



Rudolf Hensel GmbH
21039 Börnsen

Date printed 19.10.2023, Revision 12.09.2023

Version 8.0. Supersedes version: 7.0

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

1.1 Product identifier

HENSOTHERM® 310 KS outdoor

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

1.2.1 Relevant uses

Fire retardant coating

1.2.2 Uses advised against

None known.

1.3 Details of the supplier of the safety data sheet

Company

Rudolf Hensel GmbH
Lauenburger Landstr. 11
21039 Börnsen / GERMANY
Phone +49 (0)40-72 10 62 10
Fax +49 (0)40-72 10 62 52
Homepage www.rudolf-hensel.de
E-mail info@rudolf-hensel.de

Address enquiries to

Technical information

info@rudolf-hensel.de

Safety Data Sheet

sdb@chemiebuero.de (No dispatch of safety data sheets)

Safety data sheets are available from the supplier.

1.4 Emergency telephone number

Company

+49 (0)40-72 10 62 10 (7:00 - 17:00) 0172 4115390 (17:00 - 07:00)

SECTION 2: Hazards identification

2.1 Classification of the substance or mixture [REGULATION (EC) No 1272/2008]

Flam. Liq. 3: H226 Flammable liquid and vapour.
Skin Irrit. 2: H315 Causes skin irritation.
Skin Sens. 1: H317 May cause an allergic skin reaction.
Eye Irrit. 2: H319 Causes serious eye irritation.
STOT SE 3: H335 May cause respiratory irritation.
Carc. 2: H351 Suspected of causing cancer.
Repr. 2: H361f Suspected of damaging fertility.
STOT RE 2: H373 May cause damage to organs through prolonged or repeated exposure.

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2.2 Label elements

Hazard pictograms



Signal word

WARNING

Contains:

Reaction mass of ethylbenzene and xylene

Maleic anhydride

Fatty acids, C14-18 and C16-18-unsatd., maleated

Melamine

Hazard statements

H226 Flammable liquid and vapour.

H315 Causes skin irritation.

H317 May cause an allergic skin reaction.

H319 Causes serious eye irritation.

H335 May cause respiratory irritation.

H351 Suspected of causing cancer.

H361f Suspected of damaging fertility.

H373 May cause damage to organs through prolonged or repeated exposure.

Precautionary statements

P201 Obtain special instructions before use.

P210 Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking.

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

P260 Do not breathe vapours / spray.

P271 Use only outdoors or in a well-ventilated area.

P308+P313 IF exposed or concerned: Get medical advice / attention.

P501 Dispose of contents/container in accordance with local/national regulation.

2004/42/CE

< 500 g/l II A i SB One-pack performance coatings (max. 500 g/l)

2.3 Other hazards

Human health dangers

It is essential for pregnant women to avoid inhaling the product and not to let it come in contact with the skin.

If swallowed or in the event of vomiting, risk of product entering the lungs.

Contains no ingredients with endocrine-disrupting properties.

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

3.1 Substances

not applicable

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3.2 Mixtures

The product is a mixture.

Range [%]	Substance
20 - < 30	Reaction mass of ethylbenzene and xylene EINECS/ELINCS: 905-588-0, Reg-No.: 01-2119488216-32-XXXX, 01-2119486136-34-XXXX GHS/CLP: Flam. Liq. 3: H226 - Acute Tox. 4: H312 H332 - Asp. Tox. 1: H304 - Skin Irrit. 2: H315 - Eye Irrit. 2: H319 - STOT SE 3: H335 - STOT RE 2: H373 SCL [%]: >= 10: STOT RE 2: H373
3 - < 10	Melamine CAS: 108-78-1, EINECS/ELINCS: 203-615-4, EU-INDEX: 613-345-00-2, Reg-No.: 01-2119485947-16-XXXX GHS/CLP: Carc. 2: H351 - Repr. 2: H361f - STOT RE 2: H373
<1	Fatty acids, C14-18 and C16-18-unsatd., maleated CAS: 85711-46-2, EINECS/ELINCS: 288-306-2, Reg-No.: 01-2119976378-19-XXXX GHS/CLP: Skin Irrit. 2: H315 - Skin Sens. 1B: H317 - Eye Irrit. 2: H319
0,001 - < 0,002	Maleic anhydride CAS: 108-31-6, EINECS/ELINCS: 203-571-6, EU-INDEX: 607-096-00-9, Reg-No.: 01-2119472428-31-XXXX GHS/CLP: Acute Tox. 4: H302 - Skin Corr. 1B: H314 - Eye Dam. 1: H318 - Skin Sens. 1A: H317 - Resp. Sens. 1: H334 - STOT RE 1: H372 - EUH071 SCL [%]: >=0,001: Skin Sens. 1A: H317

