

## SAFETY DATA SHEET

## Perfekt Lube

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

## 1.1. Product identifier

## Trade name

Perfekt Lube

## Unique formula identifier (UFI)

M200-U0CW-500G-QTW2

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

## Relevant identified uses of the substance or mixture

PC35 Washing and cleaning products

## ▼ Product code (A.I.S.E.)

AISE-P803 / Chain maintenance product. Automatic spray process.

AISE-P804 / Chain maintenance product. Automatic drip and brush process.

## Use descriptors (REACH)

Sectors of use	Description
LCS "PW"	Professional uses: Public domain (administration, education, entertainment, services, craftsmen)
Product category	Description
PC35	Washing and Cleaning Products (including solvent based products)
Environmental release category	Description
ERC8a	Wide dispersive indoor use of processing aids in open systems

## ▼ Uses advised against

None known.

## 1.3. Details of the supplier of the safety data sheet

## Company and address

**NCA-Verodan A/S**

Industriparken 5

DK-9560 Hadsund

Denmark

Tel.: +45 7027 1630

www.ncaa.dk

## E-mail

mail@ncaa.dk

## Revision

26/09/2022

## SDS Version

2.0

## 1.4. Emergency telephone number

Contact The National Poisons Information Service (dial 111, 24 h service).

See section 4 "First aid measures".

## SECTION 2: Hazards identification

According to EC-Regulation 1907/2006 (REACH), annex II, as implemented by EC-Regulation 2015/830

## 2.1. Classification of the substance or mixture

Skin Corr. 1C; H314, Causes severe skin burns and eye damage.

Eye Dam. 1; H318, Causes serious eye damage.

Aquatic Acute 1; H400, Very toxic to aquatic life.

Aquatic Chronic 1; H410, Very toxic to aquatic life with long lasting effects.

## 2.2. Label elements

### Hazard pictogram(s)



### Signal word

Danger

### Hazard statement(s)

Causes severe skin burns and eye damage. (H314)

Very toxic to aquatic life with long lasting effects. (H410)

### Safety statement(s)

General

-

#### ▼ Prevention

Do not breathe vapour/mist. (P260)

Avoid release to the environment. (P273)

Wear face protection/protective gloves/protective clothing. (P280)

#### ▼ Response

IF ON SKIN (or hair): Take off immediately all contaminated clothing. Rinse skin with water. (P303+P361+P353)

IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do.

Continue rinsing. (P305+P351+P338)

### Storage

-

### Disposal

Dispose of contents/container to an approved waste disposal plant. (P501)

### Hazardous substances

N-,9E,-octadec-9-en-1-yl,propane-1,3-diamine

N-(3-aminopropyl)-N-dodecylpropane-1,3-diamine

acetic acid

#### ▼ Additional labelling

Not applicable.

## 2.3. Other hazards

### Additional warnings

This mixture/product does not contain any substances considered to meet the criteria classifying them as PBT and/or vPvB.

## SECTION 3: Composition/information on ingredients

### ▼ 3.2 Mixtures

Product/substance	Identifiers	% w/w	Classification	Note
N-,9E,-octadec-9-en-1-yl,propane-1,3-diamine	CAS No.: 7173-62-8 EC No.: 230-528-9 UK-REACH: Index No.:	5-10%	Acute Tox. 4, H302 Skin Corr. 1C, H314 STOT RE 2, H373 Aquatic Acute 1, H400 (M=10)	
N-(3-aminopropyl)-N-dodecylpropane-1,3-	CAS No.: 2372-82-9	3-5%	Acute Tox. 3, H301 Skin Corr. 1B, H314	

diamine	EC No.: 219-145-8 UK-REACH: Index No.:		STOT RE 2, H373 Aquatic Acute 1, H400 (M=10) Aquatic Chronic 1, H410 (M=10)
acetic acid	CAS No.: 64-19-7 EC No.: 200-580-7 UK-REACH: Index No.: 607-002-00-6	1-3%	Skin Corr. 1A, H314 (SCL: 25.00 %) [1]

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See full text of H-phrases in section 16. Occupational exposure limits are listed in section 8, if these are available.

#### Other information



[1] European occupational exposure limit.

#### ▼ Labelling of contents according to Detergents Regulation (EC) No 648/2004

5% - 15%

· Cationic surfactants

< 5%

· Non-ionic surfactants

## SECTION 4: First aid measures

### 4.1. Description of first aid measures

#### General information

In the case of accident: Contact a doctor or casualty department – take the label or this safety data sheet. Contact a doctor if in doubt about the injured person's condition or if the symptoms persist. Never give an unconscious person water or other drink.

