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

1.1 Product identifier
- Product name: TALON HUOLTOPESU
- Product description: Detergent.

1.2 Relevant identified uses of the substance or mixture and uses advised against
- Recommended use: Cleaning

1.3 Details of the supplier of the safety data sheet
- Manufacturer or Distributor: Tikkurila Oyj
  - P.O. Box 53
  - FI-01301 VANTAA
  - FINLAND
  - Telephone: +358 20 191 2000
  - e-mail address of person responsible for this SDS: productsafety@tikkurila.com

1.4 Emergency telephone number
- Supplier or Manufacturer
  - Telephone number: 112 (24h)
  - Telephone number: +358 20 191 2000 (GMT +2) Mon-Fri 8-16

SECTION 2: Hazards identification

2.1 Classification of the substance or mixture
- Product definition: Mixture
- Classification according to Regulation (EC) No. 1272/2008 [CLP/GHS]
  - Flam. Liq. 3, H226
  - Eye Irrit. 2, H319
- The product is classified as hazardous according to Regulation (EC) 1272/2008 as amended.

2.2 Label elements
- Hazard pictograms:
- Signal word: Warning
- Hazard statements:
  - H226 - Flammable liquid and vapor.
  - H319 - Causes serious eye irritation.
- Precautionary statements
  - General:
    - P102 - Keep out of reach of children.
    - P101 - If medical advice is needed, have product container or label at hand.
**Date of issue/Date of revision**: 19.04.2017  
**Date of previous issue**: 27.12.2016

### Prevention
- P261 - Avoid breathing vapor.
- P280 - Wear protective gloves.
- P284 - In case of inadequate ventilation wear respiratory protection.
- P210 - Keep away from sparks and open flames. - No smoking.

### Response
- P305 + P351 - IF IN EYES: Rinse cautiously with water for several minutes.

### Storage
- Not applicable.

### Disposal
- Not applicable.

### Supplemental label elements
- Not applicable.

**EU Detergents Regulation**
- 5% or over but less than 15%: non-ionic surfactants.
- less than 5%: anionic surfactants, phosphates.

### 2.3 Other hazards
**Other hazards which do not result in classification**: None known.

### SECTION 3: Composition/information on ingredients

#### 3.2 Mixtures

<table>
<thead>
<tr>
<th>Product/ingredient name</th>
<th>Identifiers</th>
<th>%</th>
<th>Classification</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>Alcohols, C12-14, ethoxylated</td>
<td>REACH #: 01-2119487984-16 EC: 500-213-3 CAS: 68439-50-9</td>
<td>&lt;10</td>
<td>Acute Tox. 4, H302 Eye Dam. 1, H318 Aquatic Chronic 3, H412</td>
<td>-</td>
</tr>
<tr>
<td>Tetrapotassium pyrophosphate</td>
<td>REACH #: 01-2119489369-18 EC: 230-785-7 CAS: 7320-34-5</td>
<td>≤5</td>
<td>Eye Irrit. 2, H319</td>
<td>-</td>
</tr>
<tr>
<td>Alcohols, C12-14, ethoxylated, sulfates, sodium salts</td>
<td>REACH #: 01-2119488639-16 EC: 500-234-8 CAS: 68891-38-3</td>
<td>≤5</td>
<td>Skin Irrit. 2, H315 Eye Irrit. 2, H319</td>
<td>-</td>
</tr>
<tr>
<td>Ethanol</td>
<td>REACH #: 01-2119457610-43 EC: 200-578-6 CAS: 64-17-5 Index: 603-000-00-5</td>
<td>≤5</td>
<td>Flam. Liq. 2, H225</td>
<td>-</td>
</tr>
<tr>
<td>Isopropanol</td>
<td>REACH #: 01-2119457558-25 EC: 200-661-7 CAS: 67-63-0</td>
<td>≤3</td>
<td>Flam. Liq. 2, H225 Eye Irrit. 2, H319 STOT SE 3, H336 See Section 16 for the full text of the H statements declared above.</td>
<td>-</td>
</tr>
</tbody>
</table>

| Alcohols, C12-14, ethoxylated | Eye Dam. 1 > 10 (SCL) |
There are no additional ingredients present which, within the current knowledge of the supplier, are classified and contribute to the classification of the substance and hence require reporting in this section.

