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

1.1 Product identifier

ResiFIX Epoxyacrylate EYSF, Comp. A

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

1.2.1 Relevant uses

Adhesive mortar for fastening to concrete elements A-Component (Resin)

1.2.2 Uses advised against

None known.

1.3 Details of the supplier of the safety data sheet

Company

Apolo MEA Befestigungssysteme GmbH
Industriestr. 6
86551 Aichach / GERMANY
Phone +49 (0) 8251 90 485 0
Fax +49 (0)8251 90 485 - 49
E-mail info@apolofixing.com

Address enquiries to

Technical information info@apolofixing.com

Safety Data Sheet info@apolofixing.com

1.4 Emergency telephone number

Advisory body +49 (0)89-19240 (24h) (english)

SECTION 2: Hazards identification

2.1 Classification of the substance or mixture

Eye Irrit. 2: H319 Causes serious eye irritation.
Skin Irrit. 2: H315 Causes skin irritation.
Skin Sens. 1: H317 May cause an allergic skin reaction.
Aquatic Chronic 3: H412 Harmful to aquatic life with long lasting effects.

2.2 Label elements

The product is classified and required to be labelled in accordance with EC-Directives

Hazard pictograms

Signal word WARNING

Contains: 2-Hydroxyethyl methacrylate

Ethylene dimethacrylate

Methacrylic acid, monoester with Propan-1,2-diole

Hazard statements

H319 Causes serious eye irritation.
H315 Causes skin irritation.
H317 May cause an allergic skin reaction.
H412 Harmful to aquatic life with long lasting effects.

Precautionary statements

P101 If medical advice is needed, have product container or label at hand.
P102 Keep out of reach of children.
P273 Avoid release to the environment.
P280 Wear protective gloves / eye protection / face protection.
P363 Wash contaminated clothing before reuse.
P501 Dispose of contents / container to in accordance with local / regional / national / international regulation.

2.3 Other hazards

Environmental hazards Does not contain any PBT or vPvB substances.

Other hazards Further hazards were not determined with the current level of knowledge.

SECTION 3: Composition / Information on ingredients

Product-type:

The product is a mixture.

Range [%]	Substance
5 - <15	2-Hydroxyethyl methacrylate
	CAS: 868-77-9, EINECS/ELINCS: 212-782-2, EU-INDEX: 607-124-00-X
	GHS/CLP: Eye Irrit. 2: H319 - Skin Irrit. 2: H315 - Skin Sens. 1: H317
1 - <10	Vinyltoluene
	CAS: 25013-15-4, EINECS/ELINCS: 246-562-2
	GHS/CLP: Flam. Liq. 3: H226 - Acute Tox. 4: H332 - Eye Irrit. 2: H319 - Asp. Tox. 1: H304 - Skin Irrit. 2: H315 - Aquatic Chronic 2: H411
1 - <5	Ethylene dimethacrylate
	CAS: 97-90-5, EINECS/ELINCS: 202-617-2, EU-INDEX: 607-114-00-5
	GHS/CLP: STOT SE 3: H335 - Skin Sens. 1: H317
1 - <5	Methacrylic acid, monoester with Propan-1,2-diole
	CAS: 27813-02-1, EINECS/ELINCS: 248-666-3
	GHS/CLP: Eye Irrit. 2: H319 - Skin Sens. 1: H317
0,1 - <1	1,1'-(p-Tolylimino)dipropan-2-ol
	CAS: 38668-48-3, EINECS/ELINCS: 254-075-1
	GHS/CLP: Acute Tox. 2: H300 - Eye Dam. 1: H318 - Aquatic Chronic 3: H412

Comment on component parts Substances of Very High Concern - SVHC: substances are not contained or are below 0,1%.
For full text of H-statements: see SECTION 16.

SECTION 4: First aid measures

4.1 Description of first aid measures

General information Change soaked clothing immediately.

Inhalation Ensure supply of fresh air.
In the event of symptoms seek medical treatment.

Skin contact In case of contact with skin wash off immediately with soap and water.
Consult a doctor if skin irritation persists.

Eye contact Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
If eye irritation persists: Get medical advice/attention.

Ingestion Supply with medical care.
Rinse out mouth and give plenty of water to drink.