#### Inhalation

Upon breathing difficulties or irritation of the respiratory tract: Bring the person into fresh air and stay with him/her.

#### ▼ Skin contact

Flush exposed area with water for a long time - at least 30 minutes. It may be necessary to flush for several hours. Use a comfortable water temperature (20-30 °C). Contact Poison Information/doctor/hospital for further advice on follow-up and treatment.

Remove contaminated clothing and shoes immediately. Ensure to wash exposed skin thoroughly with water and soap. Skin cleanser can be used. DO NOT use solvents or thinners.

If skin irritation occurs: Get medical advice/attention.

#### ▼ Eye contact

Upon irritation of the eye: Remove contact lenses. Flush eyes with plenty of water or salt water (20-30°C) for at least 30 minutes and continue until irritation stops. Make sure you flush under the upper and lower eyelids. Seek medical assistance immediately and continue flushing during transport.

#### ▼ Ingestion

In the case of ingestion, contact a doctor immediately. If the person is conscious, give them water. DO NOT try to induce vomiting unless this is recommended by a doctor. Hold head facing down to prevent vomit returning mouth and throat. Prevent shock by keeping the injured person warm and calm. Initiate immediate resuscitation if breathing stops. If unconscious, roll the injured person into recovery position. Call an ambulance.

#### ▼ Burns

Not applicable.

### ▼ 4.2. Most important symptoms and effects, both acute and delayed

None known.

### 4.3. Indication of any immediate medical attention and special treatment needed

IF exposed or concerned:

Get immediate medical advice/attention.

#### Information to medics

Bring this safety data sheet or the label from this product.

## SECTION 5: Firefighting measures

### ▼ 5.1. Extinguishing media

Not applicable.

### ▼ 5.2. Special hazards arising from the substance or mixture

Fire will result in dense smoke. Exposure to combustion products may harm your health. Closed containers, which are exposed to fire, should be cooled with water. Do not allow fire-extinguishing water to enter the sewage system and nearby surface waters.

If the product is exposed to high temperatures, e.g. in the event of fire, dangerous decomposition compounds are produced. These are:

Carbon oxides (CO / CO<sub>2</sub>)

### 5.3. Advice for firefighters

Wear self-contained breathing apparatus and protective clothing to prevent contact. Upon direct exposure contact The National Poisons Information Service (dial 111, 24 h service) in order to obtain further advice.

## SECTION 6: Accidental release measures

### 6.1. Personal precautions, protective equipment and emergency procedures

Avoid direct contact with spilled substances.

### 6.2. Environmental precautions

Avoid discharge to lakes, streams, sewers, etc. In the event of leakage to the surroundings, contact local environmental authorities.

### ▼ 6.3. Methods and material for containment and cleaning up

Use sand, earth, vermiculite, diatomaceous earth to contain and collect non-combustible absorbent materials and place in container for disposal, according to local regulations.

Wherever possible cleaning should be performed with normal cleaning agents. Avoid use of solvents.

### ▼ 6.4. Reference to other sections

See section 13 "Disposal considerations" on handling of waste.

See section 8 "Exposure controls/personal protection" for protective measures.

## SECTION 7: Handling and storage

### 7.1. Precautions for safe handling

It is recommended to install waste collection trays in order to prevent emissions to the waste water system and surrounding environment.

Avoid direct contact with the product.

Smoking, drinking and consumption of food is not allowed in the work area.

See section 8 "Exposure controls/personal protection" for information on personal protection.

### ▼ 7.2. Conditions for safe storage, including any incompatibilities

Containers that have been opened must be carefully resealed and kept upright to prevent leakage.

#### ▼ Recommended storage material

Keep only in original packaging.

#### ▼ Storage temperature

#### Incompatible materials

Strong acids, strong bases, strong oxidizing agents, and strong reducing agents.

### 7.3. Specific end use(s)

This product should only be used for applications quoted in section 1.2

## SECTION 8: Exposure controls/personal protection

### ▼ 8.1. Control parameters

According to EC-Regulation 1907/2006 (REACH), annex II, as implemented by EC-Regulation 2015/830

- acetic acid
- Long term exposure limit (8 hours) (ppm): 10
- Long term exposure limit (8 hours) (mg/m<sup>3</sup>): 25
- Short term exposure limit (15 minutes) (ppm): 20
- Short term exposure limit (15 minutes) (mg/m<sup>3</sup>): 50



The Control of Substances Hazardous to Health Regulations 2002. SI 2002/2677 The Stationery Office 2002. EH40/2005 Workplace exposure limits (Fourth Edition 2020).

