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

according to Regulation (EU) 2020/878

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

1.1. Product identifier

Article No. (manufacturer/supplier) 324

Trade name/designation DUROPUR 1K-PUR Haftvermittler FH-1000

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

Relevant identified uses

Coating material to protecting surfaces

Details of the supplier of the safety data sheet

supplier (manufacturer/importer/downstream user/distributor)

Vismara Unternehmungen CH-5000 Aarau www.farbladen.ch

Department responsible for information:

laboratory Manager

E-mail (competent person) info@knuchel.ch

1.4. Emergency telephone number

Emergency telephone number 145 (+41 (0)44 251 51 51)

SECTION 2: Hazards identification

2.1. Classification of the substance or mixture

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

The mixture is classified as hazardous according to regulation (EC) No 1272/2008 [CLP].

Flam. Liq. 3 / H226 Flammable liquids Flammable liquid and vapour.

Acute Tox. 4 / H332 Acute toxicity (inhalative) Harmful if inhaled.
Skin Irrit. 2 / H315 Skin corrosion/irritation Causes skin irritation.

Eye Irrit. 2 / H319 Serious eye damage/eye irritation Causes serious eye irritation.

Resp. Sens. 1 / H334 Respiratory or skin sensitisation May cause allergy or asthma symptoms or

breathing difficulties if inhaled.

Skin Sens. 1 / H317 Respiratory or skin sensitisation May cause an allergic skin reaction.
Carc. 2 / H351 Suspected of causing cancer.
STOT SE 3 / H335 STOT-single exposure May cause respiratory irritation.
STOT RE 2 / H373 STOT-repeated exposure

prolonged or repeated exposure.

Asp. Tox. 1 / H304 Aspiration hazard May be fatal if swallowed and enters airways.

2.2. Label elements

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

Hazard pictograms







Danger

Hazard statements

H226 Flammable liquid and vapour.

H332 Harmful if inhaled.
H315 Causes skin irritation.
H319 Causes serious eye irritation.

H334 May cause allergy or asthma symptoms or breathing difficulties if inhaled.

H317 May cause an allergic skin reaction.
H351 Suspected of causing cancer.
H335 May cause respiratory irritation.

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

H304 May be fatal if swallowed and enters airways.

Precautionary statements

P101 If medical advice is needed, have product container or label at hand.

P102 Keep out of reach of children.

P103 Read carefully and follow all instructions.

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

according to Regulation (EU) 2020/878

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AIIICIE NO	.3/4	DURUPUR IN-PUR DAIIVEITIIIIELED-TUUU

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P202	Do n	ot handle until all safety precautions ha	e been read and understood.	
P210	Kee	o away from heat, hot surfaces, sparks,	open flames and other ignition sourc	es. No smoking.
P240	Grou	and bond container and receiving ed	uipment.	
P241	Use	explosion-proof electrical equipment.		
P242	Use	non-sparking tools.		
P243	Take	e action to prevent static discharges.		
P260	Do n	ot breathe vapour.		
P261	Avoi	d breathing vapours.		
P264	Was	h hands thoroughly after handling.		
P271	Use	only outdoors or in a well-ventilated area	à.	
P272	Conf	taminated work clothing should not be a	lowed out of the workplace.	
P280	Wea	r protective gloves and eye/face protect	on.	
P284	In ca	ase of inadequate ventilation wear respir	atory protection.	
P301 + P310	IF S'	WALLOWED: Immediately call a POISC	N CENTER or doctor/physician.	
P302 + P352	IF O	N SKIN: Wash with plenty of soap and v	ater.	
P303 + P361	+ P353 IF O	N SKIN (or hair): Take off immediately a	Il contaminated clothing. Rinse skin	with water [or shower].
P304 + P340	IF IN	IHALED: Remove person to fresh air and	d keep comfortable for breathing.	
P305 + P351		I EYES: Rinse cautiously with water for some to do. Continue rinsing.	several minutes. Remove contact ler	ises, if present and
P308 + P313	IF ex	sposed or concerned: Get medical advic	e/attention.	
P312	Call	a POISON CENTER or doctor/physician	if you feel unwell.	
P331	Do N	NOT induce vomiting.	•	
P333 + P313	If ski	in irritation or rash occurs: Get medical a	idvice/attention.	
P337 + P313	If ey	e irritation persists: Get medical advice/a	attention.	
P342 + P311	If ex	periencing respiratory symptoms: Call a	POISON CENTER or doctor/physici	an.
P362 + P364	Take	e off contaminated clothing and wash it b	efore reuse.	
P370 + P378	In ca	ase of fire: Use extinguishing powder or	sand to extinguish.	
	_			

Store in a well-ventilated place. Keep container tightly closed.

Dispose of contents/container to industrial incineration plant.

Hazard components for labelling

Xylene

Keep locked up.

Aromatic polyisocyanate prepolymer Diphenylmethane diisocyanate, isomers

Store in a well-ventilated place. Keep cool.

4-isocyanatosulphonyltoluene 2,2'-methylenediphenyl diisocyanate 4,4'-methylenediphenyl diisocyanate o-(p-isocyanatobenzyl)phenyl isocyanate

Supplemental hazard information

EUH204 Contains isocyanates. May produce an allergic reaction.

Use restriction according to REACH annex XVII, no.:

Restrictions on use

P403 + P233 P403 + P235

P405

P501

As from 24 August 2023 adequate training is required before industrial or professional use.

Other hazards 2.3.

No information available.

