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Safety Data Sheet

According to Annex II to REACH - Regulation (EU) 2020/878 and to Annex II to UK REACH

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

1.1. Product identifier

Product name

NCLT

1.2. Relevant identified uses of the substance or mixture and uses advised against Nitrite Based Cooling Water Treatment. Intended use

1.3. Details of the supplier of the safety data sheet

UNIService UNISAFF Srl Name

Via al Santuario di N.S. Guardia 58 a Full address

District and Country 16162 Genova Bolzaneto (GE)

Italia

Tel. + 39 010 711395 Fax + 39 010 713120

e-mail address of the competent person

responsible for the Safety Data Sheet info@uniservicemarine.com

1.4. Emergency telephone number

For urgent inquiries refer to

First Aid Information: Osp." Pediatrico Bambino Gesù" - Dip. Emergenza e Accettazione DEA - 00165 - Roma - Piazza Sant'Onofrio, 4 - PIC: Mr.: Marco Marano -

Phone:06 68593726.

First Aid Information: Az. Osp. Univ. Foggia- Azienda Ospedaliera Universitaria riuniti, Foggia - V.le Luigi Pinto, 1- 71122 - PIC: Mrs.: Anna Lepre- phone.: 800183459. First Aid Information:Az. Osp. "A. Cardarelli" -Servizio di Anestesia e rianimazione-Napoli, Via A. Cardarelli, 9-80131- Phone: 081-5453333. PIC: Mr.: Romolo Villani. First Aid Information: Policlinico "Umberto I" -PRGM tossicologia d'urgenza, Roma -V.le del Policlinico, 155, cap 161- phone. 06-49978000- PIC: Mrs.: M. Caterina Grassi. First Aid Information: Policlinico "A. Gemelli", Servizio di tossicologia clinica, Roma, Largo Agostino Gemelli, 8- CAP: 168- phone: 06-3054343 - PIC: Mr.: Alessandro Barelli. First Aid Information: Az. Osp. "Careggi" U.O. Tossicologia Medica- Firenze, via Largo Brambilla, 3- CAP: 50134 -Phone: 055-7947819 -PIC: Mr.: Francesco Gambassi. First Aid Information: Centro Nazionale di Informazione Tossicologica-IRCCS Fondazione Salvatore Maugeri Clinica del lavoro e della riabilitazione - Pavia, Via Salvatore Maugeri, 10- CAP: 27100- Phone: 0382-24444 - PIC: Mr.: Carlo Locatelli. First Aid Information: Osp. Niguarda Ca' Granda - Milano, Piazza Ospedale Maggiore,3-CAP :20162- Phone: 02-66101029- PIC: Mrs.: Franca Davanzo.

First Aid Information: Azienda Ospedaliera Papa Giovanni XXII - Bergamo- Piazza OMS,

1 - CAP: 24127 -Phone: 800883300- PIC: Mr.: Bacis Giuseppe.

First Aid Information: Azienda Ospedaliera Integrata Verona, CAP: 37126 - Piazzale Aristide Stefani, 1,CAP: 37126- Phone: 800011858- PIC: Mr.: Giorgio Ricci.

SECTION 2. Hazards identification

2.1. Classification of the substance or mixture

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The product is classified as hazardous pursuant to the provisions set forth in (EC) Regulation 1272/2008 (CLP) (and subsequent amendments and supplements). The product thus requires a safety datasheet that complies with the provisions of (EU) Regulation 2020/878.

Any additional information concerning the risks for health and/or the environment are given in sections 11 and 12 of this sheet.

Hazard classification and indication:

Reproductive toxicity, category 1B H360FD May damage fertility. May damage the unborn child.

Acute toxicity, category 4 H302 Harmful if swallowed.

Eye irritation, category 2 H319 Causes serious eye irritation.

Skin irritation, category 2 H315 Causes skin irritation.

Hazardous to the aquatic environment, acute toxicity, H400 Very toxic to aquatic life.

category 1

2.2. Label elements

Hazard labelling pursuant to EC Regulation 1272/2008 (CLP) and subsequent amendments and supplements.

