

**Cosmenyl Oxide Yellow R**

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Substance key: 000000297548

Revision Date: 03.06.2022

Version : 3 - 2 / EU

Date of printing : 01.02.2023

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

**1.1. Product identifier**

**Trade name**

Cosmenyl Oxide Yellow R

**Material number:** 227802

**Chemical nature:** C.I. Pigment Yellow 42 in aqueous dispersion containing glycerin.

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

**Relevant identified uses of the substance or mixture**

Industry sector : Personal Care  
Type of use : Colourant preparation

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

**Identification of the company**

Heubach Colorants Germany GmbH  
Brüningstraße 50  
65929 Frankfurt am Main  
Telephone no. : +49 69 305 13619

**Information about the substance/mixture**

Product Stewardship  
e-mail: SDS.PI.Europe@clariant.com

**1.4. Emergency telephone number**

00800-5121 5121 (24 h)

**SECTION 2: Hazards identification**

**2.1 Classification of the substance or mixture**

**Classification (REGULATION (EC) No 1272/2008)**

Skin sensitisation, Category 1 H317: May cause an allergic skin reaction.

**2.2 Label elements**

**Labelling (REGULATION (EC) No 1272/2008)**

Hazard pictograms :



Signal word : Warning

Hazard statements : H317 May cause an allergic skin reaction.

Precautionary statements : **Prevention:**  
P261 Avoid breathing mist or vapours.  
P280 Wear protective gloves.

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**Response:**

P302 + P352 IF ON SKIN: Wash with plenty of water.  
P333 + P313 If skin irritation or rash occurs: Get medical advice/ attention.  
P362 + P364 Take off contaminated clothing and wash it before reuse.

**Disposal:**

P501 Dispose of contents/ container to an approved waste disposal plant.

**Hazardous components which must be listed on the label:**

2-Methylisothiazolin-3-one

**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.

No hazards to be specially mentioned.

**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, C16-18 and C18-unsaturated, ethoxylated	68920-66-1	Eye Irrit. 2; H319 Aquatic Chronic 3; H412	>= 2,5 - < 10
2-Phenoxyethanol	122-99-6 204-589-7 603-098-00-9 01-2119488943-21	Acute Tox. 4; H302 Eye Irrit. 2; H319  Acute toxicity estimate  Acute oral toxicity: 1.394 mg/kg	>= 1 - < 10
2-Methylisothiazolin-3-one	2682-20-4 220-239-6 613-326-00-9 01-2120764690-50	Acute Tox. 3; H301 Acute Tox. 2; H330 Acute Tox. 3; H311 Skin Corr. 1B; H314 Eye Dam. 1; H318	>= 0,0025 - < 0,025

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		Skin Sens. 1A; H317 Aquatic Acute 1; H400 Aquatic Chronic 1; H410 EUH071	
		M-Factor (Acute aquatic toxicity): 10 M-Factor (Chronic aquatic toxicity): 1	
		specific concentration limit Skin Sens. 1A; H317 >= 0,0015 %	

For explanation of abbreviations see section 16.

**SECTION 4: First aid measures**

**4.1 Description of first aid measures**

- General advice : Get medical advice/ attention if you feel unwell.
- If inhaled : Move the victim to fresh air.  
If you feel unwell, seek medical advice (show the label where possible).
- In case of skin contact : Wash off immediately with plenty of water.  
Consult a physician.
- In case of eye contact : In the case of contact with eyes, rinse immediately with plenty of water and seek medical advice.
- If swallowed : If swallowed do not induce vomiting, seek medical advice and show safety datasheet or label

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

- Symptoms : sensitising effects
- Risks : May cause an allergic skin reaction.

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

- Treatment : Treat symptomatically.

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**SECTION 5: Firefighting measures**

**5.1 Extinguishing media**

Suitable extinguishing media : Water spray jet  
Dry powder  
Carbon dioxide (CO<sub>2</sub>)  
Alcohol-resistant foam

Unsuitable extinguishing media : High volume water jet

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

Specific hazards during firefighting : In case of fires, hazardous combustion gases are formed:  
Carbon monoxide (CO)  
Carbon dioxide (CO<sub>2</sub>)

**5.3 Advice for firefighters**

Special protective equipment for firefighters : Self-contained breathing apparatus

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**SECTION 6: Accidental release measures**

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

Personal precautions : Wear suitable protective equipment.  
Do not let the liquid drain into rivers, ponds or sewer systems.