SECTION 3: Composition/information on ingredients

Mixtures 3.2.

polyisocyanate hardener, containing the following hazardous substances: Description

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

EC No. CAS No. Index No.	REACH No. Designation classification: // Remark	weight-%
215-535-7	01-2119488216-32	
1330-20-7	Xylene	40 - 60
601-022-00-9	Acute Tox. 4 H312 / Acute Tox. 4 H332 / Skin Irrit. 2 H315 / Eye Irrit. 2 H319 / STOT SE 3 H335 / STOT RE 2 H373 / Asp. Tox. 1 H304 / Flam. Liq. 3 H226	

Safety Data Sheet according to Regulation (EC) No. 1907/2006 (REACH) according to Regulation (EU) 2020/878

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67815-87-6	Aromatic polyisocyanate prepolymer Acute Tox. 4 H332 / Skin Irrit. 2 H315 / Eye Irrit. 2 H319 / Resp. Sens. 1 H334 / Skin Sens. 1 H317 / STOT SE 3 H335 / STOT RE 2 H373	25 - 40
9016-87-9 615-005-01-6	01-2119457024-46 Diphenylmethane diisocyanate, isomers Acute Tox. 4 H332 / Eye Irrit. 2 H319 / STOT SE 3 H335 / Skin Irrit. 2 H315 / Carc. 2 H351 / Resp. Sens. 1 H334 / Skin Sens. 1 H317 / STOT RE 2 H373	15 - 25
202-849-4 100-41-4	Acute toxicity estimate (ATE): ATE (inhalation, vapour): 310.00 mg/L 01-2119489370-35 ethylbenzene	10 - 15
601-023-00-4	Flam. Liq. 2 H225 / Acute Tox. 4 H332 / STOT RE 2 H373 / Asp. Tox. 1 H304	
202-966-0 101-68-8 615-005-00-9	01-2119457014-47 4,4'-methylenediphenyl diisocyanate Carc. 2 H351 / Acute Tox. 4 H332 / STOT RE 2 H373 / Eye Irrit. 2 H319 / STOT SE 3 H335 / Skin Irrit. 2 H315 / Resp. Sens. 1 H334 / Skin Sens. 1 H317	1 - 5
	Specific concentration limit (SCL): Eye Irrit. 2 H319 >= 5 / Skin Irrit. 2 H315 >= 5 / Resp. Sens. 1 H334 >= 0.1 / STOT SE 3 H335 >= 5 Acute toxicity estimate (ATE): ATE (inhalation, vapour): 11.00 mg/L	
227-534-9 5873-54-1 615-005-00-9	01-2119480143-45 o-(p-isocyanatobenzyl)phenyl isocyanate Carc. 2 H351 / Acute Tox. 4 H332 / STOT RE 2 H373 / Eye Irrit. 2 H319 / STOT SE 3 H335 / Skin Irrit. 2 H315 / Resp. Sens. 1 H334 / Skin Sens. 1 H317	1 - 5
	Specific concentration limit (SCL): Eye Irrit. 2 H319 >= 5 / Skin Irrit. 2 H315 >= 5 / Resp. Sens. 1 H334 >= 0.1 / STOT SE 3 H335 >= 5 Acute toxicity estimate (ATE): ATE (inhalation, vapour): 0.38 mg/L	
223-810-8 4083-64-1 615-012-00-7	01-2119980050-47 4-isocyanatosulphonyltoluene Skin Irrit. 2 H315 / Eye Irrit. 2 H319 / Resp. Sens. 1 H334 / Skin Sens. 1 H317 / STOT SE 3 H335 / EUH014 Specific concentration limit (SCL): Eye Irrit. 2 H319 >= 5 / STOT SE 3 H335 >= 5 / Skin Irrit. 2 H315 >= 5	0.5 - 1
219-799-4 2536-05-2 615-005-00-9	01-2119927323-43 2,2'-methylenediphenyl diisocyanate Carc. 2 H351 / Acute Tox. 4 H332 / STOT RE 2 H373 / Eye Irrit. 2 H319 / STOT SE 3 H335 / Skin Irrit. 2 H315 / Resp. Sens. 1 H334 / Skin Sens. 1 H317 Specific concentration limit (SCL): Eye Irrit. 2 H319 >= 5 / Skin Irrit. 2	0.01 - 0.05
	H315 >= 5 / Resp. Sens. 1 H334 >= 0.1 / STOT SE 3 H335 >= 5 Acute toxicity estimate (ATE): ATE (inhalation, vapour): 0.52 mg/L	

Additional information

Full text of classification: see section 16

SECTION 4: First aid measures

Description of first aid measures 4.1.

General information

In all cases of doubt, or when symptoms persist, seek medical advice. In case of unconsciousness give nothing by mouth, place in recovery position and seek medical advice.

In case of inhalation

Remove casualty to fresh air and keep warm and at rest. In case of irregular breathing or respiratory arrest provide artificial respiration.

Following skin contact

Take off immediately all contaminated clothing. After contact with skin, wash immediately with plenty of water and soap. Do not use solvents or thinners.

After eye contact

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

according to Regulation (EU) 2020/878

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Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Seek medical advice immediately.

Following ingestion

If swallowed, rinse mouth with water (only if the person is conscious). Seek medical advice immediately. Keep victim calm. Do NOT induce vomiting.

Most important symptoms and effects, both acute and delayed

In all cases of doubt, or when symptoms persist, seek medical advice.

Indication of any immediate medical attention and special treatment needed

First Aid, decontamination, treatment of symptoms.

SECTION 5: Firefighting measures

5.1. Extinguishing media

Suitable extinguishing media

alcohol resistant foam, carbon dioxide, Powder, spray mist, (water)

Unsuitable extinguishing media

strong water jet

5.2. Special hazards arising from the substance or mixture

Dense black smoke occurs during fire. Inhaling hazardous decomposing products can cause serious health damage.

Advice for firefighters

Provide a conveniently located respiratory protective device. Cool closed containers that are near the source of the fire. Do not allow water used to extinguish fire to enter drains, ground or waterways.

SECTION 6: Accidental release measures

Personal precautions, protective equipment and emergency procedures

Keep away from sources of ignition. Ventilate affected area. Do not breathe vapours.

Environmental precautions 6.2.

Do not allow to enter into surface water or drains. If the product contaminates lakes, rivers or sewages, inform competent authorities in accordance with local regulations.

Methods and material for containment and cleaning up 6.3.

Isolate leaked material using non-flammable absorption agent (e.g. sand, earth, vermiculit, diatomaceous earth) and collect it for disposal in appropriate containers in accordance with the local regulations (see section 13). Use appropriate container to avoid environmental contamination. Fouled surfaces must be immediately cleaned with suitable solvents, Useable as such (flammable): water 45 vol.% ethanol or i-propanol 50 vol. % ammonia solution (density= 0.88) 5 vol.%

Alternative (non-flammable): sodium carbonate 5 vol.% water 95 vol.%.

Take up spilled residuals with the same agent and leave them for a few days in unclosed containers until there is no further reaction. Then, close the containers and dispose of them in accordance with the regulations for waste removal (refer to section 13).

Reference to other sections

Observe protective provisions (see section 7 and 8).

