Safety Data Sheet

according to Regulation (EC) No 1907/2006

CP-Synthofloor 8010 Part B

Revision date: 09.12.2019 Page 1 of 21

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

1.1. Product identifier
CP-Synthofloor 8010 Part B

1.2. Relevant identified uses of the substance or mixture and uses advised against

Use of the substance/mixture
- Coatings and paints, fillers, putties, thinners

Uses advised against
- No data available

1.3. Details of the supplier of the safety data sheet

Company name: Chesterton International GmbH
Street: Am Lenzenfleck 23
Place: DE-85737 Ismaning GERMANY
Telephone: +49 89 99 65 46 - 0
Fax: +49 89 99 65 46 - 50
e-mail: eu-sds@chesterton.com
Internet: www.chesterton.com
Responsible Department: +49(0) 551 - 1 92 40 (GIZ-Nord, 24h)

1.4. Emergency telephone number: +49(0) 551 - 1 92 40 (GIZ-Nord, 24h)

SECTION 2: Hazards identification

2.1. Classification of the substance or mixture

Regulation (EC) No. 1272/2008

Hazard categories:
- Acute toxicity: Acute Tox. 4
- Skin corrosion/irritation: Skin Corr. 1A
- Serious eye damage/eye irritation: Eye Dam. 1
- Respiratory or skin sensitisation: Skin Sens. 1
- Reproductive toxicity: Repr. 2
- Hazardous to the aquatic environment: Aquatic Chronic 2

Hazard Statements:
- Harmful if swallowed.
- Causes severe skin burns and eye damage.
- Causes serious eye damage.
- May cause an allergic skin reaction.
- Suspected of damaging fertility.
- Toxic to aquatic life with long lasting effects.

2.2. Label elements

Regulation (EC) No. 1272/2008
Safety Data Sheet

according to Regulation (EC) No 1907/2006

CP-Synthofloor 8010 Part B

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Hazard components for labelling
4-tert-butylphenol
3-aminomethyl-3,5,5-trimethylcyclohexylamine
m-phenylenbis(methylamine)
Trimethyl-1,6-hexanediamin, mixed isomers

Signal word: Danger

Pictograms:

Hazard statements
H302 Harmful if swallowed.
H314 Causes severe skin burns and eye damage.
H317 May cause an allergic skin reaction.
H361f Suspected of damaging fertility.
H411 Toxic to aquatic life with long lasting effects.

Precautionary statements
P260 Do not breathe dust/fume/gas/mist/vapours/spray.
P280 Wear protective gloves/protective clothing/eye protection/face protection.
P303+P361+P353 IF ON SKIN (or hair): Take off immediately all contaminated clothing. Rinse skin with water or shower.
P305+P351+P338 IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
P310 Immediately call a POISON CENTER/doctor.

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>98-54-4</td>
<td>4-tert-butylphenol</td>
<td>10 -&lt; 25 %</td>
</tr>
<tr>
<td>202-679-0</td>
<td>01-2119489419-21</td>
<td>10 -&lt; 25 %</td>
</tr>
<tr>
<td>2855-13-2</td>
<td>3-aminomethyl-3,5,5-trimethylcyclohexylamine</td>
<td>10 -&lt; 25 %</td>
</tr>
<tr>
<td>100-51-6</td>
<td>benzyl alcohol</td>
<td>10 -&lt; 25 %</td>
</tr>
<tr>
<td>1477-55-0</td>
<td>m-phenylenebis(methylamine)</td>
<td>10 -&lt; 25 %</td>
</tr>
<tr>
<td>25620-58-0</td>
<td>Trimethyl-1,6-hexanediamin, mixed isomers</td>
<td>5 -&lt; 10 %</td>
</tr>
<tr>
<td>15520-10-2</td>
<td>2-methylpentane-1,5-diamine</td>
<td>1 -&lt; 5 %</td>
</tr>
</tbody>
</table>

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

Further Information
No information available.

SECTION 4: First aid measures

4.1. Description of first aid measures

General information
Remove affected person from the danger area and lay down. In case of allergic symptoms, especially in the breathing area, seek medical advice immediately. In case of accident or unwellness, seek medical advice immediately (show directions for use or safety data sheet if possible).

After inhalation
In case of inhalation of decomposition products, affected person should be moved into fresh air and kept still. In case of accident or unwellness, seek medical advice immediately (show directions for use or safety data sheet if possible).
After contact with skin
After contact with skin, take off immediately all contaminated clothing, and wash immediately with plenty of water and soap. Immediate medical treatment required because corrosive injuries that are not treated are hard to cure.

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. Remove contact lenses, if present and easy to do. Continue rinsing. Immediately call a doctor.

After ingestion
If accidentally swallowed rinse the mouth with plenty of water (only if the person is conscious) and obtain immediate medical attention.
Do NOT induce vomiting.

