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

Bremsfluessigkeit DOT4 500 mL
Art.: 3085

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

Hydraulic fluid
Sector of use [SU]:
SU 3 - Industrial uses: Uses of substances as such or in preparations at industrial sites
SU21 - Consumer uses: Private households (=general public = consumers)
SU22 - Professional uses: Public domain (administration, education, entertainment, services, craftsmen)
Chemical product category [PC]:
PC16 - Heat transfer fluids
PC17 - Hydraulic fluids
Process category [PROC]:
PROC 1 - Use in closed process, no likelihood of exposure.
PROC 2 - Use in closed, continuous process with occasional controlled exposure
PROC 8a - Transfer of substance or preparation (charging/discharging) from/to vessels/large containers at non-dedicated facilities
PROC 8b - Transfer of substance or preparation (charging/discharging) from/to vessels/large containers at dedicated facilities
PROC 9 - Transfer of substance or preparation into small containers (dedicated filling line, including weighing)
PROC20 - Heat and pressure transfer fluids in dispersive, professional use but closed systems
Article Categories [AC]:
AC99 - Not required.
Environmental Release Category [ERC]:
ERC 4 - Industrial use of processing aids in processes and products, not becoming part of articles
ERC 7 - Industrial use of substances in closed systems
ERC 9a - Wide dispersive indoor use of substances in closed systems
ERC 9b - Wide dispersive outdoor use of substances in closed systems

Uses advised against:

No information available at present.

1.3 Details of the supplier of the safety data sheet

GB

LIQUI MOLY GmbH, Jerg-Wieland-Str. 4, 89081 Ulm-Lehr, Germany
Phone: (+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)

SECTION 2: Hazards identification

2.1 Classification of the substance or mixture
Classification according to Regulation (EC) 1272/2008 (CLP)

The mixture is not classified as dangerous in the terms of the Regulation (EC) 1272/2008 (CLP).

2.2 Label elements
Labeling according to Regulation (EC) 1272/2008 (CLP)

EUH210-Safety data sheet available on request.

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

SECTION 3: Composition/information on ingredients

3.1 Substance
n.a.
3.2 Mixture

Diethylene glycol	
Registration number (REACH)	01-2119457857-21-XXXX
Index	603-140-00-6
EINECS, ELINCS, NLP	203-872-2
CAS	111-46-6
content %	1-<10
Classification according to Regulation (EC) 1272/2008 (CLP)	Acute Tox. 4, H302 STOT RE 2, H373 (kidneys) (oral)

Ethanol, 2-butoxy-, manufacture of, by-products from	
Registration number (REACH)	--
Index	---
EINECS, ELINCS, NLP	310-287-7
CAS	161907-77-3
content %	1-<10
Classification according to Regulation (EC) 1272/2008 (CLP)	Eye Dam. 1, H318

1,1'Iminodipropan-2-ol	
Registration number (REACH)	01-2119475444-34-XXXX
Index	603-083-00-7
EINECS, ELINCS, NLP	203-820-9
CAS	110-97-4
content %	1-5
Classification according to Regulation (EC) 1272/2008 (CLP)	Eye Irrit. 2, H319

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 3.1/3.2 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
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.
Call doctor immediately - have Data Sheet available.

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.
The following may occur:
Irritation of the eyes
With long-term contact:
Drying of the skin.
Dermatitis (skin inflammation)
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
n.c.

SECTION 5: Firefighting measures

5.1 Extinguishing media
Suitable extinguishing media
Alcohol resistant foam
Extinction powder
Water jet spray / alcohol resistant foam / CO2 / dry extinguisher

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 nitrogen
Toxic gases

5.3 Advice for firefighters
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
Ensure sufficient supply of air.
Avoid contact with eyes or skin.
If applicable, caution - risk of slipping.

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.

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

Avoid aerosol formation.
Avoid inhalation of the vapours.
Avoid contact with eyes.
Avoid long lasting or intensive contact with skin.
Keep away from sources of ignition - Do not smoke.
Eating, drinking, smoking, as well as food-storage, is prohibited in work-room.
Observe directions on label and instructions for use.

