

Safety data sheet

according to 1907/2006/EC, Article 31

Printing date 30.05.2016




Version number 3

Revision: 30.05.2016

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

- **1.1 Product identifier**
- **Trade name:** **COETRANS 1-K Waterproof. layer**
- **1.2 Relevant identified uses of the substance or mixture and uses advised against**
 - No further relevant information available.
- **Sector of Use**
 - SU22 Professional uses: Public domain (administration, education, entertainment, services, craftsmen)
- **Process category**
 - PROC10 Roller application or brushing
- **Application of the substance / the mixture**
 - Waterproofing
- **1.3 Details of the supplier of the safety data sheet**
- **Manufacturer/Supplier:**
 - KEMPER SYSTEM GmbH & Co. KG
 - Holländische Strasse 32-36
 - 34246 Vellmar
 - Deutschland / Germany
 - Telefon: +49 (0)561 / 8295-0
 - Telefax: +49 (0)561 / 8295-5110
 - E-Mail: MSDS@KEMPER-SYSTEM.COM
- **Further information obtainable from:**
 - Research and Development
- **1.4 Emergency telephone number:**
 - Giftinformationszentrum der Länder Rheinland-Pfalz und Hessen
 - Langenbeckstraße 1; Gebäude 601; 55131 Mainz
 - Tel. Nr.: +49 (0)6131 / 19 24 0
 - Universitätsmedizin der Johannes Gutenberg-Universität Mainz

SECTION 2: Hazards identification

- **2.1 Classification of the substance or mixture**
- **Classification according to Regulation (EC) No 1272/2008**
 - Flam. Liq. 3 H226 Flammable liquid and vapour.
 - Eye Irrit. 2 H319 Causes serious eye irritation.
 - Skin Sens. 1 H317 May cause an allergic skin reaction.
 - STOT RE 2 H373 May cause damage to organs through prolonged or repeated exposure.
 - Aquatic Chronic 3 H412 Harmful to aquatic life with long lasting effects.
- **2.2 Label elements**
- **Labelling according to Regulation (EC) No 1272/2008**
- **Hazard pictograms**
 - The product is classified and labelled according to the CLP regulation.
 -   
 - GHS02 GHS07 GHS08
- **Signal word**
 - Warning
- **Hazard-determining components of labelling:**
 - aromatic polyisocyanate prepolymer
 - Hydrocarbons, C9-C12, n-alkanes, isoalkanes, cyclics, aromatics (2-25%)
 - Urethane bis Oxazolidine
 - Isophorondiisocyanate homopolymer
- **Hazard statements**
 - H226 Flammable liquid and vapour.
 - H319 Causes serious eye irritation.
 - H317 May cause an allergic skin reaction.
 - H373 May cause damage to organs through prolonged or repeated exposure.
 - H412 Harmful to aquatic life with long lasting effects.
- **Precautionary statements**
 - P210 Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking.
 - P241 Use explosion-proof electrical/ventilating/lighting/equipment.
 - P260 Do not breathe dust/fume/gas/mist/vapours/spray.
 - P303+P361+P353 IF ON SKIN (or hair): Take off immediately all contaminated clothing. Rinse skin with water/shower.
 - P305+P351+P338 IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
 - P501 Dispose of contents/container in accordance with local/regional/national/international regulations.
- **Additional information:**
 - EUH204 Contains isocyanates. May produce an allergic reaction.
- **2.3 Other hazards**
- **Results of PBT and vPvB assessment**
- **PBT:**
 - Not applicable.
- **vPvB:**
 - Not applicable.

Safety data sheet

according to 1907/2006/EC, Article 31

Printing date 30.05.2016

Version number 3

Revision: 30.05.2016

Trade name: **COETRANS 1-K Waterproof. layer**

(Contd. of page 1)

SECTION 3: Composition/information on ingredients

- 3.2 Chemical characterisation: Mixtures

- **Description:** Mixture of substances listed below with nonhazardous additions.

