

## Safety data sheet

according to 1907/2006/EC, Article 31

Printing date 15.03.2013

Version 319

Revision: 15.03.2013

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

◊ **Product identifier**

- ◊ Trade name: **Eucalyptus oil**
- ◊ Article number: S0100180
- ◊ Registration number -
- ◊ Relevant identified uses of the substance or mixture and uses advised against No further relevant information available.
- ◊ Application of the substance / the preparation Flavour/Fragrance

◊ **Details of the supplier of the safety data sheet**

- ◊ Manufacturer/Supplier:  
Frey & Lau GmbH  
Immenhacken 12, D-24558 Henstedt-Ulzburg  
Tel:++49-4193-9953 Fax: +49-4193-9955-80
- ◊ Further information obtainable from:  
Sachkundige Person Frey + Lau  
info@freylau.de
- ◊ Emergency telephone number: ++49-40-54.77.99.56 WAKO

### 2. Hazards identification

◊ **Classification of the substance or mixture**

- ◊ Classification according to Regulation (EC) No 1272/2008  
Flam. Liq. 3 H226 Flammable liquid and vapour.  
Asp. Tox. 1 H304 May be fatal if swallowed and enters airways.  
Aquatic Chronic 2 H411 Toxic to aquatic life with long lasting effects.  
Skin Sens. 1 H317 May cause an allergic skin reaction.

- ◊ Classification according to Directive 67/548/EEC or Directive 1999/45/EC  
Xn; Harmful

R65: Harmful: may cause lung damage if swallowed.

Xi; Sensitising

R43: May cause sensitisation by skin contact.

N; Dangerous for the environment

R51/53: Toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment.

R10: Flammable.

- ◊ Information concerning particular hazards for human and environment:

The product has to be labelled due to the calculation procedure of the "General Classification guideline for preparations of the EU" in the latest valid version.

- ◊ Classification system:

The classification is according to the latest editions of the EU-lists, and extended by company and literature data.

◊ **Label elements**

- ◊ Labelling according to Regulation (EC) No 1272/2008 The product is classified and labelled according to the CLP regulation.
- ◊ Hazard pictograms



GHS02 GHS07 GHS08 GHS09

- ◊ Signal word Danger

- ◊ Hazard-determining components of labelling:

DIPENTENE

alpha-Pinene

- ◊ Hazard statements

H226 Flammable liquid and vapour.

H317 May cause an allergic skin reaction.

H304 May be fatal if swallowed and enters airways.

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H411 Toxic to aquatic life with long lasting effects.

◊ **Precautionary statements**

P210 Keep away from heat/sparks/open flames/hot surfaces. - No smoking.

P241 Use explosion-proof electrical/ventilating/lighting/equipment.

P301+P310 IF SWALLOWED: Immediately call a POISON CENTER or doctor/physician.

P303+P361+P353 IF ON SKIN (or hair): Remove/Take off immediately all contaminated clothing. Rinse skin with water/shower.

P405 Store locked up.

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

◊ **Additional information:**

Contains beta-Pinene. May produce an allergic reaction.

◊ **Other hazards**◊ **Results of PBT and vPvB assessment**

◊ PBT: Not applicable.

◊ vPvB: Not applicable.

**3. Composition/information on ingredients**◊ **Chemical characterization: Mixtures**

◊ CAS-No: 84625-32-1

◊ EINECS-No: 283-406-2

◊ Description: Mixture of substances listed below with nonhazardous additions.