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, are PBTs or vPvBs or have been assigned a workplace exposure limit and hence require reporting in this section.

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

Notes, if applicable, refer to Notes given in Annex VI of 1272/2008/EC.
### Ingredient list

<table>
<thead>
<tr>
<th>Ingredient name</th>
<th>INCI Name</th>
<th>CAS #</th>
<th>Class of constituent</th>
<th>Concentration</th>
</tr>
</thead>
<tbody>
<tr>
<td>alcohols, C12-14, ethoxylated</td>
<td>68439-50-9</td>
<td>non-ionic surfactants</td>
<td>5% or over but less than 15%</td>
<td></td>
</tr>
<tr>
<td>alcohols, C12-14, ethoxylated, sulfates, sodium salts</td>
<td>68891-38-3</td>
<td>anionic surfactants</td>
<td>less than 5%</td>
<td></td>
</tr>
<tr>
<td>Amides, coco, N,N-bis (hydroxyethyl)</td>
<td>COCAMIDE DEA</td>
<td>68603-42-9</td>
<td>anionic surfactants</td>
<td>less than 5%</td>
</tr>
<tr>
<td>tetrapotassium pyrophosphate</td>
<td>TETRAPOTASSIUM PYROPHOSPHATE</td>
<td>7320-34-5</td>
<td>phosphates</td>
<td>less than 5%</td>
</tr>
</tbody>
</table>

### SECTION 4: First aid measures

#### 4.1 Description of first aid measures

**General**
In all cases of doubt, or when symptoms persist, seek medical attention. Show this safety data sheet or label to the doctor if possible.

**Eye contact**
Check for and remove any contact lenses. Immediately flush eyes with plenty of lukewarm water, keeping eyelids open. Continue to rinse for at least 15 minutes. Get medical attention if symptoms occur.

**Inhalation**
Remove to fresh air. Keep person warm and at rest. If not breathing, if breathing is irregular or if respiratory arrest occurs, provide artificial respiration or oxygen by trained personnel. Get medical attention.

**Skin contact**
Remove contaminated clothing and shoes. Wash skin thoroughly with soap and water or use recognized skin cleanser. Do NOT use solvents or thinners.

**Ingestion**
If accidentally swallowed rinse the mouth with plenty of water (only if the person is conscious) and obtain immediate medical attention. Remove to fresh air and keep at rest in a position comfortable for breathing. Do NOT induce vomiting.

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

Causes serious eye irritation. Inhalation of vapours may cause dizziness, headache and nausea. See Section 11 for more detailed information on health effects and symptoms.

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

None.

### SECTION 5: Firefighting measures

#### 5.1 Extinguishing media

**Suitable extinguishing media**
Use an extinguishing agent suitable for the surrounding fire. Recommended: Alcohol resistant foam, CO₂, powders or water spray/mist.

**Unsuitable extinguishing media**
Do not use a direct water jet that could spread the fire.

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

**Hazards from the substance or mixture**
Flammable liquid and vapor. Fire will produce dense black smoke. Exposure to decomposition products may cause a health hazard. The vapor/gas is heavier than air and will spread along the ground. Vapors may accumulate in low or confined areas or travel a considerable distance to a source of ignition and flash back. Runoff to sewer may create fire or explosion hazard.

**Hazardous combustion products**
When exposed to high temperatures, hazardous decomposition products may be produced, such as carbon monoxide and dioxide, smoke, oxides of nitrogen etc.