4.2. Most important symptoms and effects, both acute and delayed
Causes severe skin burns and eye damage.
Allergic reactions
Gastrointestinal complaints

4.3. Indication of any immediate medical attention and special treatment needed
First Aid, decontamination, treatment of symptoms.

SECTION 5: Firefighting measures

5.1. Extinguishing media
Suitable extinguishing media
Dry extinguishing powder. Carbon dioxide (CO2). alcohol resistant foam. Water spray jet

Unsuitable extinguishing media
Full water jet

5.2. Special hazards arising from the substance or mixture
Carbon monoxide Carbon dioxide (CO2). Nitrogen oxides (NOx)

5.3. Advice for firefighters
Special protective equipment for firefighters Protective clothing. In case of fire: Wear self-contained breathing apparatus.

Additional information
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
See protective measures under point 7 and 8.
Provide adequate ventilation.
Personal protection equipment: see section 8
Remove persons to safety.

6.2. Environmental precautions
Do not allow to enter into surface water or drains. Cover drains. Adverse environmental effects
Clean contaminated articles and floor according to the environmental legislation. In case of gas escape or of
entry into waterways, soil or drains, inform the responsible authorities.

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
See protective measures under point 7 and 8.
Disposal: see section 13

SECTION 7: Handling and storage

7.1. Precautions for safe handling
Advice on safe handling
Wear personal protection equipment (refer to section 8).
Persons with a history of asthma, allergies, chronic or recurrent respiratory disease should not be exposed to any process in which this product is used. Persons with a history of skin sensitisation problems should not be employed in any process in which this product is used.

Avoid contact with skin, eyes and clothes. Avoid breathing dust/fume/gas/mist/vapours/spray. When using do not eat, drink or smoke.

Never use pressure to empty container. Keep/Store only in original container.

Do not allow to enter into surface water or drains.

Advice on protection against fire and explosion
Keep away from sources of heat (e.g. hot surfaces), sparks and open flames.

Further information on handling
Wash hands before breaks and after work. Used working clothes should not be worn outside the work area. Street clothing should be stored separately from work clothing.

7.2. Conditions for safe storage, including any incompatibilities
Requirements for storage rooms and vessels
Keep container tightly closed in a cool, well-ventilated place. Keep/Store only in original container. Protect against direct sunlight.

Hints on joint storage
Keep away from food, drink and animal feedingstuffs.

Further information on storage conditions
Keep away from:
Frost
Heat
Humidity

7.3. Specific end use(s)
No information available.

SECTION 8: Exposure controls/personal protection
8.1. Control parameters
### DNEL/DMEL values

<table>
<thead>
<tr>
<th>CAS No</th>
<th>Substance</th>
<th>Exposure route</th>
<th>Effect</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>98-54-4</td>
<td>4-tert-butylphenol</td>
<td>inhalation</td>
<td>systemic</td>
<td>0,5 mg/m³</td>
</tr>
<tr>
<td></td>
<td>Worker DNEL, long-term</td>
<td>dermal</td>
<td>systemic</td>
<td>0,071 mg/kg bw/day</td>
</tr>
<tr>
<td></td>
<td>Consumer DNEL, long-term</td>
<td>inhalation</td>
<td>systemic</td>
<td>0,09 mg/m³</td>
</tr>
<tr>
<td></td>
<td>Consumer DNEL, long-term</td>
<td>dermal</td>
<td>systemic</td>
<td>0,026 mg/kg bw/day</td>
</tr>
<tr>
<td>2855-13-2</td>
<td>3-aminomethyl-3,5,5-trimethylcyclohexylamine</td>
<td>inhalation</td>
<td>local</td>
<td>0,073 mg/m³</td>
</tr>
<tr>
<td></td>
<td>Worker DNEL, acute</td>
<td>inhalation</td>
<td>local</td>
<td>0,073 mg/m³</td>
</tr>
<tr>
<td></td>
<td>Consumer DNEL, long-term</td>
<td>oral</td>
<td>systemic</td>
<td>0,526 mg/kg bw/day</td>
</tr>
<tr>
<td>100-51-6</td>
<td>benzyl alcohol</td>
<td>inhalation</td>
<td>systemic</td>
<td>22 mg/m³</td>
</tr>
<tr>
<td></td>
<td>Worker DNEL, acute</td>
<td>inhalation</td>
<td>systemic</td>
<td>110 mg/m³</td>
</tr>
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<td></td>
<td>Worker DNEL, long-term</td>
<td>dermal</td>
<td>systemic</td>
<td>8 mg/kg bw/day</td>
</tr>
<tr>
<td></td>
<td>Worker DNEL, acute</td>
<td>dermal</td>
<td>systemic</td>
<td>40 mg/kg bw/day</td>
</tr>
<tr>
<td></td>
<td>Consumer DNEL, long-term</td>
<td>inhalation</td>
<td>systemic</td>
<td>5,4 mg/m³</td>
</tr>
<tr>
<td></td>
<td>Consumer DNEL, acute</td>
<td>inhalation</td>
<td>systemic</td>
<td>27 mg/m³</td>
</tr>
<tr>
<td></td>
<td>Consumer DNEL, long-term</td>
<td>dermal</td>
<td>systemic</td>
<td>4 mg/kg bw/day</td>
</tr>
<tr>
<td></td>
<td>Consumer DNEL, acute</td>
<td>dermal</td>
<td>systemic</td>
<td>20 mg/kg bw/day</td>
</tr>
<tr>
<td></td>
<td>Consumer DNEL, long-term</td>
<td>oral</td>
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<td>4 mg/kg bw/day</td>
</tr>
<tr>
<td></td>
<td>Consumer DNEL, acute</td>
<td>oral</td>
<td>systemic</td>
<td>20 mg/kg bw/day</td>
</tr>
<tr>
<td>1477-55-0</td>
<td>m-phenylenebis(methylamine)</td>
<td>dermal</td>
<td>systemic</td>
<td>0,33 mg/kg bw/day</td>
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<tr>
<td></td>
<td>Worker DNEL, long-term</td>
<td>inhalation</td>
<td>local</td>
<td>0,2 mg/m³</td>
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<tr>
<td></td>
<td>Worker DNEL, long-term</td>
<td>inhalation</td>
<td>systemic</td>
<td>1,2 mg/m³</td>
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<tr>
<td>25620-58-0</td>
<td>Trimethyl-1,6-hexanediamin, mixed isomers</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>15520-10-2</td>
<td>2-methylpentane-1,5-diamine</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
Worker DNEL, acute
- Inhalation: 0.5 mg/m³