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

Not to be stored in gangways or stair wells.
Store product closed and only in original packing.
Keep away from combustible material.
Protect against moisture and store closed.
Store in a well ventilated place.
Store in a dry place.
Store at room temperature.

7.3 Specific end use(s)

No information available at present.

SECTION 8: Exposure controls/personal protection

8.1 Control parameters

GB **Chemical Name**	Diethylene glycol		Content %:1-<10
WEL-TWA: 23 ppm (101 mg/m3)		WEL-STEL: ---	---
Monitoring procedures:	- Draeger - Alcohol 25/a (81 01 631) - Draeger - Alcohol 100/a (CH 29 701)		
BMGV: ---		Other information: ---	

GB WEL-TWA = Workplace Exposure Limit - Long-term exposure limit (8-hour TWA (= time weighted average) reference period) EH40. AGW = "Arbeitsplatzgrenzwert" (workplace limit value, Germany). | WEL-STEL = Workplace Exposure Limit - Short-term exposure limit (15-minute reference period). | 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.

Diethylene glycol						
Area of application	**Exposure route / Environmental compartment**	**Effect on health**	**Descriptor**	**Value**	**Unit**	**Note**
Workers / employees	Human - dermal	Long term, systemic effects	DNEL	106	mg/kg	
Workers / employees	Human - inhalation	Long term, local effects	DNEL	60	mg/m3	
Consumer	Human - dermal	Long term, systemic effects	DNEL	53	mg/kg	
Consumer	Human - inhalation	Long term, local effects	DNEL	12	mg/m3	
	Environment - freshwater		PNEC	10	mg/l	
	Environment - marine		PNEC	1	mg/l	

	Environment - sediment, freshwater		PNEC	20,9	mg/kg	
	Environment - soil		PNEC	1,53	mg/kg	
	Environment - sewage treatment plant		PNEC	199,5	mg/l	
	Environment - water, sporadic (intermittent) release		PNEC	10	mg/l	
	Environment - sediment, marine		PNEC	2,09	mg/kg dry weight	

Ethanol, 2-butoxy-, manufacture of, by-products from

Area of application	Exposure route / Environmental compartment	Effect on health	Descriptor	Value	Unit	Note
Workers / employees	Human - dermal	Long term, systemic effects	DNEL	50	mg/kg bw/day	
Workers / employees	Human - inhalation	Long term, systemic effects	DNEL	195	mg/m3	
Consumer	Human - dermal	Long term, systemic effects	DNEL	25	mg/kg bw/day	
Consumer	Human - inhalation	Long term, systemic effects	DNEL	117	mg/m3	
Consumer	Human - oral	Long term, systemic effects	DNEL	2,5	mg/kg bw/day	
	Environment - freshwater		PNEC	4,5	mg/l	
	Environment - marine		PNEC	0,31	mg/l	
	Environment - sediment, freshwater		PNEC	6,6	mg/kg dw	
	Environment - sediment, marine		PNEC	0,66	mg/kg dw	
	Environment - soil		PNEC	1,32	mg/kg dw	
	Environment - sewage treatment plant		PNEC	500	mg/l	

2,2'-(ethylenedioxy)diethanol

Area of application	Exposure route / Environmental compartment	Effect on health	Descriptor	Value	Unit	Note
Workers / employees	Human - dermal	Long term, systemic effects	DNEL	40	mg/kg bw/day	
Workers / employees	Human - inhalation	Long term, local effects	DNEL	50	mg/m3	
Consumer	Human - dermal	Long term, systemic effects	DNEL	20	mg/kg bw/day	
Consumer	Human - inhalation	Long term, local effects	DNEL	25	mg/m3	
	Environment - freshwater		PNEC	10	mg/l	
	Environment - marine		PNEC	1	mg/l	
	Environment - sediment, freshwater		PNEC	46	mg/kg dw	
	Environment - soil		PNEC	3,32	mg/kg dw	

2-(2-(2-methoxyethoxy)ethoxy)ethanol

Area of application	Exposure route / Environmental compartment	Effect on health	Descriptor	Value	Unit	Note
Workers / employees	Human - dermal	Long term, systemic effects	DNEL	40	mg/kg bw/d	
Workers / employees	Human - inhalation	Long term, systemic effects	DNEL	156	mg/m3	
Consumer	Human - dermal	Long term, systemic effects	DNEL	20	mg/kg bw/d	