- Dangerous components:

CAS: 7727-43-7 EINECS: 231-784-4	barium sulphate, natural substance with a Community workplace exposure limit	25-50%
CAS: 37273-56-6	aromatic polyisocyanate prepolymer Eye Irrit. 2, H319; Skin Sens. 1, H317	10-12.5%
CAS: 1330-20-7 EINECS: 215-535-7	xylene Flam. Liq. 3, H226; STOT RE 2, H373; Asp. Tox. 1, H304; Acute Tox. 4, H312; Acute Tox. 4, H332; Skin Irrit. 2, H315; Eye Irrit. 2, H319; STOT SE 3, H335	2.5-10%
CAS: 64742-95-6 EINECS: 265-199-0	Solvent naphtha (petroleum), light arom. Flam. Liq. 3, H226; Asp. Tox. 1, H304; Aquatic Chronic 2, H411; STOT SE 3, H335-H336	2.5-10%
CAS: 59719-67-4 EINECS: 261-879-6	Urethane bis Oxazolidine Aquatic Chronic 2, H411; Eye Irrit. 2, H319; Skin Sens. 1B, H317	2.5-10%
CAS: 100-41-4 EINECS: 202-849-4	ethylbenzene Flam. Liq. 2, H225; Acute Tox. 4, H332	0.5-2.5%
CAS: 53880-05-0 931-312-3	Isophorondiisocyanate homopolymer Skin Sens. 1, H317; STOT SE 3, H335	0.5-2.5%
CAS: 68512-30-1 EINECS: 270-966-8	Phenol, methylstyrenated Acute Tox. 3, H331; Skin Irrit. 2, H315; Skin Sens. 1, H317; Aquatic Chronic 3, H412	0.5-2.5%
919-446-0	Hydrocarbons, C9-C12, n-alkanes, isoalkanes, cyclics, aromatics (2-25%) Flam. Liq. 3, H226; STOT RE 1, H372; Asp. Tox. 1, H304; Aquatic Chronic 2, H411; STOT SE 3, H336	0.5-2.5%
CAS: 25550-51-0 EINECS: 247-094-1	hexahydromethylphthalic anhydride Resp. Sens. 1, H334; Eye Dam. 1, H318; Skin Sens. 1, H317	< 0.5%
CAS: 4098-71-9 EINECS: 223-861-6	3-isocyanatomethyl-3,5,5-trimethylcyclohexyl isocyanate Acute Tox. 3, H331; Resp. Sens. 1, H334; Aquatic Chronic 2, H411; Skin Irrit. 2, H315; Eye Irrit. 2, H319; Skin Sens. 1, H317; STOT SE 3, H335	< 0.5%

- SVHC

25550-51-0 | hexahydromethylphthalic anhydride

- **Additional information:** For the wording of the listed hazard phrases refer to section 16.

SECTION 4: First aid measures

- 4.1 Description of first aid measures

- General information:

Immediately remove any clothing soiled by the product.
Symptoms of poisoning may even occur after several hours; therefore medical observation for at least 48 hours after the accident.
Do not leave affected persons unattended.
Personal protection for the First Aider.

- After inhalation:

Take affected persons out of danger area and lay down.
Supply fresh air and to be sure call for a doctor.
In case of unconsciousness place patient stably in side position for transportation.
Supply fresh air; consult doctor in case of complaints.

- After skin contact:

Immediately rinse with water.
Immediately wash with water and soap and rinse thoroughly.

- After eye contact:

Rinse opened eye for several minutes under running water.
Rinse opened eye for several minutes under running water. If symptoms persist, consult a doctor.
Protect unharmed eye.

- After swallowing:

If symptoms persist consult doctor.

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

No further relevant information available.

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

No further relevant information available.

SECTION 5: Firefighting measures

- 5.1 Extinguishing media

- Suitable extinguishing agents:

CO2, sand, extinguishing powder. Do not use water.
ABC powder
Use fire extinguishing methods suitable to surrounding conditions.
Alcohol resistant foam

- For safety reasons unsuitable extinguishing agents:

Water with full jet

- 5.2 Special hazards arising from the substance or mixture

During heating or in case of fire poisonous gases are produced.