#### 5.3 Advice for firefighters

**Special protective actions for fire-fighters**
Move containers from fire area if this can be done without risk. Use water spray to keep fire-exposed containers cool. Do not release runoff from fire to drains or watercourses.
Special protective equipment for fire-fighters: Fire-fighters should wear appropriate protective equipment and self-contained breathing apparatus (SCBA) with a full face-piece operated in positive pressure mode.

SECTION 6: Accidental release measures

6.1 Personal precautions, protective equipment and emergency procedures: Provide adequate ventilation. Avoid breathing vapor or mist. Avoid direct skin contact with product. See Section 8 for information on appropriate personal protective equipment.

6.2 Environmental precautions: Undiluted product is not allowed to enter drains or watercourses.

6.3 Methods and materials for containment and cleaning up: 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. Preferably clean with water or detergent. Avoid using solvents.

6.4 Reference to other sections: See Section 1 for emergency contact information. See Section 13 for additional waste treatment information.

SECTION 7: Handling and storage

7.1 Precautions for safe handling: Vapors are heavier than air and may spread along floors. Vapors may form explosive mixtures with air. Prevent the creation of flammable or explosive concentrations of vapors in air and avoid vapor concentrations higher than the occupational exposure limits. Isolate from sources of heat, sparks and open flame. In addition, the product should only be used in areas from which all naked lights and other sources of ignition have been excluded. Electrical equipment should be protected to the appropriate standard. Mixture may charge electrostatically: always use earthing leads when transferring from one container to another. No sparking tools should be used. Avoid contact with skin and eyes. Avoid breathing vapor. Avoid inhalation of dust from sanding. Wear appropriate respirator when ventilation is inadequate. See Section 8 for information on appropriate personal protective equipment. Eating, drinking and smoking should be prohibited in areas where this material is handled and stored. Wash hands before breaks and immediately after handling the product.

7.2 Conditions for safe storage, including any incompatibilities: 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. No smoking. Store and use away from heat, sparks, open flame or any other ignition source. Keep container tightly closed. Containers that have been opened must be carefully resealed and kept upright to prevent leakage. Recommended storage temperature is +5°C ... +25°C. Do not allow to freeze. Store in accordance with local regulations.

7.3 Specific end use(s): None.

SECTION 8: Exposure controls/personal protection

8.1 Control parameters

Occupational exposure limits: No exposure limit value known.

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.

DNELs/DMELs: No DNELs/DMELs available.
PNECs: No PNECs available.
8.2 Exposure controls

Appropriate engineering controls

Provide adequate ventilation. Where reasonably practicable, this should be achieved by the use of local exhaust ventilation and good general extraction. Use explosion-proof ventilation equipment. If these are not sufficient to maintain concentrations of particulates and solvent vapors below the OEL, suitable respiratory protection must be worn (see Personal protection). Comply with the health and safety at work laws.

Individual protection measures

Eye/face protection : Use safety eyewear designed to protect against splash of liquids (EN166).

Hand protection : Wear protective gloves. Gloves should be replaced regularly and if there is any sign of damage to the glove material. The instructions and information provided by the glove manufacturer on use, storage, maintenance and replacement must be followed.

Recommended glove material (EN374):

< 1 hour (breakthrough time): nitrile rubber
4 - 8 hours (breakthrough time): butyl rubber
> 8 hours (breakthrough time): laminated foil

Not recommended: PVA gloves

Skin protection : Wear suitable protective clothing. This product is classified as flammable. If necessary, personnel should wear antistatic clothing made of natural fibers or of high-temperature-resistant synthetic fibers.

Respiratory protection : If ventilation is inadequate, use respirator that will protect against organic vapor and dust/ mist. Wear a half mask or full face respirator with gas and vapor filter A and dust filter P2 during sanding (EN140:1998, EN405:2001). During continuous and long-term work the use of motor-driven or air-fed respirators is recommended (EN12941:1998). Be sure to use an approved/certified respirator or equivalent. Check that mask fits tightly and change filter regularly.