4.2 Most important symptoms and effects, both acute and delayed

Irritant effects
Allergic reactions

4.3 Indication of any immediate medical attention and special treatment needed

Treat symptomatically.

SECTION 5: Fire-fighting measures

5.1 Extinguishing media

Suitable extinguishing media foam, dry powder, water spray jet, carbon dioxide

Extinguishing media that must not be used Full water jet

5.2 Special hazards arising from the substance or mixture

Risk of formation of toxic pyrolysis products.
Carbon monoxide (CO)

5.3 Advice for firefighters

Do not inhale explosion and/or combustion gases.
Use self-contained breathing apparatus.

Fire residues and contaminated firefighting water must be disposed of in accordance within the local regulations.

SECTION 6: Accidental release measures

6.1 Personal precautions, protective equipment and emergency procedures

Ensure adequate ventilation.
Use personal protective equipment.

6.2 Environmental precautions

Do not discharge into the drains/surface waters/groundwater.

6.3 Methods and material for containment and cleaning up

Take up mechanically.
Take up residues with absorbent material (e.g. sand, sawdust, general purpose binder, diatomaceous earth).
Dispose of absorbed material in accordance within the regulations.

6.4 Reference to other sections

See SECTION 8+13

SECTION 7: Handling and storage

7.1 Precautions for safe handling

Use only in well-ventilated areas.

Do not eat, drink, smoke or take drugs at work.
Wash hands before breaks and after work.
Use barrier skin cream.

7.2 Conditions for safe storage, including any incompatibilities

Keep only in original container.

Do not store together with food and animal food/diet.

Keep container in a well-ventilated place.
Keep container tightly closed.
Keep in a cool place. Store in a dry place.
Protect from atmospheric moisture and water.
Recommended storage temperature: 5 - 25 °C

7.3 Specific end use(s)

See product use, SECTION 1.2

SECTION 8: Exposure controls / personal protection

8.1 Control parameters

Ingredients with occupational exposure limits to be monitored (GB)

Range [%]	Substance
1 - <10	Vinyltoluene
	CAS: 25013-15-4, EINECS/ELINCS: 246-562-2
	Long-term exposure: 100 ppm, 491 mg/m³
	Short-term exposure (15-minute): 150 ppm, 736 mg/m³

8.2 Exposure controls

Additional advice on system design	Ensure adequate ventilation on workstation.
Eye protection	safety glasses
Hand protection	The details concerned are recommendations. Please contact the glove supplier for further information. Nitrile rubber, >480 min (EN 374).
Skin protection	Protective clothing.
Other	Avoid contact with eyes and skin. Do not inhale gases/vapours/aerosols. Personal protective equipment should be selected specifically for the working place, depending on concentration and quantity handled. The resistance of this equipment to chemicals should be ascertained with the respective supplier.
Respiratory protection	If ventilation is insufficient, wear respiratory protection. Short term: filter apparatus, combination filter A-P2.
Thermal hazards	not applicable
Delimitation and monitoring of the environmental exposition	See SECTION 6+7.

SECTION 9: Physical and chemical properties

9.1 Information on basic physical and chemical properties

Form	pasty
Color	light beige
Odor	characteristic
Odour threshold	not determined
pH-value	not applicable
pH-value [1%]	not applicable
Boiling point [°C]	not determined
Flash point [°C]	not applicable
Flammability (solid, gas) [°C]	not determined
Lower explosion limit	0,9 Vol.-%
Upper explosion limit	9,5 Vol.-%
Oxidizing properties	not determined
Vapour pressure/gas pressure [kPa]	not determined
Density [g/ml]	not determined
Bulk density [kg/m³]	not applicable
Solubility in water	insoluble
Partition coefficient [n-octanol/water]	not determined
Viscosity	not determined
Relative vapour density determined in air	not determined
Evaporation speed	not determined
Melting point [°C]	not determined
Autoignition temperature [°C]	not determined
Decomposition temperature [°C]	not determined

9.2 Other information

No information available.

SECTION 10: Stability and reactivity

10.1 Reactivity

See SECTION 10.3.

10.2 Chemical stability

Stable under normal ambient conditions (ambient temperature).

10.3 Possibility of hazardous reactions

Reactions with oxidizing agents.
Reactions with acids.

10.4 Conditions to avoid

See SECTION 7.2.

10.5 Incompatible materials

Strong oxidizing agent.