(Contd. on page 3)

Safety data sheet

according to 1907/2006/EC, Article 31

Printing date 30.05.2016

Version number 3

Revision: 30.05.2016

Trade name: **COETRANS 1-K Waterproof. layer**

(Contd. of page 2)

- 5.3 Advice for firefighters
- Protective equipment:

Mouth respiratory protective device.
Do not inhale explosion gases or combustion gases.

SECTION 6: Accidental release measures

- 6.1 Personal precautions, protective equipment and emergency procedures

Wear protective equipment. Keep unprotected persons away.
Keep away from ignition sources.

- 6.2 Environmental precautions:

Inform respective authorities in case of seepage into water course or sewage system.
Do not allow to enter sewers/ surface or ground water.
Prevent from spreading (e.g. by damming-in or oil barriers).

- 6.3 Methods and material for containment and cleaning up:

Absorb with liquid-binding material (sand, diatomite, acid binders, universal binders, sawdust).
Ensure adequate ventilation.

- 6.4 Reference to other sections

Do not flush with water or aqueous cleansing agents
See Section 7 for information on safe handling.
See Section 8 for information on personal protection equipment.
See Section 13 for disposal information.

SECTION 7: Handling and storage

- 7.1 Precautions for safe handling

Store in cool, dry place in tightly closed receptacles.
Ensure good ventilation/exhaustion at the workplace.
Prevent formation of aerosols.
Use only in well ventilated areas.

- Information about fire - and explosion protection:

Keep ignition sources away - Do not smoke.
Protect against electrostatic charges.

- 7.2 Conditions for safe storage, including any incompatibilities

- Storage:

- Requirements to be met by storerooms and receptacles:

No special requirements.

- Information about storage in one common storage facility:

Store away from foodstuffs.

- Further information about storage conditions:

Protect from frost.
Keep container tightly sealed.

- Storage class:

3

- 7.3 Specific end use(s)

No further relevant information available.

SECTION 8: Exposure controls/personal protection

- Additional information about design of technical facilities:

No further data; see item 7.

- 8.1 Control parameters

- Ingredients with limit values that require monitoring at the workplace:

7727-43-7 barium sulphate, natural

WEL	Long-term value: 10* 4** mg/m ³ *inhalable dust **respirable dust
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1330-20-7 xylene

WEL	Short-term value: 441 mg/m ³ , 100 ppm Long-term value: 220 mg/m ³ , 50 ppm Sk; BMGV
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100-41-4 ethylbenzene

WEL	Short-term value: 552 mg/m ³ , 125 ppm Long-term value: 441 mg/m ³ , 100 ppm Sk
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4098-71-9 3-isocyanatomethyl-3,5,5-trimethylcyclohexyl isocyanate

WEL	Short-term value: 0.07 mg/m ³ Long-term value: 0.02 mg/m ³ Sen; as -NCO
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- DNELs

1330-20-7 xylene

Dermal	Long term - systemic effects	180 mg/kg (worker)
Inhalative	Acute - systemic effects	289 mg/m ³ (worker)

(Contd. on page 4)

Safety data sheet

according to 1907/2006/EC, Article 31

Printing date 30.05.2016

Version number 3

Revision: 30.05.2016

Trade name: **COETRANS 1-K Waterproof. layer**

(Contd. of page 3)

Acute - local effects	289 mg/m ³ (worker)
Long term - systemic effects	77 mg/m ³ (worker)

- Ingredients with biological limit values:

1330-20-7 xylene

BMGV	650 mmol/mol creatinine
	Medium: urine
	Sampling time: post shift
	Parameter: methyl hippuric acid

- Additional information:

The lists valid during the making were used as basis.

- 8.2 Exposure controls

- Personal protective equipment:

- General protective and hygienic measures:

Keep away from foodstuffs, beverages and feed.
Immediately remove all soiled and contaminated clothing
Wash hands before breaks and at the end of work.
Avoid contact with the eyes and skin.