Hazard pictograms:







Signal words: Danger

Hazard statements:

H360FD May damage fertility. May damage the unborn child.

H302 Harmful if swallowed.

H319 Causes serious eye irritation.

H315 Causes skin irritation.

H400 Very toxic to aquatic life.

Restricted to professional users.

Precautionary statements:

P201 Obtain special instructions before use.

P280 Wear protective gloves/ protective clothing / eye protection / face protection.

P308+P313 IF exposed or concerned: Get medical advice / attention.

P273 Avoid release to the environment.

P391 Collect spillage.

P337+P313 If eye irritation persists: Get medical advice / attention.

Contains: DISODIUM TETRABORATE DECAHYDRATE

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SODIUM NITRITE POTASSIUM HYDROXIDE

2.3. Other hazards

On the basis of available data, the product does not contain any PBT or vPvB in percentage ≥ than 0,1%.

The product does not contain substances with endocrine disrupting properties in concentration ≥ 0.1%.

SECTION 3. Composition/information on ingredients

3.2. Mixtures

Contains:

Identification	x = Conc. %	Classification (EC) 1272/2008 (CLP)
SODIUM NITRITE		
INDEX 007-010-00-4	$30 \le x < 50$	Ox. Sol. 2 H272, Acute Tox. 3 H301, Aquatic Acute 1 H400 M=1
EC 231-555-9		ATE Oral: 100 mg/kg
CAS 7632-00-0		
DISODIUM TETRABORATE DECAHYDRATE		
INDEX 005-011-00-4	1 ≤ x < 5	Repr. 1B H360FD, Classification note according to Annex VI to the CLP Regulation: 11
EC 215-540-4		. togsauton
CAS 1303-96-4		
POTASSIUM HYDROXIDE		
INDEX 019-002-00-8	1 ≤ x < 2	Met. Corr. 1 H290, Acute Tox. 4 H302, Skin Corr. 1A H314, Eye Dam. 1 H318
EC 215-181-3		Skin Corr. 1B H314: ≥ 2% - < 5%, Skin Corr. 1C H314: ≥ 2% - < 5%, Skin Irrit. 2 H315: ≥ 0,5% - < 2%, Eye Dam. 1 H318: ≥ 2%, Eye Irrit. 2 H319: ≥ 0,5% - < 2%
CAS 1310-58-3		ATE Oral: 500 mg/kg

The full wording of hazard (H) phrases is given in section 16 of the sheet.

SECTION 4. First aid measures

4.1. Description of first aid measures

In case of doubt or in the presence of symptoms contact a doctor and show him this document.

In case of more severe symptoms, ask for immediate medical aid.

EYES: Remove, if present, contact lenses if the situation allows you to do so easily. Wash immediately with plenty of water for at least 15 minutes,

opening the eyelids fully. Get medical advice/attention.

SKIN: Take off contaminated clothing. Wash immediately and thoroughly with running water (and soap if possible). Get medical advice. Avoid further contact with contaminated clothing.

INGESTION: Do not induce vomiting unless explicitly authorised by a doctor. Do not give anything by mouth to an unconscious person. Get medical advice/attention.

INHALATION: Remove victim to fresh air, away from the accident scene. In the event of respiratory symptoms (coughing, wheezing, breathing difficulty, asthma) keep the victim in a comfortable position for breathing. If necessary administer oxygen. If the subject stops breathing, administer artificial respiration. Get medical advice/attention.

Rescuer protection

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It is good practice for rescuers lending support to a person who has been exposed to a chemical substance or to a mixture to wear personal protective equipment. The nature of such protection depends on the hazard level of the substance or mixture, on the type of exposure and on the extent of the contamination. In the absence of other more specific indications, use of disposable gloves in the event of possible contact with body fluids is recommended. For the type of PPE suitable for the characteristics of the substance or mixture, see section 8.

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

Specific information on symptoms and effects caused by the product are unknown.

DELAYED EFFECTS: Based on the information currently available, there are no known cases of delayed effects following exposure to this product.