Consumer	Human - inhalation	Long term, systemic effects	DNEL	93	mg/m3	
Consumer	Human - oral	Long term, systemic effects	DNEL	2	mg/kg bw/d	
	Environment - freshwater		PNEC	10	mg/l	
	Environment - marine		PNEC	1	mg/l	
	Environment - water, sporadic (intermittent) release		PNEC	50	mg/l	
	Environment - sediment, freshwater		PNEC	36,6	mg/kg dw	
	Environment - marine		PNEC	0,8	mg/kg dw	
	Environment - soil		PNEC	1,73	mg/kg dw	
	Environment - sewage treatment plant		PNEC	200	mg/l	
	Environment - oral (animal feed)		PNEC	89	mg/kg feed	

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.

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 with side protection (EN 166).

Skin protection - Hand protection:
Chemical resistant protective gloves (EN 374).
With long-term contact:
Protective gloves in butyl rubber (EN 374).
Minimum layer thickness in mm:
0,7
Permeation time (penetration time) in minutes:
480
Protective hand cream recommended.
With short-term contact:
Protective nitrile gloves (EN 374)
Minimum layer thickness in mm:
0,4
Permeation time (penetration time) in minutes:
30
Protective hand cream recommended.
The breakthrough times determined in accordance with EN 374 Part 3 were not obtained under practical conditions.
The recommended maximum wearing time is 50% of breakthrough time.

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.
Gas mask filter A (EN 14387), code colour brown
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:	Liquid
Colour:	Yellow
Odour:	Characteristic
Odour threshold:	Not determined
pH-value:	7,5-9 (20°C, (FMVSS 116))
Melting point/freezing point:	Not determined
Initial boiling point and boiling range:	>260 °C ((1,013 mbar), (FMVSS 116))
Flash point:	>125 °C (ISO 2719 (Pensky-Martens, closed cup))
Evaporation rate:	Not determined
Flammability (solid, gas):	Not determined
Lower explosive limit:	1,5 Vol-%
Upper explosive limit:	Not determined
Vapour pressure:	<1 mbar (20°C)
Vapour density (air = 1):	Not determined
Density:	1,055-1,075 g/cm3 (20°C, DIN 51757)
Bulk density:	n.a.
Solubility(ies):	Not determined
Water solubility:	Mixable
Partition coefficient (n-octanol/water):	n.a.
Auto-ignition temperature:	>200 °C (DIN 51794, Ignition temperature)
Auto-ignition temperature:	No
Decomposition temperature:	Not determined
Viscosity:	15-17 mm2/s (20°C, (FMVSS 116))
Explosive properties:	Not determined
Oxidising properties:	No

9.2 Other information

Miscibility:	Not determined
Fat solubility / solvent:	Not determined
Conductivity:	Not determined
Surface tension:	Not determined
Solvents content:	Not determined

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 decomposition if used as intended.

10.4 Conditions to avoid
Protect from humidity.
Product is hygroscopic.
Decomposition:
T ~ 360°C

10.5 Incompatible materials

No dangerous reactions are known.

10.6 Hazardous decomposition products

See also section 5.2
No decomposition when used as directed.

SECTION 11: Toxicological information

11.1 Information on toxicological effects

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

Bremsfluessigkeit DOT4 500 mL
Art.: 3085

Toxicity / effect	Endpoint	Value	Unit	Organism	Test method	Notes
Acute toxicity, by oral route:	ATE	>2000	mg/kg			calculated value
Acute toxicity, by dermal route:						n.d.a.
Acute toxicity, by inhalation:						n.d.a.
Skin corrosion/irritation:						n.d.a.
Serious eye damage/irritation:						n.d.a.
Respiratory or skin sensitisation:						n.d.a.
Germ cell mutagenicity:						n.d.a.
Carcinogenicity:						n.d.a.
Reproductive toxicity:						n.d.a.
Specific target organ toxicity - single exposure (STOT-SE):						n.d.a.
Specific target organ toxicity - repeated exposure (STOT-RE):						n.d.a.
Aspiration hazard:						n.d.a.
Symptoms:						n.d.a.
Other information:						Classification according to calculation procedure.