10.6 Hazardous decomposition products

No hazardous decomposition products known.

SECTION 11: Toxicological information

11.1 Information on toxicological effects

Acute toxicity

Product
ATE-mix, inhalative, Rat: > 100 mg/l.
ATE-mix, oral, Rat: > 5000 mg/kg.

Range [%]	Substance
1 - <5	Ethylene dimethacrylate, CAS: 97-90-5
	LD50, oral, Rat: 3300 mg/kg (RTECS).
5 - <15	2-Hydroxyethyl methacrylate, CAS: 868-77-9
	LD50, dermal, Rabbit: > 3000 mg/kg (IUCLID).
	LD50, oral, Rat: 5564 mg/kg (IUCLID).
1 - <5	Methacrylic acid, monoester with Propan-1,2-diole, CAS: 27813-02-1
	LD50, dermal, Rabbit: > 5000 mg/kg (IUCLID).
	LD50, oral, Rat: > 4000 mg/kg (IUCLID).
0,1 - <1	1,1'-(p-Tolylimino)dipropan-2-ol, CAS: 38668-48-3
	LD50, oral, Rat: 27,5 mg/kg.
1 - <10	Vinyltoluene, CAS: 25013-15-4
	LD50, oral, Rat: 4000 mg/kg (IUCLID).
	LC50, inhalative, mouse: 3,02 mg/l/4h (IUCLID).
	LC50, inhalative, Rat: 2500 ppm/8h (IUCLID).

Serious eye damage/irritation	not determined
Skin corrosion/irritation	not determined
Respiratory or skin sensitisation	not determined
Mutagenicity	There is no evidence of any mutagenic effects.
Reproduction toxicity	There is no evidence of any reproductive toxicity effects.
Carcinogenicity	There is no evidence of any carcinogenic effects.
General remarks	
	The product was classified on the basis of the calculation procedure of the preparation directive. Toxicological data of complete product are not available.

SECTION 12: Ecological information

12.1 Toxicity

Range [%]	Substance
1 - <5	Ethylene dimethacrylate, CAS: 97-90-5
	LC50, (96h), Danio rerio: 15,95 mg/l (OECD 203).
	EC50, (3h), Pseudomonas putida: 570 mg/l (OECD 209).
5 - <15	2-Hydroxyethyl methacrylate, CAS: 868-77-9
	LC50, (96h), Pimephales promelas: 227 mg/L (IUCLID).
	EC50, (96h), Pimephales promelas: 227 mg/L (IUCLID).
1 - <5	Methacrylic acid, monoester with Propan-1,2-diole, CAS: 27813-02-1
	LC50, (48h), Leuciscus idus: 493 mg/L (IUCLID).
	EC10, (16h), Pseudomonas putida: 1140 mg/l (IUCLID).
0,1 - <1	1,1'-(p-Tolylimino)dipropan-2-ol, CAS: 38668-48-3
	LC50, (96h), fish: 17 mg/l.
	EC50, (48h), Daphnia magna: 28,8 mg/l.
1 - <10	Vinyltoluene, CAS: 25013-15-4
	LC50, (96h), Pimephales promelas: 23,4 mg/l (IUCLID).

12.2 Persistence and degradability

Behaviour in environment compartments	not determined
Behaviour in sewage plant	not determined
Biological degradability	not determined

12.3 Bioaccumulative potential

No information available.

12.4 Mobility in soil

No information available.

12.5 Results of PBT and vPvB assessment

Based on all available information not to be classified as PBT or vPvB respectively.

12.6 Other adverse effects

Do not discharge product unmonitored into the environment.
The product was classified on the basis of the calculation procedure of the preparation directive.
Ecological data of complete product are not available.
The toxicity data pertaining to the ingredients were supplied by the manufacturers of raw materials.

SECTION 13: Disposal considerations

13.1 Waste treatment methods

Waste material must be disposed of in accordance with the Directive on waste 2008/98/EC as well as other national and local regulations. It is not possible to determine a waste code for this product in accordance with the European Waste Catalogue (EWC) since it is only possible to classify it according to how it is used by the customer. The waste code is to be determined within the EU in liaison with the waste-disposal operator.

Product

Coordinate disposal with the disposal contractor/authorities if necessary.