Consumer DNEL, acute
- Inhalation: 0.25 mg/m³

Worker DNEL, long-term
- Inhalation: 0.25 mg/m³

Worker DNEL, long-term
- Dermal: 1.5 mg/kg bw/day

Consumer DNEL, long-term
- Inhalation: 0.125 mg/m³

Consumer DNEL, long-term
- Dermal: 0.75 mg/kg bw/day

Consumer DNEL, long-term
- Oral: 0.75 mg/kg bw/day
### PNEC values

<table>
<thead>
<tr>
<th>CAS No</th>
<th>Substance</th>
<th>Environmental compartment</th>
<th>Value</th>
</tr>
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<tbody>
<tr>
<td>98-54-4</td>
<td>4-tert-butylphenol</td>
<td></td>
<td>0.01 mg/l</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Freshwater</td>
<td>0.048 mg/l</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Marine water</td>
<td>0.001 mg/l</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Freshwater sediment</td>
<td>0.27 mg/kg</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Marine sediment</td>
<td>0.027 mg/kg</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Secondary poisoning</td>
<td>46.67 mg/kg</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Micro-organisms in STP</td>
<td>1.5 mg/l</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Soil</td>
<td>0.25 mg/kg</td>
</tr>
<tr>
<td>2855-13-2</td>
<td>3-aminomethyl-3,5,5-trimethylcyclohexylamine</td>
<td>Freshwater</td>
<td>0.06 mg/l</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Freshwater (intermittent releases)</td>
<td>0.23 mg/l</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Marine water</td>
<td>0.006 mg/l</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Freshwater sediment</td>
<td>5.784 mg/kg</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Marine sediment</td>
<td>0.578 mg/kg</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Micro-organisms in STP</td>
<td>3.18 mg/l</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Soil</td>
<td>1.121 mg/kg</td>
</tr>
<tr>
<td>100-51-6</td>
<td>benzyl alcohol</td>
<td></td>
<td>1 mg/l</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Freshwater</td>
<td>2.3 mg/l</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Marine water</td>
<td>0.1 mg/l</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Freshwater sediment</td>
<td>5.27 mg/kg</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Marine sediment</td>
<td>0.527 mg/kg</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Micro-organisms in STP</td>
<td>39 mg/l</td>
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<tr>
<td></td>
<td></td>
<td>Soil</td>
<td>0.456 mg/kg</td>
</tr>
<tr>
<td>1477-55-0</td>
<td>m-phenylenebis(methylamine)</td>
<td></td>
<td>0.094 mg/l</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Freshwater</td>
<td>0.152 mg/l</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Marine water</td>
<td>0.009 mg/l</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Freshwater sediment</td>
<td>12.4 mg/kg</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Marine sediment</td>
<td>1.24 mg/kg</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Micro-organisms in STP</td>
<td>10 mg/l</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Soil</td>
<td>2.44 mg/kg</td>
</tr>
<tr>
<td>15520-10-2</td>
<td>2-methylpentane-1,5-diamine</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
Safety Data Sheet