#### DNEL

N-(3-aminopropyl)-N-dodecylpropane-1,3-diamine

Duration	Route of exposure	DNEL
Long term – Systemic effects	Inhalation	2,35 mg/l

#### ▼ PNEC

N-(3-aminopropyl)-N-dodecylpropane-1,3-diamine

Route of exposure	Duration of Exposure	PNEC
Freshwater		0,001 mg/l
Freshwater sediment		8,5 mg/l
Marine water		0,0001 mg/l
Marine water sediment		0,85 mg/l
Soil		45,34 mg/l

## 8.2. Exposure controls

Compliance with the given occupational exposure limits values should be controlled on a regular basis.

### General recommendations

Smoking, drinking and consumption of food is not allowed in the work area.

### Exposure scenarios

There are no exposure scenarios implemented for this product.

### Exposure limits

Professional users are subjected to the legally set maximum concentrations for occupational exposure. See occupational hygiene limit values above.

### Appropriate technical measures

The formation of vapours must be kept at a minimum and below current limit values (see above). Installation of a local exhaust system if normal air flow in the work room is not sufficient is recommended. Ensure emergency eyewash and -showers are clearly marked.

### Hygiene measures

In between use of the product and at the end of the working day all exposed areas of the body must be washed thoroughly. Always wash hands, forearms and face.

### Measures to avoid environmental exposure

Keep damming materials near the workplace. If possible, collect spillage during work.

## Individual protection measures, such as personal protective equipment

### ▼ Generally


Use only UKCA marked protective equipment.

### ▼ Respiratory Equipment



Type	Class	Colour	Standards
No special when used as intended.			

### Skin protection


According to EC-Regulation 1907/2006 (REACH), annex II, as implemented by EC-Regulation 2015/830

Recommended	Type/Category	Standards	
Dedicated work clothing should be worn.	-	-	

#### ▼ Hand protection

Material	Glove thickness (mm)	Breakthrough time (min.)	Standards	
Neoprene (Neoprene)	0.68	> 60	EN374-2, EN374-3, EN388	
Nitrile	0.38	> 60	EN374-2, EN374-3, EN388	

#### Eye protection

Type	Standards	
Face shield alternatively safety glasses with side shields.	EN166	

## SECTION 9: Physical and chemical properties

### 9.1. Information on basic physical and chemical properties

#### Form

Liquid

#### Colour

Clear

#### Odour

Characteristic

#### ▼ Odour threshold (ppm)

Testing not relevant or not possible due to the nature of the product.

#### pH

5,4

#### Density (g/cm<sup>3</sup>)

1.01

#### ▼ Viscosity

Testing not relevant or not possible due to the nature of the product.

#### Phase changes

#### ▼ Melting point (°C)

Testing not relevant or not possible due to the nature of the product.

#### ▼ Boiling point (°C)

Testing not relevant or not possible due to the nature of the product.

#### ▼ Vapour pressure

Testing not relevant or not possible due to the nature of the product.

#### ▼ Vapour density

Testing not relevant or not possible due to the nature of the product.

#### ▼ Decomposition temperature (°C)

Testing not relevant or not possible due to the nature of the product.

Evaporation rate (n-butylacetate = 100)

#### Data on fire and explosion hazards

#### ▼ Flash point (°C)

Testing not relevant or not possible due to the nature of the product.

▼ Ignition (°C)

Testing not relevant or not possible due to the nature of the product.

▼ Auto flammability (°C)

Testing not relevant or not possible due to the nature of the product.

▼ Explosion limits (% v/v)

Testing not relevant or not possible due to the nature of the product.

▼ Explosive properties

Testing not relevant or not possible due to the nature of the product.

▼ Oxidizing properties

Testing not relevant or not possible due to the nature of the product.

Solubility

▼ Solubility in water

Completely soluble

▼ n-octanol/water coefficient

Testing not relevant or not possible due to the nature of the product.

▼ Solubility in fat (g/L)

Testing not relevant or not possible due to the nature of the product.

9.2. Other information

SECTION 10: Stability and reactivity

▼ 10.1. Reactivity

No data available.

10.2. Chemical stability

The product is stable under the conditions, noted in section 7 "Handling and storage".

▼ 10.3. Possibility of hazardous reactions

None known.