Waste no. (recommended) 080409*

Contaminated packaging

Uncontaminated packaging may be taken for recycling.
Packaging that cannot be cleaned should be disposed of as for product.

Waste no. (recommended) 150110*
150102

SECTION 14: Transport information

14.1 UN number

See SECTION 14.2 in accordance with UN shipping name

14.2 UN proper shipping name

Transport by land according to ADR/RID NO DANGEROUS GOODS

Inland navigation (ADN) NO DANGEROUS GOODS

Marine transport in accordance with IMDG NOT CLASSIFIED AS "DANGEROUS GOODS"

Air transport in accordance with IATA NOT CLASSIFIED AS "DANGEROUS GOODS"

14.3 Transport hazard class(es)

See SECTION 14.2 in accordance with UN shipping name

14.4 Packing group

See SECTION 14.2 in accordance with UN shipping name

14.5 Environmental hazards

See SECTION 14.2 in accordance with UN shipping name

14.6 Special precautions for user

Relevant information under SECTION 6 to 8.

14.7 Transport in bulk according to Annex II of MARPOL and the IBC Code

not applicable

SECTION 15: Regulatory information

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

EEC-REGULATIONS	1991/689 (2001/118); 1999/13; 2004/42; 648/2004; 1907/2006 (REACH); 1272/2008; 75/324/EEC (2008/47/EC); 453/2010/EC; (EU) 2015/830
TRANSPORT-REGULATIONS	DOT-Classification, ADR (2015); IMDG-Code (2015, 37. Amdt.); IATA-DGR (2015).
NATIONAL REGULATIONS (GB):	EH40/2005 Workplace exposure limits (Second edition, published December 2011). CHIP 3/ CHIP 4
- Observe employment restrictions for people	yes
- VOC (1999/13/CE)	0 %

15.2 Chemical safety assessment

not applicable

SECTION 16: Other information

16.1 Hazard statements (SECTION 3)

H412 Harmful to aquatic life with long lasting effects.
H318 Causes serious eye damage.
H300 Fatal if swallowed.
H335 May cause respiratory irritation.
H411 Toxic to aquatic life with long lasting effects.
H304 May be fatal if swallowed and enters airways.
H332 Harmful if inhaled.
H226 Flammable liquid and vapour.
H317 May cause an allergic skin reaction.
H315 Causes skin irritation.
H319 Causes serious eye irritation.

16.2 Abbreviations and acronyms:

ADR = Accord européen relatif au transport international des marchandises Dangereuses par Route
RID = Règlement concernant le transport international ferroviaire de marchandises dangereuses
ADN = Accord européen relatif au transport international des marchandises dangereuses par voie de navigation intérieure
CAS = Chemical Abstracts Service
CLP = Classification, Labelling and Packaging
DMEL = Derived Minimum Effect Level
DNEL = Derived No Effect Level
EC50 = Median effective concentration
ECB = European Chemicals Bureau
EEC = European Economic Community
EINECS = European Inventory of Existing Commercial Chemical Substances
ELINCS = European List of Notified Chemical Substances
GHS = Globally Harmonized System of Classification and Labelling of Chemicals
IATA = International Air Transport Association
IBC-Code = International Code for the Construction and Equipment of Ships carrying Dangerous Chemicals in Bulk
IC50 = Inhibition concentration, 50%
IMDG = International Maritime Code for Dangerous Goods
IUCLID = International Uniform ChemicaL Information Database
LC50 = Lethal concentration, 50%
LD50 = Median lethal dose
MARPOL = International Convention for the Prevention of Marine Pollution from Ships
PBT = Persistent, Bioaccumulative and Toxic substance
PNEC = Predicted No-Effect Concentration
REACH = Registration, Evaluation, Authorisation and Restriction of Chemicals
TLV®/TWA = Threshold limit value – time-weighted average
TLV®STEL = Threshold limit value – short-time exposure limit
VOC = Volatile Organic Compounds
vPvB = very Persistent and very Bioaccumulative

16.3 Other information

Classification procedure

Eye Irrit. 2: H319 Causes serious eye irritation. ()
Skin Irrit. 2: H315 Causes skin irritation. ()
Skin Sens. 1: H317 May cause an allergic skin reaction. ()
Aquatic Chronic 3: H412 Harmful to aquatic life with long lasting effects. ()

Modified position

none

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

1.1 Product identifier

ResiFIX Epoxyacrylate EYSF, Comp. B

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

1.2.1 Relevant uses

Adhesive mortar for fastening to concrete elements B-Component (Hardener)

1.2.2 Uses advised against

None known.