◊ **Dangerous components:**

CAS: 138-86-3 DIPENTENE 5-9,99%

EINECS: 205-341-0 Xn R65; Xi R38; Xi R43; N R50/53

R10

Flam. Liq. 3, H226; Asp. Tox. 1, H304; Aquatic Acute 1, H400; Aquatic Chronic 1, H410; Skin Irrit. 2, H315; Skin Sens. 1B, H317

CAS: 99-85-4 p-Mentha-1,4-dien 2,5-5%

EINECS: 202-794-6 Xn R22-65

R10

Flam. Liq. 3, H226; Asp. Tox. 1, H304

CAS: 99-87-6 p-Cymene 2,5-5%

EINECS: 202-796-7 Xn R65; N R51/53

R10

Flam. Liq. 3, H226; Asp. Tox. 1, H304; Aquatic Chronic 2, H411

CAS: 7785-26-4 alpha-Pinene 1-2,49%

EINECS: 232-077-3 Xn R65; Xi R38; Xi R43

R10

Flam. Liq. 3, H226; Asp. Tox. 1, H304; Skin Irrit. 2, H315; Skin Sens. 1, H317

CAS: 586-62-9 Terpinolene &lt;1%

EINECS: 209-578-0 Xn R65; N R51/53

R10

Flam. Liq. 3, H226; Asp. Tox. 1, H304; Aquatic Chronic 2, H411

CAS: 18172-67-3 beta-Pinene &lt;1%

EINECS: 242-060-2 Xn R65; Xi R38; Xi R43

R10

Flam. Liq. 3, H226; Asp. Tox. 1, H304; Skin Irrit. 2, H315; Skin Sens. 1B, H317

◊ Additional information: For the wording of the listed risk phrases refer to section 16.

**4. First aid measures**◊ **Description of first aid measures**◊ **After inhalation:**

Supply fresh air and to be sure call for a doctor.

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- In case of unconsciousness place patient stably in side position for transportation.
- ◊ After skin contact: Immediately wash with water and soap and rinse thoroughly.
  - ◊ After eye contact: Rinse opened eye for several minutes under running water.
  - ◊ After swallowing: If symptoms persist consult doctor.
  - ◊ Information for doctor:
  - ◊ Most important symptoms and effects, both acute and delayed No further relevant information available.
  - ◊ Indication of any immediate medical attention and special treatment needed No further relevant information available.

**5. Firefighting measures**

- ◊ **Extinguishing media**
- ◊ Suitable extinguishing agents: CO<sub>2</sub>, sand, extinguishing powder. Do not use water.
- ◊ For safety reasons unsuitable extinguishing agents: Water with full jet
- ◊ **Special hazards arising from the substance or mixture** During heating or in case of fire poisonous gases are produced.
- ◊ **Advice for firefighters**
- ◊ Protective equipment: No special measures required.

**6. Accidental release measures**

- ◊ **Personal precautions, protective equipment and emergency procedures**  
Wear protective equipment. Keep unprotected persons away.
- ◊ **Environmental precautions:**  
Do not allow product to reach sewage system or any water course.  
Inform respective authorities in case of seepage into water course or sewage system.  
Do not allow to enter sewers/ surface or ground water.
- ◊ **Methods and material for containment and cleaning up:**  
Absorb with liquid-binding material (sand, diatomite, acid binders, universal binders, sawdust).  
Dispose contaminated material as waste according to item 13.  
Treat with 2 % sodium hydroxide solution.  
Ensure adequate ventilation.  
Do not flush with water or aqueous cleansing agents
- ◊ **Reference to other sections**  
See Section 7 for information on safe handling.  
See Section 8 for information on personal protection equipment.  
See Section 13 for disposal information.

**7. Handling and storage**

- ◊ **Handling:**
- ◊ Precautions for safe handling Prevent formation of aerosols.
- ◊ Information about fire - and explosion protection:  
Keep ignition sources away - Do not smoke.  
Protect from heat.  
Protect against electrostatic charges.
- ◊ **Conditions for safe storage, including any incompatibilities**
- ◊ Storage:
- ◊ Requirements to be met by storerooms and receptacles: No special requirements.
- ◊ Information about storage in one common storage facility: Not required.
- ◊ Further information about storage conditions: Keep container tightly sealed.
- ◊ **Specific end use(s)** No further relevant information available.