Comment on component parts

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

Remove the victim into fresh air and keep him calm.
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

Consult a doctor immediately.
Do not induce vomiting.
Rinse out mouth and give plenty of water to drink.

4.2 Most important symptoms and effects, both acute and delayed

Irritant effects
Vertigo
Dizziness

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

Water spray jet.
Carbon dioxide.
Foam.
Dry powder.

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.



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5.3 Advice for firefighters

Use self-contained breathing apparatus.

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

Collect contaminated firefighting water separately, must not be discharged into the drains.

Cool containers at risk with water spray jet.

SECTION 6: Accidental release measures

6.1 Personal precautions, protective equipment and emergency procedures

Keep away from all sources of ignition.

Ensure adequate ventilation.

Use breathing apparatus if exposed to vapours.

Use personal protective equipment (protective gloves, safety glasses, protective clothing).

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 with the regulations.

6.4 Reference to other sections

See SECTION 8+13

SECTION 7: Handling and storage

7.1 Precautions for safe handling

Provide suitable vacuuming at the processing machines and in the processing area.

Provide good room ventilation even at ground level (vapours are heavier than air).

Vapours can form an explosive mixture with air.

Take precautionary measures against static discharges.

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

Ignitable mixtures can be formed in the empty container.

Apparates and equipments must be conform in accordance to standard of storage and handling of flammable products.

Do not eat, drink, smoke or take drugs at work.

Take off contaminated clothing and wash before reuse.

After worktime and before work breaks the affected skin areas must be thoroughly cleaned.

Use barrier skin cream.

7.2 Conditions for safe storage, including any incompatibilities

Provide solvent-resistant and impermeable floor.

Keep only in original container.

Prevent penetration into the ground.

Provide floor with bunding.

Do not store together with oxidizing agents.

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

Keep container tightly closed.

Keep container in a well-ventilated place.

Protect from heat/overheating.

Keep in a cool place.

storage class (TRGS 510)

Storage class 3 (TRGS 510)



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7.3 Specific end use(s)

See product use, SECTION 1.2



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SECTION 8: Exposure controls / personal protection

8.1 Control parameters

Ingredients with occupational exposure limits to be monitored DE (TRGS 900)

Substance
Maleic anhydride
CAS: 108-31-6, EINECS/ELINCS: 203-571-6, EU-INDEX: 607-096-00-9, Reg-No.: 01-2119472428-31-XXXX
Exposure limit: 0,02 ppm, 0,081 mg/m³, Y, DFG, Sa, 11
Factor: 1;=2,5=(I)
Ethylbenzene
CAS: 100-41-4, EINECS/ELINCS: 202-849-4, EU-INDEX: 601-023-00-4, Reg-No.: 01-2119489370-35-XXXX
Exposure limit: 20 ppm, 88 mg/m³, H, Y, DFG
Factor: 2(II)
Xylene, mixture of isomers
CAS: 1330-20-7, EINECS/ELINCS: 215-535-7, EU-INDEX: 601-022-00-9, Reg-No.: 01-2119488216-32-XXXX
Exposure limit: 50 ppm, 220 mg/m³, DFG, EU, H
Factor: 2(II)

Ingredients with occupational exposure limits to be monitored EU (2004/37/EG)