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

IF exposed or concerned: Get medical advice / attention.

Means to have available in the workplace for specific and immediate treatment

Running water for skin and eye wash.

SECTION 5. Firefighting measures

5.1. Extinguishing media

SUITABLE EXTINGUISHING EQUIPMENT

The extinguishing equipment should be of the conventional kind: carbon dioxide, foam, powder and water spray. UNSUITABLE EXTINGUISHING EQUIPMENT None in particular.

5.2. Special hazards arising from the substance or mixture

HAZARDS CAUSED BY EXPOSURE IN THE EVENT OF FIRE Do not breathe combustion products.

5.3. Advice for firefighters

GENERAL INFORMATION

Use jets of water to cool the containers to prevent product decomposition and the development of substances potentially hazardous for health. Always wear full fire prevention gear. Collect extinguishing water to prevent it from draining into the sewer system. Dispose of contaminated water used for extinction and the remains of the fire according to applicable regulations.

SPECIAL PROTECTIVE EQUIPMENT FOR FIRE-FIGHTERS

Normal fire fighting clothing i.e. fire kit (BS EN 469), gloves (BS EN 659) and boots (HO specification A29 and A30) in combination with self-contained open circuit positive pressure compressed air breathing apparatus (BS EN 137).

SECTION 6. Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

Block the leakage if there is no hazard.

Wear suitable protective equipment (including personal protective equipment referred to under Section 8 of the safety data sheet) to prevent any contamination of skin, eyes and personal clothing. These indications apply for both processing staff and those involved in emergency procedures.

6.2. Environmental precautions

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The product must not penetrate into the sewer system or come into contact with surface water or ground water.

6.3. Methods and material for containment and cleaning up

Collect the leaked product into a suitable container. Evaluate the compatibility of the container to be used, by checking section 10. Absorb the remainder with inert absorbent material.

Make sure the leakage site is well aired. Contaminated material should be disposed of in compliance with the provisions set forth in point 13.

6.4. Reference to other sections

Any information on personal protection and disposal is given in sections 8 and 13.

SECTION 7. Handling and storage

7.1. Precautions for safe handling

Ensure that there is an adequate earthing system for the equipment and personnel. Avoid contact with eyes and skin. Do not breathe powders, vapours or mists. Do not eat, drink or smoke during use. Wash hands after use. Avoid leakage of the product into the environment.

7.2. Conditions for safe storage, including any incompatibilities

Store only in the original container. Store in a ventilated and dry place, far away from sources of ignition. Keep containers well sealed. Keep the product in clearly labelled containers. Avoid overheating. Avoid violent blows. Keep containers away from any incompatible materials, see section 10 for details.

7.3. Specific end use(s)

Information not available

SECTION 8. Exposure controls/personal protection

8.1. Control parameters

Regulatory references:

TLV-ACGIH

ESP España Límites de exposición profesional para agentes químicos en España 2023

GBR United Kingdom EH40/2005 Workplace exposure limits (Fourth Edition 2020)

TLV-ACGIH ACGIH 2023

DISODIUM TETRABORATE DECAHYDRATE Threshold Limit Value Type Country TWA/8h STEL/15min Remarks / Observations mg/m3 ppm mg/m3 ppm VLA ESP 2 6

6

INHAL

POTASSIUM HYDROXIDE Threshold Limit Value Type Country TWA/8h STEL/15min Remarks / Observations mg/m3 ppm mg/m3 ppm VLA ESP 2

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 WEL
 GBR
 2

 TLV-ACGIH
 2 (C)

Legend:

(C) = CEILING ; INHAL = Inhalable Fraction ; RESP = Respirable Fraction ; THORA = Thoracic Fraction.

8.2. Exposure controls

As the use of adequate technical equipment must always take priority over personal protective equipment, make sure that the workplace is well aired through effective local aspiration.

When choosing personal protective equipment, ask your chemical substance supplier for advice.

Personal protective equipment must be CE marked, showing that it complies with applicable standards.

Provide an emergency shower with face and eye wash station.

