



elma tec clean S2

Print date 28.08.2023
Revision date 28.08.2023
Version 1.9 (en)
replaces version of 22.07.2022 (1.8)

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

1.1 Product identifier

Trade name/designation elma tec clean S2
Unique Formula Identifier UFI: T850-10V9-N00K-6GQT
Product category PC-CLN-OTH Other cleaning, care and maintenance products (excludes biocidal products)

Hazard components

phosphoric acid ...%, isotridecanol, ethoxylated

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

Sector of uses [SU]

SU22 Professional uses: Public domain (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)

Product Categories [PC]

PC35 Washing and cleaning products

Use of the substance/mixture

Cleaning concentrate for laboratory and workshop for decalcification and rust-removal.

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-Informations-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
Met. Corr. 1, H290	Expert judgement and weight of evidence determination.
Skin Corr. 1B, H314	Calculation method.
Eye Dam. 1, H318	Calculation method.



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Hazard statements for physical hazards

H290 May be corrosive to metals.

Hazard statements for health hazards

H314 Causes severe skin burns and eye damage.

H318 Causes serious eye damage.

2.2 Label elements

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

Hazard components

phosphoric acid ...%, isotridecanol, ethoxylated

Hazard pictograms



GHS05

Signal word

Danger

Hazard statements

H290 May be corrosive to metals.

H314 Causes severe skin burns and eye damage.

Precautionary statements

P280 Wear protective gloves/protective clothing and eye protection/face protection.

P234 Keep only in original packaging.

P301 + P330 + P331 IF SWALLOWED: rinse mouth. Do NOT induce vomiting.

P301 + P310 IF SWALLOWED: Immediately call a POISON CENTER/doctor.

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

P310 Immediately call a doctor.

P303 + P361 + P353 IF ON SKIN (or hair): Take off immediately all contaminated clothing. Rinse skin with water or shower.

P332 + P313 If skin irritation occurs: Get medical advice/attention.

Other labelling

Labelling for contents according to regulation (EC) No. 648/2004:

< 5% non-ionic surfactants

≥ 30% phosphates (phosphoric acid)

2.3 Other hazards

Adverse human health effects and symptoms

Acute Tox. 5 (oral + dermal) H303 + H313: May be harmful if swallowed or in contact with skin.

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.

SECTION 3: Composition / information on ingredients

3.1 Substances

not applicable



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3.2 Mixtures

Hazardous ingredients

CAS No.	EC No.	Substance name	Concentration	Classification according to Regulation (EC) No 1272/2008 [CLP]	SCL/ M/ ATE
7664-38-2	231-633-2	phosphoric acid ...%	50 - 62 weight-%	Met. Corr. 1; H290 Acute Tox. 4; H302 Skin Corr. 1B; H314 Eye Dam. 1; H318	Skin Corr. 1B; H314: C>=25% Eye Dam. 1; H318: C>=25% Skin Irrit. 2; H315: 10%<=C<25% Eye Irrit. 2; H319: 10%<=C<25%
69011-36-5	931-138-8	isotridecanol, ethoxylated	1 - 4.7 weight-%	Acute Tox. 4; H302 Eye Dam. 1; H318	Eye Dam. 1; H318: C>10% Eye Irrit. 2; H319: 1%<C<=10% ATE(oral): 500 mg/kg

REACH No.	Substance name
01-2119485924-24	phosphoric acid ...%
Not relevant (polymer).	isotridecanol, ethoxylated

Additional information

Aqueous acid mixture from non-ionic surfactants and phosphoric acid.

Remark

Strong acid cleaning concentrate.

SECTION 4: First aid measures

4.1 Description of first aid measures

General information

Remove contaminated, saturated clothing immediately.
Symptoms may develop several hours following exposure; medical observation therefore necessary for at least 48 hours.

Following inhalation

In case of inhaling spray mist, consult a physician.