according to Regulation (EC) No 1907/2006

<p>| | |</p>
<table>
<thead>
<tr>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Freshwater</td>
<td>0.42 mg/l</td>
</tr>
<tr>
<td>Freshwater (intermittent releases)</td>
<td>0.42 mg/l</td>
</tr>
<tr>
<td>Marine water</td>
<td>0.042 mg/l</td>
</tr>
<tr>
<td>Freshwater sediment</td>
<td>7.58 mg/kg</td>
</tr>
<tr>
<td>Marine sediment</td>
<td>0.758 mg/kg</td>
</tr>
<tr>
<td>Micro-organisms in sewage treatment plants (STP)</td>
<td>1250 mg/l</td>
</tr>
<tr>
<td>Soil</td>
<td>1.27 mg/kg</td>
</tr>
</tbody>
</table>

8.2. Exposure controls

Appropriate engineering controls
Provide adequate ventilation as well as local exhaustion at critical locations.

Protective and hygiene measures
Work in well-ventilated zones or use proper respiratory protection. Only wear fitting, comfortable and clean protective clothing. Avoid contact with skin, eyes and clothes. Wash hands and face before breaks and after work and take a shower if necessary.

Eye/face protection
Suitable eye protection:
Eye glasses with side protection
goggles

Hand protection
Tested protective gloves must be worn: EN ISO 374
NBR (Nitrile rubber), Butyl caoutchouc (butyl rubber)
Wearing time with permanent contact: Thickness of the glove material: >= 0.4 mm, Breakthrough time (maximum wearing time): >480 min
Wearing time with occasional contact (splashes): Thickness of the glove material: >= 0.1 mm, Breakthrough time (maximum wearing time) > 30 min
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.
Breakthrough times and swelling properties of the material must be taken into consideration.

Skin protection
Protective clothing
For the protection against direct skin contact, body protective clothing is essential (in addition to the usual working clothes).

Respiratory protection
If technical exhaust or ventilation measures are not possible or insufficient, respiratory protection must be worn. Observe the wear time limits according GefStoffV in combination with the rules for using respiratory protection apparatus (BGR 190).

SECTION 9: Physical and chemical properties

9.1. Information on basic physical and chemical properties

<table>
<thead>
<tr>
<th>Physical state:</th>
<th>Liquid</th>
</tr>
</thead>
<tbody>
<tr>
<td>Colour:</td>
<td>transparent</td>
</tr>
<tr>
<td>Odour:</td>
<td>characteristic</td>
</tr>
</tbody>
</table>
pH-Value: No data available

**Changes in the physical state**

Melting point: No data available
Initial boiling point and boiling range: No data available
Sublimation point: No data available
Softening point: No data available
Pour point: No data available
Flash point: > 83 °C

**Flammability**

Solid: No data available
Gas: No data available

**Explosive properties**

No information available.

Lower explosion limits: No data available
Upper explosion limits: No data available
Ignition temperature: ~ 380 °C

**Auto-ignition temperature**

Solid: No data available
Gas: No data available

Decomposition temperature: No data available

**Oxidizing properties**

No information available.

Vapour pressure: No data available
Density (at 20 °C): ~ 1.1 g/cm³
Water solubility: No data available

**Solubility in other solvents**

No information available.

Partition coefficient: No data available
Viscosity / dynamic: ~ 600 mPa·s
(at 23 °C)
Flow time: No data available
Vapour density: No data available
Evaporation rate: No data available

**9.2. Other information**

No information available.

**SECTION 10: Stability and reactivity**
10.1. Reactivity
No hazardous reaction when handled and stored according to provisions.

10.2. Chemical stability
No decomposition if used according to specifications.

10.3. Possibility of hazardous reactions
No data available

10.4. Conditions to avoid
No data available

10.5. Incompatible materials
No data available

10.6. Hazardous decomposition products
No data available

SECTION 11: Toxicological information

11.1. Information on toxicological effects
Acute toxicity
Harmful if swallowed.

ATEmix calculated
ATE (oral) 1455,0 mg/kg; ATE (inhalation aerosol) 3,645 mg/l
### Chemicals in Contact with the Skin