1.3 Details of the supplier of the safety data sheet

Company

Apolo MEA Befestigungssysteme GmbH
Industriestr. 6
86551 Aichach / GERMANY
Phone +49 (0) 8251 90 485 0
Fax +49 (0)8251 90 485 - 49
E-mail info@apolofixing.com

Address enquiries to

Technical information info@apolofixing.com

Safety Data Sheet info@apolofixing.com

1.4 Emergency telephone number

Advisory body +49 (0)89-19240 (24h) (english)

SECTION 2: Hazards identification

2.1 Classification of the substance or mixture

Skin Sens. 1: H317 May cause an allergic skin reaction.
Eye Irrit. 2: H319 Causes serious eye irritation.

2.2 Label elements

The product is required to be labelled in accordance with GHS/CLP-Directives.

Hazard pictograms

Signal word WARNING

Contains: Dibenzoyl peroxide

Hazard statements

H317 May cause an allergic skin reaction.
H319 Causes serious eye irritation.

Precautionary statements

P101 If medical advice is needed, have product container or label at hand.
P102 Keep out of reach of children.
P261 Avoid breathing vapours.
P280 Wear protective gloves / eye protection / face protection.
P363 Wash contaminated clothing before reuse.
P501 Dispose of contents / container to in accordance with local / regional / national / international regulation.

2.3 Other hazards

Environmental hazards Does not contain any PBT or vPvB substances.

Other hazards Further hazards were not determined with the current level of knowledge.

SECTION 3: Composition / Information on ingredients

Product-type:

The product is a mixture.

Range [%]	Substance
1 - <20	Dibenzoyl peroxide
	CAS: 94-36-0, EINECS/ELINCS: 202-327-6, EU-INDEX: 617-008-00-0, ECB-Nr.: 01-2119511472-50-XXXX
	GHS/CLP: Org. Perox. B: H241 - Eye Irrit. 2: H319 - Skin Sens. 1: H317 - Aquatic Acute 1: H400, M = 10
1 - <5	Reaction mass of Diethylene glycole dibenzoate, Dipropylene glycole dibenzoate and Triethylene glycol dibenzoate
	ECB-Nr.: 01-2119535193-44-XXXX
1 - <5	2-Ethylhexyl benzoate
	CAS: 5444-75-7, EINECS/ELINCS: 226-641-8
	GHS/CLP: Aquatic Chronic 4: H413
1 - <5	Quartz (< 10µm)
	CAS: 14808-60-7, EINECS/ELINCS: 238-878-4
	GHS/CLP: STOT RE 1: H372

Comment on component parts

The quartz in this preparation is not available on foreseeable use.
Substances of Very High Concern - SVHC: substances are not contained or are below 0,1%.
For full text of H-statements: see SECTION 16.

SECTION 4: First aid measures

4.1 Description of first aid measures

General information

Take off contaminated clothing and wash before reuse.

Inhalation

Ensure supply of fresh air.
In the event of symptoms seek medical treatment.

Skin contact

In case of contact with skin wash off immediately with soap and water.
Consult a doctor if skin irritation persists.

Eye contact

Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
If eye irritation persists: Get medical advice/attention.

Ingestion

Supply with medical care.
Rinse out mouth and give plenty of water to drink.

4.2 Most important symptoms and effects, both acute and delayed

Allergic reactions
Irritant effects

4.3 Indication of any immediate medical attention and special treatment needed

Treat symptomatically.

SECTION 5: Fire-fighting measures

5.1 Extinguishing media

Suitable extinguishing media

Carbon dioxide.
Dry powder.
Water spray jet.

Extinguishing media that must not be used

Full water jet
Foam.

5.2 Special hazards arising from the substance or mixture

In the event of fire the following can be released:
Carbon monoxide (CO)

5.3 Advice for firefighters

Do not inhale explosion and/or combustion gases.
Use self-contained breathing apparatus.

Fire residues must be disposed of in accordance within the local regulations.

SECTION 6: Accidental release measures

6.1 Personal precautions, protective equipment and emergency procedures

Ensure adequate ventilation.
Use personal protective equipment.
High risk of slipping due to leakage/spillage of product.
Keep away from all sources of ignition.