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### 8. Exposure controls/personal protection

- ◊ **Additional information about design of technical facilities:** No further data; see item 7.
- ◊ **Control parameters**
- ◊ **Ingredients with limit values that require monitoring at the workplace:**  
The product does not contain any relevant quantities of materials with critical values that have to be monitored at the workplace.
- ◊ **Additional information:** The lists valid during the making were used as basis.
- ◊ **Exposure controls**
- ◊ **Personal protective equipment:**
- ◊ **General protective and hygienic measures:**  
Keep away from foodstuffs, beverages and feed.  
Immediately remove all soiled and contaminated clothing  
Wash hands before breaks and at the end of work.
- ◊ **Respiratory protection:** Not required.
- ◊ **Protection of hands:**  
Protective gloves  
The glove material has to be impermeable and resistant to the product/ the substance/ the preparation.  
Selection of the glove material on consideration of the penetration times, rates of diffusion and the degradation
- ◊ **Material of gloves**  
The selection of the suitable gloves does not only depend on the material, but also on further marks of quality and varies from manufacturer to manufacturer. As the product is a preparation of several substances, the resistance of the glove material can not be calculated in advance and has therefore to be checked prior to the application.  
The multichemical-resistant glove Barrier 02-100 is recommended.
- ◊ **Penetration time of glove material**  
The exact break through time has to be found out by the manufacturer of the protective gloves and has to be observed.
- ◊ **Eye protection:** Tightly sealed goggles

### 9. Physical and chemical properties

- ◊ **Information on basic physical and chemical properties**
- ◊ **General Information**
- ◊ **Appearance:**

Form:	Fluid
Colour:	Colourless to yellow tint
- ◊ **Odour:** Characteristic
- ◊ **Odour threshold:** Not determined.
- ◊ **pH-value:** Not determined.
- ◊ **Melting point/Melting range:** Undetermined.
- ◊ **Flash point:** 53 °C
- ◊ **Flammability (solid, gaseous):** Not applicable.
- ◊ **Ignition temperature:**

Decomposition temperature:	Not determined.
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- ◊ **Self-igniting:** Not determined.
- ◊ **Danger of explosion:** Product is not explosive. However, formation of explosive air/vapour mixtures are possible.
- ◊ **Explosion limits:**

Lower:	Not determined.
Upper:	Not determined.
- ◊ **Density at 20 °C:** 0,913 g/cm<sup>3</sup>
- ◊ **Relative density** Not determined.
- ◊ **Vapour density** Not determined.
- ◊ **Evaporation rate** Not determined.

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- ◊ **Solubility in / Miscibility with water:** *Not miscible or difficult to mix.*
- ◊ **Partition coefficient (n-octanol/water):** *Not determined.*
- ◊ **Other information** *No further relevant information available.*

### 10. Stability and reactivity

- ◊ **Reactivity**
- ◊ **Chemical stability**
- ◊ **Thermal decomposition / conditions to be avoided:** *No decomposition if used according to specifications.*
- ◊ **Possibility of hazardous reactions** *No dangerous reactions known.*
- ◊ **Conditions to avoid** *No further relevant information available.*
- ◊ **Incompatible materials:** *No further relevant information available.*
- ◊ **Hazardous decomposition products:** *No dangerous decomposition products known.*

### 11. Toxicological information

- ◊ **Information on toxicological effects**
- ◊ **Acute toxicity:**
- ◊ **Primary irritant effect:**
- ◊ *on the skin: No irritant effect.*
- ◊ *on the eye: No irritating effect.*
- ◊ **Sensitization:** *Sensitization possible through skin contact.*
- ◊ **Additional toxicological information:**  
*The product shows the following dangers according to the calculation method of the General EU Classification Guidelines for Preparations as issued in the latest version:*  
*The product shows the following dangers according to the calculation method of the General EU Classification Guidelines for Preparations as issued in the latest version.*  
 Irritant