<table>
<thead>
<tr>
<th>CAS No</th>
<th>Chemical name</th>
<th>Exposure route</th>
<th>Dose</th>
<th>Species</th>
<th>Source</th>
<th>Method</th>
</tr>
</thead>
<tbody>
<tr>
<td>98-54-4</td>
<td>4-tert-butylphenol</td>
<td>oral</td>
<td>LD50 mg/kg</td>
<td>&gt; 2000</td>
<td>Rat</td>
<td>Study report (1991) OECD Guideline 401</td>
</tr>
<tr>
<td></td>
<td></td>
<td>dermal</td>
<td>LD50 mg/kg</td>
<td>&gt;2000</td>
<td>Rabbit</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>inhalation (4 h) vapour</td>
<td>LC50 mg/l</td>
<td>5600</td>
<td>Rat</td>
<td>OECD 403</td>
</tr>
<tr>
<td>2855-13-2</td>
<td>3-aminomethyl-3,5,5-trimethylcyclohexylamine</td>
<td>oral</td>
<td>LD50 mg/kg</td>
<td>1030</td>
<td>Rat</td>
<td>Study report (1965) OECD Guideline 401</td>
</tr>
<tr>
<td></td>
<td></td>
<td>dermal</td>
<td>LD50 mg/kg</td>
<td>&gt; 2000</td>
<td>Rat</td>
<td>Study report (2010) OECD Guideline 402</td>
</tr>
<tr>
<td>100-51-6</td>
<td>benzyl alcohol</td>
<td>oral</td>
<td>LD50 mg/kg</td>
<td>1580</td>
<td>Mouse</td>
<td>Cosmet. Toxicol. 11, 1011-1013 (1973) (1) OECD Guideline 401</td>
</tr>
<tr>
<td></td>
<td></td>
<td>dermal</td>
<td>LD50 mg/kg</td>
<td>&gt; 2000</td>
<td>Rabbit</td>
<td>Raw Material Data Handbook, Vol.1. (Orga) EPA OTS 798.1100</td>
</tr>
<tr>
<td></td>
<td></td>
<td>inhalation vapour</td>
<td>ATE</td>
<td>11 mg/l</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>inhalation (4 h) aerosol</td>
<td>LC50 mg/l</td>
<td>&gt;4,178</td>
<td>Rat</td>
<td>ECHA OECD 403</td>
</tr>
<tr>
<td>1477-55-0</td>
<td>m-phenylenebis(methylamine)</td>
<td>oral</td>
<td>LD50 mg/kg</td>
<td>930</td>
<td>Rat</td>
<td>Study report (1973) OECD Guideline 401</td>
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<tr>
<td></td>
<td></td>
<td>dermal</td>
<td>LD50 mg/kg</td>
<td>&gt; 3100</td>
<td>Rat</td>
<td>Study report (1975) TK 11813 was applied to a shaved area of</td>
</tr>
<tr>
<td></td>
<td></td>
<td>inhalation vapour</td>
<td>ATE</td>
<td>11 mg/l</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>inhalation (4 h) aerosol</td>
<td>LC50 mg/l</td>
<td>1,34</td>
<td>Rat</td>
<td></td>
</tr>
<tr>
<td>25620-58-0</td>
<td>Trimethyl-1,6-hexanediamin, mixed isomers</td>
<td>oral</td>
<td>ATE mg/kg</td>
<td>500</td>
<td></td>
<td></td>
</tr>
<tr>
<td>15520-10-2</td>
<td>2-methylpentane-1,5-diamine</td>
<td>oral</td>
<td>LD50 mg/kg</td>
<td>1170</td>
<td>Rat</td>
<td>Study report (1986) OECD Guideline 401</td>
</tr>
<tr>
<td></td>
<td></td>
<td>dermal</td>
<td>LD50 mg/kg</td>
<td>1870</td>
<td>Rat</td>
<td>Study report (1978) OECD Guideline 402</td>
</tr>
<tr>
<td></td>
<td></td>
<td>inhalation vapour</td>
<td>ATE</td>
<td>11 mg/l</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>inhalation aerosol</td>
<td>ATE</td>
<td>1,5 mg/l</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

**Irritation and corrosivity**

Causes severe skin burns and eye damage.

Causes serious eye damage.
Sensitising effects
May cause an allergic skin reaction. (3-aminomethyl-3,5,5-trimethylcyclohexylamine; m-phenylenebis(methylene))

Carcinogenic/mutagenic/toxic effects for reproduction
Suspected of damaging fertility. (4-tert-butylphenol)
Germ cell mutagenicity: Based on available data, the classification criteria are not met.
Carcinogenicity: Based on available data, the classification criteria are not met.

STOT-single exposure
Based on available data, the classification criteria are not met.

STOT-repeated exposure
Based on available data, the classification criteria are not met.

Aspiration hazard
Based on available data, the classification criteria are not met.

Practical experience

Observations relevant to classification
May cause allergy or asthma symptoms or breathing difficulties if inhaled.

