

**SECTION 1: Identification of the substance/mixture and of the company/undertaking****1.1. Product identifier**

Trade name:

**Nordic Clean alcohol hand disinfectant****1.2. Relevant identified uses of the substance or mixture and uses advised against**

Hand sanitizer.

Biocide - Product-type 1. Biocides for human hygiene.

For professional and consumer use.

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

Manufacturer:

**SIA NORDEN GROUP**

Reg.Nr.40103872150

Salaspils iela 18k1-36, Riga,

Latvia LV-1057

Mob: 00371 29234743

Person responsible for SDS e-mail:: nordengroup@inbox.lv

**1.4. Emergency telephone number**

EU:112

Emergency telephone for other regions to be filled out by local business.

**SECTION 2: Hazards identification****2.1. Classification of the substance or mixture**

Product definition

Mixture

Classification according to regulation (EC) No 1272/2008:

**Flam. Liq. 2, H225****2.2. Label elements**

According to regulation (EC) No 1272/2008:

Symbol:



Signal word:

**Danger!**

Hazard statements:

H225 Highly flammable liquid and vapour.

Hazardous ingredients:

Not relevant.

Precautionary statements:

P101 If medical advice is needed, have product container or label at hand.

P102 Keep out of reach of children.

P210 Keep away from heat, sparks, open flames, hot surfaces. — No smoking.

P233 Keep container tightly closed.

P305+P351+P338 IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.

P302+P333+P313 IF ON SKIN: If skin irritation or rash occurs: Get medical advice/attention.

P403+P235 Store in a well-ventilated place. Keep cool.

P501 Dispose of contents/ container to in accordance with local/ regional/national/international regulation.

Not relevant.

Supplemental label elements

**Special packaging requirements**

Containers to be fitted with child-resistant fastenings:

Not relevant.

Tactile warning of danger  $\Delta$ :

Applicable.

**2.3. Other hazards**

Product does not meet the criteria for PBT or vPvB in accordance with Annex XIII of REACH (Regulation (EC) No 1907/2006).

See section 11 for more detailed information on health effects and symptoms.

**SECTION 3: Composition/information on ingredients****3.1. Substances** Not applicable.**3.2. Mixtures** Mixture of ethanol and water with glycerol, hydrogen peroxide.

Chemical Name	Identifiers	Conc. (%)	Classification according to Regulation (EC) 1272/2008 (CLP)	Type
Ethanol	EINECS: 200-578-6 CAS: 64-17-5 INDEX: 603-002-00-5 REACH: 01-2119457610-43-XXXX	80%	Flam. Liq. 2 - H225	[1] [2]
Glycerol	EINECS: 200-289-5 CAS: 56-81-5 REACH: 01-2119471987-18-xxxx	1,45%	Not classified.	
Hydrogen peroxide solution	EINECS: 231-765-0 CAS: 7722-84-1 INDEX: 008-003-00-9 REACH: 01-2119485845-22-XXXX	0,125%	Ox. Liq. 1 H271, H271 Acute Tox. 4, H302 Skin Corr. 1A, H314 Acute Tox. 4, H332 <u>Specific Concentration limits:</u> Eye Irrit. 2; H319: 5 % ≤ C < 8 % Ox. Liq. 1; H271: C ≥ 70 % Ox. Liq. 2; H272: 50 % ≤ C < 70 % Skin Corr. 1A; H314: C ≥ 70 % Skin Corr. 1B; H314: 50 % ≤ C < 70 % Skin Irrit. 2; H315: 35 % ≤ C < 50 % STOT SE 3; H335; C ≥ 35 % Eye Dam. 1; H318: 8 % ≤ C < 50 %	[1] [2]

There are no additional ingredients present which, within the current knowledge of the supplier and in the concentrations applicable, are classified as hazardous to health or the environment and hence require reporting in this section.

See section 16 for the full text of the H phrases declared above.

Occupational exposure limits, if available, are listed in section 8.

