Safety Data Sheet

according to Regulation (EC) No 1907/2006

HIGTEC COOL SMU 2
Print date: 10.02.2017
Product code: 65061-998-00
Page 1 of 8

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

1.1. Product identifier
HIGTEC COOL SMU 2

1.2. Relevant identified uses of the substance or mixture and uses advised against
Use of the substance/mixture
Metallbearbeitungsprodukt, wassermischbar (Neat, metal working product, watermiscible)

1.3. Details of the supplier of the safety data sheet
Company name: ROWE MINERALOELWERK GMBH
Street: Langewann 101
Place: D-67547 Worms
Telephone: +49 (0)6241 5906-0
Fax: +49 (0)6241 5906-999
E-mail: info@rowe-mineraloel.com
Internet: www.rowe-mineraloel.com
Responsible Department: Kundenservice

1.4. Emergency telephone number
Giftnotruf Mainz (DE; E) +49 (0)6131-19240

SECTION 2: Hazards identification

2.1. Classification of the substance or mixture
Regulation (EC) No. 1272/2008
Hazard categories:
Skin corrosion/irritation: Skin Irrit. 2
Hazard Statements:
Causes skin irritation.

2.2. Label elements
Regulation (EC) No. 1272/2008
Signal word: Warning
Pictograms:

Hazard statements
H315 Causes skin irritation.

Precautionary statements
P101 If medical advice is needed, have product container or label at hand.
P102 Keep out of reach of children.
P280 Wear protective gloves/protective clothing/eye protection/face protection.
P302+P352 IF ON SKIN: Wash with plenty of water.
P332+P313 If skin irritation occurs: Get medical advice/attention.
P362+P364 Take off contaminated clothing and wash it before reuse.

2.3. Other hazards
No information available.

SECTION 3: Composition/information on ingredients

3.2. Mixtures
Hazardous components

<table>
<thead>
<tr>
<th>CAS No</th>
<th>Chemical name</th>
<th>Quantity</th>
</tr>
</thead>
<tbody>
<tr>
<td>68920-66-1</td>
<td>Alcohol, C16-18', ethoxylated</td>
<td>5 - &lt; 15 %</td>
</tr>
<tr>
<td>105-59-9</td>
<td>2,2'-(methylimino)diethanol, N-methylidiethanolamine</td>
<td>5 - &lt; 15 %</td>
</tr>
<tr>
<td>115-86-6</td>
<td>Triphenyl phosphate (&gt;5%)</td>
<td>&lt;0,5 %</td>
</tr>
<tr>
<td>55406-53-6</td>
<td>Iodine-propyl-butyl carbamate</td>
<td>&lt;0,2 %</td>
</tr>
<tr>
<td>122-99-6</td>
<td>2-phenoxethanol</td>
<td>&lt;0,2 %</td>
</tr>
</tbody>
</table>

Full text of H and EUH statements: see section 16.

SECTION 4: First aid measures

4.1. Description of first aid measures

After inhalation

Provide fresh air.

After contact with skin

After contact with skin, wash immediately with polyethylene glycol, followed by plenty of water. Take off immediately all contaminated clothing and wash it before reuse. If skin irritation occurs: Get medical advice/attention.

After contact with eyes

After contact with the eyes, rinse with water with the eyelids open for a sufficient length of time, then consult an ophthalmologist immediately.

After ingestion

Rinse mouth immediately and drink plenty of water.

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

Treat symptomatically.

SECTION 5: Firefighting measures

5.1. Extinguishing media

Suitable extinguishing media

Co-ordinate fire-fighting measures to the fire surroundings.

5.2. Special hazards arising from the substance or mixture

Non-flammable.
5.3. Advice for firefighters

Wear a self-contained breathing apparatus and chemical protective clothing. Full protection suit.

Additional information

Suppress gases/vapours/mists with water spray jet. Collect contaminated fire extinguishing water separately.
Do not allow entering drains or surface water.

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

Provide adequate ventilation. Do not breathe gas/fumes/vapour/spray. Avoid contact with skin, eyes and clothes. Use personal protection equipment.

6.2. Environmental precautions

Do not allow to enter into surface water or drains.

6.3. Methods and material for containment and cleaning up

Absorb with liquid-binding material (e.g. sand, diatomaceous earth, acid- or universal binding agents). Treat the recovered material as prescribed in the section on waste disposal.

6.4. Reference to other sections

Safe handling: see section 7
Personal protection equipment: see section 8
Disposal: see section 13

SECTION 7: Handling and storage

7.1. Precautions for safe handling

Advice on safe handling
No special measures are necessary.