**6.2 Environmental precautions**

Environmental precautions : The product should not be allowed to enter drains, water courses or the soil.

**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).  
Treat recovered material as described in the section "Disposal considerations".

**6.4 Reference to other sections**

Information regarding Safe handling, see chapter 7.

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**SECTION 7: Handling and storage**

**7.1 Precautions for safe handling**

Advice on safe handling : Avoid breathing vapours.  
Avoid contact with skin, eyes and clothing.  
Wash thoroughly after handling.

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

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fire and explosion

Hygiene measures : Wash hands before breaks and at the end of workday. Use protective skin cream before handling the product. Take off immediately all contaminated clothing and wash it before reuse.

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

Further information on storage conditions : Keep container tightly closed. - sensitive to frost - In case of the product becoming opaque, thickening or being frozen due to the effects of cold, allow to thaw slowly at room temperature. Stir briefly before use. Keep away from heat. Keep away from direct sunlight.

**7.3 Specific end use(s)**

Specific use(s) : No further recommendations.

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

**8.1 Control parameters**

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

Substance name	End Use	Exposure routes	Potential health effects	Value
Glycerine CAS-No.: 56-81-5	Workers	Inhalation	Long-term local effects	220 mg/m3
	Remarks:DNEL			
	Consumers	Inhalation	Long-term local effects	132 mg/m3
	Remarks:DNEL			
2-Phenoxyethanol CAS-No.: 122-99-6	Workers	Dermal	Long-term systemic effects	20,83 mg/kg bw/day
	Remarks:DNEL			
	Workers	Inhalation	Long-term systemic effects	8,07 mg/m3
	Remarks:DNEL			
	Workers	Inhalation	Long-term local effects	8,07 mg/m3
	Remarks:DNEL			
	Consumers	Oral	Acute systemic effects	9,23 mg/kg bw/day
	Remarks:DNEL			
	Consumers	Dermal	Long-term systemic effects	10,42 mg/kg bw/day
	Remarks:DNEL			
	Consumers	Inhalation	Long-term systemic effects	2,41 mg/m3
	Remarks:DNEL			
	Consumers	Oral	Long-term systemic effects	9,23 mg/kg

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			effects	bw/day
	Remarks:DNEL			
	Consumers	Inhalation	Long-term local effects	2,41 mg/m3
	Remarks:DNEL			
2-Methylisothiazolin-3-one CAS-No.: 2682-20-4	Workers	Inhalation	Long-term local effects	0,021 mg/m3
	Remarks:DNEL			
	Workers	Inhalation	Acute local effects	0,043 mg/m3
	Remarks:DNEL			
	Consumers	Inhalation	Long-term local effects	0,021 mg/m3
	Remarks:DNEL			
	Consumers	Oral	Long-term systemic effects	0,027 mg/kg bw/day
	Remarks:DNEL			
	Consumers	Oral	Acute systemic effects	0,053 mg/kg bw/day
	Remarks:DNEL			

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

Substance name	Environmental Compartment	Value
Glycerine CAS-No.: 56-81-5	Sewage treatment plant	1000 mg/l
2-Phenoxyethanol CAS-No.: 122-99-6	Fresh water	0,943 mg/l
	salt water	0,094 mg/l
	Water (intermittent release)	3,44 mg/l
	Sewage treatment plant	24,8 mg/l
	Fresh water sediment	7,2366 mg/kg dry weight (d.w.)
	Marine sediment	0,7237 mg/kg dry weight (d.w.)
	Soil	1,26 mg/kg dry weight (d.w.)
2-Methylisothiazolin-3-one CAS-No.: 2682-20-4	Fresh water	0,0039 mg/l
	Marine water	0,0039 mg/l
	Sewage treatment plant	0,23 mg/l
	Soil	0,047 mg/kg dry weight (d.w.)
	Intermittent use/release	0,0039 mg/l

**8.2 Exposure controls**

**Engineering measures**

Handle only in a place equipped with local exhaust (or other appropriate exhaust).

