

Page 1 of 18

Safety data sheet according to Regulation (EC) No 1907/2006, Annex II

Revision date / version: 17.10.2022 / 0023

Replacing version dated / version: 21.09.2022 / 0022

Valid from: 17.10.2022 PDF print date: 18.10.2022 Zentralhydraulik-Oel

Safety data sheet according to Regulation (EC) No 1907/2006, Annex II

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

1.1 Product identifier

Zentralhydraulik-Oel

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

Hydraulic oil

Uses advised against:

No information available at present.

1.3 Details of the supplier of the safety data sheet

LIQUI MOLY GmbH Jerg-Wieland-Str. 4 89081 Ulm-Lehr

Tel.: (+49) 0731-1420-0 Fax: (+49) 0731-1420-88

Qualified person's e-mail address: info@chemical-check.de, k.schnurbusch@chemical-check.de Please DO NOT use for requesting Safety Data Sheets.

1.4 Emergency telephone number

Emergency information services / official advisory body:

Telephone number of the company in case of emergencies:

+49 (0) 700 / 24 112 112 (LMR)

+1 872 5888271 (LMR)

SECTION 2: Hazards identification

2.1 Classification of the substance or mixture

Classification according to Regulation (EC) 1272/2008 (CLP)

Hazard class Hazard category Hazard statement

Acute Tox. 4 H332-Harmful if inhaled.

Asp. Tox. 1 H304-May be fatal if swallowed and enters airways.

2.2 Label elements

Labeling according to Regulation (EC) 1272/2008 (CLP)





Page 2 of 18

Safety data sheet according to Regulation (EC) No 1907/2006, Annex II

Revision date / version: 17.10.2022 / 0023

Replacing version dated / version: 21.09.2022 / 0022

Valid from: 17.10.2022 PDF print date: 18.10.2022 Zentralhydraulik-Oel

H332-Harmful if inhaled. H304-May be fatal if swallowed and enters airways.

P101-If medical advice is needed, have product container or label at hand. P102-Keep out of reach of children.

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

P301+P310-IF SWALLOWED: Immediately call a POISON CENTER / doctor. P331-Do NOT induce vomiting.

P405-Store locked up.

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

1-Decene, dimer, hydrogenated

Distillates (petroleum), hydrotreated light paraffinic

Lubricating oils (petroleum), C20-50, hydrotreated neutral oil-based

2.3 Other hazards

The mixture does not contain any vPvB substance (vPvB = very persistent, very bioaccumulative) or is not included under XIII of the regulation (EC) 1907/2006 (< 0,1 %).

The mixture does not contain any PBT substance (PBT = persistent, bioaccumulative, toxic) or is not included under XIII of the regulation (EC) 1907/2006 (< 0,1 %).

The mixture does not contain any substance with endocrine disrupting properties (< 0,1 %).

SECTION 3: Composition/information on ingredients

3.1 Substances

n.a. **3.2 Mixtures**

OIZ IIIIXUU OO	
1-Decene, dimer, hydrogenated	
Registration number (REACH)	01-2119493069-28-XXXX
Index	
EINECS, ELINCS, NLP, REACH-IT List-No.	500-228-5
CAS	68649-11-6
content %	50-<75
Classification according to Regulation (EC) 1272/2008 (CLP), M-factors	Acute Tox. 4, H332
	Asp. Tox. 1, H304

Lubricating oils (petroleum), C20-50, hydrotreated neutral oil-based	
Registration number (REACH)	01-2119474889-13-XXXX
Index	649-483-00-5
EINECS, ELINCS, NLP, REACH-IT List-No.	276-738-4
CAS	72623-87-1
content %	10-<25
Classification according to Regulation (EC) 1272/2008 (CLP), M-factors	Asp. Tox. 1, H304

Short-, medium- and long-chain alkyl methacrylates copolymer (ACC-	
ZX665225-90)	
Registration number (REACH)	
Index	
EINECS, ELINCS, NLP, REACH-IT List-No.	
CAS	
content %	1-<10
Classification according to Regulation (EC) 1272/2008 (CLP), M-factors	Eye Irrit. 2, H319
Specific Concentration Limits and ATE	Eye Irrit. 2, H319: >=75 %

Distillates (petroleum), hydrotreated light paraffinic	
Registration number (REACH)	01-2119487077-29-XXXX
Index	649-468-00-3
EINECS, ELINCS, NLP, REACH-IT List-No.	265-158-7
CAS	64742-55-8
content %	1-<10
Classification according to Regulation (EC) 1272/2008 (CLP), M-factors	Asp. Tox. 1, H304



Page 3 of 18

Safety data sheet according to Regulation (EC) No 1907/2006, Annex II

Revision date / version: 17.10.2022 / 0023

Replacing version dated / version: 21.09.2022 / 0022

Valid from: 17.10.2022 PDF print date: 18.10.2022 Zentralhydraulik-Oel

2,2'-(C16-18 (evennumbered, C18 unsaturated) alkyl imino) diethanol	
Registration number (REACH)	01-2119510877-33-XXXX
Index	
EINECS, ELINCS, NLP, REACH-IT List-No.	620-540-6
CAS	1218787-32-6
content %	0,01-<0,25
Classification according to Regulation (EC) 1272/2008 (CLP), M-factors	Acute Tox. 4, H302
	Skin Corr. 1C, H314
	Eye Dam. 1, H318
	Aquatic Acute 1, H400 (M=10)
	Aquatic Chronic 1, H410 (M=1)

2-(2-heptadec-8-enyl-2-imidazolin-1-yl)ethanol	
Registration number (REACH)	01-2119777867-13-XXXX
Index	
EINECS, ELINCS, NLP, REACH-IT List-No.	202-414-9
CAS	95-38-5
content %	0,01-<0,25
Classification according to Regulation (EC) 1272/2008 (CLP), M-factors	Acute Tox. 4, H302
	Skin Corr. 1C, H314
	Eye Dam. 1, H318
	STOT RE 2, H373 (gastrointestinal tract, thymus) (oral)
	Aquatic Acute 1, H400 (M=10)
	Aquatic Chronic 1, H410 (M=1)

For the text of the H-phrases and classification codes (GHS/CLP), see Section 16.

The substances named in this section are given with their actual, appropriate classification!

For substances that are listed in appendix VI, table 3.1 of the regulation (EC) no. 1272/2008 (CLP regulation) this means that all notes that may be given here for the named classification have been taken into account.

SECTION 4: First aid measures

4.1 Description of first aid measures

First-aiders should ensure they are protected!

Never pour anything into the mouth of an unconscious person!

Inhalation

Remove person from danger area.

Supply person with fresh air and consult doctor according to symptoms.

Skin contact

Remove polluted, soaked clothing immediately, wash thoroughly with plenty of water and soap, in case of irritation of the skin (flare), consult a doctor.