Substance / EC LIMIT VALUES
Ethylbenzene
CAS: 100-41-4, EINECS/ELINCS: 202-849-4, EU-INDEX: 601-023-00-4, Reg-No.: 01-2119489370-35-XXXX
Eight hours: 100 ppm, 442 mg/m³, H
Short-term (15-minute): 200 ppm, 884 mg/m³
Xylene, mixture of isomers
CAS: 1330-20-7, EINECS/ELINCS: 215-535-7, EU-INDEX: 601-022-00-9, Reg-No.: 01-2119488216-32-XXXX
Eight hours: 50 ppm, 221 mg/m³, H
Short-term (15-minute): 100 ppm, 442 mg/m³

DNEL

Substance
Reaction mass of ethylbenzene and xylene
Industrial, inhalative (vapor), Long-term - systemic effects, 221 mg/m³
Industrial, dermal, Long-term - systemic effects, 212 mg/kg bw/day
Industrial, inhalative (vapor), Acute - local effects, 442 mg/m³
Industrial, inhalative (vapor), Acute - systemic effects, 442 mg/m³
Industrial, inhalative (vapor), Long-term - local effects, 221 mg/m³
general population, inhalative (vapor), Long-term - local effects, 65,3 mg/m³
general population, inhalative (vapor), Acute - systemic effects, 260 mg/m³
general population, inhalative (vapor), Long-term - systemic effects, 65,3 mg/m³
general population, dermal, Acute - local effects, 125 mg/kg bw/day
general population, oral, Long-term - systemic effects, 12,5 mg/kg bw/day
general population, inhalative (vapor), Acute - local effects, 260 mg/m³
Melamine, CAS: 108-78-1
Industrial, inhalative, Acute - systemic effects, 82,3 mg/m³
Industrial, dermal, Acute - systemic effects, 117 mg/kg
Industrial, inhalative, Long-term - systemic effects, 8,3 mg/m³
Industrial, dermal, Long-term - systemic effects, 11,8 mg/kg

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general population, inhalative, Long-term - systemic effects, 1,5 mg/m³
general population, dermal, Long-term - systemic effects, 4,2 mg/kg
general population, oral, Long-term - systemic effects, 0,42 mg/kg
Maleic anhydride, CAS: 108-31-6
Industrial, inhalative, Long-term - systemic effects, 81 µg/m³
Industrial, inhalative, Acute - local effects, 200 µg/m³
Industrial, dermal, Long-term - systemic effects, 200 µg/kg bw/day
Industrial, dermal, Acute - systemic effects, 200 µg/kg bw/day
Industrial, inhalative, Acute - systemic effects, 200 µg/m³
Industrial, inhalative, Long-term - local effects, 81 µg/m³
general population, dermal, Acute - systemic effects, 100 µg/kg bw/day
general population, inhalative, Long-term - local effects, 80 µg/m³
general population, dermal, Long-term - systemic effects, 100 µg/kg bw/day
general population, oral, Acute - systemic effects, 100 µg/kg bw/day
general population, inhalative, Long-term - systemic effects, 50 µg/m³
general population, oral, Long-term - systemic effects, 60 µg/kg bw/day
Fatty acids, C14-18 and C16-18-unsatd., maleated, CAS: 85711-46-2
Industrial, dermal, Long-term - systemic effects, 3,33 mg/kg bw/day
general population, oral, Long-term - systemic effects, 1,67 mg/kg bw/day
general population, dermal, Long-term - systemic effects, 1,67 mg/kg bw/day

