Safety data sheet

According to Regulation (EC) No. 1907/2006 (REACH) Date of issue: 25.06.2014 Supersedes edition of: ---

u			
1.1 Product ide	entifier		
Product name:	Lorinet		
1.2 Relevant ic Sanitary cleaner	dentified uses of the substance or mixture and uses advised against		
1.3 Details of t	the supplier of the safety data sheet		
Company:	Otto Oehme GmbH		
	Industriestraße 20		
	D-90584 Allersberg Deutschland Tel. +49 9176 98050 info@oehme-lorito.de		
	1.4 Emergency	y telephone number	
Poison Control C	Center Nuremberg, Tel. + 49 911 398 2451		
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Safety Data Sheet

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

Product name: Revision date: Lorinet 25.06.2014

<5%

Isotridecanol, ethoxylated 69011-36-5 NLP 500-241-6

Xn R 22-41

REACH Registration Number: 02-2119552461-55-0000

Full text of R-Phrases: see under section 16.

SECTION 4: First aid measures

4.1 Description of first aid measures

After inhalation: Fresh air. Call in physician if feeling unwell. After skin contact: Wash off with plenty of water. Remove contaminated clothing. Consult a

physician if skin irritations occure. After eye contact: Rinse out with plenty of water with the eyelid held wide open. Call in ophthalmologist immediately.

After swallowing: Make victim drink plenty of water (two glasses at most), avoid vomiting. Call in physician.

4.2 Most important symptoms and effects, both acute and delayed

No information available.

4.3 Indication of any immediate medical attention and special treatment needed No information available.

SECTION 5: Firefighting measures

5.1 Extinguishing media

Suitable extinguishing media Use extinguishing measures that are appropriate to local circumstances and the surrounding environment.

Unsuitable extinguishing media For this substance / mixture no limitations of extinguishing agents are given.

5.2 Special hazards arising from the substance or mixture

Not Combustible. Development of hazardous combustion gases or vapours possible in the event of fire.

5.3 Advice for firefighters

Special protective equipment for firefighters Do not stay in dangerous zone without suitable chemical protection clothing and self-contained breathing apparatus.

Further information

Prevent fire-fighting water from entering surface water or groundwater.

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SECTION 6: Accidental release measures

6.1 Personal precautions, protective equipment and emergency procedures

Caution: Risk of slipping.

Do not inhale vapours/aerosols. Avoid substance contact. Ensure supply of fresh air in enclosed rooms.

6.2 Environmental precautions

Do not allow to enter sewerage system.

6.3 Methods and material for containment and cleaning up

Take up with incombustible liquid-absorbent material. Forward for disposal. Clean up affected area.

6.4 Reference to other sections

Indications about waste treatment see section 13.

SECTION 7: Handling and storage

7.1 Precautions for safe handling

Notes for safe handling

Ensure adequate ventilation. Avoid contact with skin and eyes. Do not inhale vapours/aerosols. Avoid generation of vapours/aerosols.

Notes for prevention of fire and explosion Not required.

7.2 Conditions for safe storage, including any incompatibilities

Store cool above 5 °C. Keep away from sun and heat. Tightly closed in a well-ventilated place.

7.3 Specific end use(s)

Apart fron the uses mentioned in section 1.2 no other specific uses are stipulated.

SECTION 8: Exposure controls/personal protection

8.1 Control parameters

Contains no substances with occupational exposure limit values.

8.2 Exposure controls

Individual protection measures

Protective clothing should be selected specifically for the working place, depending on concentration and quantity of the hazardous substances handled. The resistance of the protective clothing to chemicals should be ascertained with the respective supplier.

Eye / face protection:

Tightly fitting safety goggles (EN 166).

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Hand protection:

Glove material: Nitrile rubber. LutensolTO89BASFCitronensäureMERCK Details on the penetration time have to be asked by the manufacturer.

The protective gloves to be used must comply with the specifications of EC directive 89/686/EEC and the resultant standard EN 374.

Respiratory protection:

Required when vapours/aerosols are generated. Filter A2 P2 (EN 14387).

Hygiene measures

Change contaminated clothing. Apply skin- protective barrier cream. Wash hands and face after working with substance.

SECTION 9: Physical and chemical properties

9.1 Information on basic physical and chemical properties

Form: Colour: Odour:		liquid red perfumed
pH value Melting point Boiling point Ignition temperatur Flash point Explosion limits Density (20 °C) Solubility in water	e lower upper	2 not specified not specified not applicable not applicable not applicable ~ 1.0 g/cm ³ miscible

9.2 Other information

None.

SECTION 10: Stability and reactivity

10.1 Reactivity

No dangerous chemical reactions are expected on intended use.

10.2 Chemical stability

The product is chemically stable under standard ambient conditions (room temperature).

10.3 Possibility of hazardous reactions

No information available.

10.4 Conditions to avoid

Strong heating.

10.5 Incompatible materials

Violent reactions possible with: Metals, oxidizing agents, bases, reducing agents.

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Corrosive substances, halogenes, bases, acids, reactive chemikals.

10.6 Hazardous decomposition products

No information available.

SECTION 11: Toxicological information

11.1 Information on toxicological effects

Acute oral toxicity LD₅₀ rat: 500 - 2000 mg/kg (OECD 423; Isotridecanol, ethoxylated) LD₅₀ rat: 3000 mg/kg (external MSDS; Citric acid, anhydrous)

Acute inhalation toxicity Symptoms:Irritant effects on respiratory tract.