Eye contact

Remove contact lenses.

Wash thoroughly for several minutes using copious water. Seek medical help if necessary.

Ingestion

Rinse the mouth thoroughly with water.

Do not induce vomiting. Consult doctor immediately.

Danger of aspiration.

In case of vomiting, keep head low so that the stomach content does not reach the lungs.

4.2 Most important symptoms and effects, both acute and delayed

If applicable delayed symptoms and effects can be found in section 11 and the absorption route in section 4.1. In certain cases, the symptoms of poisoning may only appear after an extended period / after several hours.

4.3 Indication of any immediate medical attention and special treatment needed

 $\label{eq:Symptomatic treatment.} Symptomatic treatment.$

Gastric lavage (stomach washing) only under endotracheal intubation.

Subsequent observation for pneumonia and pulmonary oedema.

SECTION 5: Firefighting measures



Page 4 of 18

Safety data sheet according to Regulation (EC) No 1907/2006, Annex II

Revision date / version: 17.10.2022 / 0023 Replacing version dated / version: 21.09.2022 / 0022

Valid from: 17.10.2022 PDF print date: 18.10.2022 Zentralhydraulik-Oel

5.1 Extinguishing media Suitable extinguishing media

CO₂ Foam

Dry extinguisher

Water jet spray

Unsuitable extinguishing media

High volume water jet

5.2 Special hazards arising from the substance or mixture

In case of fire the following can develop:

Oxides of carbon

Oxides of sulphur

Oxides of nitrogen

Aldehydes

Hydrogen cyanide

Toxic gases

Explosive vapour/air or gas/air mixtures.

5.3 Advice for firefighters

For personal protective equipment see Section 8.

In case of fire and/or explosion do not breathe fumes.

Protective respirator with independent air supply.

According to size of fire

Full protection, if necessary.

Cool container at risk with water.

Dispose of contaminated extinction water according to official regulations.

SECTION 6: Accidental release measures

6.1 Personal precautions, protective equipment and emergency procedures

6.1.1 For non-emergency personnel

In case of spillage or accidental release, wear personal protective equipment as specified in section 8 to prevent contamination.

Ensure sufficient ventilation, remove sources of ignition.

Avoid dust formation with solid or powder products.

Leave the danger zone if possible, use existing emergency plans if necessary.

Keep unprotected persons away.

Avoid contact with eyes or skin.

If applicable, caution - risk of slipping.

6.1.2 For emergency responders

See section 8 for suitable protective equipment and material specifications.

6.2 Environmental precautions

If leakage occurs, dam up.

Resolve leaks if this possible without risk.

Prevent from entering drainage system.

Prevent surface and ground-water infiltration, as well as ground penetration.

If accidental entry into drainage system occurs, inform responsible authorities.

6.3 Methods and material for containment and cleaning up

Soak up with absorbent material (e.g. universal binding agent, sand, diatomaceous earth) and dispose of according to Section 13. Fill the absorbed material into lockable containers.

6.4 Reference to other sections

For personal protective equipment see Section 8 and for disposal instructions see Section 13.

SECTION 7: Handling and storage

In addition to information given in this section, relevant information can also be found in section 8 and 6.1.

7.1 Precautions for safe handling

7.1.1 General recommendations

Ensure good ventilation.

Avoid formation of oil mist.



(GB)-

Page 5 of 18

Safety data sheet according to Regulation (EC) No 1907/2006, Annex II

Revision date / version: 17.10.2022 / 0023

Replacing version dated / version: 21.09.2022 / 0022

Valid from: 17.10.2022 PDF print date: 18.10.2022 Zentralhydraulik-Oel

Avoid contact with eyes or skin.

Do not heat to temperatures close to flash point.

Do not carry cleaning cloths soaked in product in trouser pockets.

Eating, drinking, smoking, as well as food-storage, is prohibited in work-room.

Observe directions on label and instructions for use. Use working methods according to operating instructions.

7.1.2 Notes on general hygiene measures at the workplace

General hygiene measures for the handling of chemicals are applicable.

Wash hands before breaks and at end of work.

Keep away from food, drink and animal feedingstuffs.

Remove contaminated clothing and protective equipment before entering areas in which food is consumed.

7.2 Conditions for safe storage, including any incompatibilities

Keep out of access to unauthorised individuals.

Not to be stored in gangways or stair wells.

Store product closed and only in original packing.

Store at room temperature.

Store in a dry place.

7.3 Specific end use(s)

No information available at present.

SECTION 8: Exposure controls/personal protection

8.1 Control parameters

Chemical Name Oil mist, mineral		
WEL-TWA: 5 mg/m3 (Mineral oil, excluding metal	WEL-STEL:	
working fluids, ACGIH)		
Monitoring procedures: -	Draeger - Oil Mist 1/a (67 33 031)	
BMGV:	Other information:	-

Lubricating oils (petroleum),	C20-50, hydrotreated neutral of	oil-based				
Area of application	Exposure route /	Effect on health	Descriptor	Value	Unit	Note
	Environmental					
	compartment					
	Human - oral		PNEC	9,33	mg/kg feed	
Consumer	Human - inhalation	Long term, local effects	DNEL	1,2	mg/m3	24h
Workers / employees	Human - inhalation	Long term, local effects	DNEL	5,4	mg/m3	8h

Distillates (petroleum), h	ydrotreated light paraffinic					
Area of application	Exposure route /	Effect on health	Descriptor	Value	Unit	Note
	Environmental					
	compartment					
	Environment - oral (animal		PNEC	9,33	mg/kg feed	
	feed)					
Consumer	Human - inhalation	Long term, local effects	DNEL	1,19	mg/m3	
Consumer	Human - oral	Long term, systemic	DNEL	0,74	mg/kg	
		effects			bw/day	
Workers / employees	Human - inhalation	Long term, local effects	DNEL	5,6	mg/m3	
Workers / employees	Human - dermal	Long term, systemic	DNEL	0,97	mg/kg	
		effects			bw/day	
Workers / employees	Human - inhalation	Long term, systemic	DNEL	2,7	mg/m3	
		effects				

2,2'-(C16-18 (evennumbered,	C18 unsaturated) alkyl imino)	diethanol				
Area of application	Exposure route /	Effect on health	Descriptor	Value	Unit	Note
	Environmental					
	compartment					
	Environment - freshwater		PNEC	0,21	μg/l	



Page 6 of 18

Safety data sheet according to Regulation (EC) No 1907/2006, Annex II

Revision date / version: 17.10.2022 / 0023

Replacing version dated / version: 21.09.2022 / 0022

Valid from: 17.10.2022 PDF print date: 18.10.2022 Zentralhydraulik-Oel

Consumer	Human - dermal	Long term, systemic effects	DNEL	0,21	mg/kg bw/d	
Consumer	Human - oral	Long term, systemic effects	DNEL	0,21	mg/kg bw/d	
Workers / employees	Human - dermal	Long term, systemic effects	DNEL	0,3	mg/kg bw/d	