SECTION 9: Physical and chemical properties

9.1 Information on basic physical and chemical properties

Appearance

Physical state : Liquid.
Color : Clear.
Odor : Mild.
Odor threshold : Not relevant for the hazard assessment of the product.
pH : 10,5
Melting point/freezing point : -114°C (ethanol)
Initial boiling point and boiling range : 78,29°C (ethanol)
Flash point : Closed cup: 50°C
Evaporation rate : 1,7 (butyl acetate = 1) (ethanol)
Flammability (solid, gas) : Not applicable. Product is a liquid.
Upper/lower flammability or explosive limits : Lower: 3,3% (ethanol)
 : Upper: 19% (ethanol)
Vapor pressure : 5,7 kPa [room temperature] (ethanol)
Vapor density : 1,6 (ethanol)
Density : 1 g/cm³
Solubility(ies) : Miscible in water.
Partition coefficient: n-octanol/ water : Not available.
Auto-ignition temperature : 455°C (ethanol)
Decomposition temperature : Not relevant for the hazard assessment of the product.
Viscosity : 9 s [ISO 6mm cup]
Explosive properties : No explosive ingredients present.
Oxidizing properties : No oxidizing ingredients present.
9.2 Other information
No additional information.

SECTION 10: Stability and reactivity

10.1 Reactivity
: See Section 10.5.

10.2 Chemical stability
: Stable under recommended storage and handling conditions (see Section 7).

10.3 Possibility of hazardous reactions
: May present an explosion hazard when material is suspended in air in confined areas or equipment and subjected to spark, heat or flame.

10.4 Conditions to avoid
: Avoid extreme heat and freezing. Avoid all possible sources of ignition (spark or flame).

10.5 Incompatible materials
: Keep away from the following materials to prevent strong exothermic reactions:
- oxidizing agents
- strong acids
- strong alkalis

10.6 Hazardous decomposition products
: When exposed to high temperatures, hazardous decomposition products may be produced, such as carbon monoxide and dioxide, smoke, oxides of nitrogen etc.

SECTION 11: Toxicological information

11.1 Information on toxicological effects
There is no testdata available on the product itself.
The product is classified as hazardous according to Regulation (EC) 1272/2008 as amended.
Long term exposure by inhalation may cause respiratory tract irritation. Prolonged or repeated contact can defat the skin and lead to irritation, cracking and/or dermatitis.

Acute toxicity

<table>
<thead>
<tr>
<th>Product/ingredient name</th>
<th>Result</th>
<th>Species</th>
<th>Dose</th>
<th>Exposure</th>
</tr>
</thead>
<tbody>
<tr>
<td>alcohols, C12-14, ethoxylated</td>
<td>LD50 Oral</td>
<td>Rat</td>
<td>300 to 2000 mg/kg</td>
<td>-</td>
</tr>
</tbody>
</table>

Not classified.

Irritation/Corrosion
Causes serious eye irritation.

Sensitization
Not classified.

Mutagenicity
Not classified.

Carcinogenicity
Not classified.

Reproductive toxicity
Not classified.

Teratogenicity
Not classified.

Specific target organ toxicity (single exposure)
Not classified.

Specific target organ toxicity (repeated exposure)
Not classified.

Aspiration hazard
Not classified.
**SECTION 12: Ecological information**

Ecological testing has not been conducted on this product. Do not allow undiluted product to enter drains, water courses or soil.

The product is not classified as environmentally hazardous according to Regulation (EC) 1272/2008. The surfactants contained in this mixture comply with the biodegradability criteria as laid down in Regulation (EC) No. 648/2004 on detergents.