- Respiratory protection:

Use suitable respiratory protective device in case of insufficient ventilation.
Filter A/P2

- Protection of hands:



Protective gloves

Only use chemical-protective gloves with CE-labelling of category III.
The glove material has to be impermeable and resistant to the product/ the substance/ the preparation.
Selection of the glove material on consideration of the penetration times, rates of diffusion and the degradation

- Material of gloves

Butyl rubber, BR
The selection of the suitable gloves does not only depend on the material, but also on further marks of quality and varies from manufacturer to manufacturer. As the product is a preparation of several substances, the resistance of the glove material can not be calculated in advance and has therefore to be checked prior to the application.

- Penetration time of glove material

Recommended thickness of the material: ≥ 0.5 mm
For the mixture of chemicals mentioned below the penetration time has to be at least 480 minutes (Permeation according to EN 374 Part 3: Level \geq 6).

- Eye protection:



Tightly sealed goggles

- Body protection:

Protective work clothing
Impervious protective clothing

SECTION 9: Physical and chemical properties

- 9.1 Information on basic physical and chemical properties

- General Information

- Appearance:

Form:	Fluid
Colour:	According to product specification
- Odour:	Characteristic
- Odour threshold:	Not determined.

- pH-value: Not determined.

- Change in condition

Melting point/Melting range:	Undetermined.
Boiling point/Boiling range:	Undetermined.

- Flash point: 25 °C (DIN EN 22719)

- Flammability (solid, gaseous): Not applicable.

- Ignition temperature:

Decomposition temperature: Not determined.

- Self-igniting: Product is not selfigniting.

- Danger of explosion: Product is not explosive. However, formation of explosive air/vapour mixtures are possible.

- Explosion limits:

Lower:	Not determined.
Upper:	Not determined.

(Contd. on page 5)

Safety data sheet

according to 1907/2006/EC, Article 31

Printing date 30.05.2016

Version number 3

Revision: 30.05.2016

Trade name: **COETRANS 1-K Waterproof. layer**

(Contd. of page 4)

- Density at 20 °C:	1.45 g/cm ³
- Relative density	Not determined.
- Vapour density	Not determined.
- Evaporation rate	Not determined.
- Solubility in / Miscibility with water:	Not miscible or difficult to mix.
- Partition coefficient (n-octanol/water):	Not determined.
- Viscosity:	
Dynamic:	Not determined.
Kinematic at 23 °C:	110 s (ISO 6 mm, DIN EN ISO 2431)
- Solvent content:	
VOC (EC)	10.70 %
- 9.2 Other information	No further relevant information available.

SECTION 10: Stability and reactivity

- 10.1 Reactivity	No further relevant information available.
- 10.2 Chemical stability	
- Thermal decomposition / conditions to be avoided:	No decomposition if used according to specifications.
- 10.3 Possibility of hazardous reactions	No dangerous reactions known.
- 10.4 Conditions to avoid	No further relevant information available.
- 10.5 Incompatible materials:	No further relevant information available.
- 10.6 Hazardous decomposition products:	No dangerous decomposition products known.

SECTION 11: Toxicological information

- 11.1 Information on toxicological effects	
- Acute toxicity	Based on available data, the classification criteria are not met.

- LD/LC50 values relevant for classification:

7727-43-7 barium sulphate, natural

Oral	LD50	>15000 mg/kg (rat)
Dermal	LD50	> 2000 mg/kg (rat)

37273-56-6 aromatic polyisocyanate prepolymer

Oral	LD50	>5000 mg/kg (rat)
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1330-20-7 xylene

Oral	LD50	5251 mg/kg (mouse) 4300 mg/kg (rat)
Dermal	LD50	>2000 mg/kg (rabbit)
Inhalative	LC50/4 h	21.7 mg/l (rat)

64742-95-6 Solvent naphtha (petroleum), light arom.