Area of application	Exposure route /	Effect on health	Descriptor	Value	Unit	Note
	Environmental					
	compartment					
	Environment - freshwater		PNEC	0	mg/l	
	Environment - marine		PNEC	0	mg/l	
	Environment - sewage treatment plant		PNEC	0,27	mg/l	
	Environment - sediment, freshwater		PNEC	0,376	mg/kg	
	Environment - sediment,		PNEC	0,038	mg/kg	
	Environment - soil		PNEC	0,075	mg/kg	
Workers / employees	Human - dermal	Short term, systemic effects	DNEL	2	mg/kg	
Workers / employees	Human - inhalation	Short term, systemic effects	DNEL	14	mg/m3	
Workers / employees	Human - inhalation	Long term, systemic effects	DNEL	0,46	mg/m3	
Workers / employees	Human - dermal	Long term, systemic effects	DNEL	0,06	mg/kg body weight/day	

Distillates (petroleum), hydrotreated heavy paraffinic											
Area of application	Exposure route /	Effect on health	Descriptor	Value	Unit	Note					
	Environmental										
	compartment										
	Environment - oral (animal		PNEC	9,33	mg/kg feed						
	feed)										

- WEL-TWA = Workplace Exposure Limit Long-term exposure limit (8-hour TWA (= time weighted average) reference period) EH40. AGW = "Arbeitsplatzgrenzwert" (workplace limit value, Germany).
- (8) = Inhalable fraction (Directive 2017/164/EU, Directive 2004/37/CE). (9) = Respirable fraction (Directive 2017/164/EU, Directive 2004/37/CE). (11) = Inhalable fraction (Directive 2004/37/CE). (12) = Inhalable fraction. Respirable fraction in those Member States that implement, on the date of the entry into force of this Directive, a biomonitoring system with a biological limit value not exceeding 0,002 mg Cd/g creatinine in urine (Directive 2004/37/CE). | WEL-STEL = Workplace Exposure Limit Short-term exposure limit (15-minute reference period).
- (8) = Inhalable fraction (2017/164/EU, 2017/2398/EU). (9) = Respirable fraction (2017/164/EU), 2017/2398/EU). (10) = Short-term exposure limit value in relation to a reference period of 1 minute (2017/164/EU). | BMGV = Biological monitoring guidance value EH40. BGW = "Biologischer Grenzwert" (biological limit value, Germany) | Other information: Sen = Capable of causing occupational asthma. Sk = Can be absorbed through skin. Carc = Capable of causing cancer and/or heritable genetic damage.
- ** = The exposure limit for this substance is repealed through the TRGS 900 (Germany) of January 2006 with the goal of revision.
- (13) = The substance can cause sensitisation of the skin and of the respiratory tract (Directive 2004/37/CE), (14) = The substance can cause sensitisation of the skin (Directive 2004/37/CE).

8.2 Exposure controls

8.2.1 Appropriate engineering controls

Ensure good ventilation. This can be achieved by local suction or general air extraction.

If this is insufficient to maintain the concentration under the WEL or AGW values, suitable breathing protection should be worn. Applies only if maximum permissible exposure values are listed here.

Suitable assessment methods for reviewing the effectiveness of protection measures adopted include metrological and non-metrological investigative techniques.

These are specified by e.g. EN 14042.

EN 14042 "Workplace atmospheres. Guide for the application and use of procedures for the assessment of exposure to chemical and biological agents".



Page 7 of 18

Safety data sheet according to Regulation (EC) No 1907/2006, Annex II

Revision date / version: 17.10.2022 / 0023

Replacing version dated / version: 21.09.2022 / 0022

Valid from: 17.10.2022 PDF print date: 18.10.2022 Zentralhydraulik-Oel

8.2.2 Individual protection measures, such as personal protective equipment

General hygiene measures for the handling of chemicals are applicable.

Wash hands before breaks and at end of work.

Keep away from food, drink and animal feedingstuffs.

Remove contaminated clothing and protective equipment before entering areas in which food is consumed.

Eye/face protection:

Tight fitting protective goggles (EN 166) with side protection, with danger of splashes.

Skin protection - Hand protection:

Chemical resistant protective gloves (EN ISO 374).

If applicable

Protective Neoprene® / polychloroprene gloves (EN ISO 374).

Protective nitrile gloves (EN ISO 374).

Minimum layer thickness in mm:

0.4

Permeation time (penetration time) in minutes:

> 480

The breakthrough times determined in accordance with EN 16523-1 were not obtained under practical conditions.

The recommended maximum wearing time is 50% of breakthrough time.

Protective hand cream recommended.

Skin protection - Other:

Protective working garments (e.g. safety shoes EN ISO 20345, long-sleeved protective working garments).

Respiratory protection:

If OES or MEL is exceeded.

Filter A2 P2 (EN 14387), code colour brown, white

Observe wearing time limitations for respiratory protection equipment.

Thermal hazards:

Not applicable

Additional information on hand protection - No tests have been performed.

In the case of mixtures, the selection has been made according to the knowledge available and the information about the contents. Selection of materials derived from glove manufacturer's indications.

Final selection of glove material must be made taking the breakthrough times, permeation rates and degradation into account.

Selection of a suitable glove depends not only on the material but also on other quality characteristics and varies from manufacturer to manufacturer.

In the case of mixtures, the resistance of glove materials cannot be predicted and must therefore be tested before use.

The exact breakthrough time of the glove material can be requested from the protective glove manufacturer and must be observed.

8.2.3 Environmental exposure controls

No information available at present.

SECTION 9: Physical and chemical properties

9.1 Information on basic physical and chemical properties

Physical state:

Colour:

Odour:

Characteristic

Melting point/freezing point:

Boiling point or initial boiling point and boiling range:

Flammability:

Lower explosion limit: Upper explosion limit:

Flash point:

Auto-ignition temperature: Decomposition temperature:

pH:

Kinematic viscosity: Kinematic viscosity: There is no information available on this parameter. There is no information available on this parameter. There is no information available on this parameter.

There is no information available on this parameter. There is no information available on this parameter. There is no information available on this parameter.

150 °C

There is no information available on this parameter. There is no information available on this parameter.

n.d.a.

19,5 mm2/s (40°C) 6,1 mm2/s (100°C)



Page 8 of 18

Safety data sheet according to Regulation (EC) No 1907/2006, Annex II

Revision date / version: 17.10.2022 / 0023

Replacing version dated / version: 21.09.2022 / 0022

Valid from: 17.10.2022 PDF print date: 18.10.2022 Zentralhydraulik-Oel

Solubility:

Partition coefficient n-octanol/water (log value):

Vapour pressure:

Density and/or relative density: Relative vapour density:

Particle characteristics:

9.2 Other informationNo information available at present.

Insoluble

Does not apply to mixtures.