HAND PROTECTION

Protect hands with category III work gloves.

The following should be considered when choosing work glove material (see standard EN 374): compatibility, degradation, permeability time.

The work gloves' resistance to chemical agents should be checked before use, as it can be unpredictable. The gloves' wear time depends on the duration and type of use.

SKIN PROTECTION

Wear category II professional long-sleeved overalls and safety footwear (see Regulation 2016/425 and standard EN ISO 20344). Wash body with soap and water after removing protective clothing.

EYE PROTECTION

Wear airtight protective goggles (see standard EN ISO 16321).

In the presence of risks of exposure to splashes or squirts during work, adequate mouth, nose and eye protection should be used to prevent accidental absorption.

RESPIRATORY PROTECTION

Respiratory protection devices must be used if the technical measures adopted are not suitable for restricting the worker's exposure to the threshold values considered. Use a mask with a type B filter whose class (1, 2 or 3) must be chosen according to the limit of use concentration. (see standard EN 14387).

If the substance considered is odourless or its olfactory threshold is higher than the corresponding TLV-TWA and in the case of an emergency, wear open-circuit compressed air breathing apparatus (in compliance with standard EN 137) or external air-intake breathing apparatus (in compliance with standard EN 138). For a correct choice of respiratory protection device, see standard EN 529.

ENVIRONMENTAL EXPOSURE CONTROLS

The emissions generated by manufacturing processes, including those generated by ventilation equipment, should be checked to ensure compliance with environmental standards.

Product residues must not be indiscriminately disposed of with waste water or by dumping in waterways.

SECTION 9. Physical and chemical properties

9.1. Information on basic physical and chemical properties

Properties Value Information

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Appearance liquid yellowish Colour Odour nitrite Melting point / freezing point -5 °C Initial boiling point 115 °C not available Flammability not available Lower explosive limit not available Upper explosive limit not available Flash point not available Auto-ignition temperature Decomposition temperature not available 10.5 - 11 рΗ not available Kinematic viscosity Dynamic viscosity 5 mPa.s Solubility soluble Partition coefficient: n-octanol/water not available Vapour pressure 1800 kPa Density and/or relative density 1.20 - 1.25 Relative vapour density not available Particle characteristics not applicable

9.2. Other information

9.2.1. Information with regard to physical hazard classes

Information not available

9.2.2. Other safety characteristics

Information not available

SECTION 10. Stability and reactivity

10.1. Reactivity

POTASSIUM HYDROXIDE

May develop: heat.May corrode: metals.

10.2. Chemical stability

POTASSIUM HYDROXIDE

Stable in normal conditions of use and storage.

10.3. Possibility of hazardous reactions

The product may react violently with water.

DISODIUM TETRABORATE DECAHYDRATE

Risk of explosion on contact with: strong oxidising agents,acids,moisture,water,metal salts.

POTASSIUM HYDROXIDE

Develops hydrogen on contact with: metals.Develops heat on contact with: strong acids.Reacts violently with: water.

10.4. Conditions to avoid

Avoid overheating. Prevent moisture or water from penetrating inside the containers.

DISODIUM TETRABORATE DECAHYDRATE

Keep away from: strong reducing agents. Possibility of explosion.

POTASSIUM HYDROXIDE

Avoid exposure to: sources of heat.Keep away from: oxidising agents,acids,flammable substances,halogens,organic substances.Keep away from: lead,aluminium,copper,tin,sulphur,bronze.Absorbs atmospheric CO2.

Unstable on exposure to air. Freezing.

10.5. Incompatible materials

Information not available

10.6. Hazardous decomposition products

DISODIUM TETRABORATE DECAHYDRATE

May develop: boron oxides, sodium oxides.

POTASSIUM HYDROXIDE

May develop: flammable gases.

SECTION 11. Toxicological information

In the absence of experimental data for the product itself, health hazards are evaluated according to the properties of the substances it contains, using the criteria specified in the applicable regulation for classification.

It is therefore necessary to take into account the concentration of the individual hazardous substances indicated in section 3, to evaluate the toxicological effects of exposure to the product.