Diethylene glycol

Toxicity / effect	Endpoint	Value	Unit	Organism	Test method	Notes
Acute toxicity, by oral route:	LD50	19600	mg/kg	Rat		
Acute toxicity, by dermal route:	LD50	13300	mg/kg	Rabbit		Analogous conclusion
Acute toxicity, by inhalation:	LC50	>4,6	mg/l/4h			Not relevant., expert judgement
Skin corrosion/irritation:				Rabbit		Not irritant
Serious eye damage/irritation:				Rabbit	OECD 405 (Acute Eye Irritation/Corrosion)	Not irritant
Symptoms:						acidosis, breathing difficulties, unconsciousness, diarrhoea, coughing, cramps, fatigue, mucous membrane irritation, dizziness, nausea and vomiting., trembling

Ethanol, 2-butoxy-, manufacture of, by-products from

Toxicity / effect	Endpoint	Value	Unit	Organism	Test method	Notes
Acute toxicity, by oral route:	LD50	2630	mg/kg	Rat		Analogous conclusion
Acute toxicity, by dermal route:	LD50	3540	mg/kg	Rabbit		Analogous conclusion
Skin corrosion/irritation:				Rabbit	OECD 404 (Acute Dermal Irritation/Corrosion)	Not irritant, Analogous conclusion
Serious eye damage/irritation:				Rabbit	OECD 405 (Acute Eye Irritation/Corrosion)	Corrosive, Analogous conclusion

Respiratory or skin sensitisation:				Pig	OECD 406 (Skin Sensitisation)	Not sensitizising, Analogous conclusion
Specific target organ toxicity - repeated exposure (STOT-RE), oral:	NOAEL	500	mg/kg/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	5000	mg/kg/d	Rat		Analogous conclusion

1,1'Iminodipropan-2-ol

Toxicity / effect	Endpoint	Value	Unit	Organism	Test method	Notes
Acute toxicity, by oral route:	LD50	4765	mg/kg	Rat		
Acute toxicity, by dermal route:	LD50	8000	mg/kg	Rabbit		
Skin corrosion/irritation:				Rabbit		Mild irritant
Germ cell mutagenicity:					OECD 471 (Bacterial Reverse Mutation Test)	Negative
Symptoms:						respiratory distress, eyes, reddened

SECTION 12: Ecological information

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

Bremsfluessigkeit DOT4 500 mL
Art.: 3085

Toxicity / effect	Endpoint	Time	Value	Unit	Organism	Test method	Notes
Toxicity to fish:	LC50	96h	250 - 350	mg/l		DIN 38412 T.15	Analogous conclusion
Toxicity to daphnia:	EC50		6,25	mg/l			Analogous conclusion
Toxicity to algae:							n.d.a.
Persistence and degradability:		17d	90	%			Analogous conclusion
Bioaccumulative potential:							n.d.a.
Mobility in soil:							n.d.a.
Results of PBT and vPvB assessment							n.d.a.
Other adverse effects:							n.d.a.
Other information:	AOX						According to the recipe, contains no AOX.
Other information:	DOC						DOC-elimination degree(complexing organic substance)>= 80%/28d: n.a.

Diethylene glycol

Toxicity / effect	Endpoint	Time	Value	Unit	Organism	Test method	Notes
Toxicity to fish:	LC50	96h	75200	mg/l	Pimephales promelas		
Toxicity to daphnia:	EC50	24h	>10000	mg/l	Daphnia magna		
Toxicity to algae:	NOEC/NOEL	72h	100	mg/l	Scenedesmus quadricauda		References
Persistence and degradability:	DOC	28d	90-100	%		OECD 301 B (Ready Biodegradability - Co2 Evolution Test)	
Bioaccumulative potential:	BCF		100				
Toxicity to bacteria:	EC20	30min	1995	mg/l	Pseudomonas putida		References