SECTION 12: Ecological information

12.1. Toxicity
### Aquatic toxicity

<table>
<thead>
<tr>
<th>CAS No</th>
<th>Chemical name</th>
<th>Dose</th>
<th>[h]</th>
<th>[d]</th>
<th>Species</th>
<th>Source</th>
<th>Method</th>
</tr>
</thead>
<tbody>
<tr>
<td>98-54-4</td>
<td>4-tert-butylphenol</td>
<td>LC50 &gt; 1 mg/l</td>
<td>96</td>
<td>h</td>
<td>Oncorhynchus mykiss</td>
<td>Study report (1991)</td>
<td>OECD Guideline 203</td>
</tr>
<tr>
<td></td>
<td>Acute fish toxicity</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Acute algae toxicity</td>
<td>ErC50 ca. 14 mg/l</td>
<td>72</td>
<td>h</td>
<td>Pseudokirchneriella subcapitata</td>
<td>Study report (2001)</td>
<td>OECD Guideline 201</td>
</tr>
<tr>
<td></td>
<td>Acute crustacea toxicity</td>
<td>EC50 3,9 mg/l</td>
<td>48</td>
<td>h</td>
<td>Daphnia magna (Big water flea)</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Fish toxicity</td>
<td>NOEC 0,01 mg/l</td>
<td>128</td>
<td>d</td>
<td>Pimephales promelas</td>
<td>Study report (2008)</td>
<td>OECD Guideline 210</td>
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<tr>
<td></td>
<td>Crustacea toxicity</td>
<td>NOEC 0,73 mg/l</td>
<td>21</td>
<td>d</td>
<td>Daphnia magna</td>
<td>Toxicity Testing Reports of Environment</td>
<td>OECD Guideline 211</td>
</tr>
<tr>
<td></td>
<td>Acute bacteria toxicity</td>
<td>(&gt; 10 mg/l)</td>
<td>3</td>
<td>h</td>
<td>activated sludge of a predominantly domestic sewage</td>
<td>Study report (1991)</td>
<td>OECD Guideline 209</td>
</tr>
<tr>
<td>2855-13-2</td>
<td>3-aminomethyl-3,5,5-trimethylcyclohexylamine</td>
<td>LC50 110 mg/l</td>
<td>96</td>
<td>h</td>
<td>Leuciscus idus</td>
<td>Study report (1993)</td>
<td>EU Method C.1</td>
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<tr>
<td></td>
<td>Acute fish toxicity</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Acute algae toxicity</td>
<td>ErC50 37 mg/l</td>
<td>72</td>
<td>h</td>
<td>Desmodesmus subspicatus</td>
<td>Study report (1993)</td>
<td>EU Method C.3</td>
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<tr>
<td></td>
<td>Acute crustacea toxicity</td>
<td>EC50 23 mg/l</td>
<td>48</td>
<td>h</td>
<td>Daphnia magna</td>
<td>Study report (2002)</td>
<td>OECD Guideline 202</td>
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<tr>
<td></td>
<td>Crustacea toxicity</td>
<td>NOEC 3 mg/l</td>
<td>21</td>
<td>d</td>
<td>Daphnia magna</td>
<td>Study report (1993)</td>
<td>other: OECD 202, part 2</td>
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<tr>
<td>100-51-6</td>
<td>benzy alcohol</td>
<td>LC50 &gt; 100 mg/l</td>
<td>96</td>
<td>h</td>
<td>Oryzias latipes</td>
<td>Review article or handbook (2009)</td>
<td>OECD Guideline 203</td>
</tr>
<tr>
<td></td>
<td>Acute fish toxicity</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Acute algae toxicity</td>
<td>ErC50 770 mg/l</td>
<td>72</td>
<td>h</td>
<td>Pseudokirchneriella subcapitata</td>
<td>Review article or handbook (2009)</td>
<td>OECD Guideline 201</td>
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<tr>
<td></td>
<td>Acute crustacea toxicity</td>
<td>EC50 230 mg/l</td>
<td>48</td>
<td>h</td>
<td>Daphnia magna</td>
<td>Review article or handbook (2009)</td>
<td>OECD Guideline 202</td>
</tr>
<tr>
<td></td>
<td>Fish toxicity</td>
<td>NOEC 48,897 mg/l</td>
<td>30</td>
<td>d</td>
<td>Fish species</td>
<td><a href="http://epa.gov/oppt/exposure/pubs/episui">http://epa.gov/oppt/exposure/pubs/episui</a></td>
<td>other: QSAR</td>
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<tr>
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<td>Algea toxicity</td>
<td>NOEC 51 mg/l</td>
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<td>d</td>
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<td></td>
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<tr>
<td></td>
<td>Crustacea toxicity</td>
<td>NOEC 51 mg/l</td>
<td>21</td>
<td>d</td>
<td>Daphnia magna</td>
<td>Review article or handbook (2009)</td>
<td>OECD Guideline 211</td>
</tr>
<tr>
<td></td>
<td>Acute bacteria toxicity</td>
<td>(1385 mg/l)</td>
<td>3</td>
<td>h</td>
<td>activated sludge, domestic</td>
<td>Study report (1989)</td>
<td>OECD Guideline 209</td>
</tr>
<tr>
<td>1477-55-0</td>
<td>m-phenylenebis(methylamine)</td>
<td>LC50 &gt; 100 mg/l</td>
<td>96</td>
<td>h</td>
<td>Oncorhynchus mykiss</td>
<td>REACh Registration Dossier</td>
<td>OECD Guideline 203</td>
</tr>
</tbody>
</table>
## 12.2. Persistence and degradability