6.2 Environmental precautions

Do not discharge into the drains/surface waters/groundwater.
In case the product spills into drains/surface waters/groundwater, immediately inform the authorities.

6.3 Methods and material for containment and cleaning up

Take up mechanically.
Take up residues with absorbent material (e.g. sand, sawdust, general purpose binder, diatomaceous earth).
Dispose of absorbed material in accordance within the regulations.

6.4 Reference to other sections

See SECTION 8+13

SECTION 7: Handling and storage

7.1 Precautions for safe handling

Use only in well-ventilated areas.

Keep away from all sources of ignition - Refrain from smoking.

Take off contaminated clothing and wash before reuse.
Do not eat, drink, smoke or take drugs at work.
Wash hands before breaks and after work.
Use barrier skin cream.

7.2 Conditions for safe storage, including any incompatibilities

Keep only in original container.
Prevent penetration into the ground.

Do not store together with food and animal food/diet.

Keep container in a well-ventilated place.
Keep container tightly closed.
Keep in a cool place. Store in a dry place.
Store in a dark place.
Protect from atmospheric moisture and water.
Recommended storage temperature: 5 °C - +25 °C

7.3 Specific end use(s)

See product use, SECTION 1.2

SECTION 8: Exposure controls / personal protection

8.1 Control parameters

Ingredients with occupational exposure limits to be monitored (GB)

Range [%]	Substance
1 - <5	Quartz (< 10µm)
	CAS: 14808-60-7, EINECS/ELINCS: 238-878-4
	Long-term exposure: 0,15 mg/m³, HSE, NIOSH, OSHA
1 - <20	Glycerol
	CAS: 56-81-5, EINECS/ELINCS: 200-289-5
	Long-term exposure: 10 mg/m³, (mist)
1 - <20	Dibenzoyl peroxide
	CAS: 94-36-0, EINECS/ELINCS: 202-327-6, EU-INDEX: 617-008-00-0, ECB-Nr.: 01-2119511472-50-XXXX
	Long-term exposure: 5 mg/m³

DNEL

Range [%]	Substance
1 - <20	Dibenzoyl peroxide, CAS: 94-36-0
	Industrial, dermal, Long-term - systemic effects: 6,6 mg/kg bw/d.
	Industrial, inhalative, Long-term - systemic effects: 11,75 mg/m³.
	general population, oral, Long-term - systemic effects: 1,65 mg/kg bw/d.
	general population, dermal, Long-term - systemic effects: 3,3 mg/kg bw/d.
	general population, inhalative, Long-term - systemic effects: 2,9 mg/m³.

PNEC

Range [%]	Substance
1 - <20	Dibenzoyl peroxide, CAS: 94-36-0
	oral (food), 6,67 mg/kg dw.
	soil, 0,0758 mg/kg dw.
	sediment (freshwater), 0,338 mg/kg dw.
	sewage treatment plants (STP), 0,35 mg/l.
	freshwater, 0,000602 mg/l.
	seawater, 0,0000602 mg/l.

8.2 Exposure controls

Additional advice on system design	Ensure adequate ventilation on workstation.
Eye protection	Tightly fitting goggles.
Hand protection	The details concerned are recommendations. Please contact the glove supplier for further information. In splash contact Nitrile rubber, >120 min (EN 374). In full contact: Butyl rubber, >480 min (EN 374).
Skin protection	Protective clothing.
Other	Avoid contact with eyes and skin. Do not inhale gases/vapours/aerosols. Personal protective equipment should be selected specifically for the working place, depending on concentration and quantity handled. The resistance of this equipment to chemicals should be ascertained with the respective supplier.
Respiratory protection	If ventilation is insufficient, wear respiratory protection. Short term: filter apparatus, combination filter A-P2.
Thermal hazards	not applicable
Delimitation and monitoring of the environmental exposition	Protect the environment by applying appropriate control measures to prevent or limit emissions.