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.
Call a physician immediately.
If swallowed seek medical advice immediately and show the doctor packing or label.
Rinse mouth immediately and drink plenty of water.



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4.2 Most important symptoms and effects, both acute and delayed

Effects

Risk of stomach perforation.

4.3 Indication of any immediate medical attention and special treatment needed

Notes for the doctor

Keep under medical supervision for at least 48 hours.

SECTION 5: Firefighting measures

5.1 Extinguishing media

Suitable extinguishing media

Limestone powder
Foam
Extinguishing powder
Dry sand
Water spray jet

Unsuitable extinguishing media

none

5.2 Special hazards arising from the substance or mixture

Hazardous combustion products

In case of fire formation of dangerous gases possible.

In the event of fire the following can be released:

Carbon monoxide
Phosphorus oxides

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

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

For emergency responders

Personal protection equipment
Use personal protection.
Wear acid-resistant boots.
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.
Do not allow to enter into soil/subsoil.

6.3 Methods and material for containment and cleaning up

For containment

Take up with absorbent material (e.g. acid binder).
Flush away residues with water.
After taking up the material dispose according to regulation.



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For cleaning up

Suitable material for diluting or neutralizing:

Soda

Lime

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

Do not inhale aerosols

Handle and open container with care.

Avoid contact with eyes and skin.

Use only acid-proof equipment.

When diluting/dissolving, always have the water ready first, then slowly stir in the product.

Keep the packing dry and well sealed to prevent contamination and absorption of humidity.

The product is not combustible.

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

Suitable floor material:

Acid-resistant

Keep only in unopened original container.

Keep container tightly closed.

Handle and open container with care.

Storage class

8B Non-combustible corrosive substances

Materials to avoid

Do not store together with:

alkali

Further information on storage conditions

Keep locked up and out of reach of children.

Protect from heat and direct solar radiation.

Do not keep at temperatures below -5°C.

Do not keep at temperatures above 30°C.

Storage time: 4 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
7664-38-2	231-633-2	Orthophosphoric acid	1 [mg/m ³] Short-term(mg/m ³) 2 2000/39/EC



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
7664-38-2	231-633-2	Orthophosphoric acid	1 [mg/m ³] Short-term(mg/m ³) 2 (1) (1) 15 minutes reference period (IE)
7664-38-2	231-633-2	Orthophosphoric acid	1 [mg/m ³] Short-term(mg/m ³) 2 (UK)
7664-38-2	231-633-2	phosphoric acid	1 [mg/m ³] Short-term(mg/m ³) 2 EU

* **DNEL worker**

CAS No.	Substance name	DNEL value	DNEL type	Remark
7664-38-2	phosphoric acid ...%	1 mg/m ³	long-term inhalative (local)	

* **8.2 Exposure controls**

Personal protection equipment

Eye/face protection
tightly fitting goggles

Hand protection

Gloves (acid-resistant)

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

Glove material specification [make/type, thickness, permeation time/life]: NBR, 0,35mm, >=8h.

Glove material specification [make/type, thickness, permeation time/life]: FKM, 0,4mm, >=8h.

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

Body protection:

Required properties:
acid-resistant

Environmental exposure controls

Technical measures to prevent exposure

Neutralization is normally necessary before a waste water is discharged into sewage treatment plants.

Avoid penetration into the subsoil/soil.

Do not discharge into surface waters.