Type:

[1] Substance classified with a health or environmental hazard

[2] Substance with a workplace exposure limit

[3] PBT-substance

[4] vPvB-substance

**SECTION 4: First aid measures****4.1. Description of first aid measures**

**Inhalation:** Remove victim to fresh air and keep at rest in a position comfortable for breathing and contact physician. If not breathing, if breathing is irregular or if respiratory arrest occurs, provide artificial respiration or oxygen by trained personnel. It may be dangerous to the person providing aid to give mouth-to-mouth resuscitation. If unconscious, place in recovery position and get medical attention immediately. Maintain an open airway.

**Skin contact:** Flush contaminated skin with plenty of water and soap. Remove contaminated clothing and shoes. Contact physician if symptoms persist.

**Eye contact:** Flush eyes with plenty of water, occasionally lifting the upper and lower eyelids. Check for and remove any contact lenses. Continue to rinse for at least 15 minutes. Get medical attention if symptoms persist.

**Ingestion:** Get medical attention if feeling unwell. Wash out mouth with water. Remove dentures if any. If material has been swallowed and the exposed person is conscious, give small quantities of water to drink. Stop if the exposed person feels sick as vomiting may be dangerous. DO NOT INDUCE VOMITING unless directed to do so by medical personnel. If vomiting occurs, the head should be kept low so that vomit does not enter the lungs. Never give anything by mouth to an unconscious person. If unconscious, place in recovery position and get medical attention immediately. Maintain an open airway.

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

**Inhalation:** May cause respiratory and nasal irritation.

**Skin contact:** Skin irritation is unlikely.

**Eye contact:** Strong but transient eye irritation is possible.

**Ingestion:** May cause central nervous system depression. Inhalation of vomited mass may cause lung damage.

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



Specific treatments: Treat symptomatically. Contact poison treatment specialist immediately.  
See section 11 for more detailed information on health effects and symptoms.

## SECTION 5: Firefighting measures

### 5.1. Extinguishing media

Suitable extinguishing media: Water fog or mist, alcohol-resistant foam, carbon dioxide (CO<sub>2</sub>) or dry chemical powder.

Unsuitable extinguishing media: Do not use full power water spray.

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

Risk of explosion if heated under confinement. In a fire or if heated, a pressure increase will occur and the container may burst.

The product is flammable, and heating may generate vapours which may form explosive vapour/air mixtures.

Decomposition products may include the following materials: carbon dioxide, carbon monoxide and unidentified organic and inorganic compounds.

### 5.3. Advice for firefighters

Promptly isolate the scene by removing all persons from the vicinity of the incident if there is a fire. No action shall be taken involving any personal risk or without suitable training. Fire water contaminated with this material must be contained and prevented from being discharged to any waterway, sewer or drain.

Fire-fighters should wear appropriate protective equipment and self-contained breathing apparatus (SCBA) with a full face-piece operated in positive pressure mode. Clothing for fire-fighters (including helmets, protective boots and gloves) conforming to European standard EN 469 will provide a basic level of protection for chemical incidents.

### 5.4. Further information

Use water spray to cool unopened containers and disperse vapours.

Be aware of risk of fire re-starting, and risk of explosion.

Keep run-off water out of sewers and water sources.

## SECTION 6: Accidental release measures

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

6.1.1. For non-emergency personnel:

No action shall be taken involving any personal risk or without suitable training. Evacuate surrounding areas. Keep unnecessary and unprotected personnel from entering. Do not touch or walk through spilled material. Keep away from sources of ignition - No smoking. Ground/bond container and receiving equipment. Use explosion-proof electrical, ventilating, equipment. Use only non-sparking tools. Do not breathe vapour or mist. Provide adequate ventilation. Wear appropriate respirator when ventilation is inadequate. Put on appropriate personal protective equipment.

6.1.2. For emergency responders:

If specialised clothing is required to deal with the spillage, take note of any information in Section 8 on suitable and unsuitable materials. See also Section 8 for additional information on hygiene measures.