Metabolism, toxicokinetics, mechanism of action and other information

Information not available

Information on likely routes of exposure

Information not available

Delayed and immediate effects as well as chronic effects from short and long-term exposure

Information not available

Interactive effects

Information not available

ACUTE TOXICITY ATE (Inhalation) of the mixture: Not classified (no significant component)

ATE (Oral) of the mixture: 352,38 mg/kg

ATE (Dermal) of the mixture: Not classified (no significant component)

SODIUM NITRITE

LD50 (Oral): 180 mg/kg Rat

ATE (Oral): 100 mg/kg estimate from table 3.1.2 of Annex I of the CLP

(figure used for calculation of the acute toxicity estimate of the mixture)

DISODIUM TETRABORATE DECAHYDRATE

 LD50 (Dermal):
 10000 mg/kg Rabbit

 LD50 (Oral):
 2660 mg/kg Rat

POTASSIUM HYDROXIDE

LD50 (Oral): 333 mg/kg Rat

ATE (Oral): 500 mg/kg estimate from table 3.1.2 of Annex I of the CLP

(figure used for calculation of the acute toxicity estimate of the mixture)

SKIN CORROSION / IRRITATION

Causes skin irritation

SERIOUS EYE DAMAGE / IRRITATION

Causes serious eye irritation

RESPIRATORY OR SKIN SENSITISATION

Does not meet the classification criteria for this hazard class

GERM CELL MUTAGENICITY

Does not meet the classification criteria for this hazard class

CARCINOGENICITY

Does not meet the classification criteria for this hazard class

REPRODUCTIVE TOXICITY

May damage fertility - May damage the unborn child

STOT - SINGLE EXPOSURE

Does not meet the classification criteria for this hazard class

STOT - REPEATED EXPOSURE

Does not meet the classification criteria for this hazard class

ASPIRATION HAZARD

Does not meet the classification criteria for this hazard class

Based on the available data, the product does not contain substances listed in the main European lists of potential or suspected endocrine disruptors with human health effects under evaluation.

SECTION 12. Ecological information

This product is dangerous for the environment and highly toxic for aquatic organisms.

12.1. Toxicity

SODIUM NITRITE

LC50 - for Fish 0,79 mg/l/96h Oncorhynchus mykiss
EC50 - for Crustacea 23,31 mg/l/48h Penaeus monodon
EC50 - for Algae / Aquatic Plants 159 mg/l/72h Tetraseimis chui

12.2. Persistence and degradability

SODIUM NITRITE

Solubility in water 848000 mg/l

Degradability: information not available

POTASSIUM HYDROXIDE

Solubility in water > 10000 mg/l

Degradability: information not available

DISODIUM TETRABORATE

DECAHYDRATE

Solubility in water 47000 mg/l

12.3. Bioaccumulative potential

SODIUM NITRITE

Partition coefficient: n-octanol/water -3,7

DISODIUM TETRABORATE

DECAHYDRATE

Partition coefficient: n-octanol/water -1,53

12.4. Mobility in soil

Information not available

12.5. Results of PBT and vPvB assessment

On the basis of available data, the product does not contain any PBT or vPvB in percentage ≥ than 0,1%.

12.6. Endocrine disrupting properties

Based on the available data, the product does not contain substances listed in the main European lists of potential or suspected endocrine disruptors with environmental effects under evaluation.

12.7. Other adverse effects

Information not available

SECTION 13. Disposal considerations

13.1. Waste treatment methods

Reuse, when possible. Product residues should be considered special hazardous waste. The hazard level of waste containing this product should be evaluated according to applicable regulations.

Disposal must be performed through an authorised waste management firm, in compliance with national and local regulations.

Waste transportation may be subject to ADR restrictions.

CONTAMINATED PACKAGING

Contaminated packaging must be recovered or disposed of in compliance with national waste management regulations.