▼ 10.4. Conditions to avoid

None known.

10.5. Incompatible materials

Strong acids, strong bases, strong oxidizing agents, and strong reducing agents.

10.6. Hazardous decomposition products

The product is not degraded when used as specified in section 1.

SECTION 11: Toxicological information

11.1. Information on toxicological effects

Acute toxicity

Product/substance	N-,9E,-octadec-9-en-1-yl,propane-1,3-diamine
Test method	
Species	Rat
Route of exposure	
Test	LD50
Result	200-2000mg/kg ·
Other information	

Product/substance	N-(3-aminopropyl)-N-dodecylpropane-1,3-diamine
Test method	
Species	Rat
Route of exposure	Oral
Test	LD50
Result	200 - 2000 mg/kg ·

Other information

Product/substance	acetic acid
Test method	
Species	Rat
Route of exposure	Oral
Test	LD50
Result	3310 mgKG ·
Other information	

**Skin corrosion/irritation**

Causes severe skin burns and eye damage.

**Serious eye damage/irritation**

Causes serious eye damage.

**Respiratory sensitisation**

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

**Skin sensitisation**

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

**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**

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

**Aspiration hazard**

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

**Long term effects**

Tissue-damaging effects: This product contains substances with skin corrosive properties. Inhaled vapour or aerosols may produce adverse effects to lungs, -irritations and burns in the respiratory organs -as well as coughing. Dermal contact and contact with the eye cause irreversible effects.

▼ **Other information**

None known.

**SECTION 12: Ecological information**

▼ **12.1. Toxicity**

Product/substance	N-,9E,-octadec-9-en-1-yl,propane-1,3-diamine
Test method	
Species	Fish
Compartment	
Duration	96 hours
Test	LC50
Result	0,1-1 mg/l ·
Other information	

Product/substance	N-,9E,-octadec-9-en-1-yl,propane-1,3-diamine
Test method	
Species	Daphnia
Compartment	



According to EC-Regulation 1907/2006 (REACH), annex II, as implemented by EC-Regulation 2015/830

Duration 48 hours  
 Test EC50  
 Result 0,1-1 mg/l ·  
 Other information

Product/substance N-,9E,-octadec-9-en-1-yl,propane-1,3-diamine  
 Test method  
 Species Algae  
 Compartment  
 Duration 72 hours  
 Test IC50  
 Result 0,1-1 mg/l ·  
 Other information

Product/substance N-(3-aminopropyl)-N-dodecylpropane-1,3-diamine  
 Test method  
 Species Fish  
 Compartment  
 Duration 96 hours  
 Test LC50  
 Result 0,431 mg/l ·  
 Other information

Product/substance N-(3-aminopropyl)-N-dodecylpropane-1,3-diamine  
 Test method  
 Species Daphnia  
 Compartment  
 Duration 48 hours  
 Test EC50  
 Result 0,078 mg/l ·  
 Other information

Product/substance N-(3-aminopropyl)-N-dodecylpropane-1,3-diamine  
 Test method  
 Species Algae  
 Compartment  
 Duration 72 hours  
 Test IC50  
 Result 0,015 mg/l ·  
 Other information

Product/substance acetic acid  
 Test method  
 Species Fish  
 Compartment  
 Duration 24 hours  
 Test LC50  
 Result 251 mg/l ·  
 Other information

Product/substance acetic acid  
 Test method  
 Species Fish

According to EC-Regulation 1907/2006 (REACH), annex II, as implemented by EC-Regulation 2015/830

Compartment	
Duration	96 hours
Test	LC50
Result	75 mg/l ·
Other information	

Product/substance	acetic acid
Test method	
Species	Daphnia
Compartment	
Duration	96 hours
Test	LC50
Result	47 mg/l ·
Other information	

## 12.2. Persistence and degradability

Product/substance	N-,9E,-octadec-9-en-1-yl,propane-1,3-diamine
Biodegradable	Yes
Test method	OECD 301 D
Result	>60%

Product/substance	N-(3-aminopropyl)-N-dodecylpropane-1,3-diamine
Biodegradable	Yes
Test method	OECD 301 D
Result	>60%

Product/substance	acetic acid
Biodegradable	Yes
Test method	
Result	95%, 5 days

## ▼ 12.3. Bioaccumulative potential

Product/substance	N-,9E,-octadec-9-en-1-yl,propane-1,3-diamine
Test method	
Potential bioaccumulation	No
LogPow	0,0300
BCF	No data available.
Other information	

Product/substance	N-(3-aminopropyl)-N-dodecylpropane-1,3-diamine
Test method	
Potential bioaccumulation	No
LogPow	-0,6600
BCF	No data available.
Other information	

Product/substance	acetic acid
Test method	
Potential bioaccumulation	No

According to EC-Regulation 1907/2006 (REACH), annex II, as implemented by EC-Regulation 2015/830

LogPow -0,1700  
BCF 3.16  
Other information

▼ 12.4. Mobility in soil

No data available.