PNEC

Substance
Reaction mass of ethylbenzene and xylene
seawater, 0,327 mg/L
sewage treatment plants (STP), 6,58 mg/L
sediment (freshwater), 12,46 mg/kg sediment dw
freshwater, 0,327 mg/L
sediment (seawater), 12,46 mg/kg sediment dw
soil, 2,31 mg/kg soil dw
Melamine, CAS: 108-78-1
sewage treatment plants (STP), 200 mg/L
soil, 0,206 mg/kg soil dw
sediment (seawater), 0,252 mg/kg sediment dw
sediment (freshwater), 2,524 mg/kg sediment dw
seawater, 0,051 mg/L
freshwater, 0,51 mg/L
Maleic anhydride, CAS: 108-31-6
sediment (seawater), 0,03 mg/kg sediment dw
freshwater, 0,038 mg/L
seawater, 0,004 mg/L
sediment (freshwater), 0,296 mg/kg sediment dw
soil, 0,037 mg/kg soil dw
sewage treatment plants (STP), 44,6 mg/L
Fatty acids, C14-18 and C16-18-unsatd., maleated, CAS: 85711-46-2
sewage treatment plants (STP), 100 mg/L



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8.2 Exposure controls

Additional advice on system design	Ensure adequate ventilation on workstation. Measurement methods for taking workplace measurements must meet the performance requirements of DIN EN 482. For example, recommendations are given in the IFA's list of hazardous substances.
Eye protection	Safety glasses. (EN 166:2001)
Hand protection	For short-term contact: 0,4mm Butyl rubber, >480 min (EN 374-1/-2/-3). 0,4mm Nitrile rubber, >480 min (EN 374-1/-2/-3). In full contact: 0,4mm Viton, >480 min (EN 374-1/-2/-3). The details concerned are recommendations. Please contact the glove supplier for further information.
Skin protection	Solvent-resistant protective clothing (EN 340)
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. Avoid contact during pregnancy/ while nursing.
Respiratory protection	In the event of occupational exposure limits being exceeded or of inadequate ventilation: wear appropriate respiratory protection. Short term: filter apparatus, combination filter A-P2. (DIN EN 14387)
Thermal hazards	none
Delimitation and monitoring of the environmental exposition	Protect the environment by applying appropriate control measures to prevent or limit emissions.



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SECTION 9: Physical and chemical properties

9.1 Information on basic physical and chemical properties

Physical state	liquid
Form	pasty
Color	white
Odor	characteristic
Odour threshold	not relevant
pH-value	not applicable
pH-value [1%]	not applicable
Boiling point [°C]	> 100
Flash point [°C]	26
Flammability	yes
Lower explosion limit	ca. 1 Vol.%
Upper explosion limit	ca. 8 Vol.%
Oxidising properties	no
Vapour pressure/gas pressure [kPa]	not determined
Density [g/cm³]	1,25 - 1,35 (20 °C / 68,0 °F)
Relative density	not determined
Bulk density [kg/m³]	not applicable
Solubility in water	soluble
Solubility other solvents	not relevant
Partition coefficient [n-octanol/water]	not determined
Kinematic viscosity	7000 - 13000 mPa.s (20 °C)
Relative vapour density	not determined
Evaporation speed	not determined
Melting point [°C]	not determined
Auto-ignition temperature [°C]	not self-igniting
Decomposition temperature [°C]	not determined
Particle characteristics	not relevant

9.2 Other information

none

SECTION 10: Stability and reactivity

10.1 Reactivity

No dangerous reactions known if used as directed.

10.2 Chemical stability

The product is stable under standard conditions.

10.3 Possibility of hazardous reactions

Evolution of flammable mixtures possible in air when heated above flash point and/or during spraying or misting.
Uncleaned empty vessels may contain product gases which can form explosive mixtures with air.
Reactions with oxidizing agents.

10.4 Conditions to avoid

Strong heating.
See SECTION 7



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10.5 Incompatible materials

Oxidizing agent

10.6 Hazardous decomposition products

No hazardous decomposition products known.