SECTION 9: Physical and chemical properties

9.1 Information on basic physical and chemical properties

Physical state

liquid

Colour

colourless

Odour

characteristic

Safety relevant basis data

	Value	Method	Source, Remark
Odour threshold:			not determined
Melting point/freezing point	solidifying range < -5 °C		
Boiling point or initial boiling point and boiling range	> 100 °C		
flammability	solid		not applicable



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	Value	Method	Source, Remark
flammability	gaseous		not applicable
Lower and upper explosion limit	Upper explosion limit		not relevant
Lower and upper explosion limit	Lower explosion limit		not relevant
Flash point			No flash point up to 100 °C.
Auto-ignition temperature	approx. 360 °C		Value of isotridecanol, ethoxylated.
Decomposition temperature	≥ 100 °C		
pH	in delivery state < 1 (20°C)		
Viscosity	dynamic 27.4 mPa*s (20°C)		
Solubility(ies)	Water solubility		miscible
Partition coefficient n-octanol/water (log value)	-0.77		Value of phosphoric acid.
Vapour pressure	10- 15 hPa (20°C)		
Density and/or relative density	1.45 g/cm ³ (20°C)		
Relative vapour density	3.37		Value of phosphoric acid.
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).

flammable liquids

Assessment/classification

not flammable, not combustible (No flash point below 100°C).



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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).

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
The mixture is classified as corrosive to metals (Met. Corr. 1 H290).



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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).
Solvent content	0 %		
Explosive properties			none
Oxidising properties			none

Other information

No further relevant informations available.

SECTION 10: Stability and reactivity

10.1 Reactivity

Exothermic reaction with alkalis.
Corrosive to metals.
No further hazardous reactions known if used as directed.

10.2 Chemical stability

Stable at ambient temperature.

10.3 Possibility of hazardous reactions

Reactions with alkalis.
Reactions with light metals, with evolution of hydrogen.

10.4 Conditions to avoid

Heat and direct solar radiation.

10.5 Incompatible materials

Alkali (lye)

10.6 Hazardous decomposition products

No decomposition if used as directed.

*** 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	2012 mg/kg	ATE: Acute Toxicity Estimate	The acute oral toxicity is corresponding to GHS-category 5.
	CAS No.7664-38-2 phosphoric acid ...% LD50: 1530 mg/kg Species Rat		
	CAS No.69011-36-5 isotridecanol, ethoxylated 500 mg/kg	ATE: Acute Toxicity Estimate	



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

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	Effective dose	Method, Evaluation	Source, Remark
Acute dermal toxicity	4086 mg/kg	ATE: Acute Toxicity Estimate	The acute dermal toxicity is corresponding to GHS-category 5.
Acute inhalation toxicity	CAS No.7664-38-2 phosphoric acid ...% LD50: 2740 mg/kg Species Rabbit Acute inhalation toxicity (vapour)		not relevant

Skin corrosion/irritation

Animal data

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

Serious eye damage/irritation

Animal data

Result / Evaluation	Method	Source, Remark
Corrosive	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

Other information

The mixture is not classified as specific target organ toxicant (single exposure).

Assessment/classification

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

STOT SE 3



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Irritation to respiratory tract

Assessment/classification

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

Narcotic effects

Assessment/classification

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

STOT-repeated exposure

Other information

The mixture is not classified as specific target organ toxicant (repeated exposure).

Assessment/classification

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

Aspiration hazard

Remark

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

11.2 Information on other hazards

Symptoms related to the physical, chemical and toxicological characteristics

	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

If swallowed danger of perforation of the esophagus and the stomach (strong corrosive effects).
Inhalation of spray may cause strong respiratory irritation and may cause damage to mucous membranes/lung.
Causes burns.

SECTION 12: Ecological information

12.1 Toxicity

Aquatic toxicity

	Effective dose	Method,Evaluation	Source, Remark
Acute (short-term) fish toxicity	LC50: 3.9 mg/L	calculated.	After neutralisation, reduction in toxic effects is observed.
Chronic (long-term) fish toxicity	not determined		
Acute (short-term) toxicity to crustacea	EC50 16 mg/L	calculated.	
Chronic (long-term) toxicity to aquatic invertebrate	not determined		
Acute (short-term) toxicity to algae and cyanobacteria	EC50 17.8 mg/L	calculated.	
Chronic (long-term) toxicity to aquatic algae and cyanobacteria	not determined		
Toxicity to other aquatic plants/organisms	not determined		
Toxicity to microorganisms	not determined		



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Assessment/classification

Toxic to aquatic life.