**Personal protective equipment**

Eye protection : Safety glasses

Hand protection

Remarks : Nitrile rubber gloves. Minimum breakthrough time (glove): not

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determined Minimum thickness (glove): not determined 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 : Wear suitable protective equipment.
- Respiratory protection : Yes, if TLV value is exceeded  
Filter A (organic gases and vapours) to standard DIN EN 141
- Protective measures : Wear suitable protective equipment.

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**SECTION 9: Physical and chemical properties**

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

- Physical state : Liquid
- Colour : yellow
- Odour : not significant
- Odour Threshold : not required
- Freezing point : no data available
- Boiling point : approx. 100 °C
- Flammability : not determined
- Upper explosion limit / upper flammability limit : not determined
- Lower explosion limit / Lower flammability limit : not determined
- Flash point : not determined
- Auto-ignition temperature : not determined
- Decomposition temperature : > 100 °C  
with dehydration
- pH : 6,9 (20 °C)  
Concentration: 100 %  
Determined in the undiluted form
- Viscosity
- Viscosity, dynamic : 800 mPa.s (23 °C)
- Viscosity, kinematic : no data available
- Solubility(ies)
- Water solubility : miscible

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Partition coefficient: n-octanol/water	:	Not applicable
Vapour pressure	:	not determined
Relative density	:	no data available
Density	:	1,93 g/cm <sup>3</sup> (20 °C)
Relative vapour density	:	not determined
Particle characteristics Particle size	:	Not applicable

**9.2 Other information**

Explosives	:	no data available
Oxidizing properties	:	no data available
Flammable solids Burning number	:	Not applicable
Metal corrosion rate	:	no data available
Evaporation rate	:	not determined
Minimum ignition energy	:	not determined
Molecular weight	:	no data available

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**SECTION 10: Stability and reactivity**

**10.1 Reactivity**

No dangerous reaction known under conditions of normal use.

**10.2 Chemical stability**

Stable

**10.3 Possibility of hazardous reactions**

Hazardous reactions : No dangerous reaction known under conditions of normal use. Stable

**10.4 Conditions to avoid**

Conditions to avoid : None known.

**10.5 Incompatible materials**

Materials to avoid : no data available



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**10.6 Hazardous decomposition products**

No decomposition if stored and applied as directed.

**SECTION 11: Toxicological information**

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

**Acute toxicity**

**Product:**

Acute oral toxicity : Acute toxicity estimate: > 2.000 mg/kg  
Method: Calculation method

Acute inhalation toxicity : Remarks: no data available

Acute dermal toxicity : Remarks: no data available

**Components:**

**2-Phenoxyethanol:**

Acute oral toxicity : LD50 (Rat, male and female): 1.840 - 4.070 mg/kg  
Method: OECD Test Guideline 401  
GLP: no  
  
Acute toxicity estimate: 1.394 mg/kg  
Method: Acute toxicity estimate according to Regulation (EC)  
No. 1272/2008

Assessment: The component/mixture is moderately toxic after single ingestion.

Acute inhalation toxicity : LC50 (Rat, male and female): > 1000 mg/m<sup>3</sup>  
Exposure time: 14 d  
Test atmosphere: dust/mist  
Method: OECD Test Guideline 412  
GLP: yes  
Assessment: The substance or mixture has no acute inhalation toxicity

Acute dermal toxicity : LD50 (Rabbit, male and female): > 2.214 mg/kg  
Method: Other  
GLP: no  
Assessment: The substance or mixture has no acute dermal toxicity

**2-Methylisothiazolin-3-one:**

Acute oral toxicity : LD50 (Rat): 285,5 mg/kg  
Method: OECD Test Guideline 401  
  
Acute toxicity estimate: Method: Calculation method

Acute inhalation toxicity : LC50 (Rat): 0,11 mg/l  
Exposure time: 4 h

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Test atmosphere: dust/mist  
Method: OECD Test Guideline 403

Assessment: Corrosive to the respiratory tract.