### 6.2. Environmental precautions

Avoid dispersal of spilled material and runoff and contact with soil, waterways, drains and sewers. Inform the relevant authorities if the product has caused environmental pollution (sewers, waterways, soil or air).

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

Small spill: Stop leak if possible without risk. Move containers from spill area. Extinguish all ignition sources. Avoid sparks, flames, heat and smoking. Ventilate. Use spark-proof tools and explosion-proof equipment. Dilute with water and mop up if water-soluble. Place spilled material in a designated, labeled waste container. Dispose of via a licensed waste disposal contractor.

Large spill: Stop leak if possible without risk. Move containers from spill area. Extinguish all ignition sources. Avoid sparks, flames, heat and smoking. Ventilate. Use spark-proof tools and explosion-proof equipment. Approach release from upwind. Prevent entry into sewers, water courses, basements or confined areas. Wash spillages into an effluent treatment plant or proceed as follows. Contain and collect spillage with non-combustible, absorbent material e.g. sand, earth, vermiculite or diatomaceous earth and place in container for disposal according to local regulations. Dispose of via a licensed waste disposal contractor.

### 6.4. Reference to other sections

See Section 1 for emergency contact information.

See Section 8 for information on appropriate personal protective equipment.

See Section 13 for additional waste treatment information

**SECTION 7: Handling and storage****7.1. Precautions for safe handling**

Protective measures:

Put on appropriate personal protective equipment (see Section 8). Do not get in eyes or on skin or clothing. Do not breathe vapor or mist. Do not ingest. Avoid acids, moisture, and combustible materials. Avoid all possible sources of ignition (spark or flame). Use only with adequate ventilation. Wear appropriate respirator when ventilation is inadequate. Keep in the original container or an approved alternative made from a compatible material, kept tightly closed when not in use. Take precautionary measures against electrostatic discharges. To avoid fire or explosion, dissipate static electricity during transfer by grounding and bonding containers and equipment before transferring material. Empty containers retain product residue and can be hazardous. Do not reuse container.

Advice on general occupational hygiene:

Eating, drinking and smoking should be prohibited in areas where this material is handled, stored and processed. Workers should wash hands and face before eating, drinking and smoking. Remove contaminated clothing and protective equipment before entering eating areas. See also Section 8 for additional information on hygiene measures.

**7.2. Conditions for safe storage, including any incompatibilities**

Storage:

Store in accordance with local regulations. Store in a segregated and approved area. Keep container tightly closed. Store in original container protected from direct sunlight in a dry, cool and well-ventilated area, away from incompatible materials (see Section 10) and food and drink. Keep away from heat and sources of ignition. Keep container tightly closed and sealed until ready for use. Containers that have been opened must be carefully resealed and kept upright to prevent leakage. Do not store in unlabeled containers. Use appropriate containment to avoid environmental contamination.

Do not store above the following temperature:

No specific recommendation.

**7.3. Specific end use(s)**

Recommendations:

Biocide.  
For professional and consumer use.

Industrial sector specific solutions:

Information is not available.

**SECTION 8: Exposure controls/personal protection****8.1 Control parameters**

Occupational exposure limits

Limit values are laid down throughout the EU, but each Member State establishes its own national OELs, often going beyond EU legislation ((IOELV). OELs are set by competent national authorities and other relevant institutions.

**EU: Indicative Occupational Exposure Limit Value (IOELV):**

Substance name	Limit value 8 hours		Limit value short term	
	mg/m <sup>3</sup>	ppm	mg/m <sup>3</sup>	ppm
Values not established	-	-	-	-

**Latvia (AER, reg.325/2011):**

Substance name	Limit value 8 hours		Limit value short term	
	mg/m <sup>3</sup>	ppm	mg/m <sup>3</sup>	ppm
Ethanol	1000	-	-	-

Recommended monitoring Procedures:

If this product contains ingredients with exposure limits, personal, workplace atmosphere or biological monitoring may be required to determine the effectiveness of the ventilation or other control measures and/or the necessity to use respiratory protective equipment. Reference should be made to European Standard EN 689 for methods for the assessment of exposure by inhalation to chemical agents and national guidance documents for methods for the determination of hazardous substances.