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SECTION 11: Toxicological information

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

Acute oral toxicity

Product
ATE-mix, oral, >2000 mg/kg
Substance
Reaction mass of ethylbenzene and xylene
LD50, oral, Rat, 3523 - 4000 mg/kg
Melamine, CAS: 108-78-1
LD50, oral, Rat (male), 3161 mg/kg
LD50, oral, Rat (female), 3828 mg/kg
Maleic anhydride, CAS: 108-31-6
LD50, oral, Rat, 1090 mg/kg bw
NOAEL, oral, Rat, 10 - 250 mg/kg bw/day
Fatty acids, C14-18 and C16-18-unsatd., maleated, CAS: 85711-46-2
LD50, oral, > 2000 mg/kg

Acute dermal toxicity

Product
ATE-mix, dermal, >2000 mg/kg
Substance
Reaction mass of ethylbenzene and xylene
LD50, dermal, Rabbit, 12126 mg/kg
Melamine, CAS: 108-78-1
LD50, dermal, Rat, > 2000 mg/kg
Maleic anhydride, CAS: 108-31-6
LD50, dermal, Rabbit, 2620 mg/kg bw
Fatty acids, C14-18 and C16-18-unsatd., maleated, CAS: 85711-46-2
LD50, dermal, > 2000 mg/kg

Acute inhalational toxicity

Product
ATE-mix, inhalation (vapour), >20 mg/l 4h
Substance
Reaction mass of ethylbenzene and xylene
LC50, inhalation (vapour), Rat, 6350 - 6700 ppm 4h
Melamine, CAS: 108-78-1
LC50, inhalative, Rat, 5,19 mg/l, OECD 403, 4h
Maleic anhydride, CAS: 108-31-6
NOAEC, inhalative, Rat, 3.3 mg/m³ air

Serious eye damage/irritation

Irritant
Based on the available information, the classification criteria are fulfilled.
Toxicological data of complete product are not available.
Calculation method

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Substance
Reaction mass of ethylbenzene and xylene
Eye, irritant
Melamine, CAS: 108-78-1
Eye, non-irritating
Maleic anhydride, CAS: 108-31-6
Eye, Rabbit, OECD 405, Can cause irreversible damage to the eyes.
Fatty acids, C14-18 and C16-18-unsatd., maleated, CAS: 85711-46-2
Eye, irritant

Skin corrosion/irritation

Irritant

Based on the available information, the classification criteria are fulfilled.

Toxicological data of complete product are not available.

Calculation method

Substance
Reaction mass of ethylbenzene and xylene
dermal, irritant
Melamine, CAS: 108-78-1
Rabbit, OECD 404, non-irritating
Maleic anhydride, CAS: 108-31-6
dermal, Rabbit, OECD 404, corrosive
Fatty acids, C14-18 and C16-18-unsatd., maleated, CAS: 85711-46-2
dermal, irritant

Respiratory or skin sensitisation

May cause an allergic skin reaction.

Based on the available information, the classification criteria are fulfilled.

Toxicological data of complete product are not available.

Calculation method

Substance
Reaction mass of ethylbenzene and xylene
dermal, non-sensitizing
Melamine, CAS: 108-78-1
inhalative, non-sensitizing
Guinea pig, OECD 406, non-sensitizing
Maleic anhydride, CAS: 108-31-6
inhalative, Rat, In vivo study, sensitising
dermal, mouse, OECD 429, sensitising
Fatty acids, C14-18 and C16-18-unsatd., maleated, CAS: 85711-46-2
dermal, sensitising

Specific target organ toxicity — single exposure

May cause respiratory irritation.

Based on the available information, the classification criteria are fulfilled.

Toxicological data of complete product are not available.

Calculation method

Substance
Reaction mass of ethylbenzene and xylene
inhalative, irritant

Specific target organ toxicity — repeated exposure

May cause damage to organs through prolonged or repeated exposure.

Based on the available information, the classification criteria are fulfilled.

Toxicological data of complete product are not available.