There is no information available on this parameter.

0,825 g/cm3

There is no information available on this parameter.

Does not apply to liquids.

SECTION 10: Stability and reactivity

10.1 Reactivity

The product has not been tested.

10.2 Chemical stability

Stable with proper storage and handling.

10.3 Possibility of hazardous reactions

No dangerous reactions are known.

10.4 Conditions to avoid

Heating, open flame, ignition sources

10.5 Incompatible materials

Avoid contact with strong oxidizing agents.

10.6 Hazardous decomposition products

No decomposition when used as directed.

SECTION 11: Toxicological information

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

Possibly more information on health effects, see Section 2.1 (classification).

Zentralhydraulik-Oel		,	,			
Toxicity / effect	Endpoint	Value	Unit	Organism	Test method	Notes
Acute toxicity, by oral route:						n.d.a.
Acute toxicity, by dermal route:						n.d.a.
Acute toxicity, by inhalation:	ATE	14,5	mg/l/4h			calculated value,
						Vapours
Acute toxicity, by inhalation:	ATE	2,38	mg/l/4h			calculated value,
						Aerosol
Skin corrosion/irritation:						n.d.a.
Serious eye damage/irritation:						n.d.a.
Respiratory or skin						n.d.a.
sensitisation:						
Germ cell mutagenicity:						n.d.a.
Carcinogenicity:						n.d.a.
Reproductive toxicity:						n.d.a.
Specific target organ toxicity -						n.d.a.
single exposure (STOT-SE):						
Specific target organ toxicity -						n.d.a.
repeated exposure (STOT-RE):						
Aspiration hazard:						n.d.a.
Symptoms:						n.d.a.

1-Decene, dimer, hydrogenated	1-Decene, dimer, hydrogenated									
Toxicity / effect	Endpoint	Value	Unit	Organism	Test method	Notes				
Acute toxicity, by oral route:	LD50	>5000	mg/kg	Rat	OECD 401 (Acute Oral					
					Toxicity)					
Serious eye damage/irritation:				Rabbit	OECD 405 (Acute Eye	Not irritant				
					Irritation/Corrosion)					
Respiratory or skin					OECD 406 (Skin	Not sensitizising				
sensitisation:					Sensitisation)	(Analogous				
						conclusion)				



Page 9 of 18

Safety data sheet according to Regulation (EC) No 1907/2006, Annex II Revision date / version: 17.10.2022 / 0023

Replacing version dated / version: 21.09.2022 / 0022 Valid from: 17.10.2022 PDF print date: 18.10.2022 Zentralhydraulik-Oel

Lubricating oils (petroleum), Caronicity / effect	Endpoint	Value	Unit	Organism	Test method	Notes
Acute toxicity, by oral route:	LD50	>5000	mg/kg	Rat	OECD 401 (Acute Oral Toxicity)	140163
Acute toxicity, by dermal route:	LD50	>5000	mg/kg	Rabbit	OECD 402 (Acute Dermal Toxicity)	
Acute toxicity, by inhalation:	LC50	>5,53	mg/l/4h	Rat	OECD 403 (Acute Inhalation Toxicity)	
Skin corrosion/irritation:				Rabbit	OECD 404 (Acute Dermal Irritation/Corrosion)	Not irritant, Repeated exposure may cause skin dryness or cracking.
Serious eye damage/irritation:				Rabbit	OECD 405 (Acute Eye Irritation/Corrosion)	Not irritant
Respiratory or skin sensitisation:				Guinea pig	OECD 406 (Skin Sensitisation)	No (skin contact
Germ cell mutagenicity:				Salmonella typhimurium	OECD 471 (Bacterial Reverse Mutation Test)	Negative, Analogous conclusion
Germ cell mutagenicity:					OECD 473 (In Vitro Mammalian Chromosome Aberration Test)	Negative, Analogous conclusion Chinese hamste
Germ cell mutagenicity:				Mouse	OECD 476 (In Vitro Mammalian Cell Gene Mutation Test)	Negative, Analogous conclusion
Germ cell mutagenicity:				Mouse	OECD 474 (Mammalian Erythrocyte Micronucleus Test)	Negative, Analogous conclusion
Carcinogenicity:					OECD 453 (Combined Chronic Toxicity/Carcinogenicity Studies)	Negative
Carcinogenicity:				Mouse	OECD 451 (Carcinogenicity Studies)	Negative, Analogous conclusion
Reproductive toxicity:					OECD 414 (Prenatal Developmental Toxicity Study)	Negative
Reproductive toxicity:					OECD 421 (Reproduction/Developm ental Toxicity Screening Test)	Negative
Reproductive toxicity:				Rat	OECD 421 (Reproduction/Developm ental Toxicity Screening Test)	Negative, Analogous conclusion
Specific target organ toxicity - repeated exposure (STOT-RE):					OECD 453 (Combined Chronic Toxicity/Carcinogenicity Studies)	Negative
Specific target organ toxicity - repeated exposure (STOT-RE):					OECD 408 (Repeated Dose 90-Day Oral Toxicity Study in Rodents)	Negative
Specific target organ toxicity - repeated exposure (STOT-RE):					OECD 410 (Repeated Dose Dermal Toxicity - 90-Day)	Negative
Specific target organ toxicity - repeated exposure (STOT-RE):					OECD 411 (Subchronic Dermal Toxicity - 90-day Study)	Negative



Page 10 of 18

Safety data sheet according to Regulation (EC) No 1907/2006, Annex II Revision date / version: 17.10.2022 / 0023

Replacing version dated / version: 21.09.2022 / 0022

Specific target organ toxicity - repeated exposure (STOT-RE):			OECD 412 (Subacute Inhalation Toxicity - 28- Day Study)	Negative
Aspiration hazard:				Asp. Tox. 1

Toxicity / effect	Endpoint	Value	Unit	Organism	Test method	Notes
Acute toxicity, by oral route:	LD50	>5000	mg/kg	Rat	OECD 401 (Acute Oral	Analogous
					Toxicity)	conclusion
Skin corrosion/irritation:				Rabbit	OECD 404 (Acute	Not irritant,
					Dermal	Analogous
					Irritation/Corrosion)	conclusion
Serious eye damage/irritation:		>=75	%	Rabbit	OECD 405 (Acute Eye	Eye Irrit. 2,
					Irritation/Corrosion)	Classification
						based on
						toxicological
						analyses.
Respiratory or skin				Guinea pig	OECD 406 (Skin	No (skin
sensitisation:					Sensitisation)	contact),
						Analogous
						conclusion
Germ cell mutagenicity:					OECD 471 (Bacterial	Negative,
					Reverse Mutation Test)	Analogous
						conclusion