**8.2 Manufacturer: Exposure controls**

Appropriate engineering Controls:

Use only with adequate ventilation. If user operations generate fumes, gas, vapor or mist, use process enclosures, local exhaust ventilation or other engineering controls to keep worker exposure to airborne contaminants below any recommended or statutory limits. The engineering controls also need to keep gas or vapor concentrations below any lower explosive limits. Use explosion-proof ventilation equipment.

**Individual protection measures:**

Hygiene measures:

Wash hands, forearms and face thoroughly after handling chemical products, before eating, smoking and using the lavatory and at the end of the working period.

Appropriate techniques should be used to remove potentially contaminated clothing. Wash contaminated clothing before reusing. Ensure that eyewash stations and safety showers are close to the workstation location.

Eye/face protection:

Safety eyewear complying with an approved standard should be used when a risk assessment indicates this is necessary to avoid exposure to liquid splashes, mists or dust. If contact is possible, the following protection should be worn, unless the assessment indicates a higher degree of protection: chemical splash goggles and/or face shield. If inhalation hazards exist, a full-face respirator may be required instead.

**Skin protection:**

Hand protection

Chemical-resistant, impervious gloves complying with an approved standard should be worn at all times when handling chemical products if a risk assessment indicates this is necessary.

Considering the parameters specified by the glove manufacturer, check during use that the gloves are still retaining their protective properties. It should be noted that the time to breakthrough for any glove material may be different for different glove manufacturers. In the case of mixtures, consisting of several substances, the protection time of the gloves cannot be accurately estimated.

Permeation level 6, Penetration level 3 following EN374, taking into consideration the exposure of chemicals given in chapter 3.

Body protection

Personal protective equipment for the body should be selected based on the task being performed and the risks involved and should be approved by a specialist before handling this product.

Other skin protection

Appropriate footwear and any additional skin protection measures should be selected based on the task being performed and the risks involved and should be approved by a specialist before handling this product.

Respiratory protection

No personal respiratory protective equipment normally required.

Use a properly fitted, air-purifying or air-fed respirator complying with an approved standard if a risk assessment indicates this is necessary. Respirator selection must be based on known or anticipated exposure levels, the hazards of the product and the safe working limits of the selected respirator.

**Environmental exposure controls:**

Emissions from ventilation or work process equipment should be checked to ensure they comply with the requirements of environmental protection legislation. In some cases, fume scrubbers, filters or engineering modifications to the process equipment will be necessary to reduce emissions to acceptable levels.

**SECTION 9: Physical and chemical properties****9.1. Information on basic physical and chemical properties**

Appearance

Physical state

Liquid.

Colour

Transparent.

Odour

Alcohol.

Odour threshold

Not available.

pH

Not available.

Melting point/freezing point

Not available.

Initial boiling point and boiling range

&gt; 35 °C.

Flash point

From 21 °C to 25 °C.

Evaporation rate

Not available.

Flammability (solid, gas)

Not applicable.

Upper/lower flammability or explosive limits

Not available.

Vapour pressure

Not available.

Vapour density

Not available.

Relative density

Not available.

Solubility(ies)

Soluble in water.

Partition coefficient: n-octanol/water

Not available.

Auto-ignition temperature

Not available.

Decomposition temperature

Not available.

Viscosity

Not available.



Explosive properties	The product is flammable.
Oxidising properties	Not available.
Explosion temperature limits	Not available.
Explosion concentration limits	Not available.
<b>9.2. Other information</b>	Not available.

**SECTION 10: Stability and reactivity****10.1. Reactivity**

No known reactions according to our database.

**10.2. Chemical stability**

Stable under recommended storage conditions.