SECTION 7: Handling and storage

People who suffer from skin sensitization problems, asthma, allergies, chronic or recurring respiratory illnesses should not be deployed in any process using this mixture.

People who spray this preparation should have regular pulmonary function tests.

Precautions for safe handling

Advices on safe handling

Avoid formation of flammable and explosive vapour concentrations in the air and exceeding the exposure limit values. Only use the material in places where open light, fire and other flammable sources can be kept away. Electrical equipment must be protected meeting the accepted standard. Product may become electrostatically charged. Provide earthing of containers, equipment, pumps and ventilation facilities. Anti-static clothing including shoes are recommended. Floors must be electrically conductive. Be careful when opening used containers (excess pressure). Precautionary measures should be taken in order to reduce strain from humidity or water: CO2 is formed which may produce excess pressure in closed containers . Keep away from heat sources, sparks and open flames. Use only spark proof tools. Avoid contact with skin, eyes and clothes. Do not inhale dusts, particulates and spray mist when using this preparation. Avoid respiration of swarf. When using do not eat, drink or smoke. Personal protection equipment: refer to section 8. Do not empty containers with pressure - no pressure vessel! Always keep in containers that correspond to the material of the original container. Follow the legal protection and safety

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regulations.

Further information

Vapours are heavier than air. Vapours form explosive mixtures with air.

7.2. Conditions for safe storage, including any incompatibilities

Requirements for storage rooms and vessels

Storage in accordance with the Ordinance on Industrial Safety and Health (BetrSiVO). Keep container tightly closed. Do not empty containers with pressure - no pressure vessel! Smoking is forbidden. Access only for authorised persons. Store carefully closed containers upright to prevent any leaks. Soils have to conform to the "Guidelines for avoidance of ignition hazards due to electrostatic charges (TRGS 727)".

Hints on joint storage

Keep away from strongly acidic and alkaline materials as well as oxidizers. Keep away from amines, alcohols and water.

Further information on storage conditions

Take care of instructions on label. Store in a well-ventilated and dry room at temperatures between 15 °C and 30 °C. Protect from heat and direct sunlight. Keep container tightly closed. Remove all sources of ignition. Smoking is forbidden. Access only for authorised persons. Store carefully closed containers upright to prevent any leaks.

7.3. Specific end use(s)

Observe technical data sheet. Observe instructions for use.

SECTION 8: Exposure controls/personal protection

People who suffer from skin sensitization problems, asthma, allergies, chronic or recurring respiratory illnesses should not be deployed in any process using this mixture.

People who spray this preparation should have regular pulmonary function tests.

8.1. Control parameters

Occupational exposure limit values:

Xylene

Index No. 601-022-00-9 / EC No. 215-535-7 / CAS No. 1330-20-7

WEL, TWA: 220 mg/m3; 50 ppm WEL, STEL: 441 mg/m3; 100 ppm

Remark: (may be absorbed through the skin)

BMGV, TWA: 650 mmol/mol creatinine

Remark: methyl hippuric acid; urine; end of exposure or end of shift

ethylbenzene

Index No. 601-023-00-4 / EC No. 202-849-4 / CAS No. 100-41-4

WEL, TWA: 441 mg/m3; 100 ppm WEL, STEL: 552 mg/m3; 125 ppm

Remark: (may be absorbed through the skin)

Additional information

TWA: Long-term occupational exposure limit value STEL: short-term occupational exposure limit value

Ceiling: peak limitation

DNEL:

Xylene

Index No. 601-022-00-9 / EC No. 215-535-7 / CAS No. 1330-20-7

DNEL long-term dermal (systemic), Workers: 212 mg/kg bw/day

DNEL acute inhalative (local), Workers: 442 mg/m³ DNEL acute inhalative (systemic), Workers: 442 mg/m³

DNEL long-term inhalative (local), Workers:

DNEL long-term inhalative (systemic), Workers: 221 mg/m³
DNEL long-term oral (repeated), Consumer: 12,5 mg/kg bw/day

DNEL long-term dermal (systemic), Consumer: 125 mg/kg bw/day

DNEL acute inhalative (local), Consumer: 260 mg/m³ DNEL acute inhalative (systemic), Consumer: 260 mg/m³

DNEL long-term inhalative (local), Consumer: 65,3 mg/m³

DNEL long-term inhalative (systemic), Consumer: 65,3 mg/m³

ethylbenzene

Index No. 601-023-00-4 / EC No. 202-849-4 / CAS No. 100-41-4

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DNEL long-term dermal (systemic), Workers: 180 mg/kg bw/day DNEL long-term inhalative (systemic), Workers: 77 mg/m³ DNEL long-term oral (repeated), Consumer: 1,6 mg/kg bw/day

DNEL long-term inhalative (systemic), Consumer: 15 mg/m³

o-(p-isocyanatobenzyl)phenyl isocyanate

Index No. 615-005-00-9 / EC No. 227-534-9 / CAS No. 5873-54-1 DNEL acute dermal, short-term (local), Workers: 28,7 mg/cm²

DNEL acute dermal, short-term (systemic), Workers: 50 mg/kg bw/day

DNEL acute inhalative (local), Workers: 0,1 mg/m³
DNEL acute inhalative (systemic), Workers: 0,1 mg/m³
DNEL long-term inhalative (local), Workers: 0,05 mg/m³
DNEL long-term inhalative (systemic), Workers: 0,05 mg/m³
DNEL long-term oral (repeated), Consumer: 20 mg/kg bw/day
DNEL acute dermal, short-term (local), Consumer: 17,2 mg/kg

DNEL acute dermal, short-term (systemic), Consumer: 25 mg/kg bw/day

DNEL acute inhalative (local), Consumer: 0,05 mg/m³
DNEL acute inhalative (systemic), Consumer: 0,05 mg/m³
DNEL long-term inhalative (local), Consumer: 0,025 mg/m³
DNEL long-term inhalative (systemic), Consumer: 0,025 mg/m³

2,2'-methylenediphenyl diisocyanate

Index No. 615-005-00-9 / EC No. 219-799-4 / CAS No. 2536-05-2

DNEL acute dermal, short-term (systemic), Workers: 50 mg/kg bw/day

DNEL acute inhalative (local), Workers: 0,1 mg/m3

DNEL long-term inhalative (systemic), Workers: 0,05 mg/m³

PNEC:

Xylene

Index No. 601-022-00-9 / EC No. 215-535-7 / CAS No. 1330-20-7

PNEC aquatic, freshwater: 0,327 mg/L PNEC aquatic, marine water: 0,327 mg/L PNEC sediment, freshwater: 12,46 mg/kg PNEC sediment, marine water: 12,46 mg/kg PNEC sewage treatment plant (STP): 6,58 mg/L

soil: 2,31 mg/kg

ethylbenzene

Index No. 601-023-00-4 / EC No. 202-849-4 / CAS No. 100-41-4

PNEC aquatic, freshwater: 0,1 mg/L PNEC aquatic, marine water: 0,01 mg/L PNEC sediment, freshwater: 13,7 mg/kg PNEC sediment, marine water: 1,37 mg/kg

PNEC, soil: 2,68 mg/kg

PNEC sewage treatment plant (STP): 9,6 mg/L

o-(p-isocyanatobenzyl)phenyl isocyanate

Index No. 615-005-00-9 / EC No. 227-534-9 / CAS No. 5873-54-1

PNEC aquatic, freshwater: > 1 mg/L PNEC aquatic, marine water: > 0,1 mg/L

PNEC, soil: > 1 mg/kg

PNEC sewage treatment plant (STP): > 1 mg/L

2,2'-methylenediphenyl diisocyanate

Index No. 615-005-00-9 / EC No. 219-799-4 / CAS No. 2536-05-2

PNEC aquatic, freshwater: > 1 mg/L PNEC aquatic, marine water: > 0,1 mg/L

PNEC, soil: > 1 mg/kg

PNEC sewage treatment plant (STP): > 1 mg/L

8.2. Exposure controls

Provide good ventilation. This can be achieved with local or room suction. When spraying, wear self-contained breathing apparatus. For other tasks a suitable respiratory system must be used, if local and room suction is not sufficient for keeping aerosol and solvent vapour concentration below the exposure limit values. (refer to Personal protection equipment.)

Personal protection equipment

Respiratory protection

according to Regulation (EC) No. 1907/2006 (REACH) according to Regulation (EU) 2020/878

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If concentration of solvents is beyond the occupational exposure limit values, approved and suitable respiratory protection must be used. Use only respiratory protection equipment with CE-symbol including four digit test number.

Hand protection

For prolonged or repeated handling the following glove material must be used: NBR (Nitrile rubber)

Thickness of the glove material > 0.4 mm; Breakthrough time: > 480 min.

Observe the instructions and details for use, storage, maintenance and replacement provided by the protective glove manufacturer. Penetration time of glove material depending on intensity and duration of exposure to skin. Recommended glove articles EN ISO 374

Barrier creams can help protecting exposed skin areas. In no case should they be used after contact.

Eye/face protection

Wear closely fitting protective glasses in case of splashes.

Body protection

Wear antistatic clothing of natural fibers (cotton) or heat resistant synthetic fibers.

Protective measures

After contact clean skin thoroughly with water and soap or use appropriate cleanser.

Environmental exposure controls

Do not allow to enter into surface water or drains. See section 7. No additional measures necessary.

SECTION 9: Physical and chemical properties

9.1. Information on basic physical and chemical properties

Physical state:

Colour:

Colour:

Characteristic

Odour threshold:

Melting point/freezing point:

Liquid

refer to label

characteristic

not applicable

not applicable

Initial boiling point and boiling range: 136 °C

Source: ethylbenzene

Flammability Flammable liquid and vapour.

Lower and upper explosion limit

Lower explosion limit: 0.83 Vol-% Upper explosion limit: 8 Vol-%

Source: Xylene

Flash point: 25 °C

Method: DIN 53213

Auto-ignition temperature: 430 °C

Source: ethylbenzene

Decomposition temperature: not applicable pH at 20 °C: not applicable Cinematic viscosity (40°C): < 20 mm²/s

Viscosity: at 20 °C: 10 - 14 sec DIN 4 mm

Solubility(ies):

Water solubility at 20 °C: insoluble

Partition coefficient: n-octanol/water: see section 12

Vapour pressure at 20 °C: 9.52 mbar

Source: ethylbenzene

Density and/or relative density:

Density at 20 °C: 0.99 g/cm³

Relative vapour density: not applicable particle characteristics: not applicable

9.2. Other information

Solid content: 50 weight-%

according to Regulation (EC) No. 1907/2006 (REACH) according to Regulation (EU) 2020/878

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solvent content:

Organic solvents: 50 weight-% Water: 0 weight-%

SECTION 10: Stability and reactivity

10.1. Reactivity

Reacts with water, forming carbon dioxide, producing bursting hazard in closed containers due to build-up of pressure.

10.2. Chemical stability

Stable when applying the recommended regulations for storage and handling. Further information on correct storage: refer to section 7.

10.3. Possibility of hazardous reactions

Keep away from strong acids, strong bases and strong oxidizing agents to avoid exothermic reactions. Reacts with water, forming carbon dioxide, producing bursting hazard in closed containers due to build-up of pressure.

10.4. Conditions to avoid

Stable when applying the recommended regulations for storage and handling. Further information on correct storage: refer to section 7. Hazardous decomposition byproducts may form with exposure to high temperatures.

10.5. Incompatible materials

not applicable

10.6. Hazardous decomposition products

Hazardous decomposition byproducts may form with exposure to high temperatures, e.g.: carbon dioxide, carbon monoxide, smoke, nitrogen oxides.

SECTION 11: Toxicological information

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

Acute toxicity

Harmful if inhaled.