Toxicity / effect	Endpoint	Value	Unit	Organism	Test method	Notes
Acute toxicity, by oral route:	LD50	>5000	mg/kg	Rat	OECD 401 (Acute Oral	Analogous
3 7. 3					Toxicity)	conclusion
Acute toxicity, by dermal route:	LD50	>5000	mg/kg	Rabbit	OECD 402 (Acute	Analogous
• •					Dermal Toxicity)	conclusion
Acute toxicity, by inhalation:	LC50	>5,53	mg/l/4h	Rat	OECD 403 (Acute	Aerosol,
					Inhalation Toxicity)	Analogous
						conclusion
Skin corrosion/irritation:				Rabbit	OECD 404 (Acute	Not irritant,
					Dermal	Analogous
					Irritation/Corrosion)	conclusion
Serious eye damage/irritation:				Rabbit	OECD 405 (Acute Eye	Not irritant,
					Irritation/Corrosion)	Analogous
						conclusion
Respiratory or skin				Guinea pig	OECD 406 (Skin	No (skin
sensitisation:					Sensitisation)	contact),
						Analogous
						conclusion
Germ cell mutagenicity:				Salmonella	OECD 471 (Bacterial	Negative,
				typhimurium	Reverse Mutation Test)	Analogous
						conclusion
Germ cell mutagenicity:				Mammalian	OECD 473 (In Vitro	Negative,
					Mammalian	Analogous
					Chromosome	conclusionChines
					Aberration Test)	e hamster
Reproductive toxicity				Rat	OECD 414 (Prenatal	Negative,
(Developmental toxicity):					Developmental Toxicity	Analogous
					Study)	conclusion
Carcinogenicity:				Mouse	OECD 451	Negative,
					(Carcinogenicity Studies)	Analogous
B 1 2 1 1 2	110151	1000			0505 404	conclusionderma
Reproductive toxicity:	NOAEL	1000	mg/kg	Rat	OECD 421	Analogous
			bw/d		(Reproduction/Developm	conclusionderma
					ental Toxicity Screening	
Assissting beauty					Test)	V
Aspiration hazard:						Yes



Page 11 of 18

Safety data sheet according to Regulation (EC) No 1907/2006, Annex II Revision date / version: 17.10.2022 / 0023

Replacing version dated / version: 21.09.2022 / 0022

Specific target organ toxicity - repeated exposure (STOT-RE), oral:	NOAEL	125	mg/kg bw/d	Rat	OECD 408 (Repeated Dose 90-Day Oral Toxicity Study in Rodents)	Analogous conclusion
Specific target organ toxicity - repeated exposure (STOT-RE), dermal:	NOAEL	<30	mg/kg bw/d	Rat	OECD 411 (Subchronic Dermal Toxicity - 90-day Study)	Analogous conclusion
Specific target organ toxicity - repeated exposure (STOT-RE), dermal:	NOAEL	1000	mg/kg	Rabbit	OECD 410 (Repeated Dose Dermal Toxicity - 90-Day)	Analogous conclusion
Specific target organ toxicity - repeated exposure (STOT-RE), inhalat.:	NOAEL	0,05	mg/l	Rat	OECD 412 (Subacute Inhalation Toxicity - 28- Day Study)	Aerosol, Analogous conclusion
Specific target organ toxicity - repeated exposure (STOT-RE), inhalat.:	NOAEL	0,15	mg/l	Rat		Aerosol, Analogous conclusion13 weeks

2,2'-(C16-18 (evennumbered,		, ,	<i>'</i>	0	To at weath and	Maria
Toxicity / effect	Endpoint	Value	Unit	Organism	Test method	Notes
Acute toxicity, by oral route:	LD50	1500	mg/kg	Rat	OECD 425 (Acute Oral	
					Toxicity - Up-and-Down	
					Procedure)	
Skin corrosion/irritation:				Rabbit	OECD 404 (Acute	Skin Corr. 1C
					Dermal	
					Irritation/Corrosion)	
Respiratory or skin				Guinea pig	OECD 406 (Skin	No (skin
sensitisation:					Sensitisation)	contact),
					,	Analogous
						conclusion
Germ cell mutagenicity:				Mouse	OECD 476 (In Vitro	Negative,
					Mammalian Cell Gene	Analogous
					Mutation Test)	conclusion
Germ cell mutagenicity:				Human being	OECD 473 (In Vitro	Negative,
0 ,					Mammalian `	Analogous
					Chromosome	conclusion
					Aberration Test)	

Toxicity / effect	Endpoint	Value	Unit	Organism	Test method	Notes
Acute toxicity, by oral route:	LD50	1265	mg/kg	Rat	OECD 401 (Acute Oral	Analogous
					Toxicity)	conclusion
Skin corrosion/irritation:				Rabbit	OECD 404 (Acute	Corrosive,
					Dermal	Analogous
					Irritation/Corrosion)	conclusion
Serious eye damage/irritation:				Rabbit	OECD 405 (Acute Eye	Corrosive,
					Irritation/Corrosion)	Analogous
						conclusion
Respiratory or skin				Guinea pig	OECD 406 (Skin	No (skin
sensitisation:					Sensitisation)	contact),
						Analogous
						conclusion
Germ cell mutagenicity:				Salmonella	OECD 471 (Bacterial	Negative,
				typhimurium	Reverse Mutation Test)	Analogous
						conclusion
Germ cell mutagenicity:				Mammalian	OECD 473 (In Vitro	Negative,
					Mammalian	Analogous
					Chromosome	conclusion
					Aberration Test)	
Specific target organ toxicity -				Rat	OECD 422 (Combined	Target organ(s):
repeated exposure (STOT-RE),					Repeated Dose Tox.	gastrointestinal
oral:					Study with the	tract, Target
					Reproduction/Developm.	organ(s): thymu
					Tox. Screening Test)	



Œ

Page 12 of 18

Safety data sheet according to Regulation (EC) No 1907/2006, Annex II

Revision date / version: 17.10.2022 / 0023 Replacing version dated / version: 21.09.2022 / 0022

Valid from: 17.10.2022 PDF print date: 18.10.2022 Zentralhydraulik-Oel

11.2. Information on other hazards

Zentralhydraulik-Oel						
Toxicity / effect	Endpoint	Value	Unit	Organism	Test method	Notes
Endocrine disrupting properties:						Does not apply
						to mixtures.
Other information:						No other
						relevant
						information
						available on
						adverse effects
						on health.

SECTION 12: Ecological information

Possibly more information on environmental effects, see Section 2.1 (classification). See section 2.