<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>2855-13-2</td>
<td>3-aminomethyl-3,5,5-trimethylcyclohexylamine</td>
<td>OECD 301A/ ISO 7827/ EEC 92/69/V, C.4-A</td>
<td>8 %</td>
<td>28</td>
<td>Not readily biodegradable (according to OECD criteria)</td>
</tr>
<tr>
<td>100-51-6</td>
<td>benzyl alcohol</td>
<td>OECD 301A/ ISO 7827/ EEC 92/69/V, C.4-A</td>
<td>95 - 97%</td>
<td>21</td>
<td>Readily biodegradable (according to OECD criteria).</td>
</tr>
<tr>
<td>1477-55-0</td>
<td>m-phenylenebis(methylamine)</td>
<td>OECD 301B/ ISO 9439/ EEC 92/69/V, C.4-C</td>
<td>49 %</td>
<td>28</td>
<td>Not readily biodegradable (according to OECD criteria)</td>
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</tbody>
</table>

## 12.3. Bioaccumulative potential

### 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>98-54-4</td>
<td>4-tart-butylphenol</td>
<td>3</td>
</tr>
<tr>
<td>2855-13-2</td>
<td>3-aminomethyl-3,5,5-trimethylcyclohexylamine</td>
<td>0.99</td>
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<tr>
<td>100-51-6</td>
<td>benzyl alcohol</td>
<td>1</td>
</tr>
<tr>
<td>1477-55-0</td>
<td>m-phenylenebis(methylamine)</td>
<td>ca. 0.18</td>
</tr>
<tr>
<td>15520-10-2</td>
<td>2-methylpentane-1,5-diamine</td>
<td>0</td>
</tr>
</tbody>
</table>
12.4. Mobility in soil

No information available.

12.5. Results of PBT and vPvB assessment

The substances in the mixture do not meet the PBT/vPvB criteria according to REACH, annex XIII.

12.6. Other adverse effects

No information available.

SECTION 13: Disposal considerations

13.1. Waste treatment methods

Disposal recommendations

Dispose of waste according to applicable legislation.

Contaminated packaging

Non-contaminated packages may be recycled. Dispose of waste according to applicable legislation.

SECTION 14: Transport information

Land transport (ADR/RID)

14.1. UN number: UN 2735

14.2. UN proper shipping name: AMINES, LIQUID, CORROSIVE, N.O.S. (Isophorondiamine, 4-tert-butylphenol)

14.3. Transport hazard class(es): 8

14.4. Packing group: II

Hazard label: 8

Classification code: C7

Special Provisions: 274

Limited quantity: 1 L

Excepted quantity: E2

Transport category: 2

Hazard No: 80

Tunnel restriction code: E

Inland waterways transport (ADN)

14.1. UN number: UN 2735

14.2. UN proper shipping name: AMINES, LIQUID, CORROSIVE, N.O.S. (Isophorondiamine, 4-tert-butylphenol)

14.3. Transport hazard class(es): 8
### 14.4. Packing group:
- **II**

**Hazard label:** 8  
**Classification code:** C7  
**Special Provisions:** 274  
**Limited quantity:** 1 L  
**Excepted quantity:** E2

#### Marine transport (IMDG)
- **14.1. UN number:** UN 2735  
- **14.2. UN proper shipping name:** AMINES, LIQUID, CORROSIVE, N.O.S. (Isophorondiamine, 4-tert-butylphenol)  
- **14.3. Transport hazard class(es):** 8  
- **14.4. Packing group:** II  
- **Hazard label:** 8  
- **Special Provisions:** 274  
- **Limited quantity:** 1 L  
- **Excepted quantity:** E2  
- **EmS:** F-A, S-B

#### Air transport (ICAO-TI/IATA-DGR)
- **14.1. UN number:** UN 2735  
- **14.2. UN proper shipping name:** AMINES, LIQUID, CORROSIVE, N.O.S. (Isophorondiamine, 4-tert-butylphenol)  
- **14.3. Transport hazard class(es):** 8  
- **14.4. Packing group:** II  
- **Hazard label:** 8  
- **Special Provisions:** A3 A803  
- **Limited quantity Passenger:** 0.5 L  
- **Passenger LQ:** Y840  
- **Excepted quantity:** E2  
- **IATA-packing instructions - Passenger:** Y840  
- **IATA-max. quantity - Passenger:** 1 L  
- **IATA-packing instructions - Cargo:** Y840  
- **IATA-max. quantity - Cargo:** 30 L