Oral	LD50	>6800 mg/kg (rat)
Dermal	LD50	>3400 mg/kg (rab)
Inhalative	LC50/4 h	>10.2 mg/l (rat)

59719-67-4 Urethane bis Oxazolidine

Oral	LD50	>5000 mg/kg (rat)
Dermal	LD50	>2000 mg/kg (rab)

100-41-4 ethylbenzene

Oral	LD50	3500 mg/kg (rat)
Dermal	LD50	17800 mg/kg (rabbit)
Inhalative	LC50/4 h	11 mg/l (ATE)

53880-05-0 Isophorondiisocyanate homopolymer

Oral	LD50	2000 mg/kg (rat)
Dermal	LD50	>14000 mg/kg (rat)

68512-30-1 Phenol, methylstyrenated

Oral	LD50	>2000 mg/kg (rat)
Dermal	LD50	>2000 mg/kg (rat)
Inhalative	LC50/4 h	>5 mg/l (rat) (OECD 403)

(Contd. on page 6)

Safety data sheet

according to 1907/2006/EC, Article 31

Printing date 30.05.2016

Version number 3

Revision: 30.05.2016

Trade name: **COETRANS 1-K Waterproof. layer**

(Contd. of page 5)

Hydrocarbons, C9-C12, n-alkanes, isoalkanes, cyclics, aromatics (2-25%)

Oral LD50 >15000 mg/kg (rat)

Dermal LD50 >3400 mg/kg (rat)

25550-51-0 hexahydromethylphthalic anhydride

Oral LD50 >5000 mg/kg (rat)

4098-71-9 3-isocyanatomethyl-3,5,5-trimethylcyclohexyl isocyanate

Inhalative LC50/4 h 3 mg/l (ATE)

584-84-9 4-methyl-m-phenylene diisocyanate

Oral LD50 4130 mg/kg (rat)

>9400 mg/kg (rabbit)

Inhalative LC50/4 h 0.107 mg/l (rat)

- Primary irritant effect:

- Skin corrosion/irritation

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

- Serious eye damage/irritation

Causes serious eye irritation.

- Respiratory or skin sensitisation

May cause an allergic skin reaction.

- CMR effects (carcinogenicity, mutagenicity and toxicity for reproduction)

- Germ cell mutagenicity

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

- Carcinogenicity

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

- Reproductive toxicity

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

- STOT-single exposure

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

- STOT-repeated exposure

May cause damage to organs through prolonged or repeated exposure.

- Aspiration hazard

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

SECTION 12: Ecological information

- 12.1 Toxicity

- Aquatic toxicity:

37273-56-6 aromatic polyisocyanate prepolymer

EC50 >10000 mg/l (Belebtschlamm)

1330-20-7 xylene

LC50/96 h 26.7 mg/l (Pimephales promelas)

IC50 2.2 mg/l (ALGAE)

59719-67-4 Urethane bis Oxazolidine

EC50 87.1 mg/l (Daphnia magna)

EC50 18.6 mg/l (Selenastrum capricornutum)

100-41-4 ethylbenzene

EC50 2.1 mg/l (Daphnia magna)

EC50 4.6 mg/l (Pseudokirchneriella subcapitata)

LC50 12.1 mg/l (Daphnia magna)

53880-05-0 Isophorondiisocyanate homopolymer

LC50/96 h >1.51 mg/l (Cyprinus Carpio) (Richtlinie 67/548/EWG, Anhang V, C.1.)

EC50 >3.36 mg/l (Daphnia magna) (OECD- Prüfrichtlinie 202)

EC50 >10000 mg/l (Belebtschlamm) (OECD- Prüfrichtlinie 209)

68512-30-1 Phenol, methylstyrenated

ErC50 15 mg/l (daphnia)

LC50/96 h 25.8 mg/l (daphnia)

EC50 14-51 mg/l (daphnia)

Hydrocarbons, C9-C12, n-alkanes, isoalkanes, cyclics, aromatics (2-25%)

LC50 13100 mg/l (rat)

584-84-9 4-methyl-m-phenylene diisocyanate

LC50/96 h 133 mg/l (Oncorhynchus mykiss (Regenbogenforelle))

EC50 12.5 mg/l (Daphnia magna)

EC50 >100 mg/l (Belebtschlamm)

- 12.2 Persistence and degradability

No further relevant information available.