SECTION 9: Physical and chemical properties

9.1 Information on basic physical and chemical properties

Form	pasty
Color	black
Odor	characteristic
Odour threshold	not determined
pH-value	not applicable
pH-value [1%]	not applicable
Boiling point [°C]	not determined
Flash point [°C]	116
Flammability (solid, gas) [°C]	not determined
Lower explosion limit	not determined
Upper explosion limit	not determined
Oxidizing properties	not determined
Vapour pressure/gas pressure [kPa]	not determined
Density [g/ml]	not determined
Bulk density [kg/m³]	not applicable
Solubility in water	insoluble
Partition coefficient [n-octanol/water]	not determined
Viscosity	not determined
Relative vapour density determined in air	not determined
Evaporation speed	not determined
Melting point [°C]	not determined
Autoignition temperature [°C]	not determined
Decomposition temperature [°C]	not determined

9.2 Other information

No information available.

SECTION 10: Stability and reactivity

10.1 Reactivity

See SECTION 10.3.

10.2 Chemical stability

Stable under normal ambient conditions (ambient temperature).

10.3 Possibility of hazardous reactions

Reactions with oxidizing agents.

10.4 Conditions to avoid

Strong heating.
See SECTION 7.2.

10.5 Incompatible materials

Strong oxidizing agent.

10.6 Hazardous decomposition products

No hazardous decomposition products known.

SECTION 11: Toxicological information

11.1 Information on toxicological effects

Acute toxicity

Range [%]	Substance
1 - <5	2-Ethylhexyl benzoate, CAS: 5444-75-7
	LD50, dermal, Rabbit: >5000 mg/kg bw.
	LD50, oral, Rat: >2000 mg/kg bw.
1 - <20	Dibenzoyl peroxide, CAS: 94-36-0
	LD50, oral, Rat: >5000 mg/kg.

Serious eye damage/irritation	not determined
Skin corrosion/irritation	not determined
Respiratory or skin sensitisation	not determined
Specific target organ toxicity — single exposure	not determined
Specific target organ toxicity — repeated exposure	not determined
Mutagenicity	There is no evidence of any mutagenic effects.
Reproduction toxicity	There is no evidence of any reproductive toxicity effects.
Carcinogenicity	There is no evidence of any carcinogenic effects.
General remarks	

Toxicological data of complete product are not available.
The toxicity data listed pertaining to the ingredients are intended for those working in the medicinal professions, experts for occupational health and safety and toxicologists. The toxicity data pertaining to the ingredients were supplied by the manufacturers of raw materials.

SECTION 12: Ecological information

12.1 Toxicity

Product
EC50, (72h), Pseudokirchneriella subcapitata: > 1 mg/l.
EC50, (48h), Daphnia magna: > 1 mg/l.

Range [%]	Substance
1 - <20	Dibenzoyl peroxide, CAS: 94-36-0
	LC50, (96h), Oncorhynchus mykiss: 0,0602 mg/l (OECD 203).
	LC50, (96h), fish: 1,7-2,4 mg/l (OECD 203).
	EC50, (48h), Daphnia magna: 2,91 mg/l (OECD 202).
	EC50, (48h), Daphnia magna: 0,11 mg/l (OECD 202).
	EC50, (72h), Pseudokirchneriella subcapitata: 0,0711 mg/l (OECD 201).
	NOEC, (48h), Daphnia magna: 1,99 mg/l.

12.2 Persistence and degradability

Behaviour in environment compartments	not determined
Behaviour in sewage plant	not determined
Biological degradability	not determined

12.3 Bioaccumulative potential

No information available.

12.4 Mobility in soil

No information available.

12.5 Results of PBT and vPvB assessment

Based on all available information not to be classified as PBT or vPvB respectively.

12.6 Other adverse effects

No classification due to toxicological investigations.
The toxicity data pertaining to the ingredients were supplied by the manufacturers of raw materials.
Do not discharge product unmonitored into the environment.

SECTION 13: Disposal considerations

13.1 Waste treatment methods

Waste material must be disposed of in accordance with the Directive on waste 2008/98/EC as well as other national and local regulations. It is not possible to determine a waste code for this product in accordance with the European Waste Catalogue (EWC) since it is only possible to classify it according to how it is used by the customer. The waste code is to be determined within the EU in liaison with the waste-disposal operator.

Product

Coordinate disposal with the disposal contractor/authorities if necessary.

Waste no. (recommended) 080409*

Contaminated packaging

Uncontaminated packaging may be taken for recycling.
Packaging that cannot be cleaned should be disposed of as for product.

