \* **To follow:**  
Regulation (EC) No. 648/2004 (Detergents regulation)  
Directive 2012/18/EU, Annex I: not mentioned.

**Directive 2010/75/EU on industrial emissions [Industrial Emissions Directive] VOC**  
VOC content, delivery state 23 %

**15.2 Chemical Safety Assessment**

**National regulations**

For this mixture a chemical safety assessment were not carried out.

\* **SECTION 16: Other information**

- \* **Abbreviations and acronyms**  
For abbreviations and acronyms, see: ECHA Guidance on information requirements and chemical safety assessment, chapter R.20 (Table of terms and abbreviations).  
ADR: European Agreement concerning the International Carriage of Dangerous Goods by Road  
ASTM: American Society for Testing and Materials  
ATE: Acute Toxicity Estimate  
AVV: Waste Shipment Ordinance (DE)  
DGR: Dangerous Goods Regulations (IATA)  
DIN: German Institute for Standardization / German Industrial Standard  
DNEL: derived no-effect level  
DOC: Dissolved Organic Carbon  
IATA: International Air Transport Association  
ICAO: International Civil Aviation Organization  
IMDG: International Maritime Dangerous Goods  
IMO: International Maritime Organization  
JArbSchG: Youth Labor Protection Act (DE)  
LDL0: Lowest Lethal (fatal) Dose  
OECD: Organisation for Economic Cooperation and Development  
PBT: persistent and bioaccumulative and toxic  
PNEC: Predicted No Effect Concentration  
RID: Dangerous goods regulations for transport by rail  
SCL: Specific concentration limit  
TI: Technical Instruction  
TRGS: Technical Rules for Hazardous Substances  
VOC: Volatile organic compounds  
vPvB: very persistent, very bioaccumulative  
Flam. Liq. 3: Flammable Liquids, Category 3  
Met. Corr. 1: Corrosive to metals, Category 1  
Acute Tox. 4, H302: Acute Toxicity (oral), Category 4  
Acute Tox. 4, H332: Acute Toxicity (inhalation), Category 4  
Skin Corr. 1B: Skin corrosion, Sub-category 1B  
Skin Irrit. 2: Skin irritation, Category 2  
Eye Dam. 1: Serious eye damage, Category 1  
Eye Irrit. 2: Eye irritation, Category 2  
STOT SE 3, H335: Specific target organ toxicity (single exposure), Category 3  
STOT SE 3, H336: Specific target organ toxicity (single exposure), Category 3 (narcotic effects)  
Aquatic Acute 1: Short-term (acute) aquatic hazard, Category 1  
Aquatic Chronic 2: Long-term (chronic) aquatic hazard, Category 2  
Aquatic Chronic 3: Long-term (chronic) aquatic hazard, Category 3

**Key literature references and sources for data**

Own measurements.  
European Chemicals Agency, <http://echa.europa.eu/>.  
Informations from our suppliers.



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**Additional information**

National and local regulations concerning chemicals shall be observed.  
These data are given according to our actual knowledge about this product. This data sheet does not correspond to an assurance by virtue of a contract for properties of the product.

**Relevant H- and EUH-phrases (Number and full text)**

H226 Flammable liquid and vapour.  
H290 May be corrosive to metals.  
H302 Harmful if swallowed.  
H314 Causes severe skin burns and eye damage.  
H318 Causes serious eye damage.  
H319 Causes serious eye irritation.  
H332 Harmful if inhaled.  
H335 May cause respiratory irritation.  
H336 May cause drowsiness or dizziness.  
H400 Very toxic to aquatic life.  
H411 Toxic to aquatic life with long lasting effects.  
H412 Harmful to aquatic life with long lasting effects.

**Indication of changes**

\* Data changed compared with the previous version