- 12.3 Bioaccumulative potential

No further relevant information available.

- 12.4 Mobility in soil

No further relevant information available.

- Ecotoxicological effects:

- Remark:

Harmful to fish

- Additional ecological information:

- General notes:

Water hazard class 2 (German Regulation) (Self-assessment): hazardous for water
Do not allow product to reach ground water, water course or sewage system.
Danger to drinking water if even small quantities leak into the ground.

(Contd. on page 7)

Safety data sheet

according to 1907/2006/EC, Article 31

Printing date 30.05.2016

Version number 3

Revision: 30.05.2016

Trade name: **COETRANS 1-K Waterproof. layer**

(Contd. of page 6)

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|--|---|
| <ul style="list-style-type: none"> - 12.5 Results of PBT and vPvB assessment - PBT: - vPvB: - 12.6 Other adverse effects | <p>Harmful to aquatic organisms</p> <p>Not applicable.</p> <p>Not applicable.</p> <p>No further relevant information available.</p> |
|--|---|

SECTION 13: Disposal considerations


- 13.1 Waste treatment methods
- Recommendation: Must not be disposed together with household garbage. Do not allow product to reach sewage system.
- European waste catalogue

08 04 09*	waste adhesives and sealants containing organic solvents or other hazardous substances
08 04 10	waste adhesives and sealants other than those mentioned in 08 04 09

- Uncleaned packaging:
- Recommendation: Disposal must be made according to official regulations.

SECTION 14: Transport information

- 14.1 UN-Number
- ADR, ADN, IMDG: Void
- IATA: UN1263
- 14.2 UN proper shipping name
- ADR, ADN, IMDG: Void
- IATA: PAINT
- 14.3 Transport hazard class(es)
- ADR, ADN, IMDG
- Class: Void
- IATA



- Class: 3 Flammable liquids.
- Label: 3
- 14.4 Packing group
- ADR, IMDG: Void
- IATA: III
- 14.5 Environmental hazards:
- Marine pollutant: No
- 14.6 Special precautions for user: Not applicable.
- 14.7 Transport in bulk according to Annex II of Marpol and the IBC Code: Not applicable.
- Transport/Additional information:
- ADR
- Remarks:

Kein Gut der Kl. 3 gemäß 2.2.3.1.5 ADR / 2.3.2.5 IMDG-Code
 ADR: Verpackung > 450 l = UN 1263 - Kl. 3 - Farbe - VPIII
 IMDG: Verpackung > 30 l = UN 1263 - Kl.3 - Farbe - VPIII
 Außerhalb ADR / IMDG = UN 1263 - Kl. 3 - Farbe - VPIII

Not goods of cl. 3 in accordance with 2.2.3.1.5 ADR / 2.3.2.5 IMDG-Code
 ADR: Packaging > 450 l = UN 1263 - cl. 3 - Paint - PGIII
 IMDG: Packaging > 30 l = UN 1263 - cl. 3 - Paint - PGIII
 Outside ADR / IMDG = UN 1263 - cl. 3 - Paint - PGIII
- UN "Model Regulation": Void

SECTION 15: Regulatory information

- 15.1 Safety, health and environmental regulations/legislation specific for the substance or mixture
- Directive 2012/18/EU
- Named dangerous substances - ANNEX I: None of the ingredients is listed.
- Seveso category: P5c FLAMMABLE LIQUIDS

(Contd. on page 8)

Safety data sheet

according to 1907/2006/EC, Article 31

Printing date 30.05.2016

Version number 3

Revision: 30.05.2016

Trade name: COETRANS 1-K Waterproof. layer

(Contd. of page 7)

- **Qualifying quantity (tonnes) for the application of lower-tier requirements** 5,000 t
- **Qualifying quantity (tonnes) for the application of upper-tier requirements** 50,000 t
- **REGULATION (EC) No 1907/2006 ANNEX XVII** Conditions of restriction: 3, 20, 28, 29
- **National regulations:**
- **Other regulations, limitations and prohibitive regulations**

- Substances of very high concern (SVHC) according to REACH, Article 57

25550-51-0 | hexahydromethylphthalic anhydride

- **15.2 Chemical safety assessment:** A Chemical Safety Assessment has not been carried out.