Waste no. (recommended) 150110*
150102

SECTION 14: Transport information

14.1 UN number

See SECTION 14.2 in accordance with UN shipping name

14.2 UN proper shipping name

Transport by land according to ADR/RID	NO DANGEROUS GOODS
Inland navigation (ADN)	NO DANGEROUS GOODS
Marine transport in accordance with IMDG	NOT CLASSIFIED AS "DANGEROUS GOODS"
Air transport in accordance with IATA	NOT CLASSIFIED AS "DANGEROUS GOODS"

14.3 Transport hazard class(es)

See SECTION 14.2 in accordance with UN shipping name

14.4 Packing group

See SECTION 14.2 in accordance with UN shipping name

14.5 Environmental hazards

See SECTION 14.2 in accordance with UN shipping name

14.6 Special precautions for user

Relevant information under SECTION 6 to 8.

14.7 Transport in bulk according to Annex II of MARPOL and the IBC Code

not applicable

SECTION 15: Regulatory information

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

EEC-REGULATIONS	1991/689 (2001/118); 1999/13; 2004/42; 648/2004; 1907/2006 (REACH); 1272/2008; 75/324/EEC (2008/47/EC); 453/2010/EC; (EU) 2015/830
TRANSPORT-REGULATIONS	DOT-Classification, ADR (2015); IMDG-Code (2015, 37. Amdt.); IATA-DGR (2015).
NATIONAL REGULATIONS (GB):	EH40/2005 Workplace exposure limits (Second edition, published December 2011). CHIP 3/ CHIP 4
- Observe employment restrictions for people	Observe employment restrictions for young people.
- VOC (1999/13/CE)	0 %

15.2 Chemical safety assessment

not applicable

SECTION 16: Other information

16.1 Hazard statements (SECTION 3)

H372 Causes damage to organs through prolonged or repeated exposure.
H413 May cause long lasting harmful effects to aquatic life.
H400 Very toxic to aquatic life.
H317 May cause an allergic skin reaction.
H319 Causes serious eye irritation.
H241 Heating may cause a fire or explosion.

16.2 Abbreviations and acronyms:

ADR = Accord européen relatif au transport international des marchandises Dangereuses par Route
RID = Règlement concernant le transport international ferroviaire de marchandises dangereuses
ADN = Accord européen relatif au transport international des marchandises dangereuses par voie de navigation intérieure
CAS = Chemical Abstracts Service
CLP = Classification, Labelling and Packaging
DMEL = Derived Minimum Effect Level
DNEL = Derived No Effect Level
EC50 = Median effective concentration
ECB = European Chemicals Bureau
EEC = European Economic Community
EINECS = European Inventory of Existing Commercial Chemical Substances
ELINCS = European List of Notified Chemical Substances
GHS = Globally Harmonized System of Classification and Labelling of Chemicals
IATA = International Air Transport Association
IBC-Code = International Code for the Construction and Equipment of Ships carrying Dangerous Chemicals in Bulk
IC50 = Inhibition concentration, 50%
IMDG = International Maritime Code for Dangerous Goods
IUCLID = International Uniform ChemicaL Information Database
LC50 = Lethal concentration, 50%
LD50 = Median lethal dose
MARPOL = International Convention for the Prevention of Marine Pollution from Ships
PBT = Persistent, Bioaccumulative and Toxic substance
PNEC = Predicted No-Effect Concentration
REACH = Registration, Evaluation, Authorisation and Restriction of Chemicals
TLV®/TWA = Threshold limit value – time-weighted average
TLV®STEL = Threshold limit value – short-time exposure limit
VOC = Volatile Organic Compounds
vPvB = very Persistent and very Bioaccumulative

16.3 Other information

Classification procedure

Skin Sens. 1: H317 May cause an allergic skin reaction. (Calculation method)
Eye Irrit. 2: H319 Causes serious eye irritation. (Calculation method)

Modified position

SECTION 2 been added: R 51/53: Toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment.

SECTION 2 been added: Dangerous for the environment

SECTION 6 been added: In case the product spills into drains/surface waters/groundwater, immediately inform the authorities.

SECTION 11 been added: Toxicological data of complete product are not available.

SECTION 11 deleted: Sensitizing.

SECTION 11 deleted: Slight irritant effect - does not require labelling.

SECTION 16 been added: Calculation method