12.5. Results of PBT and vPvB assessment

This mixture/product does not contain any substances considered to meet the criteria classifying them as PBT and/or vPvB.

12.6. Other adverse effects

This product contains substances that are toxic to the environment. May result in adverse effects to aquatic organisms.

This product contains substances, which may cause adverse long-term effects to the aquatic environment.

SECTION 13: Disposal considerations

▼ 13.1. Waste treatment methods

Product is covered by the regulations on hazardous waste.

HP 8 – Corrosive

HP 14 – Ecotoxic

Dispose of contents/container to an approved waste disposal plant.

Regulation (EU) No 1357/2014 of 18 December 2014 on waste as retained and amended in UK law.

EWC code

20 01 29\* Detergents containing dangerous substances

Waste group H: Waste with low energy content

▼ Specific labelling



Not applicable.

Contaminated packing

Packaging containing residues of the product must be disposed of similarly to the product.

SECTION 14: Transport information



	14.1 UN / ID	14.2 UN proper shipping name	14.3 Hazard class(es)	14.4 PG*	14.5 Env**	Other information
ADR	3082	ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S. (N-(3-aminopropyl)-N-dodecylpropane-1,3-diamine)	Class: 9 Labels: 9 Classification code: M6 	III	Yes	Limited quantities: 5 L Tunnel restriction code: 3 (-) See below for additional information.
IMDG	3082	ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S. (N-(3-aminopropyl)-N-dodecylpropane-1,3-diamine)	Class: 9 Labels: 9 Classification code: M6 	III	Yes	Limited quantities: 5 L EmS: F-A S-F See below for additional information.
IATA	3082	ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S. (N-(3-aminopropyl)-N-dodecylpropane-1,3-diamine)	Class: 9 Labels: 9 Classification	III	Yes	See below for additional information.

According to EC-Regulation 1907/2006 (REACH), annex II, as implemented by EC-Regulation 2015/830

14.1 UN / ID	14.2 UN proper shipping name	14.3 Hazard class(es)	14.4 PG*	14.5 Env**	Other information
		code: M6			

\* Packing group

\*\* Environmental hazards

#### ▼ Additional information

These substances when carried in single or combination packaging's containing a net quantity per single or inner packaging of 5 L or less for liquids or having a net mass per single or inner packaging of 5 kg or less for solids, are not subject to any other provisions of ADR/IMDG/IATA provided the packaging's meet the general provisions of 4.1.1.1, 4.1.1.2, 4.1.1.4 - 4.1.1.8 (ADR, IMDG) / 5.0.2.4.1, 5.0.2.6.1.1, 5.0.2.8 (IATA).

ADR / See Table A, Section 3.2.1 for any information on special provisions, requirements, or warnings in connection with transport. See section 5.4.3, for instructions in writing regarding mitigation of damages in relation to incidents or accidents during transport.

IMDG / See the Dangerous Goods List, section 3.2.1, for any information on special provisions, requirements, or warnings in connection with transport.

IATA / See Table 4.2 for any information on special provisions, requirements, or warnings in connection with transport.

This product is within scope of the regulations of transport of dangerous goods.

#### ▼ 14.6. Special precautions for user

Not applicable.

#### ▼ 14.7. Transport in bulk according to Annex II of Marpol and the IBC Code

No data available.

## SECTION 15: Regulatory information

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

#### Restrictions for application

Restricted to professional users.

People under the age of 18 shall not be exposed to this product.

Pregnant women and women breastfeeding must not be exposed to this product. The risk, and possible technical precautions or design of the workplace needed to eliminate exposure, must be considered.

#### ▼ Demands for specific education

No specific requirements.

#### SEVESO - Categories / dangerous substances

E1 - ENVIRONMENTAL HAZARDS, Qualifying quantity (lower-tier): 100 tonnes / (upper-tier): 200 tonnes

#### ▼ Additional information

The surfactant(s) contained in this preparation complies(comply) with the biodegradability criteria as laid down in Regulation (EC) No 648/2004 on detergents as retained and amended in UK law. Data to support this assertion are held at the disposal of the competent authorities of the Member States and will be made available to them, at their direct request or at the request of a detergent manufacturer.