SECTION 16: Other information

This information is based on our present knowledge. However, this shall not constitute a guarantee for any specific product features and shall not establish a legally valid contractual relationship.

- **Relevant phrases**
 - H225 Highly flammable liquid and vapour.
 - H226 Flammable liquid and vapour.
 - H304 May be fatal if swallowed and enters airways.
 - H312 Harmful in contact with skin.
 - H315 Causes skin irritation.
 - H317 May cause an allergic skin reaction.
 - H318 Causes serious eye damage.
 - H319 Causes serious eye irritation.
 - H331 Toxic if inhaled.
 - H332 Harmful if inhaled.
 - H334 May cause allergy or asthma symptoms or breathing difficulties if inhaled.
 - H335 May cause respiratory irritation.
 - H336 May cause drowsiness or dizziness.
 - H372 Causes damage to organs through prolonged or repeated exposure.
 - H373 May cause damage to organs through prolonged or repeated exposure.
 - H411 Toxic to aquatic life with long lasting effects.
 - H412 Harmful to aquatic life with long lasting effects.

- **Department issuing SDS:** research & development
- **Contact:** research & development
- **Abbreviations and acronyms:**
 - ADR: Accord européen sur le transport des marchandises dangereuses par Route (European Agreement concerning the International Carriage of Dangerous Goods by Road)
 - IMDG: International Maritime Code for Dangerous Goods
 - IATA: International Air Transport Association
 - GHS: Globally Harmonised System of Classification and Labelling of Chemicals
 - EINECS: European Inventory of Existing Commercial Chemical Substances
 - ELINCS: European List of Notified Chemical Substances
 - CAS: Chemical Abstracts Service (division of the American Chemical Society)
 - VOC: Volatile Organic Compounds (USA, EU)
 - DNEL: Derived No-Effect Level (REACH)
 - LC50: Lethal concentration, 50 percent
 - LD50: Lethal dose, 50 percent
 - PBT: Persistent, Bioaccumulative and Toxic
 - SVHC: Substances of Very High Concern
 - vPvB: very Persistent and very Bioaccumulative
 - Flam. Liq. 2: Flammable liquids – Category 2
 - Flam. Liq. 3: Flammable liquids – Category 3
 - Acute Tox. 4: Acute toxicity – Category 4
 - Acute Tox. 3: Acute toxicity – Category 3
 - Skin Irrit. 2: Skin corrosion/irritation – Category 2
 - Eye Dam. 1: Serious eye damage/eye irritation – Category 1
 - Eye Irrit. 2: Serious eye damage/eye irritation – Category 2
 - Resp. Sens. 1: Respiratory sensitisation – Category 1
 - Skin Sens. 1: Skin sensitisation – Category 1
 - Skin Sens. 1B: Skin sensitisation – Category 1B
 - STOT SE 3: Specific target organ toxicity (single exposure) – Category 3
 - STOT RE 1: Specific target organ toxicity (repeated exposure) – Category 1
 - STOT RE 2: Specific target organ toxicity (repeated exposure) – Category 2
 - Asp. Tox. 1: Aspiration hazard – Category 1
 - Aquatic Chronic 2: Hazardous to the aquatic environment - long-term aquatic hazard – Category 2
 - Aquatic Chronic 3: Hazardous to the aquatic environment - long-term aquatic hazard – Category 3

- **Sources**
 - Internet:
 - www.echa.com
 - www.baua.de
 - www.gestis.itrust.de (IFA: Institute für Occupational Safety and Health of the German Social Accident Insurance)

- *** Data compared to the previous version altered.**