#### 14.5. Environmental hazards
- **ENVIRONMENTALLY HAZARDOUS:** yes  
- **Danger releasing substance:** 4-tert-butylphenol

#### 14.6. Special precautions for user
- **No information available.**

#### 14.7. Transport in bulk according to Annex II of Marpol and the IBC Code
- **No information available.**

---

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

**EU regulatory information**

Authorisations (REACH, annex XIV):
- Substances of very high concern, SVHC (REACH, article 59):
  - 4-tert-butylphenol

2010/75/EU (VOC):
- Subcategory according to Directive 2004/42/EC:
  - Two-pack reactive performance coatings for specific end use such as floors - Solvent-borne coatings, VOC limit value: 500 g/l

**National regulatory information**

Employment restrictions:
- Observe restrictions to employment for juvenils according to the 'juvenile work protection guideline' (94/33/EC). Observe employment restrictions under the Maternity Protection Directive (92/85/EEC) for expectant or nursing mothers. Observe employment restrictions for women of child-bearing age.

Water contaminating class (D):
- 2 - clearly water contaminating

15.2. Chemical safety assessment

For the following substances of this mixture a chemical safety assessment has been carried out:
- 4-tert-butylphenol
- 3-aminomethyl-3,5,5-trimethylcyclohexylamine
- benzyl alcohol
- m-phenylenebis(methylamine)
- 2-methylpentane-1,5-diamine

SECTION 16: Other information

Changes
- This data sheet contains changes from the previous version in section(s): 3,14.

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)
- RID: Règlement international concernant le transport des marchandises dangereuses par chemin de fer (Regulations Concerning the International Transport of Dangerous Goods by Rail)
- IMDG: International Maritime Code for Dangerous Goods
- IATA: International Air Transport Association
- IATA-DGR: Dangerous Goods Regulations by the "International Air Transport Association" (IATA)
- ICAO: International Civil Aviation Organization
- ICAO-TI: Technical Instructions by the "International Civil Aviation Organization" (ICAO)
- CLP: Classification, Labelling and Packaging
- REACH: Registration, Evaluation and Authorization of Chemicals
- GHS: Globally Harmonised System of Classification, Labelling and Packaging of Chemicals
- UN: United Nations
- CAS: Chemical Abstracts Service
- DNEL: Derived No Effect Level
- DMEL: Derived Minimal Effect Level
PNEC: Predicted No Effect Concentration
ATE: Acute toxicity estimate
LC50: Lethal concentration, 50%
LD50: Lethal dose, 50%
LL50: Lethal loading, 50%
EL50: Effect loading, 50%
EC50: Effective Concentration 50%
ErC50: Effective Concentration 50%, growth rate
NOEC: No Observed Effect Concentration
BCF: Bio-concentration factor
PBT: persistent, bioaccumulative, toxic
vPvB: very persistent, very bioaccumulative
MARPOL: International Convention for the Prevention of Marine Pollution from Ships
IBC: Intermediate Bulk Container
SVHC: Substance of Very High Concern

Classification for mixtures and used evaluation method according to Regulation (EC) No. 1272/2008 [CLP]

<table>
<thead>
<tr>
<th>Classification</th>
<th>Classification procedure</th>
</tr>
</thead>
<tbody>
<tr>
<td>Acute Tox. 4; H302</td>
<td>Calculation method</td>
</tr>
<tr>
<td>Skin Corr. 1A; H314</td>
<td>Calculation method</td>
</tr>
<tr>
<td>Eye Dam. 1; H318</td>
<td>Calculation method</td>
</tr>
<tr>
<td>Skin Sens. 1; H317</td>
<td>Calculation method</td>
</tr>
<tr>
<td>Repr. 2; H361f</td>
<td>Calculation method</td>
</tr>
<tr>
<td>Aquatic Chronic 2; H411</td>
<td>Calculation method</td>
</tr>
</tbody>
</table>

Relevant H and EUH statements (number and full text)

- **H302**: Harmful if swallowed.
- **H312**: Harmful in contact with skin.
- **H314**: Causes severe skin burns and eye damage.
- **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.
- **H361f**: Suspected of damaging fertility.
- **H410**: Very toxic to aquatic life with long lasting effects.
- **H411**: Toxic to aquatic life with long lasting effects.
- **H412**: Harmful to aquatic life with long lasting effects.
- **EUH071**: Corrosive to the respiratory tract.

**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.
(The data for the hazardous ingredients were taken respectively from the last version of the sub-contractor’s safety data sheet.)