**10.3. Possibility of hazardous reactions**

Under normal conditions of storage and use, hazardous reactions will not occur.  
Vapours may form explosive mixture with air.

**10.4. Conditions to avoid**

Heat, sparks, open flame, electrical discharge.

**10.5. Incompatible materials**

Reactive or incompatible materials are not known according to our database.

**10.6. Hazardous decomposition products**

Under normal conditions of storage and use, hazardous decomposition products should not be produced.

**SECTION 11: Toxicological information****11.1. Information on toxicological effects****Acute toxicity of substance:** Substance is not classified.

	Result	Species	Dose	Note
Ethanol	LD50 oral	Rats	10470 mg/kg bw	
	LC50 inhal.	Rats	124.7 mg/L air	
	LD50 dermal	Rabbits	> 20000 mL/kg bw	

**Irritation/ Corrosion:** Eye Irrit. 2, H319

Ethanol	Dermal: Not irritating. Eyes: Not irritating.
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**Sensitisation:** Substance is not classified.

Ethanol	Skin: Not sensitizing. Respiratory: No known effect according to our database.
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**Repeated dose toxicity:** Substance is not classified.

Ethanol	LOEC (Oral): 4 other: ml/Kg of pure ethanol. NOAEC (Inhal.): >= 6130 ppm.
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**Mutagenicity:** Substance is not classified.

Ethanol	No known effect according to our database.
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**Carcinogenicity:** Substance is not classified.

Ethanol	NOAEC: >= 1.3 mg/L air.
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**Toxicity for reproduction:** Substance is not classified.

Ethanol	NOAEL (parental): > 16000 ppm.
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**Specific target organ toxicity. Single / repeated exposure:** Substance is not classified.

Ethanol	No known effect according to our database.
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**Aspiration hazard:** Substance is not classified.

Ethanol	No known effect according to our database.
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**Potential acute health effects**

Inhalation:	May cause respiratory and nasal irritation.
Skin contact:	Skin irritation is unlikely.
Eye contact:	Strong but transient eye irritation is possible.
Ingestion:	May cause central nervous system depression. Inhalation of vomited mass may cause lung damage.

**Symptoms related to the physical, chemical and toxicological characteristics**

Inhalation:	Adverse symptoms may include the following: respiratory tract irritation, coughing, shortness of breath.
Skin contact:	Adverse symptoms may include the following: light irritation, redness.
Eye contact:	Adverse symptoms may include the following: irritation, watering, redness.
Ingestion:	Adverse symptoms may include the following: stomach pains, nausea, headache, dizziness and intoxication.

**Delayed and immediate effects and also chronic effects from short and long term exposure****Short term exposure:**

Potential immediate effects: Not available.

Potential delayed effects: Not available.

**Long term exposure:**

Potential immediate effects: Not available.

Potential delayed effects: Not available.

**Potential chronic health effects:**

Conclusion/Summary: Not available.

General: No known significant effects or critical hazards.

Carcinogenicity: No known significant effects or critical hazards.

Mutagenicity: No known significant effects or critical hazards.

Teratogenicity: No known significant effects or critical hazards.

Developmental effects: No known significant effects or critical hazards.

Fertility effects: No known significant effects or critical hazards.

**11.2. Other information**

Not available.

**SECTION 12: Ecological information****12.1. Toxicity****Substance is not classified.**

Ethanol	Short-term toxicity to fish: LC50, 96 h: 14.2 g/L. Long-term toxicity to fish: NOEC, 24 d: > 1 mg/L. Short-term toxicity to aquatic invertebrates: LC50, 48 h: 5012 mg/L. Long-term toxicity to aquatic invertebrates: LC50, 2d: 9248 mg/L. Toxicity to aquatic algae and cyanobacteria: EC50, 96 h: 2400 other: ppm. Toxicity to microorganisms: EC50, 4 h: 5.8 g/L.
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**12.2. Persistence and degradability**

Ethanol	Readily biodegradable. O <sub>2</sub> consumption, 28 d: ca. 74%. COD: 1.99 g O <sub>2</sub> /g test mat.
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**12.3. Bioaccumulative potential**

Ethanol	BCF: 5 mg/L.
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**12.4. Mobility in soil**

Not available.