Calculation method

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Substance
Reaction mass of ethylbenzene and xylene
NOAEL, oral, Rat, 250 mg/kg bw/day (chronic), adverse effect observed
NOAEC, inhalative, Rat, 3515 mg/m³ (subchronic), adverse effect observed
Melamine, CAS: 108-78-1
NOAEL, oral, Rat, 72 mg/kg bw/day (subchronic), adverse effect observed
Maleic anhydride, CAS: 108-31-6
NOAEL, oral, Dog, 60 mg/kg bw/day, OECD 409, no adverse effect observed
NOAEC, inhalative, Rat, 3,3 mg/m³, In vivo study, adverse effect observed
Fatty acids, C14-18 and C16-18-unsatd., maleated, CAS: 85711-46-2
NOAEL, oral, Rat, no adverse effect observed

Mutagenicity

Does not contain a relevant substance that meets the classification criteria.
Based on the available information, the classification criteria are not fulfilled.
Toxicological data of complete product are not available.

Substance
Reaction mass of ethylbenzene and xylene
in vivo, no adverse effect observed
Melamine, CAS: 108-78-1
in vivo, negativ
in vitro, negativ
Maleic anhydride, CAS: 108-31-6
in vitro, OECD 471, negativ

Reproduction toxicity

Suspected of damaging fertility.
Based on the available information, the classification criteria are fulfilled.
Toxicological data of complete product are not available.
Calculation method

- Fertility

Substance
Melamine, CAS: 108-78-1
NOAEL, oral, Rat, 89 mg/kg bw/day (subchronic), adverse effect observed
Maleic anhydride, CAS: 108-31-6
NOAEL, oral, Rat, 55 mg/kg bw/day, OECD 416, no adverse effect observed

- Development

Substance
Reaction mass of ethylbenzene and xylene
inhalative, Rat, 4698 mg/m³, no adverse effect observed
Melamine, CAS: 108-78-1
NOAEL, oral, Rabbit, 150 mg/kg bw/day (subacute), no adverse effect observed
Maleic anhydride, CAS: 108-31-6
NOAEL, oral, Rat, 140 mg/kg bw/day, OECD 414, no adverse effect observed

Carcinogenicity

Based on the available information, the classification criteria are fulfilled.
Suspected of causing cancer.
Calculation method
Toxicological data of complete product are not available.

Substance
Reaction mass of ethylbenzene and xylene
NOAEL, oral, Rat, 500 mg/kg bw/day (chronic), no adverse effect observed



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Melamine, CAS: 108-78-1

LOAEL, oral, Rat, 126 mg/kg bw/day (chronic), adverse effect observed

Maleic anhydride, CAS: 108-31-6

NOAEL, oral, Rat, 100 mg/kg bw/day, OECD 451, no adverse effect observed

Aspiration hazard

Based on the available information, the classification criteria are not fulfilled.

General remarks

none

11.2 Information on other hazards

11.2.1 Endocrine disrupting properties

Contains no ingredients with endocrine-disrupting properties.

11.2.2 Other information

SECTION 12: Ecological information

12.1 Toxicity

Substance

Reaction mass of ethylbenzene and xylene

LC50, (24h), Daphnia magna, 1 mg/l OECD 202

LC50, (96h), Oncorhynchus mykiss, 2,6 mg/l OECD 203

EC50, (72h), Selenastrum capricornutum, 2,2 mg/l OECD 201

NOEC, (21d), Invertebrates, 1,57 mg/l

Melamine, CAS: 108-78-1

LC50, (96h), Oncorhynchus kisutch, > 3000 mg/L

EC50, (48h), Daphnia magna, 200 mg/L EPA OPP 72-2

NOEC, (21d), Daphnia magna, >= 11 mg/L OECD 211

ErC50, (96h), Pseudokirchneriella subcapitata, 325 mg/L PRO/FT Algae-AC090-6

Maleic anhydride, CAS: 108-31-6

LC50, (96h), fish, 75 mg/L

EC50, (72h), Algae, 74.35 - 150 mg/L

EC50, (48h), Invertebrates, 42,81 - 330 mg/L

Fatty acids, C14-18 and C16-18-unsatd., maleated, CAS: 85711-46-2

EC50, (72h), Algae, 2,76 - 100 mg/L

EC50, (48h), Invertebrates, 5,3 - 100 mg/L

NOEC, (72h), Algae, 2,76 - 100 mg/L

NOEC, (48h), Invertebrates, 5,3 - 100 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

Accumulation in organisms is not expected.