### 12.1 Toxicity

<table>
<thead>
<tr>
<th>Product/ingredient name</th>
<th>Result</th>
<th>Species</th>
<th>Exposure</th>
</tr>
</thead>
<tbody>
<tr>
<td>Alcohols, C12-14, ethoxylated</td>
<td>EC10 &gt;0,1 mg/l</td>
<td>Algae</td>
<td>72 hours</td>
</tr>
<tr>
<td></td>
<td>EC50 &gt;1 mg/l</td>
<td>Algae</td>
<td>72 hours</td>
</tr>
<tr>
<td></td>
<td>EC50 &gt;1 mg/l</td>
<td>Daphnia</td>
<td>48 hours</td>
</tr>
<tr>
<td></td>
<td>LC50 &gt;1 mg/l</td>
<td>Fish</td>
<td>96 hours</td>
</tr>
<tr>
<td></td>
<td>EC50 7,4 mg/l</td>
<td>Daphnia</td>
<td>48 hours</td>
</tr>
<tr>
<td></td>
<td>IC50 10 mg/l</td>
<td>Algae</td>
<td>72 hours</td>
</tr>
<tr>
<td></td>
<td>LC50 7,1 mg/l</td>
<td>Fish</td>
<td>96 hours</td>
</tr>
</tbody>
</table>

### 12.2 Persistence and degradability

<table>
<thead>
<tr>
<th>Product/ingredient name</th>
<th>Test</th>
<th>Result</th>
<th>Dose</th>
<th>Inoculum</th>
</tr>
</thead>
<tbody>
<tr>
<td>alcohols, C12-14, ethoxylated</td>
<td>OECD 301B</td>
<td>&gt;60 % - Readily - 28 days</td>
<td>-</td>
<td>-</td>
</tr>
</tbody>
</table>

### 12.3 Bioaccumulative potential

<table>
<thead>
<tr>
<th>Product/ingredient name</th>
<th>LogP&lt;sub&gt;ow&lt;/sub&gt;</th>
<th>Bioconcentration factor [BCF]</th>
<th>Potential</th>
</tr>
</thead>
<tbody>
<tr>
<td>Alcohols, C12-14, ethoxylated, sulfates, sodium salts</td>
<td>0,3</td>
<td>-</td>
<td>low</td>
</tr>
<tr>
<td>Isopropanol</td>
<td>0,05</td>
<td>-</td>
<td>low</td>
</tr>
<tr>
<td>Ethanol</td>
<td>-0,35</td>
<td>-</td>
<td>low</td>
</tr>
</tbody>
</table>

### 12.4 Mobility in soil

Biodegradability report: Not available.
Soil/water partition coefficient (K_{ow}) : Not available.

Mobility : Not available.

12.5 Results of PBT and vPvB assessment

PBT : Not applicable.
vPvB : Not applicable.

12.6 Other adverse effects : Not available.

SECTION 13: Disposal considerations

13.1 Waste treatment methods

Product

Methods of disposal : Remove as much product as possible from the tools before cleaning. Undiluted liquid residue must not be emptied into drains or sewage system, but handled in accordance with national regulations. Product residues should be left at special companies which have permission for gathering this kind of wastes.

European waste catalogue (EWC)

<table>
<thead>
<tr>
<th>Waste code</th>
<th>Waste designation</th>
</tr>
</thead>
<tbody>
<tr>
<td>20 01 29*</td>
<td>detergents containing hazardous substances</td>
</tr>
</tbody>
</table>

If this product is mixed with other wastes, the original waste product code may no longer apply and the appropriate code should be assigned. For further information, contact your local waste authority.

Packaging

Methods of disposal : Empty packaging should be recycled or disposed of in accordance with national regulations.

Special precautions : No additional information.