**12.5. Results of PBT and vPvB assessment**

Product (and ingredients) does not meet the criteria for PBT or vPvB in accordance with Annex XIII of REACH (Regulation (EC) No 1907/2006).

**12.6. Other adverse effects**

No known significant effects or critical hazards.

**SECTION 13: Disposal considerations****13.1. Waste treatment methods****Product:**

Methods of disposal: Waste must be disposed of in accordance with federal, state and local environmental control regulations. Avoid dispersal of spilled material and runoff and contact with soil, waterways, drains and sewers.

Hazardous waste: Within the present knowledge of the supplier, this product is regarded as hazardous waste, as defined by EU Directive 91/689/EEC.

European waste catalogue (EWC): According to the European Waste Catalogue, Waste Codes are not product specific, but application specific. Waste codes should be assigned by the user based on the application for which the product was used.

In general waste code for ethanol: **14 06 03\***: other solvents and solvent mixtures.

The following code(s) might be applicable as well:

**16:** WASTES NOT OTHERWISE SPECIFIED IN THE LIST:**16 03 05\***: organic wastes containing dangerous substances**Packaging:**

Methods of disposal: The generation of waste should be avoided or minimized wherever possible. Waste packaging should be recycled. Can be added to general waste collection after completely emptying. Incineration or landfill should only be considered when recycling is not feasible.

Within the present knowledge of the supplier, packaging is not regarded as hazardous waste, as





## SAFETY DATA SHEET

Conforms to Regulation (EC) No. 1907/2006 (REACH), Annex II - Europe

Nordic Clean alcohol hand disinfectant





Version : 01

Date of issue : 03/04/2020

European waste catalogue (EWC): defined by EU Directive 91/689/EEC.  
 Package: 20 01 39: Plastics.

**SECTION 14: Transport information**

This preparation is classified as dangerous according to international transport regulations (ADR/RID, IMDG or ICAO/IATA).

	ADR/RID	ADN	IMDG	IATA
14.1. UN number	1170	1170	1170	1170
14.2. UN proper shipping name	ETHANOL	ETHANOL	ETHANOL	ETHANOL
14.3. Transport hazard class(es)	 3	 3	 3	 3
14.4. Packing group	II	II	II	II
14.5. Environmental hazards	None	None	None	None
14.6. Special precautions for user	<i>Special provisions:</i> 144 601	None	None	None
14.7. Transport in bulk according to Annex II of MARPOL73/78 and the IBC Code	Not applicable.			

**SECTION 15: Regulatory information****15.1. Safety, health and environmental regulations/legislation specific for the substance or mixture**

REGULATION (EU) No 528/2012 OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL of 22 May 2012 concerning the placing on the market and use of biocidal products.

REGULATION (EC) No 1272/2008 OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL of 16 December 2008 on classification, labelling and packaging of substances and mixtures.

REGULATION (EC) No 648/2004 OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL of 31 March 2004 on detergents.

ADR - the European Agreement concerning the International Carriage of Dangerous Goods by Road, concluded at Geneva on 30 September 1957, as amended.

RID - the Regulations concerning the International Carriage of Dangerous Goods by Rail, appearing as Appendix C to the Convention concerning International Carriage by Rail (COTIF) concluded at Vilnius on 3 June 1999, as amended.

ADN - the European Agreement concerning the International Carriage of Dangerous Goods by Inland Waterways concluded at Geneva on 26 May 2000, as amended.

IMDG Code - International Maritime Dangerous Goods Code.

IATA/ICAO: ICAO - International Civil Aviation Organization. IATA - International Air Transport Association.

MARPOL 73/78 - International Convention for the Prevention of Pollution from Ships, 1973 as modified by the Protocol of 1978.