Ethanol, 2-butoxy-, manufacture of, by-products from							
Toxicity / effect	**Endpoint**	**Time**	**Value**	**Unit**	**Organism**	**Test method**	**Notes**
Toxicity to fish:	LC50	96h	>1800	mg/l	Scophthalmus maximus	OECD 203 (Fish, Acute Toxicity Test)	
Toxicity to daphnia:	EC50	48h	>3200	mg/l	Daphnia magna	OECD 202 (Daphnia sp. Acute Immobilisation Test)	
Toxicity to algae:	EC50	72h	1075	mg/l	Selenastrum capricornutum	OECD 201 (Alga, Growth Inhibition Test)	
Toxicity to algae:	EC50	72h	2490	mg/l	Selenastrum capricornutum	OECD 201 (Alga, Growth Inhibition Test)	
Persistence and degradability:		28d	70	%		OECD 306 (Biodegradability in Seawater)	
Persistence and degradability:		28d	76	%		OECD 301 D (Ready Biodegradability - Closed Bottle Test)	

1,1'Iminodipropan-2-ol							
Toxicity / effect	**Endpoint**	**Time**	**Value**	**Unit**	**Organism**	**Test method**	**Notes**
Toxicity to fish:	LC50	96h	>1000-2200	mg/l	Leuciscus idus		
Bioaccumulative potential:	Log Pow		0,82				Bioaccumulation is unlikely (LogPow < 1).20°C
Other information:	COD		1530-2010	mg/g			
Water solubility:			870	g/l			Soluble20°C

SECTION 13: Disposal considerations

13.1 Waste treatment methods

For the substance / mixture / residual amounts

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)
16 01 13 brake fluids
Recommendation:
Sewage disposal shall be discouraged.
Pay attention to local and national official regulations.
E.g. suitable incineration plant.

For contaminated packing material

Pay attention to local and national official regulations.
Empty container completely.
Uncontaminated packaging can be recycled.
Dispose of packaging that cannot be cleaned in the same manner as the substance.
15 01 10 packaging containing residues of or contaminated by hazardous substances

SECTION 14: Transport information

General statements

UN number: n.a.

Transport by road/by rail (ADR/RID)

UN proper shipping name:	
Transport hazard class(es):	n.a.
Packing group:	n.a.
Classification code:	n.a.
LQ (ADR 2015):	n.a.
Environmental hazards:	Not applicable
Tunnel restriction code:	

Transport by sea (IMDG-code)

UN proper shipping name:	
Transport hazard class(es):	n.a.
Packing group:	n.a.
Marine Pollutant:	n.a
Environmental hazards:	Not applicable

Transport by air (IATA)

UN proper shipping name:	
Transport hazard class(es):	n.a.
Packing group:	n.a.
Environmental hazards:	Not applicable

Special precautions for user

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

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

Non-dangerous material according to Transport Regulations.

SECTION 15: Regulatory information

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

National rules/regulation for the compliance with maximum quantities with regard to phosphates and or phosphorous compounds must be observed and complied with.
For classification and labelling see Section 2.
Observe restrictions:
General hygiene measures for the handling of chemicals are applicable.

15.2 Chemical safety assessment

A chemical safety assessment is not provided for mixtures.

SECTION 16: Other information

Revised sections: 1 - 16

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

Not applicable

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).
H373 May cause damage to organs through prolonged or repeated exposure if swallowed.
H302 Harmful if swallowed.
H318 Causes serious eye damage.
H319 Causes serious eye irritation.

Acute Tox. — Acute toxicity - oral
STOT RE — Specific target organ toxicity - repeated exposure
Eye Dam. — Serious eye damage
Eye Irrit. — Eye irritation

Any abbreviations and acronyms used in this document:

AC Article Categories
acc., acc. to according, according to
ACGIH American Conference of Governmental Industrial Hygienists
ADR Accord européen relatif au transport international des marchandises Dangereuses par Route (= European Agreement concerning the International Carriage of Dangerous Goods by Road)
AOEL Acceptable Operator Exposure Level
AOX Adsorbable organic halogen compounds
approx. approximately
Art., Art. no. Article number
ATE Acute Toxicity Estimate according to Regulation (EC) 1272/2008 (CLP)
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
BGV Berufsgenossenschaftliche Vorschrift (= Accident Prevention Regulation)
BHT Butylhydroxytoluol (= 2,6-Di-t-butyl-4-methyl-phenol)
BMGV Biological monitoring guidance value (EH40, UK)
BOD Biochemical oxygen demand
BSEF Bromine Science and Environmental Forum
bw body weight
CAS Chemical Abstracts Service
CEC Coordinating European Council for the Development of Performance Tests for Fuels, Lubricants and Other Fluids
CESIO Comité Européen des Agents de Surface et de leurs Intermédiaires Organiques
CIPAC Collaborative International Pesticides Analytical Council
CLP Classification, Labelling and Packaging (REGULATION (EC) No 1272/2008 on classification, labelling and packaging of substances and mixtures)
CMR carcinogenic, mutagenic, reproductive toxic
COD Chemical oxygen demand
CTFA Cosmetic, Toiletry, and Fragrance Association
DMEL Derived Minimum Effect Level
DNEL Derived No Effect Level
DOC Dissolved organic carbon
DT50 Dwell Time - 50% reduction of start concentration
DVS Deutscher Verband für Schweißen und verwandte Verfahren e.V. (= German Association for Welding and Allied Processes)
dw dry weight
e.g. for example (abbreviation of Latin 'exempli gratia'), for instance
EC European Community
ECHA European Chemicals Agency
EEA European Economic Area
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)
ERC Environmental Release Categories
ES Exposure scenario
etc. et cetera
EU European Union
EWC European Waste Catalogue
Fax. Fax number
gen. general
GHS Globally Harmonized System of Classification and Labelling of Chemicals
GWP Global warming potential
HET-CAM Hen's Egg Test - Chorionallantoic Membrane
HGWP Halocarbon Global Warming Potential
IARC International Agency for Research on Cancer
IATA International Air Transport Association
IBC Intermediate Bulk Container
IBC (Code) International Bulk Chemical (Code)
IC Inhibitory concentration
IMDG-code International Maritime Code for Dangerous Goods
incl. including, inclusive
IUCLID International Uniform ChemicaL Information Database
LC lethal concentration
LC50 lethal concentration 50 percent kill

LCLo lowest published lethal concentration
LD Lethal Dose of a chemical
LD50 Lethal Dose, 50% kill
LDLo Lethal Dose Low
LOAEL Lowest Observed Adverse Effect Level
LOEC Lowest Observed Effect Concentration
LOEL Lowest Observed Effect Level
LQ Limited Quantities
MARPOL International Convention for the Prevention of Marine Pollution from Ships
n.a. not applicable
n.av. not available
n.c. not checked
n.d.a. no data available
NIOSH National Institute of Occupational Safety and Health (United States of America)
NOAEC No Observed Adverse Effective Concentration
NOAEL No Observed Adverse Effect Level
NOEC No Observed Effect Concentration
NOEL No Observed Effect Level
ODP Ozone Depletion Potential
OECD Organisation for Economic Co-operation and Development
org. organic
PAH polycyclic aromatic hydrocarbon
PBT persistent, bioaccumulative and toxic
PC Chemical product category
PE Polyethylene
PNEC Predicted No Effect Concentration
POCP Photochemical ozone creation potential
ppm parts per million
PROC Process category
PTFE Polytetrafluorethylene
REACH Registration, 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)
SADT Self-Accelerating Decomposition Temperature
SAR Structure Activity Relationship
SU Sector of use
SVHC Substances of Very High Concern
Tel. Telephone
ThOD Theoretical oxygen demand
TOC Total organic carbon
TRGS Technische Regeln für Gefahrstoffe (=Technical Regulations for Hazardous Substances)
UN RTDG United Nations Recommendations on the Transport of Dangerous Goods
VbF Verordnung über brennbare Flüssigkeiten (= Regulation for flammable liquids (Austria))
VOC Volatile organic compounds
vPvB very persistent and very bioaccumulative
WEL-TWA, WEL-STEL WEL-TWA = Workplace Exposure Limit - Long-term exposure limit (8-hour TWA (= time weighted average) reference period), WEL-STEL = Workplace Exposure Limit - Short-term exposure limit (15-minute reference period) (EH40, UK).
WHO World Health Organization
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