12.4 Mobility in soil

Spillages may penetrate the soil causing ground water contamination.



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12.5 Results of PBT and vPvB assessment

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

12.6 Endocrine disrupting properties

Contains no ingredients with endocrine-disrupting properties.

12.7 Other adverse effects

None known.

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

Dispose of as hazardous waste.

Disposal in an incineration plant in accordance with the regulations of the local authorities.

Waste no. (recommended)

080111*

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* packaging containing residues of or contaminated by hazardous substances

SECTION 14: Transport information

14.1 UN number or ID number

Transport by land according to ADR/RID 1263

Inland navigation (ADN) 1263

Marine transport in accordance with IMDG 1263

Air transport in accordance with IATA 1263

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14.2 UN proper shipping name

Transport by land according to ADR/RID

Paint (No dangerous goods, according ADR 2.2.3.1.5 to max. 450 l)

- Label



- ADR 1.1.3.6 (8.6)

Transport category (tunnel restriction code) 3 (D/E)

Inland navigation (ADN)

Paint (No dangerous goods, according ADR 2.2.3.1.5 to max. 450 l)

- Label



Marine transport in accordance with IMDG

Paint (No dangerous goods, according IMDG 2.3.2.5 to max. 30 l (see 5.4.1.5.10) - "transport in compliance with 2.3.2.5 of the IMDG Code")

- EMS

F-E, S-E

- Label



Air transport in accordance with IATA Paint

- Label



14.3 Transport hazard class(es)

Transport by land according to ADR/RID

3

Inland navigation (ADN)

3

Marine transport in accordance with IMDG

3

Air transport in accordance with IATA 3

14.4 Packing group

Transport by land according to ADR/RID

III

Inland navigation (ADN)

III

Marine transport in accordance with IMDG

III

Air transport in accordance with IATA III



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14.5 Environmental hazards

Transport by land according to ADR/RID no

Inland navigation (ADN) no

Marine transport in accordance with IMDG no

Air transport in accordance with IATA no

14.6 Special precautions for user

Relevant information under SECTION 6 to 8.

14.7 Maritime transport in bulk according to IMO instruments

not applicable

SECTION 15: Regulatory information

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

EEC-REGULATIONS	2008/98/EC 2000/532/EC; 2010/75/EU; 2004/42/EC; (EC) 648/2004; (EC) 1907/2006 (REACH); (EU) 1272/2008; 75/324/EEC ((EC) 2016/2037); (EU) 2020/878; (EU) 2016/131; (EU) 517/2014; (EU) 2019/1148
- Comment on component parts	SVHC (Candidate List of Substances of Very High Concern for authorisation) ≥ 0.1% CAS 108-78-1 - Melamine
- Annex I (REACH)	The product is not subject to Annex I restrictions.
- Annex XIV (REACH)	According to Annex XIV of Regulation (EC) 1907/2006 (REACH) the product does not contain any substances ≥ 0.1% that are subject to authorisation.
- Annex XVII (REACH)	According to Annex XVII of Regulation (EC) 1907/2006 (REACH) the product contains ≥ 0.1% of substances with the following restrictions. 40, 75 According to Annex XVII of Regulation (EC) 1907/2006 (REACH) the product is subject to the following restrictions. 3
TRANSPORT-REGULATIONS	ADR (2023); IMDG-Code (2023, 41. Amdt.); IATA-DGR (2023)
NATIONAL REGULATIONS (DE):	Hazardous Substances Ordinance - GefStoffV 2016; Detergent and Cleaning Agents Act - WRMG; Federal Water Act - WHG; Technical Rule for Hazardous Substances - TRGS: 200, 220, 615, 900, 905.
- Water hazard class	2, conf. AwSV, 18.04.2017
- Decree for case of interference, observe limits	yes
- Class. according to TA-Luft	5.2.5.
- GISBAU, Produktcode	BS60
Storage class (TRGS 510)	Storage class 3 (TRGS 510)
- Observe employment restrictions for people	Observe employment restrictions for mothers-to-be and nursing mothers. Observe employment restrictions for young people.
- VOC (2010/75/CE)	< 500 g/l
- Other regulations	Principles of industrial medicine Occupational Safety Regulations G29: Toluene, Xylene. DGUV Information 213-079: Tätigkeiten mit Gefahrstoffen - Informationen für Beschäftigte. DGUV Information 213-072: Lösemittel (Merkblatt M 017 der Reihe "Gefahrstoffe") TRGS 401: Gefährdung durch Hautkontakt. - Ermittlung, Beurteilung, Maßnahmen. TRGS 510: Storage of hazardous substances in non-stationary containers