REGULATION (EC) No 1907/2006 OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL of 18 December 2006 concerning the Registration, Evaluation, Authorisation and Restriction of Chemicals (REACH):

**Annex XIV - List of substances subject to authorization:** Substances of very high concern: None of the components are listed.

**Annex XVII - Restrictions on the manufacture, placing on the market and use of certain dangerous substances, mixtures and articles:** Not applicable.

**15.2. Chemical safety assessment**

Chemical Safety Assessment following regulation 1907/2006/EC: This product contains substances for which Chemical Safety Assessments are still required.

**SECTION 16: Other information**

Abbreviations and acronyms:



**SAFETY DATA SHEET**

Conforms to Regulation (EC) No. 1907/2006 (REACH), Annex II - Europe

Nordic Clean alcohol hand disinfectant

Version : 01

Date of issue : 03/04/2020

CLP: Classification, Labelling and Packaging Regulation [Regulation (EC) No.1272/2008]  
ADR: The European Agreement concerning the International Carriage of Dangerous Goods by Road  
RID: International Rule for Transport of Dangerous Substances by Railway  
IMDG: International Maritime Code for Dangerous Goods  
IATA: International Air Transport Association  
CAS: Chemical Abstracts Service  
EINECS: European Inventory of Existing Commercial chemical Substances  
LC50: Median lethal concentration  
LD50: Median lethal dose  
REACH: Registration, Evaluation and Authorisation of Chemicals  
PBT: Persistent, bio-accumulative and toxic  
vPvB: Very persistent, very bio-accumulative  
bw: Body weight.

**Full text of classifications and H statements [CLP/GHS]:**

Flam. Liq. 2, Flammable liquids, Hazard Category 2;  
H225 Highly flammable liquid and vapour.  
Ox. Liq. 1, Oxidising Liquids, Hazard Category 1;  
H271 May cause fire or explosion; strong oxidiser.  
Ox. Liq. 2, Oxidising Liquids, Hazard Category 2;  
H272 May intensify fire; oxidiser.  
Acute Tox. 4, Acute toxicity (oral), Hazard Category 4;  
H302 Harmful if swallowed.  
Skin Corr. 1A, Skin corrosion/ irritation, Hazard Category 1A;  
H314 Causes severe skin burns and eye damage.  
Skin Corr. 1B, Skin corrosion/ irritation, Hazard Category 1B;  
H314 Causes severe skin burns and eye damage.  
Skin Irrit. 2, Skin corrosion/ irritation, Hazard Category 2;  
H315 Causes skin irritation.  
Eye Dam. 1, Serious eye damage/eye irritation, Hazard Category 1;  
H318 Causes serious eye damage.  
Eye Irrit. 2, Serious eye damage/eye irritation, Hazard Category 2;  
H319 Causes serious eye irritation.  
Acute Tox. 4, Acute toxicity (inhal.), Hazard Category 4;  
H332 Harmful if inhaled.  
STOT SE 3, Specific target organ toxicity — Single exposure, Hazard Category 3, Respiratory tract irritation;  
H335 May cause respiratory irritation.

**Classification method:**

Flam. Liq. 2, H225 -> Expert judgment based on literature data on flash points of ethanol solutions (Bridging principle - Interpolation within a single hazard category).

**Training advice:**

In addition to health, safety and environmental training programs for their workers, companies must ensure that workers read, understand and apply the requirements of this SDS.

**DISCLAIMER OF LIABILITY:**

The information in this MSDS was obtained from sources which we believe are reliable. However, the information is provided without any warranty, express or implied, regarding its correctness. The conditions or method of handling, storage, use or disposal of the product are beyond our control and may be beyond our knowledge. For this and other reasons, we do not assume responsibility and expressly disclaim liability for loss, damage or expense arising out of or in any way connected with the handling, storage, use or disposal of the product. This MSDS/SDS was prepared and is to be used only for this product. If the product is used as a component in another product, this MSDS/SDS information may not be applicable.

**END OF SAFETY DATA SHEET**