Acute toxicity estimate: Test atmosphere: dust/mist  
Method: Calculation method

Acute dermal toxicity : LD50 (Rat): > 2.000 mg/kg  
Assessment: The component/mixture is toxic after single contact with skin.

**Skin corrosion/irritation**

**Product:**

Species : EPISKIN Human Skin Model Test  
Method : OECD Test Guideline 439  
Result : No skin irritation  
Remarks : The toxicological data has been taken from products of similar composition.

**Components:**

**2-Phenoxyethanol:**

Species : Rabbit  
Exposure time : 4 h  
Method : OECD Test Guideline 404  
Result : No skin irritation  
GLP : no

**2-Methylisothiazolin-3-one:**

Species : Rabbit  
Method : OECD Test Guideline 404  
Result : Causes burns.

**Serious eye damage/eye irritation**

**Product:**

Species : Bovine cornea  
Method : OECD Test Guideline 437  
Result : No eye irritation  
Remarks : The toxicological data has been taken from products of similar composition.

Species : rabbit eye  
Method : OECD Test Guideline 405  
Result : No eye irritation  
Remarks : The toxicological data has been taken from products of similar composition.

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**Components:**

**Alcohols, C16-18 and C18-unsaturated, ethoxylated:**

Result : Irritating to eyes.

**2-Phenoxyethanol:**

Species : Rabbit  
Exposure time : 15 d  
Method : OECD Test Guideline 405  
Result : Irritating to eyes.  
GLP : no

**2-Methylisothiazolin-3-one:**

Result : Risk of serious damage to eyes.  
Remarks : By analogy with a product of similar composition

**Respiratory or skin sensitisation**

**Product:**

Remarks : no data available

**Components:**

**2-Phenoxyethanol:**

Test Type : Maximisation Test  
Exposure routes : Skin contact  
Species : Guinea pig  
Method : OECD Test Guideline 406  
Result : Not a skin sensitizer.  
GLP : yes

Assessment : Harmful if swallowed.

**2-Methylisothiazolin-3-one:**

Test Type : Buehler Test  
Exposure routes : Dermal  
Species : Guinea pig  
Method : OECD Test Guideline 406  
Result : The product is a skin sensitizer, sub-category 1A.

Assessment : Toxic if swallowed., Fatal if inhaled., Causes severe skin burns and eye damage.  
May cause an allergic skin reaction.

**Germ cell mutagenicity**

**Product:**

Genotoxicity in vitro : Remarks: no data available

Germ cell mutagenicity- : No information available.

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Assessment

**Components:**

**2-Phenoxyethanol:**

Genotoxicity in vitro : Test Type: Ames test  
Test system: Salmonella typhimurium  
Concentration: 20 - 5000 µg/plate  
Metabolic activation: with and without metabolic activation  
Method: OECD Test Guideline 471  
Result: negative  
GLP: yes

Test Type: Chromosome aberration test in vitro  
Test system: Chinese hamster lung cells  
Concentration: 43,8 - 1400 µg/ml  
Metabolic activation: with and without metabolic activation  
Method: OECD Test Guideline 473  
Result: negative  
GLP: yes

Test Type: HGPRT assay  
Test system: Chinese hamster lung cells  
Concentration: 43,8 - 1400 µg/ml  
Metabolic activation: with and without metabolic activation  
Method: OECD Test Guideline 476  
Result: negative  
GLP: yes

Genotoxicity in vivo : Test Type: Micronucleus test  
Species: Mouse (male)  
Strain: NMRI  
Cell type: Bone marrow  
Application Route: Intraperitoneal injection  
Exposure time: 24 - 48 h  
Dose: 1x 125-250-500 mg/kg  
Method: OECD Test Guideline 474  
Result: negative  
GLP: yes

Germ cell mutagenicity-  
Assessment : In vitro tests did not show mutagenic effects, In vivo tests did  
not show mutagenic effects

**2-Methylisothiazolin-3-one:**

Genotoxicity in vitro : Test Type: Ames test  
Metabolic activation: with and without metabolic activation  
Result: negative

Test Type: Chromosome aberration test in vitro  
Test system: mammalian cells  
Metabolic activation: with and without metabolic activation  
Result: negative

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Test Type: Micronucleus test  
Test system: mammalian cells  
Metabolic activation: with and without metabolic activation  
Result: negative

Germ cell mutagenicity-  
Assessment : In vitro tests did not show mutagenic effects, In vivo tests did not show mutagenic effects

**Carcinogenicity**

**Product:**

Carcinogenicity -  
Assessment : No information available.