SECTION 14. Transport information

14.1. UN number or ID number

ADR / RID, IMDG, IATA: UN 3287

14.2. UN proper shipping name

ADR / RID: TOXIC LIQUID, INORGANIC, N.O.S. (SODIUM NITRITE)

IMDG: TOXIC LIQUID, INORGANIC, N.O.S. (SODIUM NITRITE)

IATA: TOXIC LIQUID, INORGANIC, N.O.S. (SODIUM NITRITE)

14.3. Transport hazard class(es)

ADR / RID: Class: 6.1 Label: 6.1

IMDG: Class: 6.1 Label: 6.1

IATA: Class: 6.1 Label: 6.1



14.4. Packing group

ADR / RID, IMDG, IATA:

14.5. Environmental hazards

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ADR / RID: Environmentally

Hazardous

IMDG: Marine Pollutant

IATA: NO

For Air transport, environmentally hazardous mark is only mandatory for UN 3077 and UN 3082.

Cargo:

Passengers:

14.6. Special precautions for user

ADR / RID: HIN - Kemler: 60 Limited Quantities: 5

Tunnel restriction code: (E)

Special provision: 274

IMDG: EMS: F-A, S-A Limited Quantities: 5

Maximum Packaging quantity: 220 instructions:

Maximum

Packaging

quantity: 60 L

instructions:

655

663

A3, A4, A137 Special provision:

14.7. Maritime transport in bulk according to IMO instruments

Information not relevant

IATA:

SECTION 15. Regulatory information

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

Seveso Category - Directive 2012/18/EU: E1

Restrictions relating to the product or contained substances pursuant to Annex XVII to EC Regulation 1907/2006

<u>Product</u>

Point 3

Contained substance

Point 75

Point 30 **DISODIUM TETRABORATE**

DECAHYDRATE

Regulation (EU) 2019/1148 - on the marketing and use of explosives precursors

not applicable

Substances in Candidate List (Art. 59 REACH)

DISODIUM TETRABORATE DECAHYDRATE

Substances subject to authorisation (Annex XIV REACH)

None

Substances subject to exportation reporting pursuant to Regulation (EU) 649/2012:

None

Substances subject to the Rotterdam Convention:

None

Substances subject to the Stockholm Convention:

None

Healthcare controls

Workers exposed to this chemical agent must not undergo health checks, provided that available risk-assessment data prove that the risks related to the workers' health and safety are modest and that the 98/24/EC directive is respected.

15.2. Chemical safety assessment

A chemical safety assessment has not been performed for the preparation/for the substances indicated in section 3.

SECTION 16. Other information

Text of hazard (H) indications mentioned in section 2-3 of the sheet:

Ox. Sol. 2 Oxidising solid, category 2

Met. Corr. 1 Substance or mixture corrosive to metals, category 1

Repr. 1B Reproductive toxicity, category 1B

Acute Tox. 3 Acute toxicity, category 3

Acute Tox. 4 Acute toxicity, category 4

Skin Corr. 1A Skin corrosion, category 1A

Skin Corr. 1B Skin corrosion, category 1B

Skin Corr. 1C Skin corrosion, category 1C

Eye Dam. 1 Serious eye damage, category 1

Eye Irrit. 2 Eye irritation, category 2
Skin Irrit. 2 Skin irritation, category 2

Aquatic Acute 1 Hazardous to the aquatic environment, acute toxicity, category 1

H272 May intensify fire; oxidiser.H290 May be corrosive to metals.

H360FD May damage fertility. May damage the unborn child.

H301 Toxic if swallowed.H302 Harmful if swallowed.