SECTION 14: Transport information

<table>
<thead>
<tr>
<th>ADR/RID</th>
<th>IMDG</th>
<th>IATA</th>
</tr>
</thead>
<tbody>
<tr>
<td>14.1 UN number</td>
<td>UN1993</td>
<td>UN1993</td>
</tr>
<tr>
<td>14.2 UN proper shipping name</td>
<td>FLAMMABLE LIQUID, N.O.S. (ethanol, Isopropyl alcohol)</td>
<td>FLAMMABLE LIQUID, N.O.S. (ethanol, Isopropyl alcohol)</td>
</tr>
<tr>
<td>14.3 Transport hazard class(es)</td>
<td>3</td>
<td>3</td>
</tr>
<tr>
<td>14.4 Packing group</td>
<td>III</td>
<td>III</td>
</tr>
<tr>
<td>14.5 Environmental hazards</td>
<td>No.</td>
<td>No.</td>
</tr>
<tr>
<td>Additional information</td>
<td>Special provisions 640 (E)</td>
<td>Emergency schedules (EmS) F-E,S-E</td>
</tr>
<tr>
<td>Tunnel code</td>
<td>(D/E)</td>
<td></td>
</tr>
</tbody>
</table>

14.6 Special precautions for user : Transport within user's premises: always transport in closed containers that are upright and secure. Ensure that persons transporting the product know what to do in the event of an accident or spillage.
14.7 Transport in bulk according to Annex II of MARPOL and the IBC Code : Not available.

SECTION 15: Regulatory information

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

- EU Regulation (EC) No. 1907/2006 (REACH)

Other EU regulations

- Europe inventory : All components are listed or exempted.

15.2 Chemical Safety Assessment : This product contains substances for which Chemical Safety Assessments are still required.

SECTION 16: Other information

Abbreviations and acronyms

- ATE = Acute Toxicity Estimate
- CLP = Classification, Labelling and Packaging Regulation [Regulation (EC) No. 1272/2008]
- DMEL = Derived Minimal Effect Level
- DNEL = Derived No Effect Level
- EUH statement = CLP-specific Hazard statement
- PBT = Persistent, Bioaccumulative and Toxic
- PNEC = Predicted No Effect Concentration
- RRN = REACH Registration Number
- vPvB = Very Persistent and Very Bioaccumulative

Procedure used to derive the classification according to Regulation (EC) No. 1272/2008 [CLP/GHS]

<table>
<thead>
<tr>
<th>Classification</th>
<th>Justification</th>
</tr>
</thead>
<tbody>
<tr>
<td>Flam. Liq. 3, H226</td>
<td>On basis of test data</td>
</tr>
<tr>
<td>Eye Irrit. 2, H319</td>
<td>Calculation method</td>
</tr>
</tbody>
</table>

Full text of abbreviated H statements

- H225 : Highly flammable liquid and vapor.
- H226 : Flammable liquid and vapor.
- H302 : Harmful if swallowed.
- H315 : Causes skin irritation.
- H318 : Causes serious eye damage.
- H319 : Causes serious eye irritation.
- H336 : May cause drowsiness or dizziness.
- H412 : Harmful to aquatic life with long lasting effects.

Full text of classifications [CLP/GHS]

- Acute Tox. 4, H302 : ACUTE TOXICITY (oral) - Category 4
- Aquatic Chronic 3, H412 : AQUATIC HAZARD (LONG-TERM) - Category 3
- Eye Dam. 1, H318 : SERIOUS EYE DAMAGE/ EYE IRRITATION - Category 1
- Eye Irrit. 2, H319 : SERIOUS EYE DAMAGE/ EYE IRRITATION - Category 2
- Flam. Liq. 2, H225 : FLAMMABLE LIQUIDS - Category 2
- Flam. Liq. 3, H226 : FLAMMABLE LIQUIDS - Category 3
- Skin Irrit. 2, H315 : SKIN CORROSION/IRRITATION - Category 2
- STOT SE 3, H336 : SPECIFIC TARGET ORGAN TOXICITY (SINGLE EXPOSURE) (Narcotic effects) - Category 3

Date of issue/Date of revision : 19-04-2017

Date of previous issue : 27-12-2016

Version : 1.02

Notice to reader

This Safety Data Sheet is prepared in accordance with Annex II to Regulation (EC) No 1907/2006 (REACH). The information contained in this Safety Data Sheet is based on the present state of knowledge and current EU and national legislation. It provides guidance on health, safety and environmental aspects of the product and should not be construed as any guarantee of technical performance or suitability for particular applications.