Xylene

oral, LD50, Rat, male: 5,523 mg/kg

Method: EU Test B.1

inhalative (vapours), LC50, Rat, male: 6700 ppm (4 h)

ethylbenzene

oral, LD50, Rat: 3,5 mg/kg dermal, LD50, Rabbit: 15,4 mg/kg

4.4'-methylenediphenyl diisocyanate

oral, LD50, Rat; > 5000 mg/kg

dermal, LD50, Rabbit: > 9000 mg/kg

inhalative (vapours), LC50, Rat: 11 mg/L (4 h)

o-(p-isocyanatobenzyl)phenyl isocyanate

oral, LD50, Rat: > 2000 mg/kg Directive 84/449/EEC, B.1

dermal, LD50, Rabbit: > 9400 mg/kg

Method: OECD 402

inhalative (vapours), LC50, Rat: 0,38 mg/L (4 h)

Method: OECD 403

2,2'-methylenediphenyl diisocyanate

oral, LD50, Rat: > 2000 mg/kg

dermal, LD50, Rabbit: > 9400 mg/kg

inhalative (vapours), LC50, Rat: 0,527 mg/L (4 h)

Diphenylmethane diisocyanate, isomers

oral, LD50, Rat: > 10000 mg/kg

dermal, LD50, Rabbit: > 9400 mg/kg

inhalative (vapours), LC50, Rat: 310 mg/L (4 h)

Aromatic polyisocyanate prepolymer

oral, LD50, Rat: > 5000 mg/kg

Method: OECD 423

according to Regulation (EC) No. 1907/2006 (REACH) according to Regulation (EU) 2020/878

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Skin corrosion/irritation; Serious eye damage/eye irritation

Causes skin irritation.

Causes serious eye irritation.

ethylbenzene

Skin, Rabbit (24 h)

Causes mild skin irritation.

eyes, Rabbit

Causes slight eye irritation

4,4'-methylenediphenyl diisocyanate

Skin (4 h)

Causes skin irritation.

eves

Causes serious eye irritation.

o-(p-isocyanatobenzyl)phenyl isocyanate

Skin (4 h)

Method: OECD 404 Causes skin irritation.

eyes

No eye irritation

2,2'-methylenediphenyl diisocyanate

Skin (4 h)

No skin irritation

eyes

No eye irritation

Diphenylmethane diisocyanate, isomers

Skin, Rabbit (4 h) Method: OECD 404 Weak skin irritation eyes, Rabbit

eyes, Rabbit

Method: OECD 405

non-irritant.

Aromatic polyisocyanate prepolymer

Skin (4 h)

No data available

eyes

No data available

Respiratory or skin sensitisation

May cause allergy or asthma symptoms or breathing difficulties if inhaled.

May cause an allergic skin reaction.

4,4'-methylenediphenyl diisocyanate

Skin, Guinea pig: ; Evaluation positive

Respiratory system, Guinea pig: ; Evaluation positive

o-(p-isocyanatobenzyl)phenyl isocyanate

Skin, Guinea pig: ; Evaluation negative

Method: OECD 406 not sensitising. Respiratory system: No data available

2,2'-methylenediphenyl diisocyanate

Skin, Guinea pig: ; Evaluation negative

not sensitising.

Respiratory system, Guinea pig: ; Evaluation negative

not sensitising.

Diphenylmethane diisocyanate, isomers

Skin: ; Evaluation May cause an allergic skin reaction.

Respiratory system: ; Evaluation May cause allergy or asthma symptoms or breathing difficulties if inhaled.

according to Regulation (EC) No. 1907/2006 (REACH) according to Regulation (EU) 2020/878

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Aromatic polyisocyanate prepolymer

Skin:

No data available Respiratory system: No data available

CMR effects (carcinogenicity, mutagenicity and toxicity for reproduction)

Suspected of causing cancer.

ethylbenzene

Germ cell mutagenicity; Evaluation negative

Hamster; Mouse; ovaries

Carcinogenicity; Evaluation Carc. Cat. 2

Method: Group II B (IARC): Possible carcinogenic to humans (ethylbenzene)

human

4,4'-methylenediphenyl diisocyanate

Germ cell mutagenicity No data available

Carcinogenicity

Suspected of causing cancer.

Reproductive toxicity

No data available

teratogenicity

No data available

o-(p-isocyanatobenzyl)phenyl isocyanate

Germ cell mutagenicity

No data available

Carcinogenicity; Evaluation positive

Method: OECD 453

Rat; inhalative; Dosages: 0 - 0.2 - 1 - 6 mg/m3Test substance: as aerosol exposure duration: 2 a Frequency of treatment: 6

hours/day, 5 days/weekOccurrence of tumours in the highest dose group. Examination on a comparable product.

Reproductive toxicity No data available

Genotoxicity in vitro; Evaluation negative

Method: OECD 471 (Ames test)

Salmonella typhimurium; Metabolic activation: with/without

Genotoxicity in vivo; Evaluation negative

Method: OECD 474

Rat, male; Route of administration: Inhalative (exposure duration: 3x1h/day over 3 weeks); Toxicological tests on a

comparable product.

2,2'-methylenediphenyl diisocyanate

Germ cell mutagenicity

No data available

Carcinogenicity; Evaluation negative

Didn't show any carcinogenic effects in animal tests.

Reproductive toxicity No data available

In-vitro mutagenicity; Evaluation negative

Does not act genotoxically in mammalian cell systems.; Mouse micronucleus test: negative

Diphenylmethane diisocyanate, isomers

Germ cell mutagenicity; Evaluation negative

Method: OECD 471 (Ames test)

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

Carcinogenicity; Evaluation May cause cancer by inhalation.

Method: OECD 453

Rat; inhalative; Dosages: 0 - 0.2 - 1 - 6 mg/m3Test substance: as aerosol exposure duration: 2 a Frequency of treatment: 6 hours/day, 5 days/weekOccurrence of tumours in the highest dose group. Examination on a comparable product.

Reproductive toxicity; Evaluation negative

Did not show any fruit-damaging effect in animal experiments.; teratogenicity

Aromatic polyisocyanate prepolymer

Germ cell mutagenicity

according to Regulation (EC) No. 1907/2006 (REACH) according to Regulation (EU) 2020/878

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No data available Carcinogenicity No data available Reproductive toxicity No data available

STOT-single exposure; STOT-repeated exposure

May cause respiratory irritation.

May cause damage to organs through prolonged or repeated exposure.

Xylene

Specific target organ toxicity (repeated exposure)

Liver and kidney damage; central nervous system

Causes damage to organs (or state all organs affected, if known) through prolonged or repeated exposure (state route of exposure if it is conclusively proven that no other routes of exposure cause the hazard).

Liver and kidney damage; central nervous system; hearing organs

ethylbenzene

Repeated dose toxicity, Rat: 75 mg/kg

Method: OECD 407 RTECS-no.:; DA0700000

Depression of central nervous system movement disorders; headache; Vomiting

4,4'-methylenediphenyl diisocyanate

Specific target organ toxicity (single exposure) Evaluation May cause respiratory irritation. Specific target organ toxicity (repeated exposure) Evaluation May cause respiratory irritation.