UNISERVICE UNISAFE Srl NCLT H314 Causes severe skin burns and eye damage. H318 Causes serious eye damage. H319 Causes serious eye irritation. H315 Causes skin irritation H400 Very toxic to aquatic life. LEGEND: ADR: European Agreement concerning the carriage of Dangerous goods by Road ATE: Acute Toxicity Estimate CAS: Chemical Abstract Service Number CE50: Effective concentration (required to induce a 50% effect) CE: Identifier in ESIS (European archive of existing substances) CLP: Regulation (EC) 1272/2008 **DNEL: Derived No Effect Level** EmS: Emergency Schedule GHS: Globally Harmonized System of classification and labeling of chemicals IATA DGR: International Air Transport Association Dangerous Goods Regulation IC50: Immobilization Concentration 50% IMDG: International Maritime Code for dangerous goods IMO: International Maritime Organization INDEX: Identifier in Annex VI of CLP LC50: Lethal Concentration 50% LD50: Lethal dose 50% OEL: Occupational Exposure Level PBT: Persistent, bioaccumulative and toxic PEC: Predicted environmental Concentration PEL: Predicted exposure level PMT: Persistent, mobile and toxic PNEC: Predicted no effect concentration REACH: Regulation (EC) 1907/2006 RID: Regulation concerning the international transport of dangerous goods by train TLV: Threshold Limit Value TLV CEILING: Concentration that should not be exceeded during any time of occupational exposure. TWA: Time-weighted average exposure limit TWA STEL: Short-term exposure limit VOC: Volatile organic Compounds vPvB: Very persistent and very bioaccumulative vPvM: Very persistent and very mobile WGK: Water hazard classes (German). GENERAL BIBLIOGRAPHY 1. Regulation (EC) 1907/2006 (REACH) of the European Parliament 2. Regulation (EC) 1272/2008 (CLP) of the European Parliament 3. Regulation (EU) 2020/878 (II Annex of REACH Regulation) 4. Regulation (EC) 790/2009 (I Atp. CLP) of the European Parliament 5. Regulation (EU) 286/2011 (II Atp. CLP) of the European Parliament 6. Regulation (EU) 618/2012 (III Atp. CLP) of the European Parliament 7. Regulation (EU) 487/2013 (IV Atp. CLP) of the European Parliament 8. Regulation (EU) 944/2013 (V Atp. CLP) of the European Parliament

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- 9. Regulation (EU) 605/2014 (VI Atp. CLP) of the European Parliament
- 10. Regulation (EU) 2015/1221 (VII Atp. CLP) of the European Parliament
- 11. Regulation (EU) 2016/918 (VIII Atp. CLP) of the European Parliament
- 12. Regulation (EU) 2016/1179 (IX Atp. CLP)
- 13. Regulation (EU) 2017/776 (X Atp. CLP)
- 14. Regulation (EU) 2018/669 (XI Atp. CLP)
- 15. Regulation (EU) 2019/521 (XII Atp. CLP)
- 16. Delegated Regulation (UE) 2018/1480 (XIII Atp. CLP)
- 17. Regulation (EŬ) 2019/1148
- 18. Delegated Regulation (UE) 2020/217 (XIV Atp. CLP)
- 19. Delegated Regulation (UE) 2020/1182 (XV Atp. CLP)
- 20. Delegated Regulation (UE) 2021/643 (XVI Atp. CLP)
- 21. Delegated Regulation (UE) 2021/849 (XVII Atp. CLP)

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Note for users:

The information contained in the present sheet are based on our own knowledge on the date of the last version. Users must verify the suitability and thoroughness of provided information according to each specific use of the product.

This document must not be regarded as a guarantee on any specific product property.

Database of SDS models for chemicals - Ministry of Health and ISS (Istituto Superiore di Sanità) - Italy

The use of this product is not subject to our direct control; therefore, users must, under their own responsibility, comply with the current health and safety laws and regulations. The producer is relieved from any liability arising from improper uses.

Provide appointed staff with adequate training on how to use chemical products.

CALCULATION METHODS FOR CLASSIFICATION

Chemical and physical hazards: Product classification derives from criteria established by the CLP Regulation, Annex I, Part 2. The data for evaluation of chemical-physical properties are reported in section 9.

Health hazards: Product classification is based on calculation methods as per Annex I of CLP, Part 3, unless determined otherwise in Section 11.
Environmental hazards: Product classification is based on calculation methods as per Annex I of CLP, Part 4, unless determined otherwise in Section 12.

Changes to previous review:

The following sections were modified:

01 / 03 / 04 / 08 / 11 / 14 / 15 / 16.