**Components:**

**2-Phenoxyethanol:**

Carcinogenicity -  
Assessment : No information available.

**2-Methylisothiazolin-3-one:**

Carcinogenicity -  
Assessment : Not classifiable as a human carcinogen.

**Reproductive toxicity**

**Product:**

Reproductive toxicity -  
Assessment : No information available.

**Components:**

**2-Phenoxyethanol:**

Effects on fertility : Test Type: Two-generation study  
Species: Mouse, male and female  
Strain: CD1  
Application Route: oral (feed)  
Dose: 0,25 - 1,25 - 2,5 % in diet  
General Toxicity - Parent: NOAEL: 1.875 mg/kg body weight  
General Toxicity F1: NOAEL: 375 mg/kg body weight  
General Toxicity F2: NOAEL: 375 mg/kg body weight  
Method: Other  
GLP: yes

Reproductive toxicity -  
Assessment : No evidence of adverse effects on sexual function and fertility, or on development, based on animal experiments.

**2-Methylisothiazolin-3-one:**

Effects on fertility : Remarks: This information is not available.

Effects on foetal : Remarks: Based on available data, the classification criteria

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development are not met.

Reproductive toxicity - Assessment : No evidence of adverse effects on sexual function and fertility, or on development, based on animal experiments.

**STOT - single exposure**

**Product:**

Remarks : no data available

**Components:**

**2-Methylisothiazolin-3-one:**

Assessment : The substance or mixture is not classified as specific target organ toxicant, single exposure.

**STOT - repeated exposure**

**Product:**

Remarks : no data available

**Components:**

**2-Phenoxyethanol:**

Assessment : The substance or mixture is not classified as specific target organ toxicant, repeated exposure.

**2-Methylisothiazolin-3-one:**

Assessment : The substance or mixture is not classified as specific target organ toxicant, repeated exposure.

**Repeated dose toxicity**

**Product:**

Remarks : This information is not available.

**Components:**

**2-Phenoxyethanol:**

Species : Rat, male and female  
NOAEL : 369 mg/kg  
Application Route : oral (gavage)  
Exposure time : 13 w  
Number of exposures : daily  
Dose : 1250-2500-5000-10000-20000mg/l  
Control Group : yes  
Method : OECD Test Guideline 408  
GLP : yes

Species : Rat, male and female  
NOAEL : 0,0482 mg/l  
LOAEL : 0,246 mg/l

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Application Route : Inhalation  
Exposure time : 14 d  
Number of exposures : 6 h/d, 5 days/w  
Dose : 40 - 200 - 1000 mg/m3  
Control Group : yes  
Method : OECD Test Guideline 412  
GLP : yes

Species : Rabbit, male and female  
NOAEL : 500 mg/kg  
Application Route : Skin contact  
Exposure time : 13 w  
Number of exposures : 6 h/d, 5 days/w  
Dose : 50 - 150 - 500 mg/kg  
Control Group : yes  
Method : OECD Test Guideline 411  
GLP : yes

**2-Methylisothiazolin-3-one:**

Species : Rat  
NOAEL : 25 mg/kg  
Application Route : Oral  
Exposure time : 90 d  
Remarks : By analogy with a product of similar composition

**Aspiration toxicity**

**Product:**

no data available

**Components:**

**2-Phenoxyethanol:**

No aspiration toxicity classification

**2-Methylisothiazolin-3-one:**

No aspiration toxicity classification

**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.

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**SECTION 12: Ecological information**

**12.1 Toxicity**

**Product:**

Toxicity to fish : Remarks: no data available

Toxicity to daphnia and other aquatic invertebrates : Remarks: no data available

Toxicity to algae/aquatic plants : Remarks: no data available

Toxicity to fish (Chronic toxicity) : Remarks: no data available

Toxicity to microorganisms : Remarks: no data available

**Components:**

**Alcohols, C16-18 and C18-unsaturated, ethoxylated:**

**Ecotoxicology Assessment**

Acute aquatic toxicity : Toxic to aquatic life.