Inhalation

o-(p-isocyanatobenzyl)phenyl isocyanate

Specific target organ toxicity (single exposure) Evaluation May cause respiratory irritation.

inhalative; Target organs: Respiratory system

Specific target organ toxicity (repeated exposure) Evaluation May cause damage to organs through prolonged or repeated exposure.

inhalative; Target organs: Respiratory system

2,2'-methylenediphenyl diisocyanate

Specific target organ toxicity (single exposure)

No data available

Specific target organ toxicity (repeated exposure)

No data available

Diphenylmethane diisocyanate, isomers

Specific target organ toxicity (single exposure) Evaluation May cause respiratory irritation.

Target organs: Respiratory system

Specific target organ toxicity (repeated exposure) Evaluation Target organs: Respiratory system

Method: May cause respiratory irritation.

Aromatic polyisocyanate prepolymer

Specific target organ toxicity (single exposure)

No data available

Specific target organ toxicity (repeated exposure)

No data available

Aspiration hazard

May be fatal if swallowed and enters airways.

o-(p-isocyanatobenzyl)phenyl isocyanate

Aspiration hazard

No data available

2,2'-methylenediphenyl diisocyanate

Aspiration hazard

No data available

Diphenylmethane diisocyanate, isomers

Aspiration hazard

Not classified based on available information.

according to Regulation (EC) No. 1907/2006 (REACH) according to Regulation (EU) 2020/878

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Aromatic polyisocyanate prepolymer

Aspiration hazard No data available

Practical experience/human evidence

Inhaling of solvent components above the MWC-value can lead to health damage, e.g. irritation of the mucous membrane and respiratory organs, as well as damage to the liver, kidneys and the central nerve system. Indications for this are: headache, dizziness, fatigue, amyosthenia, drowsiness, in serious cases: unconsciousness. Solvents may cause some of the aforementioned effects through skin resorption. Repeated or prolonged contact with the preparation may cause removal of natural fat from the skin resulting in non-allergic contact dermatitis and/or absorption through skin. Splashing may cause eye irritation and reversible damage. Because of the isocyanate components' properties of this and with consideration of similar preparations the following applies: This mixture may cause acute irritation and/or sensitization of airways which lead to tightness in thorax, short-breath and asthmatic complaints. After sensitization even concentrations below the exposure limit values may cause asthma. Repeated inhaling can lead to permanent illness of the respiratory tract.

Overall assessment on CMR properties

The ingredients in this mixture do not meet the criteria for classification as CMR category 1A or 1B according to CLP.

11.2. Information on other hazards

Endocrine disrupting properties

No information available.

SECTION 12: Ecological information

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

Do not allow to enter into surface water or drains.

12.1. Toxicity

Xylene

Fish toxicity, LC50, fish: 2,6 mg/L (96 h)

Method: OECD 203

Algae toxicity, ErC50, Pseudokirchneriella subcapitata: 4,6 mg/L (72 h)

Method: OECD 201

Algae toxicity, EC50, Pseudokirchneriella subcapitata: 4,6 mg/L (72 h)

Method: OECD 201

Fish toxicity, LC50, Oncorhynchus mykiss (Rainbow trout) (96 h)

Method: OECD 203

Daphnia toxicity, IC50, Daphnia magna: 1 mg/L (24 h)

Method: OECD 202

Algae toxicity, EC50, Selenastrum capricornutum: 2,2 mg/L (73 h)

Method: OECD 201

Daphnia toxicity, growth test (Eb-Cx) 10%", Daphnia magna: 1,91 mg/L (21 d)

Method: OECD 211

Bacteria toxicity, NOEC, Activated sludge: 16 mg/L (28 t)

Method: OECD 301 F

ethylbenzene

Fish toxicity, LC50, Oncorhynchus mykiss (Rainbow trout): 4,2 mg/L (96 h) Daphnia toxicity, EC50, Daphnia magna (Big water flea) 1,8 - 2,4 mg/L (48 h)

Algae toxicity, EC50, Skeletonema costatum: 4,9 mg/L (72 h)

Algae toxicity, EC50, Pseudokirchneriella subcapitata: 7,2 mg/L (48 h)

Shellfish Toxicity, LC50, Mysidopsis bahia: > 5,2 mg/L (48 h) Toxicity of Microoganisms, EC50, microorganisms: 96 mg/L (24 h)

4,4'-methylenediphenyl diisocyanate

Fish toxicity, LC50, Danio rerio (Zebrabärbling): > 1000 mg/L (96 h)

Method: OECD 203

Algae toxicity, ErC50, Scenedesmus subspicatus: > 1640 mg/L (72 h)

Method: OECD 201

Daphnia toxicity, EC50, Daphnia magna: 0,35 mg/L (24 h)

Algae toxicity, IC50, Desmodesmus subspicatus: 1,5 mg/L (72 h)

Daphnia toxicity, NOEC, Daphnia magna (Big water flea): > 10 mg/L (21 d)

Method: OECD 202

Bacteria toxicity, Activated sludge: > 100 mg/L (3 h)

o-(p-isocyanatobenzyl)phenyl isocyanate

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

according to Regulation (EU) 2020/878

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Fish toxicity, LC50, Danio rerio (zebrafish): > 1000 mg/L (96 h)

Method: OECD 203

Algae toxicity, ErC50, Scenedesmus subspicatus: > 1640 mg/L (72 h)

Method: OECD 201

Examination on a comparable product.; growth inhibition

Daphnia toxicity, EC50: > 1000 mg/L (24 h)

Method: OECD 202

Algae toxicity, EC50, Scenedesmus subspicatus: > 1640 mg/L (72 h) Daphnia toxicity, NOEC, Daphnia magna (Big water flea): 10 mg/L (21 d)

Method: OECD 202

Bacteria toxicity, Activated sludge: > 100 mg/L (3 h)

Method: OECD 209

Toxicity to soil macroorganisms, NOEC, Eisenia fetida: > 1000 mg/kg (14 d)

Method: OECD 207

Examination on a comparable product.