Skin irritation Rabbit: No irritation (OECD 404; Isotridecanol, ethoxylated). Rabbit: No irritation (OECD 404; Citric acid, anhydrous).

Eye irritation Rabbit: Eye irritation (OECD 405; Isotridecanol, ethoxylated). Causes serious eye irritations. Rabbit: Strong irritations (OECD 405; Citric acid, anhydrous). Causes serious eye irritations.

Genotoxicity in vitro Ames test: Negative (external MSDS; Citric acid, anhydrous).

Reproductive toxicity

No impairment of reproductive performance in animal experiments (external MSDS; Citric acid, monohydrate).

Teratogenicity Did not show teratogenic effects in animal experiments (external MSDS; Citric acid, monohydrate).

Specific target organ toxicity – single exposure The substance or mixture is not classified as specific target organ toxicant, single exposure.

Specific target organ toxicity – repeated exposure The substance or mixture is not classified as specific target organ toxicant, repeated exposure.

Aspiration hazard No aspiration toxicity classification.

11.2 Further information

Further hazardous properties cannot be excluded. The product should be handled with the care usual when dealing with chemicals.

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SECTION 12: Ecological information

12.1 Toxicity

Toxicity to fish Leuciscus idus LC₅₀: 440 - 760 mg/l /96 h (IUCLID; Citric acid, anhydrous) Leuciscus idus LC₅₀: 1-10 mg/l /96 h (external MSDS; Isotridecanol, ethoxylated)

Toxicity to daphnia an other aquatic invertebrates

Entosiphon sulcatum: EC₅: 485 mg/l /72 h (maximum permissible toxic concentration; external MSDS; Citric acid, anhydrous)

Daphnia magna: EC₅₀: 120 mg/l /72h (IUCLID; Citric acid, anhydrous)

Aaquatic invertebrates: EC₅₀: 1-10 mg/l /48 h (external MSDS; Isotridecanol, ethoxylated)

Toxicity to algea

Microcystis aeruginosa: IC₅: 80 mg/l /8 d (maximum permissible toxic concentration; external MSDS; Citric acid, anhydrous) Scenedesmus quadricauda: IC₅: 640 mg/l /7 d (maximum permissible toxic concentration; external MSDS; Citric acid, anhydrous) EC₅₀: 1-10 mg/l /72 h (external MSDS; Isotridecanol, ethoxylated)

Toxicity to bacteria

Pseudomonas putida EC₅: > 10000 mg/l /16 h (external MSDS; Citric acid, anhydrous) Activated sludge: EC₁₀: >10000 mg/l /17 h (DIN 38412 (8); Isotridecanol, ethoxylated)

12.2 Persistence and degradability

Biodegradability

The surfactants contained in this preparation complies with the Biodegradability criteria as laid down in Regulation (EC) No. 648/2004 on detergents.

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.

Biodegradation: 98 % / 2 d (OECD 302B; Citric acid, anhydrous) Readily biodegradable (Citric acid, anhydrous) Biodegradation: >60 % / 28 d (OECD 301B; Isotridecanol, ethoxylated) Readily biodegradable (Isotridecanol, ethoxylated)

Biochemical oxigen demand (BOD) 481 mg/g /5 d (external MSDS; Citric acid, monohydrate)

Chemical oxigen demand (COD) 685 mg/g (external MSDS; Citric acid, monohydrate)

Theoretical oxigen demand (ThOD) 686 mg/g (external MSDS; Citric acid, monohydrate)

12.3 Bioaccumulative potential

Partition coefficient: n-octanol / water: log P_{OW}: -1.72 (IUCLID; Citric acid, monohydrate). No bioaccumulation is to be expected (Citric acid, monohydrate). No bioaccumulation is to be expected (external MSDS; Isotridecanol, ethoxylated).

12.4 Mobility in soil

No information available.

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12.5 Results of PBT and vPvB assessment

PBT / vPvB assessment not available as chemical safety assessment not required / not conducted.

12.6 Other adverse effects

Further information on ecology COD: 2.1 g/g (external MSDS; Isotridecanol, ethoxylated). Biological effects: Harmful effect due to pH shift.

Do not allow to enter waters, waste water, or soil!

SECTION 13: Disposal considerations

13.1 Waste treatment methods

Product:

Chemicals must be disposed of in compliance with the respective national regulations.

Code of the waste	Name according to directive 2000/532/EC:
200129*	detergents containing dangerous substances.
070601*	aqueous washing liquids and mother liquors.

Packaging:

Product packaging must be disposed of in compliance with the country-specific regulations or must be to a packaging return system.

Code of the waste 200139

Name according to directive 2000/532/EC: plastics.

SECTION 14: Transport information

Not classified as dangerous in the meaning of transport regulations.

SECTION 15: Regulatory information

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

EU regulations Ingredients according to Regulation (EC) on detergents No. 648/2004: Non-ionic surfactants: Less than 5 % Perfumes. Limonene, Alpha–Isomethyl Ionone.

15.2 Chemical safety assessment

For this product a chemical safety assessment was not carried out.

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SECTION 16: Other information

Text of any R phrases referred to under section 2 and 3:

- 22 Harmful if swallowed.
- 36 Irritating to eyes.
- 41 Risk of serious damage to eyes.

The information contained herein is based on the present state of our knowledge. It characterizes the product with regard to the appropriate safety precautions. It does not represent a guarantee of the properties of the product.