Chronic aquatic toxicity : Harmful to aquatic life with long lasting effects.

**2-Phenoxyethanol:**

Toxicity to fish : LC50 (Pimephales promelas (fathead minnow)): 344 mg/l  
End point: mortality  
Exposure time: 96 h  
Test Type: flow-through test  
Analytical monitoring: yes  
Method: Other  
GLP: no data available

Toxicity to daphnia and other aquatic invertebrates : EC50 (Daphnia magna (Water flea)): > 500 mg/l  
End point: Immobilization  
Exposure time: 48 h  
Test Type: static test  
Analytical monitoring: no  
Method: OECD Test Guideline 202  
GLP: no  
Remarks: The details of the toxic effect relate to the nominal concentration.

Toxicity to algae/aquatic plants : ErC50 (Desmodesmus subspicatus (green algae)): 625 mg/l  
End point: Growth rate  
Exposure time: 72 h  
Test Type: static test  
Analytical monitoring: yes  
Method: Directive 67/548/EEC, Annex V, C.3.



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GLP: yes

Remarks: The details of the toxic effect relate to the nominal concentration.

- Toxicity to microorganisms : EC50 (activated sludge): > 1.000 mg/l  
End point: Bacteria toxicity (respiration inhibition)  
Exposure time: 0,5 h  
Test Type: aquatic  
Analytical monitoring: no  
Method: OECD Test Guideline 209  
GLP: yes  
Remarks: The details of the toxic effect relate to the nominal concentration.
- Toxicity to fish (Chronic toxicity) : NOEC: 24 mg/l  
End point: mortality  
Exposure time: 34 d  
Species: Pimephales promelas (fathead minnow)  
Test Type: flow-through test  
Analytical monitoring: yes  
Method: OECD Test Guideline 210  
GLP: yes
- Toxicity to daphnia and other aquatic invertebrates (Chronic toxicity) : NOEC: 9,43 mg/l  
End point: Reproduction rate  
Exposure time: 21 d  
Species: Daphnia magna (Water flea)  
Test Type: semi-static test  
Analytical monitoring: yes  
Method: OECD Test Guideline 211  
GLP: yes
- Toxicity to soil dwelling organisms : Test Type: artificial soil  
LC50: > 1.000 mg/kg  
Exposure time: 14 d  
End point: mortality  
Species: Eisenia fetida (earthworms)  
Method: OECD Test Guideline 207  
GLP:yes  
Remarks: The details of the toxic effect relate to the nominal concentration.
- Plant toxicity : EC50: 107 mg/kg  
Exposure time: 19 d  
Analytical monitoring: no  
Method: OECD Guide-line 208  
GLP:yes
- EC50: 37 mg/kg  
Exposure time: 19 d  
Species: Brassica napus  
Analytical monitoring: no  
Method: OECD Guide-line 208  
GLP:yes

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EC50: 235 mg/kg  
Exposure time: 19 d  
Species: Brassica napus  
Analytical monitoring: no  
Method: OECD Guide-line 208  
GLP:yes

Sediment toxicity : Remarks: Not applicable

Toxicity to terrestrial organisms : Remarks: Not applicable

**2-Methylisothiazolin-3-one:**

Toxicity to fish : LC50 (Oncorhynchus mykiss (rainbow trout)): 4,77 mg/l  
Exposure time: 96 h  
Method: OECD Test Guideline 203

Toxicity to daphnia and other aquatic invertebrates : EC50 (Daphnia magna (Water flea)): 0,934 mg/l  
End point: mortality  
Exposure time: 48 h  
Method: OECD Test Guideline 202

Toxicity to algae/aquatic plants : NOEC (Pseudokirchneriella subcapitata (green algae)):  
0,0104 mg/l  
End point: Biomass  
Exposure time: 96 h  
Method: OECD Test Guideline 201