#### ▼ Sources

The Management of Health and Safety at Work Regulations 1999.

The Health and Safety at Work etc. Act 1974 Regulations 2013.

Regulation (EC) No 648/2004 on detergents as retained and amended in UK law.

Control of Major Accident Hazards (COMAH) Regulations 2015.

Regulation (EU) No 1357/2014 of 18 December 2014 on waste as retained and amended in UK law.

Regulation (EC) No 1272/2008 on classification, labelling and packaging of substances and mixtures (CLP) as retained and amended in UK law.

Regulation (EC) No 1907/2006 concerning the Registration, Evaluation, Authorisation and Restriction of Chemicals (REACH) as retained and amended in UK law.

### 15.2. Chemical safety assessment

No

## ▼ SECTION 16: Other information

### ▼ Full text of H-phrases as mentioned in section 3

- H301, Toxic if swallowed.
- H302, Harmful if swallowed.
- H314, Causes severe skin burns and eye damage.
- H373, May cause damage to organs through prolonged or repeated exposure.
- H400, Very toxic to aquatic life.
- H410, Very toxic to aquatic life with long lasting effects.

### ▼ The full text of identified uses as mentioned in section 1

- LCS "PW" = Professional uses: Public domain (administration, education, entertainment, services, craftsmen)
- PC35 = Washing and Cleaning Products (including solvent based products)
- ERC8a = Wide dispersive indoor use of processing aids in open systems

### ▼ Abbreviations and acronyms

- ADN = European Provisions concerning the International Carriage of Dangerous Goods by Inland Waterway
- ADR = The European Agreement concerning the International Carriage of Dangerous Goods by Road
- ATE = Acute Toxicity Estimate
- BCF = Bioconcentration Factor
- CAS = Chemical Abstracts Service
- CE = Conformité Européenne
- CLP = Classification, Labelling and Packaging Regulation [Regulation (EC) No. 1272/2008]
- CSA = Chemical Safety Assessment
- CSR = Chemical Safety Report
- DMEL = Derived Minimal Effect Level
- DNEL = Derived No Effect Level
- EINECS = European Inventory of Existing Commercial chemical Substances
- ES = Exposure Scenario
- EUH statement = CLP-specific Hazard statement
- EWC = European Waste Catalogue
- GHS = Globally Harmonized System of Classification and Labelling of Chemicals
- IARC = International Agency for Research on Cancer (IARC)
- IATA = International Air Transport Association
- IBC = Intermediate Bulk Container
- IMDG = International Maritime Dangerous Goods
- LogPow = logarithm of the octanol/water partition coefficient
- MARPOL = International Convention for the Prevention of Pollution From Ships, 1973 as modified by the Protocol of 1978. ("Marpol" = marine pollution)
- OECD = Organisation for Economic Co-operation and Development
- PBT = Persistent, Bioaccumulative and Toxic
- PNEC = Predicted No Effect Concentration
- RID = The Regulations concerning the International Carriage of Dangerous Goods by Rail
- RRN = REACH Registration Number
- SCL = A specific concentration limit
- SVHC = Substances of Very High Concern
- STOT-RE = Specific Target Organ Toxicity - Repeated Exposure
- STOT-SE = Specific Target Organ Toxicity - Single Exposure
- TWA = Time weighted average
- UN = United Nations
- UVBC = Unknown or variable composition, complex reaction products or of biological materials
- VOC = Volatile Organic Compound
- vPvB = Very Persistent and Very Bioaccumulative

### ▼ Additional information

- The classification of the substance/mixture in regard of health hazards are in accordance with the calculation methods given by Regulation (EC) No. 1272/2008 (CLP) as retained and amended in UK law.
- The classification of the substance/mixture in regard of environmental hazards are in accordance with the

calculation methods given by Regulation (EC) No. 1272/2008 (CLP) as retained and amended in UK law.

▼ The safety data sheet is validated by

LEJ

#### Other

A change (in proportion to the last essential change (first cipher in SDS version, see section 1)) is marked with a blue triangle.

The information in this safety data sheet applies only to this specific product (mentioned in section 1) and is not necessarily correct for use with other chemicals/products.

It is recommended to hand over this safety data sheet to the actual user of the product. Information in this safety data sheet cannot be used as a product specification.

Country-language: GB-en