Advice on protection against fire and explosion
No special fire protection measures are necessary.

Further information on handling
No special hazards known when the product is properly used and the precautionary measures indicated are observed.

7.2. Conditions for safe storage, including any incompatibilities

Requirements for storage rooms and vessels
Keep container tightly closed.

Advice on storage compatibility
No special measures are necessary.

7.3. Specific end use(s)

Metallbearbeitungsprodukt, wassermischbar (Neat, metal working product, watermiscible)

SECTION 8: Exposure controls/personal protection

8.1. Control parameters

Exposure limits (EH40)

<table>
<thead>
<tr>
<th>CAS No</th>
<th>Substance</th>
<th>ppm</th>
<th>mg/m³</th>
<th>fibres/ml</th>
<th>Category</th>
<th>Origin</th>
</tr>
</thead>
<tbody>
<tr>
<td>115-88-6</td>
<td>Triphenyl phosphate</td>
<td>-</td>
<td>3</td>
<td>-</td>
<td>TWA (8 h)</td>
<td>WEL</td>
</tr>
<tr>
<td></td>
<td></td>
<td>-</td>
<td>6</td>
<td>-</td>
<td>STEL (15 min)</td>
<td>WEL</td>
</tr>
</tbody>
</table>

8.2. Exposure controls
Protective and hygiene measures
Remove contaminated, saturated clothing immediately. Draw up and observe skin protection programme. Wash hands and face before breaks and after work and take a shower if necessary. When using do not eat or drink.

Eye/face protection
Wear eye/face protection.

Hand protection
When handling with chemical substances, protective gloves must be worn with the CE-label including the four control digits. The quality of the protective gloves resistant to chemicals must be chosen as a function of the specific working place concentration and quantity of hazardous substances. For special purposes, it is recommended to check the resistance to chemicals of the protective gloves mentioned above together with the supplier of these gloves. Protect skin by using skin protective cream.

Skin protection
Wear suitable protective clothing.

Respiratory protection
In case of inadequate ventilation wear respiratory protection.

SECTION 9: Physical and chemical properties

9.1. Information on basic physical and chemical properties

| Physical state: | liquid |
| Colour:         | red brown |
| Odour:          | characteristic |

| pH-Value (at 20 °C): | 10% in H₂O 9,2-9,4 DIN 51369 |

Test method

Changes in the physical state

Melting point: not determined
Initial boiling point and boiling range: not determined
Flash point: not determined

Flammability
Solid: not applicable
Gas: not applicable

Lower explosion limits: not determined
Upper explosion limits: not determined

Auto-ignition temperature
Solid: not applicable
Gas: not applicable

Decomposition temperature: not determined

Oxidizing properties
Not oxidizing.

Vapour pressure: not determined

Density (at 20 °C): 0,97-0,99 g/cm³ DIN 51757

Water solubility: easily soluble
### SECTION 10: Stability and reactivity

#### 10.1. Reactivity

No hazardous reaction when handled and stored according to provisions.

#### 10.2. Chemical stability

The product is stable under storage at normal ambient temperatures.

#### 10.3. Possibility of hazardous reactions

possible with strong oxidizing agents.

#### 10.4. Conditions to avoid

Oxidizing agents. Acid Alkalis (alkalis).

#### 10.5. Incompatible materials

No information available.

#### 10.6. Hazardous decomposition products

No known hazardous decomposition products.

### SECTION 11: Toxicological information

#### 11.1. Information on toxicological effects

**Acute toxicity**

<table>
<thead>
<tr>
<th>CAS No</th>
<th>Chemical name</th>
<th>Exposure route</th>
<th>Dose</th>
<th>Species</th>
<th>Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>105-59-9</td>
<td>2,2′-(methyleneimino)diethanol, N-methyl-diethanolamine</td>
<td>oral</td>
<td>LD50</td>
<td>4680 mg/kg</td>
<td>Rat</td>
</tr>
<tr>
<td>115-86-6</td>
<td>Triphenyl phosphate (&gt;5%)</td>
<td>oral</td>
<td>LD50</td>
<td>&gt;20000 mg/kg</td>
<td>Rat</td>
</tr>
<tr>
<td></td>
<td></td>
<td>dermal</td>
<td>LD50</td>
<td>&gt;10000 mg/kg</td>
<td></td>
</tr>
<tr>
<td>55406-53-6</td>
<td>Iodine-propylin-butyl carbamate</td>
<td>oral</td>
<td>LD50 mg/kg</td>
<td>300-500</td>
<td>Rat</td>
</tr>
<tr>
<td></td>
<td></td>
<td>dermal</td>
<td>LD50</td>
<td>5000 mg/kg</td>
<td>Rabbit</td>
</tr>
<tr>
<td></td>
<td></td>
<td>inhalative vapour</td>
<td>ATE</td>
<td>11 mg/l</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>inhalative aerosol</td>
<td>ATE</td>
<td>1,5 mg/l</td>
<td></td>
</tr>
<tr>
<td>122-99-6</td>
<td>2-Phenoxyethanol</td>
<td>oral</td>
<td>LD50</td>
<td>1850 mg/kg</td>
<td>Rat</td>
</tr>
<tr>
<td></td>
<td></td>
<td>dermal</td>
<td>LD50</td>
<td>&gt;2000 mg/kg</td>
<td>Rabbit</td>
</tr>
</tbody>
</table>