EC50 (Pseudokirchneriella subcapitata (algae)): 0,063 mg/l  
End point: Biomass  
Exposure time: 96 h  
Method: OECD Test Guideline 201

M-Factor (Acute aquatic toxicity) : 10

Toxicity to microorganisms : EC50 (Bacteria): 31,7 mg/l  
Exposure time: 3 h

Toxicity to fish (Chronic toxicity) : Remarks: no data available

Toxicity to daphnia and other aquatic invertebrates (Chronic toxicity) : Remarks: no data available

M-Factor (Chronic aquatic toxicity) : 1

**Ecotoxicology Assessment**

Acute aquatic toxicity : Very toxic to aquatic life.

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Chronic aquatic toxicity : Very toxic to aquatic life with long lasting effects.

**12.2 Persistence and degradability**

**Product:**

Biodegradability : Remarks: Not applicable

**Components:**

**2-Phenoxyethanol:**

Biodegradability : Test Type: aerobic  
Inoculum: activated sludge  
Concentration: 30 mg/l  
Result: Readily biodegradable.  
Biodegradation: 90 %  
Related to: Biochemical Oxygen Demand (BOD)  
Exposure time: 28 d  
Method: OECD Test Guideline 301F  
GLP: yes

Test Type: aerobic  
Inoculum: activated sludge  
Concentration: 20 mg DOC/l  
Result: Readily biodegradable.  
Biodegradation: > 90 %  
Related to: Dissolved organic carbon (DOC)  
Exposure time: 15 d  
Method: OECD Test Guideline 301A  
GLP: yes

Physico-chemical  
removability : Remarks: Biodegradable

Stability in water : Test Type: abiotic  
Degradation half life (DT50): > 365 d (50 °C)  
pH: 4 - 9  
Method: OECD Test Guideline 111  
GLP: yes

Photodegradation : Test Type: air  
Light source: Sunlight  
Sensitiser: OH  
Concentration: 500000 molecules/cm<sup>3</sup>  
Rate constant: 3,26727E-11 cm<sup>3</sup>/(molecule\*sec)  
Degradation (indirect photolysis): 50 % Degradation half life:  
11,8 h  
Method: calculated  
GLP: no

Test Type: water  
Light source: Other  
Light spectrum: 298 - 400 nm  
Degradation (direct photolysis): 50 % Degradation half life:  
5.120 d

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GLP: No information available.

**2-Methylisothiazolin-3-one:**

Biodegradability : Test Type: aerobic  
Result: Not rapidly biodegradable

**12.3 Bioaccumulative potential**

**Product:**

Bioaccumulation : Remarks: no data available

**Components:**

**2-Phenoxyethanol:**

Bioaccumulation : Species: Other  
Bioconcentration factor (BCF): 0,35  
Method: calculated  
GLP: no

Partition coefficient: n-octanol/water : log Pow: 1,2 (23 °C)  
pH: 7  
Method: Regulation (EC) No. 440/2008, Annex, A.8  
GLP: yes

**2-Methylisothiazolin-3-one:**

Bioaccumulation : Remarks: Due to the distribution coefficient n-octanol/water, accumulation in organisms is not expected.

**12.4 Mobility in soil**

**Components:**

**2-Phenoxyethanol:**

Distribution among environmental compartments : adsorption  
Medium: water - soil  
log Koc: 1,6  
Method: OECD Test Guideline 121

**2-Methylisothiazolin-3-one:**

Distribution among environmental compartments : Remarks: 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.

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**Components:**

**2-Phenoxyethanol:**

Assessment : This substance is not considered to be persistent, bioaccumulating and toxic (PBT).

**2-Methylisothiazolin-3-one:**

Assessment : Remarks: no data available

**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:**

Environmental fate and pathways : no data available

Additional ecological information : The product should not be allowed to enter drains, water courses or the soil.

**Components:**

**2-Phenoxyethanol:**

Environmental fate and pathways : no data available

Additional ecological information : The product should not be allowed to enter drains, water courses or the soil.