15.2 Chemical safety assessment

not applicable



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SECTION 16: Other information

16.1 Hazard statements (SECTION 3)

H373 May cause damage to organs through prolonged or repeated exposure.
H361f Suspected of damaging fertility.
H351 Suspected of causing cancer.
EUH071 Corrosive to the respiratory tract.
H372 Causes damage to organs through prolonged or repeated exposure.
H334 May cause allergy or asthma symptoms or breathing difficulties if inhaled.
H318 Causes serious eye damage.
H314 Causes severe skin burns and eye damage.
H302 Harmful if swallowed.
H317 May cause an allergic skin reaction.

H373 May cause damage to organs through prolonged or repeated exposure through inhalation.
H335 May cause respiratory irritation.
H319 Causes serious eye irritation.
H315 Causes skin irritation.
H304 May be fatal if swallowed and enters airways.
H312+H332 Harmful in contact with skin or if inhaled.
H226 Flammable liquid and vapour.

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
ATE = acute toxicity estimate
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
EL50 = Median effective loading
ELINCS = European List of Notified Chemical Substances
EmS = Emergency Schedules
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
IVIS = In vitro irritation score
LC50 = Lethal concentration, 50%
LD50 = Median lethal dose
LC0 = lethal concentration, 0%
LOAEL = lowest-observed-adverse-effect level
LL50 = Median lethal loading
LQ = Limited Quantities
MARPOL = International Convention for the Prevention of Marine Pollution from Ships
NOAEL = No Observed Adverse Effect Level
NOEC = No Observed Effect Concentration
PBT = Persistent, Bioaccumulative and Toxic substance
PNEC = Predicted No-Effect Concentration
REACH = Registration, Evaluation, Authorisation and Restriction of Chemicals
STP = Sewage Treatment Plant
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



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16.3 Other information

Classification procedure

Flam. Liq. 3: H226 Flammable liquid and vapour. (On basis of test data)
Skin Irrit. 2: H315 Causes skin irritation. (Calculation method)
Skin Sens. 1: H317 May cause an allergic skin reaction. (Calculation method)
Eye Irrit. 2: H319 Causes serious eye irritation. (Calculation method)
STOT SE 3: H335 May cause respiratory irritation. (Calculation method)
Carc. 2: H351 Suspected of causing cancer. (Calculation method)
Repr. 2: H361f Suspected of damaging fertility. (Calculation method)
STOT RE 2: H373 May cause damage to organs through prolonged or repeated exposure. (Calculation method)

Modified position

SECTION 3 been added: Melamine
SECTION 3 deleted: Melamine
SECTION 2 been added: H351 Suspected of causing cancer.
SECTION 2 been added: Carc. 2
SECTION 2 been added: It is essential for pregnant women to avoid inhaling the product and not to let it come in contact with the skin.
SECTION 9 been added: yes
SECTION 9 deleted: not applicable
SECTION 9 been added: liquid
SECTION 11 been added: Calculation method
SECTION 11 been added: Suspected of causing cancer.
SECTION 11 deleted: Does not contain a relevant substance that meets the classification criteria.
SECTION 11 been added: Based on the available information, the classification criteria are fulfilled.
SECTION 11 deleted: Based on the available information, the classification criteria are not fulfilled.
SECTION 16 been added: Calculation method

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