Toxicity / effect	Endpoint	Time	Value	Unit	Organism	Test method	Notes
12.1. Toxicity to fish:	•						n.d.a.
12.1. Toxicity to daphnia:							n.d.a.
12.1. Toxicity to algae:							n.d.a.
12.2. Persistence and							Isolate as much
degradability:							as possible with
							an oil separator.
12.3. Bioaccumulative							n.d.a.
potential:							
12.4. Mobility in soil:							n.d.a.
12.5. Results of PBT							n.d.a.
and vPvB assessment							
12.6. Endocrine							Does not apply
disrupting properties:							to mixtures.
12.7. Other adverse							No information
effects:							available on
							other adverse
							effects on the
							environment.
Other information:							DOC-elimination
							degree(complexi
							ng organic
							substance)>=
							80%/28d: No
Other information:	AOX			%			According to the
							recipe, contains
							no AOX.

1-Decene, dimer, hydrog	1-Decene, dimer, hydrogenated							
Toxicity / effect	Endpoint	Time	Value	Unit	Organism	Test method	Notes	
12.1. Toxicity to fish:	LL50	96h	>1000	mg/l				
12.1. Toxicity to daphnia:	EL50	48h	>1000	mg/l				
12.2. Persistence and		28d	49,2-	%				
degradability:			53,5					
12.2. Persistence and							Not readily	
degradability:							biodegradable	
12.4. Mobility in soil:	Log Koc		>6,2					

Lubricating oils (petroleum), C20-50, hydrotreated neutral oil-based							
Toxicity / effect	Endpoint	Time	Value	Unit	Organism	Test method	Notes
Toxicity to bacteria:	NOEC/NOEL	10min	> 1,93	mg/l	activated sludge		DIN 38412
12.1. Toxicity to fish:	NOEC/NOEL	96h	>=100	mg/l	Pimephales promelas	OECD 203 (Fish, Acute Toxicity Test)	



Page 13 of 18

Safety data sheet according to Regulation (EC) No 1907/2006, Annex II Revision date / version: 17.10.2022 / 0023

Replacing version dated / version: 21.09.2022 / 0022

12.1. Toxicity to fish:	LL50	96h	> 100	mg/l	Pimephales promelas	OECD 203 (Fish, Acute Toxicity	
					promeias	Test)	
12.1. Toxicity to daphnia:	EL50	48h	>10000	mg/l	Daphnia magna	OECD 202	
						(Daphnia sp.	
						Acute	
						Immobilisation	
						Test)	
12.1. Toxicity to daphnia:	NOEC/NOEL	21d	10	mg/l	Daphnia magna	OECD 211	
						(Daphnia magna	
40.4 Tanisitata alman	NOTO/NOTI	701-	400	/1	De condebineten edell	Reproduction Test)	
12.1. Toxicity to algae:	NOEC/NOEL	72h	>=100	mg/l	Pseudokirchneriell	OECD 201 (Alga,	
					a subcapitata	Growth Inhibition	
12.1. Toxicity to algae:	EL50	48h	>100	m a /l	Pseudokirchneriell	Test) OECD 201 (Alga,	
12.1. Toxicity to algae.	ELOU	4011	>100	mg/l	a subcapitata	Growth Inhibition	
					a Subcapitata	Test)	
12.2. Persistence and						OECD 301 B	Not readily
degradability:						(Ready	biodegradable
aog.aaay.						Biodegradability -	2.0dog.add2.0
						Co2 Evolution	
						Test)	
12.2. Persistence and		28d	46	%		OECD 301 B	
degradability:						(Ready	
						Biodegradability -	
						Co2 Evolution	
						Test)	
12.3. Bioaccumulative	Log Kow		>6				A notable
potential:							biological
							accumulation
							potential has to
							be expected
40.5 Desults of DDT		-					(LogPow > 3).
12.5. Results of PBT							No PBT
and vPvB assessment							substance, No vPvB substance
							vrvd substance

Short-, medium- and long-chain alkyl methacrylates copolymer (ACC-ZX665225-90)							
Toxicity / effect	Endpoint	Time	Value	Unit	Organism	Test method	Notes
12.1. Toxicity to fish:	LL50	96h	>100	mg/l	Brachydanio rerio		
12.1. Toxicity to daphnia:	EL50	48h	>100	mg/l	Daphnia magna		
12.1. Toxicity to daphnia:	EL10	21d	>100	mg/l	Daphnia magna		
12.1. Toxicity to algae:	EL50	72h	>100	mg/l	Desmodesmus		
					subspicatus		
12.1. Toxicity to algae:	EL10	72h	>100	mg/l	Desmodesmus		
,					subspicatus		

Distillates (petroleum), hydrotreated light paraffinic							
Toxicity / effect	Endpoint	Time	Value	Unit	Organism	Test method	Notes
12.1. Toxicity to fish:	NOEC/NOEL	28d	>1000	mg/l	Oncorhynchus mykiss	QSAR	
12.1. Toxicity to fish:	LL50	96h	>100	mg/l	Pimephales promelas	OECD 203 (Fish, Acute Toxicity Test)	Analogous conclusion
12.1. Toxicity to fish:	NOEC/NOEL	14d	1000	mg/l	Oncorhynchus mykiss	QSÁR	
12.1. Toxicity to daphnia:	NOEC/NOEL	21d	10	mg/l	Daphnia magna	OECD 211 (Daphnia magna Reproduction Test)	Analogous conclusion
12.3. Bioaccumulative potential:						,	Not to be expected



Page 14 of 18

Safety data sheet according to Regulation (EC) No 1907/2006, Annex II Revision date / version: 17.10.2022 / 0023

Replacing version dated / version: 21.09.2022 / 0022

12.1. Toxicity to daphnia:	EL50	48h	> 10000	mg/l	Daphnia magna	OECD 202	Analogous
						(Daphnia sp.	conclusion
						Acute	
						Immobilisation	
						Test)	
12.1. Toxicity to algae:	NOEC/NOEL	72h	>=100	mg/l	Pseudokirchneriell	OECD 201 (Alga,	Analogous
					a subcapitata	Growth Inhibition	conclusion
						Test)	
12.1. Toxicity to algae:	EC50	72h	>100	mg/l	Pseudokirchneriell	OECD 201 (Alga,	Analogous
					a subcapitata	Growth Inhibition	conclusion
						Test)	
12.2. Persistence and		28d	31	%	activated sludge	OECD 301 F	Not readily
degradability:						(Ready	biodegradable,
						Biodegradability -	Analogous
						Manometric	conclusion
						Respirometry Test)	
12.3. Bioaccumulative potential:	Log Pow		>6				@20°C
12.5. Results of PBT							No PBT
and vPvB assessment							substance, No
							vPvB substance