**2-Methylisothiazolin-3-one:**

Environmental fate and pathways : no data available

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**SECTION 13: Disposal considerations**

**13.1 Waste treatment methods**

Product : Dispose of in accordance with the European Directives on waste and hazardous waste.

Contaminated packaging : This material and its container must be disposed of in a safe way.

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**SECTION 14: Transport information**

**Section 14.1. to 14.5.**

<b>ADR</b>	not restricted
<b>ADN</b>	not restricted
<b>RID</b>	not restricted
<b>IATA</b>	not restricted
<b>IMDG</b>	not restricted

**14.6. Special precautions for user**

See sections 6 to 8 of this Safety Data Sheet.

**14.7. Maritime transport in bulk according to IMO instruments**

No transport as bulk according IBC - Code.

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**SECTION 15: Regulatory information**

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

REACH - Restrictions on the manufacture, placing on the market and use of certain dangerous substances, mixtures and articles (Annex XVII)	: Conditions of restriction for the following entries should be considered: Number on list 3
REACH - Candidate List of Substances of Very High Concern for Authorisation (Article 59).	: Not applicable
Regulation (EC) No 1005/2009 on substances that deplete the ozone layer	: Not applicable
Regulation (EU) 2019/1021 on persistent organic pollutants (recast)	: Not applicable
Council Regulation (EC) No 111/2005 laying down rules for the monitoring of trade between the Community and third countries in drug precursors	: Neither banned nor restricted
Regulation (EC) No 649/2012 of the European Parliament and the Council concerning the export and import of dangerous chemicals	: Not applicable
REACH - List of substances subject to authorisation (Annex XIV)	: Not applicable

**Other regulations:**

Apart from the data/regulations specified in this chapter, no further information is available concerning safety, health and environmental protection.

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**15.2 Chemical safety assessment**

No Chemical Safety Assessment (CSA) is yet available for the substance, or for the component substances, contained in this product.

**SECTION 16: Other information**

**Full text of H-Statements**

H301	: Toxic if swallowed.
H302	: Harmful if swallowed.
H311	: Toxic in contact with skin.
H314	: Causes severe skin burns and eye damage.
H317	: May cause an allergic skin reaction.
H318	: Causes serious eye damage.
H319	: Causes serious eye irritation.
H330	: Fatal if inhaled.
H400	: Very toxic to aquatic life.
H410	: Very toxic to aquatic life with long lasting effects.
H412	: Harmful to aquatic life with long lasting effects.
EUH071	: Corrosive to the respiratory tract.

**Full text of other abbreviations**

Acute Tox.	: Acute toxicity
Aquatic Acute	: Short-term (acute) aquatic hazard
Aquatic Chronic	: Long-term (chronic) aquatic hazard
Eye Dam.	: Serious eye damage
Eye Irrit.	: Eye irritation
Skin Corr.	: Skin corrosion
Skin Sens.	: Skin sensitisation

ADN - European Agreement concerning the International Carriage of Dangerous Goods by Inland Waterways; ADR - Agreement concerning the International Carriage of Dangerous Goods by Road; AIIC - 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 Standardisation; DSL - Domestic Substances 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 Organisation 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

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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, Authorisation 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; TECl - 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**

Other information : Observe national and local legal requirements

**Classification of the mixture:**

Skin Sens. 1

H317

**Classification procedure:**

Calculation method

This information corresponds to the present state of our knowledge and is intended as a general description of our products and their possible applications. Heubach makes no warranties, express or implied, as to the information's accuracy, adequacy, sufficiency or freedom from defect and assumes no liability in connection with any use of this information. Any user of this product is responsible for determining the suitability of Heubach's products for its particular application. Nothing included in this information waives any of Heubach's General Terms and Conditions of Sale, which control unless it agrees otherwise in writing. Any existing intellectual/industrial property rights must be observed. Due to possible changes in our products and applicable national and international regulations and laws, the status of our products could change. Material Safety Data Sheets providing safety precautions, that should be observed when handling or storing Heubach products, are available upon request and are provided in compliance with applicable law. You should obtain and review the applicable Material Safety Data Sheet information before handling any of these products. For additional information, please contact Heubach.

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