Toxicity to terrestrial plants., NOEC, Avena sativa (Oats): > 1000 mg/kg (14 d)

Method: OECD 208

Examination on a comparable product. 2.2'-methylenediphenyl diisocyanate

Fish toxicity, LC50: > 1000 mg/L (96 h)

Daphnia toxicity, EC50, Water flea: > 1000 mg/L (24 h) Algae toxicity, EC50, Scenedesmus subspicatus: > 1640 mg/L (72 h)

Diphenylmethane diisocyanate, isomers

Fish toxicity, LC50, Danio rerio (zebrafish): > 1000 mg/L (96 h) Algae toxicity, EC50, Desmodesmus subspicatus: 1640 mg/L (72 h)

Aromatic polyisocyanate prepolymer

Bacteria toxicity, EC50, Activated sludge: > 1000 mg/L (48 h) Algae toxicity, EC50, Scenedesmus subspicatus: > 1000 mg/L (96 h)

Long-term Ecotoxicity

Xylene

Algae toxicity, ErC50, Pseudokirchneriella subcapitata: 4,36 mg/L (73 h)

Method: OECD 201

Fish toxicity, NOEC, fish: > 1,3 mg/L (56 d)

Daphnia toxicity, NOEC, Daphnia pulex (water flea): 1,17 mg/L (7 d)

Method: US EPA 600/4-91-003

Daphnia toxicity, EL50, Daphnia magna: 2,9 mg/L (21 d)

Method: OECD 211

Algae toxicity, EC50, Pseudokirchneriella subcapitata: 2,2 mg/L (73 h)

Method: OECD 201

Daphnia toxicity, LOEC:, Daphnia magna (Big water flea): 3,16 mg/L (21 d)

Method: OECD 211

Algae toxicity, growth test (Eb-Cx) 10%", Pseudokirchneriella subcapitata: 0,72 mg/L (73 h)

Method: OECD 201

ethylbenzene

Daphnia toxicity, NOEC, Ceriodaphnia dubia (Wasserfloh): 0,96 mg/L (7 d) Daphnia toxicity, LC50, Ceriodaphnia dubia (Wasserfloh): 3,6 mg/L (7 d)

Bacteria toxicity, EC50, Nitrosomonas sp: 96 mg/L (24 h)

Algae toxicity, NOEC, Pseudokirchneriella subcapitata: 3,4 mg/L (96 h) Daphnia toxicity, LOEC:, Ceriodaphnia dubia (Wasserfloh): 1,7 mg/L (7 d)

o-(p-isocyanatobenzyl)phenyl isocyanate

Daphnia toxicity, NOEC, Daphnia magna (Big water flea): > 10 mg/L (21 d)

Method: OECD 202

Examination on a comparable product.

12.2. Persistence and degradability

Xylene

Persistence and degradability:

Method: Rapid photochemical oxidation in air

Biodegradation: 98 percent (28 d)

Readily biodegradable (according to OECD criteria)

according to Regulation (EC) No. 1907/2006 (REACH) according to Regulation (EU) 2020/878

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ethylbenzene

Biodegradation, aerobic: 70 - 80 percent (28 d); Evaluation Readily biodegradable (according to OECD criteria)

4,4'-methylenediphenyl diisocyanate

Persistence and degradability: 28 percent ; Evaluation Not readily biodegradable (according to OECD criteria)

Method: OECD 302C

o-(p-isocyanatobenzyl)phenyl isocyanate

Biodegradation: < 0,001 percent; Evaluation Not potentially biodegradable.

Method: OECD 302C

Persistence and degradability: Evaluation After release or contact with air, moderate photochemical degradation of the

substance occurs.

2,2'-methylenediphenyl diisocyanate

Biodegradation: Evaluation Not readily biodegradable (according to OECD criteria)

Method: OECD 301D

Diphenylmethane diisocyanate, isomers

Biodegradation: No data available

Aromatic polyisocyanate prepolymer Biodegradation: 0,0001 percent (28 d)

12.3. Bioaccumulative potential

Xylene

Distribution coefficient n-octanol/water (log KOW): 3,49

ethylbenzene

Distribution coefficient n-octanol/water (log KOW): 3,6

4,4'-methylenediphenyl diisocyanate

Distribution coefficient n-octanol/water (log KOW):

No data available

2,2'-methylenediphenyl diisocyanate

Distribution coefficient n-octanol/water (log KOW):

No data available

Diphenylmethane diisocyanate, isomers

Distribution coefficient n-octanol/water (log KOW):

Bioconcentration factor (BCF)

4,4'-methylenediphenyl diisocyanate

Bioconcentration factor (BCF): 200

Method: OECD 305 E

o-(p-isocyanatobenzyl)phenyl isocyanate

Bioconcentration factor (BCF): 200

2,2'-methylenediphenyl diisocyanate

Bioconcentration factor (BCF), fish: 17,5 9,8 - 25

12.4. Mobility in soil

Xylene

soil: Evaluation Absorbs slowly into the soil Water: Evaluation Floats on the water

4,4'-methylenediphenyl diisocyanate

soil:

No data available

o-(p-isocyanatobenzyl)phenyl isocyanate

soil:

No data available

Water: Evaluation The substance hydrolyses rapidly in water (half-life: 20 h at 25 °C)

Examination on a comparable product.; Test type: Hydrolysis

2,2'-methylenediphenyl diisocyanate

soil:

No data available

Diphenylmethane diisocyanate, isomers

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

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soil:

No data available

Aromatic polyisocyanate prepolymer

soil:

No data available

12.5. Results of PBT and vPvB assessment

The substances in the mixture do not meet the PBT/vPvB criteria according to REACH, annex XIII.

12.6. Endocrine disrupting properties

No information available.

12.7. Other adverse effects

No information available.

SECTION 13: Disposal considerations

13.1. Waste treatment methods

Appropriate disposal / Product

Recommendation

Do not allow to enter into surface water or drains. Handle contaminated packages in the same way as the substance itself. This material and its container must be disposed of in a safe way. Waste disposal according to directive 2008/98/EC, covering waste and dangerous waste.

List of proposed waste codes/waste designations in accordance with EWC

080111* Waste paint and varnish containing organic solvents or other dangerous substances

*Hazardous waste according to Directive 2008/98/EC (waste framework directive).

Appropriate disposal / Package

Recommendation

Non-contaminated packages may be recycled. Vessels not properly emptied are special waste.