2,2'-(C16-18 (evennumbe			<u> </u>	_			
Toxicity / effect	Endpoint	Time	Value	Unit	Organism	Test method	Notes
12.2. Persistence and		28d	75	%		OECD 301 F	Readily
degradability:						(Ready	biodegradable,
						Biodegradability -	Analogous
						Manometric	conclusion
						Respirometry Test)	
12.3. Bioaccumulative potential:	Log Pow		3,6				Low
12.1. Toxicity to fish:	LC50	96h	0,1	mg/l	Brachydanio rerio	OECD 203 (Fish,	Analogous
•						Acute Toxicity	conclusion
						Test)	
12.1. Toxicity to daphnia:	EC50	48h	0,043	mg/l	Daphnia magna	OECD 202	Analogous
						(Daphnia sp.	conclusion
						Acute	
						Immobilisation	
						Test)	
12.1. Toxicity to daphnia:	EC10	21d	0,0107	mg/l	Daphnia magna	OECD 211	Analogous
						(Daphnia magna	conclusion
						Reproduction Test)	
12.1. Toxicity to algae:	EC50	72h	0,0538	mg/l	Pseudokirchneriell	IUCLID Chem.	Analogous
					a subcapitata	Data Sheet (ESIS)	conclusion
12.2. Persistence and		28d	63	%		OECD 301 D	Readily
degradability:						(Ready	biodegradable,
						Biodegradability -	Analogous
						Closed Bottle Test)	conclusion
12.3. Bioaccumulative potential:	BCF		110,2				calculated
Toxicity to bacteria:	EC50	3h	167	mg/l	activated sludge	OECD 209	Analogous
						(Activated Sludge,	conclusion
						Respiration	
						Inhibition Test	
						(Carbon and	
						Ammonium	
						Oxidation))	

2-(2-heptadec-8-enyl-2-imidazolin-1-yl)ethanol							
Toxicity / effect	Endpoint	Time	Value	Unit	Organism	Test method	Notes
12.1. Toxicity to algae:	EC10	72h	0,014	mg/l	Desmodesmus subspicatus	OECD 201 (Alga, Growth Inhibition Test)	Analogous conclusion



Page 15 of 18

Safety data sheet according to Regulation (EC) No 1907/2006, Annex II

Revision date / version: 17.10.2022 / 0023

Replacing version dated / version: 21.09.2022 / 0022

Valid from: 17.10.2022 PDF print date: 18.10.2022 Zentralhydraulik-Oel

12.5. Results of PBT and vPvB assessment							No PBT substance, No vPvB substance
12.1. Toxicity to fish:	LC50	96h	0,3	mg/l	Brachydanio rerio	OECD 203 (Fish, Acute Toxicity Test)	VI 12 0 3.11 3.11 11 11 11 11 11 11 11 11 11 11 11 11
12.1. Toxicity to daphnia:	EC50	48h	0,163	mg/l	Daphnia magna	OECD 202 (Daphnia sp. Acute Immobilisation Test)	Analogous conclusion
12.1. Toxicity to algae:	EC50	72h	0,03	mg/l	Desmodesmus subspicatus	OECD 201 (Alga, Growth Inhibition Test)	Analogous conclusion
12.2. Persistence and degradability:		28d	1	%	activated sludge	OECD 301 B (Ready Biodegradability - Co2 Evolution Test)	Not biodegradable

SECTION 13: Disposal considerations

13.1 Waste treatment methods

For the substance / mixture / residual amounts

Soaked polluted cloths, paper or other organic materials represent a fire hazard and should be controlled, collected and disposed of. EC disposal code no.:

The waste codes are recommendations based on the scheduled use of this product.

Owing to the user's specific conditions for use and disposal, other waste codes may be

allocated under certain circumstances. (2014/955/EU)

13 01 10 mineral based non-chlorinated hydraulic oils

Recommendation:

Sewage disposal shall be discouraged.

Pay attention to local and national official regulations.

E.g. dispose at suitable refuse site.

E.g. suitable incineration plant.

For contaminated packing material

Pay attention to local and national official regulations.

15 01 01 paper and cardboard packaging

15 01 02 plastic packaging

15 01 04 metallic packaging

Empty container completely.

Uncontaminated packaging can be recycled.

Dispose of packaging that cannot be cleaned in the same manner as the substance.

SECTION 14: Transport information

General statements

14.1. UN number or ID number: Not applicable

Transport by road/by rail (ADR/RID)

14.2. UN proper shipping name:

14.3. Transport hazard class(es):

14.4. Packing group:Not applicableClassification code:Not applicableLQ:Not applicable14.5. Environmental hazards:Not applicable

Tunnel restriction code:

Transport by sea (IMDG-code)

14.2. UN proper shipping name:

14.3. Transport hazard class(es): n.a.

14.4. Packing group: Not applicable



Page 16 of 18

Safety data sheet according to Regulation (EC) No 1907/2006, Annex II

Revision date / version: 17.10.2022 / 0023

Replacing version dated / version: 21.09.2022 / 0022

Valid from: 17.10.2022 PDF print date: 18.10.2022 Zentralhydraulik-Oel

Marine Pollutant:

14.5. Environmental hazards: Not applicable

Transport by air (IATA)

14.2. UN proper shipping name:

14.3. Transport hazard class(es):

14.4. Packing group: Not applicable 14.5. Environmental hazards: Not applicable

14.6. Special precautions for user

Unless specified otherwise, general measures for safe transport must be followed.

14.7. Maritime transport in bulk according to IMO instruments

Non-dangerous material according to Transport Regulations.

SECTION 15: Regulatory information

n.a.

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

Observe restrictions:

Comply with trade association/occupational health regulations.

Directive 2010/75/EU (VOC): 0.64 %

15.2 Chemical safety assessment

A chemical safety assessment is not provided for mixtures.

SECTION 16: Other information

Employee instruction/training in handling hazardous materials is required.

2, 3, 7, 8, 9, 11, 12, 15 Revised sections: These details refer to the product as it is delivered.

Classification and processes used to derive the classification of the mixture in accordance with the ordinance (EG) 1272/2008 (CLP):

Classification in accordance with regulation (EC) No. 1272/2008 (CLP)	Evaluation method used
Acute Tox. 4, H332	Classification according to calculation procedure.
Asp. Tox. 1, H304	Classification according to calculation procedure.

The following phrases represent the posted Hazard Class and Risk Category Code (GHS/CLP) of the product and the constituents (specified in Section 2 and 3).

H314 Causes severe skin burns and eye damage.

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

H302 Harmful if swallowed.

H304 May be fatal if swallowed and enters airways.

H318 Causes serious eye damage.

H319 Causes serious eye irritation.

H332 Harmful if inhaled.

H400 Very toxic to aquatic life.