**Additional information on tests**

The mixture is classified as hazardous according to regulation (EC) No 1272/2008 [CLP].
### SECTION 12: Ecological information

#### 12.1. Toxicity

The product is not Ecotoxic.

<table>
<thead>
<tr>
<th>CAS No</th>
<th>Chemical name</th>
<th>Aquatic toxicity</th>
<th>Dose</th>
<th>h</th>
<th>Species</th>
<th>Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>105-59-9</td>
<td>2,2'-[(methylimino)diethanol, N-methyldiethanolamine</td>
<td>Acute fish toxicity</td>
<td>LC50</td>
<td>1000 - 2200 mg/l</td>
<td>96 h Leuciscus idus</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>Acute algae toxicity</td>
<td>ErC50</td>
<td>37 mg/l</td>
<td>72 h Desmodesmus subspicatus</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>Acute crustacea toxicity</td>
<td>EC50</td>
<td>233 mg/l</td>
<td>48 h Daphnia magna</td>
<td></td>
</tr>
<tr>
<td>115-86-6</td>
<td>Triphenyl phosphate (&gt;5%)</td>
<td>Acute fish toxicity</td>
<td>LC50</td>
<td>0,5 mg/l</td>
<td>96 h</td>
<td></td>
</tr>
<tr>
<td>55406-53-6</td>
<td>iodine-propynyl-butyl carbamate</td>
<td>Acute fish toxicity</td>
<td>LC50</td>
<td>0,067 mg/l</td>
<td>96 h Oncorhynchus mykiss (Rainbow trout)</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>Acute algae toxicity</td>
<td>ErC50</td>
<td>0,022 mg/l</td>
<td>72 h Desmodesmus subspicatus</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>Acute crustacea toxicity</td>
<td>EC50</td>
<td>0,16 mg/l</td>
<td>48 h Daphnia magna</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>Acute bacteria toxicity</td>
<td>(5000 mg/l)</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>122-99-6</td>
<td>2-phenoxyethanol</td>
<td>Acute fish toxicity</td>
<td>LC50</td>
<td>220 - 460 mg/l</td>
<td>96 h Leuciscus idus</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>Acute algae toxicity</td>
<td>ErC50</td>
<td>&gt; 500 mg/l</td>
<td>72 h Scenedesmus sp.</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>Acute crustacea toxicity</td>
<td>EC50</td>
<td>&gt; 500 mg/l</td>
<td>48 h Daphnia magna</td>
<td></td>
</tr>
</tbody>
</table>

#### 12.2. Persistence and degradability

No data available

<table>
<thead>
<tr>
<th>CAS No</th>
<th>Chemical name</th>
<th>Method</th>
<th>Value</th>
<th>d</th>
<th>Source</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td>Evaluation</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>55406-53-6</td>
<td>iodine-propynyl-butyl carbamate</td>
<td>OECD 301F</td>
<td>84%</td>
<td>28</td>
<td></td>
</tr>
</tbody>
</table>

#### 12.3. Bioaccumulative potential

No data available

Partition coefficient n-octanol/water

<table>
<thead>
<tr>
<th>CAS No</th>
<th>Chemical name</th>
<th>Log Pow</th>
</tr>
</thead>
<tbody>
<tr>
<td>105-59-9</td>
<td>2,2'-[(methylimino)diethanol, N-methyldiethanolamine</td>
<td>-1,08</td>
</tr>
<tr>
<td>122-99-6</td>
<td>2-phenoxyethanol</td>
<td>1,16</td>
</tr>
</tbody>
</table>

#### 12.4. Mobility in soil

No data available

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

No data available

#### 12.6. Other adverse effects

No data available

**Further information**

Do not allow to enter into surface water or drains. Do not allow to enter into soil/subsoil.
SECTION 13: Disposal considerations

13.1. Waste treatment methods

Advice on disposal
Do not allow to enter into surface water or drains. Do not allow to enter into soil/subsoil. Dispose of waste according to applicable legislation.