SECTION 14: Transport information

14.1. UN number or ID number

UN 1263

14.2. UN proper shipping name

Land transport (ADR/RID): Paint
Sea transport (IMDG): PAINT
Air transport (ICAO-TI / IATA-DGR): Paint

14.3. Transport hazard class(es)

3

14.4. Packing group

Ш

14.5. Environmental hazards

Land transport (ADR/RID) not applicable
Marine pollutant not applicable

14.6. Special precautions for user

Transport always in closed, upright and safe containers. Make sure that persons transporting the product know what to do in case of an accident or leakage.

Advices on safe handling: see parts 6 - 8

Further information

Land transport (ADR/RID)

Tunnel restriction code D/E

Sea transport (IMDG)

EmS-No. F-E, S-E

14.7. Maritime transport in bulk according to IMO instruments

No transport as bulk according IBC - Code.

SECTION 15: Regulatory information

according to Regulation (EC) No. 1907/2006 (REACH) according to Regulation (EU) 2020/878

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

EU legislation

Directive 2010/75/EU on industrial emissions [Industrial Emissions Directive]

VOC-value (in q/L): 496

Use restriction according to REACH annex XVII, no.:

Restrictions on use

As from 24 August 2023 adequate training is required before industrial or professional use.

National regulations

Restrictions of occupation

Observe employment restrictions under the Maternity Protection Directive 92/85/EEC or stricter national regulations, if applicable.

Observe restrictions to employment for juveniles according to the 'juvenile work protection guideline' (94/33/EC) or stricter national regulations, if applicable.

15.2. Chemical Safety Assessment

For the following substances of this mixture a chemical safety assessment has been carried out:

EC No. CAS No.	Designation	REACH No.
215-535-7	Xylene	01-2119488216-32
1330-20-7	,	
	Diphenylmethane diisocyanate, isomers	01-2119457024-46
9016-87-9		
202-849-4	ethylbenzene	01-2119489370-35
100-41-4		
202-966-0	4,4'-methylenediphenyl diisocyanate	01-2119457014-47
101-68-8		
227-534-9	o-(p-isocyanatobenzyl)phenyl isocyanate	01-2119480143-45
5873-54-1		
223-810-8	4-isocyanatosulphonyltoluene	01-2119980050-47
4083-64-1		
219-799-4	2,2'-methylenediphenyl diisocyanate	01-2119927323-43
2536-05-2		

SECTION 16: Other information

Full text of classification in section 3:

ruii text of classification i	n section 3:	
Acute Tox. 4 / H312	Acute toxicity (dermal)	Harmful in contact with skin.
Acute Tox. 4 / H332	Acute toxicity (inhalative)	Harmful if inhaled.
Skin Irrit. 2 / H315	Skin corrosion/irritation	Causes skin irritation.
Eye Irrit. 2 / H319	Serious eye damage/eye irritation	Causes serious eye irritation.
STOT SE 3 / H335	STOT-single exposure	May cause respiratory irritation.
STOT RE 2 / H373	STOT-repeated exposure	May cause damage to organs (or state all
		organs affected, if known) through prolonged or
		repeated exposure (state route of exposure if it
		is conclusively proven that no other routes of
		exposure cause the hazard).
Asp. Tox. 1 / H304	Aspiration hazard	May be fatal if swallowed and enters airways.
Flam. Liq. 3 / H226	Flammable liquids	Flammable liquid and vapour.
Resp. Sens. 1 / H334	Respiratory or skin sensitisation	May cause allergy or asthma symptoms or
		breathing difficulties if inhaled.
Skin Sens. 1 / H317	Respiratory or skin sensitisation	May cause an allergic skin reaction.
Carc. 2 / H351	Carcinogenicity	Suspected of causing cancer (state route of
		exposure if it is conclusively proven that no
		other routes of exposure cause the hazard).
Flam. Liq. 2 / H225	Flammable liquids	Highly flammable liquid and vapour.
Classification presedure		

Classification procedure

Classification for mixtures and used evaluation method according to regulation (EC) No 1272/2008 [CLP] Flam. Liq. 3 Flammable liquids On basis of test data. Acute Tox. 4 Acute toxicity (inhalative) Calculation method. Skin Irrit. 2 Skin corrosion/irritation Calculation method.

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

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Eve Irrit. 2 Serious eve damage/eye irritation Calculation method. Resp. Sens. 1 Respiratory or skin sensitisation Calculation method. Skin Sens. 1 Respiratory or skin sensitisation Calculation method. Carc. 2 Carcinogenicity Calculation method. STOT SE 3 STOT-single exposure Calculation method. STOT RE 2 STOT-repeated exposure Calculation method. Aspiration hazard Asp. Tox. 1 Calculation method.

Abbreviations and acronyms

ADR European Agreement concerning the International Carriage of Dangerous Goods by Road

OEL Occupational Exposure Limit Value

BLV Biological Limit Value CAS Chemical Abstracts Service

CLP Classification, Labelling and Packaging CMR Carcinogenic, Mutagenic and Reprotoxic

DIN German Institute for Standardization / German industrial standard

DNEL Derived No-Effect Level

EAKV European Waste Catalogue Directive

EC Effective Concentration
EC European Community
EN European Standard

IATA-DGR International Air Transport Association – Dangerous Goods Regulations

IBC Code International Code for the Construction and Equipment of Ships carrying Dangerous Chemicals in Bulk ICAO-TI International Civil Aviation Organization Technical Instructions for the Safe Transport of Dangerous

Goods by Air

IMDG Code International Maritime Code for Dangerous Goods ISO International Organization for Standardization

LC Lethal Concentration

LD Lethal Dose

MARPOL Maritime Pollution: The International Convention for the Prevention of Pollution from Ships

OECD Organisation for Economic Cooperation and Development

PBT persistent, bioaccumulative, toxic
PNEC Predicted No Effect Concentration

REACH Registration, Evaluation, Authorisation and Restriction of Chemicals

RID Regulations concerning the International Carriage of Dangerous Goods by Rail

UN United Nations

VOC Volatile Organic Compounds

vPvB very persistent and very bioaccumulative

Further information

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

The information supplied on this safety data sheet complies with our current level of knowledge as well as with national and EU regulations. Without written approval, the product must not be used for purposes different from those mentioned in section 1. It is always the user's duty to take any necessary measures for meeting the requirements laid down by local rules and regulations. The details in this safety data sheet describe the safety requirements of our product and are not to be regarded as guaranteed attributes of the product.