H410 Very toxic to aquatic life with long lasting effects.

Acute Tox. — Acute toxicity - inhalation Asp. Tox. — Aspiration hazard

Eye Irrit. — Eye irritation

Acute Tox. — Acute toxicity - oral Skin Corr. — Skin corrosion

Eye Dam. — Serious eye damage

Aquatic Acute — Hazardous to the aquatic environment - acute Aquatic Chronic — Hazardous to the aquatic environment - chronic

STOT RE — Specific target organ toxicity - repeated exposure



Page 17 of 18

Safety data sheet according to Regulation (EC) No 1907/2006, Annex II

Revision date / version: 17.10.2022 / 0023 Replacing version dated / version: 21.09.2022 / 0022

Valid from: 17.10.2022 PDF print date: 18.10.2022 Zentralhydraulik-Oel

Key literature references and sources for data:

Regulation (EC) No 1907/2006 (REACH) and Regulation (EC) No 1272/2008 (CLP) as amended.

Guidelines for the preparation of safety data sheets as amended (ECHA).

Guidelines on labelling and packaging according to the Regulation (EG) Nr. 1272/2008 (CLP) as amended (ECHA).

Safety data sheets for the constituent substances.

ECHA Homepage - Information about chemicals.

GESTIS Substance Database (Germany).

German Environment Agency "Rigoletto" information site on substances that are hazardous to water (Germany).

EU Occupation Exposure Limits Directives 91/322/EEC, 2000/39/EC, 2006/15/EC, 2009/161/EU, (EU) 2017/164, (EU) 2019/1831, each as amended

National Lists of Occupational Exposure Limits for each country as amended.

Regulations on the transport of hazardous goods by road, rail, sea and air (ADR, RID, IMDG, IATA) as amended.

Any abbreviations and acronyms used in this document:

acc., acc. to according, according to

ADR Accord européen relatif au transport international des marchandises Dangereuses par Route (= European Agreement concerning the International Carriage of Dangerous Goods by Road)

AOX Adsorbable organic halogen compounds

approx. approximately

Art., Art. no. Article number

ASTM ASTM International (American Society for Testing and Materials)

ATE Acute Toxicity Estimate

BAM Bundesanstalt für Materialforschung und -prüfung (Federal Institute for Materials Research and Testing, Germany)
BAuA Bundesanstalt für Arbeitsschutz und Arbeitsmedizin (= Federal Institute for Occupational Health and Safety, Germany)

BCF Bioconcentration factor

BSEF The International Bromine Council

bw body weight

CAS Chemical Abstracts Service

CLP Classification, Labelling and Packaging (REGULATION (EC) No 1272/2008 on classification, labelling and packaging of substances and mixtures)

CMR carcinogenic, mutagenic, reproductive toxic

DMEL Derived Minimum Effect Level
DNEL Derived No Effect Level
DOC Dissolved organic carbon

dw dry weight

e.g. for example (abbreviation of Latin 'exempli gratia'), for instance

EbCx, EyCx, EbLx (x = 10, 50) Effect Concentration/Level of x % on reduction of the biomass (algae, plants)

EC European Community
ECHA European Chemicals Agency

ECx, ELx (x = 0, 3, 5, 10, 20, 50, 80, 100) Effect Concentration/Level for x % effect

EEC European Economic Community

EINECS European Inventory of Existing Commercial Chemical Substances

ELINCS European List of Notified Chemical Substances

EN European Norms

EPA United States Environmental Protection Agency (United States of America)

ErCx, $E\mu$ Cx, ErLx (x = 10, 50) Effect Concentration/Level of x % on inhibition of the growth rate (algae, plants)

etc. et cetera EU European Union

EVAL Ethylene-vinyl alcohol copolymer

Fax. Fax number gen. general

GHS Globally Harmonized System of Classification and Labelling of Chemicals

GWP Global warming potential

Koc Adsorption coefficient of organic carbon in the soil

Kow octanol-water partition coefficient

IARC International Agency for Research on Cancer
IATA International Air Transport Association
IBC (Code) International Bulk Chemical (Code)

IMDG-code International Maritime Code for Dangerous Goods



Page 18 of 18

Safety data sheet according to Regulation (EC) No 1907/2006, Annex II

Revision date / version: 17.10.2022 / 0023

Replacing version dated / version: 21.09.2022 / 0022

Valid from: 17.10.2022 PDF print date: 18.10.2022 Zentralhydraulik-Oel

incl. including, inclusive

IUCLID International Uniform Chemical Information Database IUPAC International Union for Pure Applied Chemistry LC50 Lethal Concentration to 50 % of a test population

LD50 Lethal Dose to 50% of a test population (Median Lethal Dose)

Log Koc Logarithm of adsorption coefficient of organic carbon in the soil Log Kow, Log Pow Logarithm of octanol-water partition coefficient

LQ Limited Quantities

MARPOL International Convention for the Prevention of Marine Pollution from Ships

n.a. not applicablen.av. not availablen.c. not checkedn.d.a. no data available

NIOSH National Institute for Occupational Safety and Health (USA)

NLP No-longer-Polymer

NOEC, NOEL No Observed Effect Concentration/Level

OECD Organisation for Economic Co-operation and Development

org. organic

OSHA Occupational Safety and Health Administration (USA)

PBT persistent, bioaccumulative and toxic

PE Polyethylene

PNEC Predicted No Effect Concentration

ppm parts per million PVC Polyvinylchloride

REACHRegistration, Evaluation, Authorisation and Restriction of Chemicals (REGULATION (EC) No 1907/2006 concerning the Registration,

Evaluation, Authorisation and Restriction of Chemicals)

REACH-IT List-No. 9xx-xxx-x No. is automatically assigned, e.g. to pre-registrations without a CAS No. or other numerical identifier. List

Numbers do not have any legal significance, rather they are purely technical identifiers for processing a submission via REACH-IT.

RID Règlement concernant le transport International ferroviaire de marchandises Dangereuses (= Regulation concerning the International

Carriage of Dangerous Goods by Rail) SVHC Substances of Very High Concern

Tel. Telephone

TOC Total organic carbon

UN RTDG United Nations Recommendations on the Transport of Dangerous Goods

VOC Volatile organic compounds

vPvB very persistent and very bioaccumulative

wwt wet weight

The statements made here should describe the product with regard to the necessary safety precautions - they are not meant to guarantee definite characteristics - but they are based on our present up-to-date knowledge. No responsibility.

These statements were made by:

Chemical Check GmbH, Chemical Check Platz 1-7, D-32839 Steinheim, Tel.: +49 5233 94 17 0, Fax: +49 5233 94 17 90

© by Chemical Check GmbH Gefahrstoffberatung. The copying or changing of this document is forbidden except with consent of the Chemical Check GmbH Gefahrstoffberatung.