Waste disposal number of waste from residues-unused products
120109 WASTES FROM SHAPING AND PHYSICAL AND MECHANICAL SURFACE TREATMENT OF METALS AND PLASTICS; wastes from shaping and physical and mechanical surface treatment of metals and plastics; machining emulsions and solutions free of halogens
Classified as hazardous waste.

Waste disposal number of used product
120109 WASTES FROM SHAPING AND PHYSICAL AND MECHANICAL SURFACE TREATMENT OF METALS AND PLASTICS; wastes from shaping and physical and mechanical surface treatment of metals and plastics; machining emulsions and solutions free of halogens
Classified as hazardous waste.

Waste disposal number of contaminated packaging
120109 WASTES FROM SHAPING AND PHYSICAL AND MECHANICAL SURFACE TREATMENT OF METALS AND PLASTICS; wastes from shaping and physical and mechanical surface treatment of metals and plastics; machining emulsions and solutions free of halogens
Classified as hazardous waste.

Contaminated packaging
Non-contaminated packages may be recycled. Handle contaminated packages in the same way as the substance itself.

SECTION 14: Transport information

Land transport (ADR/RID)

14.1. UN number: No dangerous good in sense of this transport regulation.
14.2. UN proper shipping name: No dangerous good in sense of this transport regulation.
14.3. Transport hazard class(es): No dangerous good in sense of this transport regulation.
14.4. Packing group: No dangerous good in sense of this transport regulation.

Inland waterways transport (ADN)

14.1. UN number: No dangerous good in sense of this transport regulation.
14.2. UN proper shipping name: No dangerous good in sense of this transport regulation.
14.3. Transport hazard class(es): No dangerous good in sense of this transport regulation.
14.4. Packing group: No dangerous good in sense of this transport regulation.

Marine transport (IMDG)

14.1. UN number: No dangerous good in sense of this transport regulation.
14.2. UN proper shipping name: No dangerous good in sense of this transport regulation.
14.3. Transport hazard class(es): No dangerous good in sense of this transport regulation.
14.4. Packing group: No dangerous good in sense of this transport regulation.

Air transport (ICAO)

14.1. UN number: No dangerous good in sense of this transport regulation.
14.2. UN proper shipping name: No dangerous good in sense of this transport regulation.
14.3. Transport hazard class(es): No dangerous good in sense of this transport regulation.
14.4. Packing group: No dangerous good in sense of this transport regulation.

14.5. Environmental hazards
ENVIRONMENTALLY HAZARDOUS:  no

14.6. Special precautions for user
No dangerous good in sense of this transport regulation.

14.7. Transport in bulk according to Annex II of Marpol and the IBC Code
No dangerous good in sense of this transport regulation.

SECTION 15: Regulatory information

15.1. Safety, health and environmental regulations/legislation specific for the substance or mixture
EU regulatory information
2004/42/EC (VOC): 5,558 % (53,909 g/l)

National regulatory information
Employment restrictions: Observe restrictions to employment for juvenils according to the 'juvenile work protection guideline' (94/33/EC).

Water contaminating class (D): 2 - water contaminating

15.2. Chemical safety assessment
Chemical safety assessments for substances in this mixture were not carried out.

SECTION 16: Other information

Abbreviations and acronyms
ADR: Accord européen sur le transport des marchandises dangereuses par Route (European Agreement concerning the International Carriage of Dangerous Goods by Road)
IMDG: International Maritime Code for Dangerous Goods
IATA: International Air Transport Association
GHS: Globally Harmonized System of Classification and Labelling of Chemicals
EINECS: European Inventory of Existing Commercial Chemical Substances
ELINCS: European List of Notified Chemical Substances
CAS: Chemical Abstracts Service
LC50: Lethal concentration, 50%
LD50: Lethal dose, 50%

Relevant H and EUH statements (number and full text)
H302  Harmful if swallowed.
H315  Causes skin irritation.
H317  May cause an allergic skin reaction.
H318  Causes serious eye damage.
H319  Causes serious eye irritation.
H332  Harmful if inhaled.
H335  May cause respiratory irritation.
H400  Very toxic to aquatic life.
H411  Toxic to aquatic life with long lasting effects.

Further Information
The above information describes exclusively the safety requirements of the product and is based on our present-day knowledge. The information is intended to give you advice about the safe handling of the product named in this safety data sheet, for storage, processing, transport and disposal. The information cannot be transferred to other products. In the case of mixing the product with other products or in the case of processing, the information on this safety data sheet is not necessarily valid for the new made-up material.