12.2 Persistence and degradability

	Value	Method	Source, Remark
Biodegradation	Degradation rate > 90 %		DOC reduction Readily biodegradable (according to OECD criteria).
Biodegradation	Degradation rate 100 %	Neutralization, pH-measurement	Acid properties can be eliminated up to 100% by neutralization.
Biodegradation			CAS No.7664-38-2 phosphoric acid ...%
			Inorganic product which is not eliminable from water through biological cleaning processes.
Biodegradation	Degradation rate > 60 % Test duration 28 d	OECD 301B/ ISO 9439/ EEC 92/69/V, C.4-C	CAS No.69011-36-5 isotridecanol, ethoxylated

12.3 Bioaccumulative potential

Assessment/classification

isotridecanol, ethoxylated: Bioaccumulation is improbable.
phosphoric acid: Accumulation in organisms is not expected.

12.4 Mobility in soil

Assessment/classification

isotridecanol, ethoxylated: Koc: >5000, immobile, strong adsorption on soil.
phosphoric acid: not available.

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. 98 mgO ₂ /g	DIN ISO 15705	The product does not contain any organically bound halogens according to the recipe.



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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.
The mixture is 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

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.
Neutralize with alkalis or lime.
Product is allowed to discharge into sewage treatment plants, but in accordance with official regulations.

Appropriate disposal / Package

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)	Sea transport (IMDG)	Air transport (ICAO-TI / IATA-DGR)
14.1 UN number or ID number	UN 1805	UN 1805	UN 1805
14.2 UN proper shipping name	PHOSPHORIC ACID SOLUTION	PHOSPHORIC ACID SOLUTION	Phosphoric acid, solution
14.3 Transport hazard class(es)	8	8	8
14.4 Packing group	III	III	III
14.5 Environmental hazards	No	No	No

14.6 Special precautions for user

none

14.7 Maritime transport in bulk according to IMO instruments

not relevant

Land transport (ADR/RID)

UN number or ID number	UN 1805
UN proper shipping name	PHOSPHORIC ACID SOLUTION
Transport hazard class(es)	8
Hazard label(s)	8
Classification code	C1
Packing group	III
Environmental hazards	No
Limited quantity (LQ)	5 L



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Special provisions -
Tunnel restriction code E

Sea transport (IMDG)

UN number or ID number UN 1805
UN proper shipping name PHOSPHORIC ACID SOLUTION
Transport hazard class(es) 8
Packing group III
Environmental hazards No
Limited quantity (LQ) 5 L
Marine pollutant No
EmS F-A, S-B

Air transport (ICAO-TI / IATA-DGR)

UN number or ID number UN 1805
UN proper shipping name Phosphoric acid, solution
Transport hazard class(es) 8
Packing group III
Environmental hazards No

*** SECTION 15: Regulatory information**

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

*** EU legislation**

Authorisations
not relevant

*** Restrictions on use**

Regulation (EC) No 1907/2006 (REACH), Annex XVII No 3 - 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 0 %

15.2 Chemical Safety Assessment

National regulations

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



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*** 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

EmS: emergency procedures

IATA: International Air Transport Association

ICAO: International Civil Aviation Organization

IMDG: International Maritime Dangerous Goods

IMO: International Maritime Organization

ISO: International Organization for Standardization

JArbSchG: Youth Labor Protection Act (DE)

OECD: Organisation for Economic Cooperation and Development

PBT: persistent and bioaccumulative and toxic

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

Key literature references and sources for data

Own measurements.

European Chemicals Agency, <http://echa.europa.eu/>.

Informations from our suppliers.

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)

H290 May be corrosive to metals.

H302 Harmful if swallowed.

H314 Causes severe skin burns and eye damage.

H318 Causes serious eye damage.

Indication of changes

* Data changed compared with the previous version