### 12. Ecological information

- ◊ **Toxicity**
- ◊ **Aquatic toxicity:** *No further relevant information available.*
- ◊ **Persistence and degradability** *No further relevant information available.*
- ◊ **Behaviour in environmental systems:**
- ◊ **Bioaccumulative potential** *No further relevant information available.*
- ◊ **Mobility in soil** *No further relevant information available.*
- ◊ **Ecotoxicological effects:**
- ◊ **Remark:** *Toxic for fish*
- ◊ **Additional ecological information:**
- ◊ **General notes:**  
*Water hazard class 2 (German Regulation) (Self-assessment): hazardous for water*  
*Do not allow product to reach ground water, water course or sewage system.*  
*Danger to drinking water if even small quantities leak into the ground.*  
*Also poisonous for fish and plankton in water bodies.*  
*Toxic for aquatic organisms*
- ◊ **Results of PBT and vPvB assessment**
- ◊ **PBT:** *Not applicable.*
- ◊ **vPvB:** *Not applicable.*
- ◊ **Other adverse effects** *No further relevant information available.*

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### 13. Disposal considerations

- ◊ **Waste treatment methods**
- ◊ Recommendation Must not be disposed together with household garbage. Do not allow product to reach sewage system.
- ◊ **Uncleaned packaging:**
- ◊ Recommendation: Disposal must be made according to official regulations.

### 14. Transport information

- ◊ **UN-Number**
- ◊ ADR, IMDG, IATA UN1993
- ◊ **UN proper shipping name**
- ◊ ADR UN 1993 FLAMMABLE LIQUID, N.O.S. (1,8-Cineol, DIPENTENE), ENVIRONMENTALLY HAZARDOUS
- ◊ IMDG FLAMMABLE LIQUID, N.O.S. (1,8-Cineol, DIPENTENE), MARINE POLLUTANT
- ◊ IATA FLAMMABLE LIQUID, N.O.S. (1,8-Cineol, DIPENTENE)
- ◊ **Transport hazard class(es)**
- ◊ ADR 3 (F1) Flammable liquids.
- ◊ Class 3
- ◊ Label 3

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- ◊ IMDG, IATA 3 Flammable liquids.
- ◊ Class 3
- ◊ Label 3
- ◊ **Packing group** III
- ◊ ADR, IMDG, IATA
- ◊ **Environmental hazards:** Product contains environmentally hazardous substances: DIPENTENE
- ◊ Marine pollutant: Yes
- ◊ Special marking (ADR): Symbol (fish and tree)
- ◊ **Special precautions for user** Symbol (fish and tree)
- ◊ Danger code (Kemler): Warning: Flammable liquids.
- ◊ EMS Number: 30
- ◊ **Transport in bulk according to Annex II of MARPOL73/78 and the IBC Code** F-E,S-E
- ◊ **Transport/Additional information:** Not applicable.

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- ◊ ADR
- ◊ Limited quantities (LQ) 5L
- ◊ Transport category 3
- ◊ Tunnel restriction code D/E
- ◊ **UN "Model Regulation":** UN1993, FLAMMABLE LIQUID, N.O.S. (1,8-Cineol, DIPENTENE), ENVIRONMENTALLY HAZARDOUS, 3, III

### 15. Regulatory information

- ◊ **Safety, health and environmental regulations/legislation specific for the substance or mixture**
- ◊ Labelling according to Regulation (EC) No 1272/2008 The product is classified and labelled according to the CLP regulation.
- ◊ Hazard pictograms




  
 GHS02 GHS07 GHS08 GHS09

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- ◊ Signal word *Danger*
- ◊ Hazard-determining components of labelling:  
DIPENTENE  
alpha-Pinene
- ◊ Hazard statements  
H226 *Flammable liquid and vapour.*  
H317 *May cause an allergic skin reaction.*  
H304 *May be fatal if swallowed and enters airways.*  
H411 *Toxic to aquatic life with long lasting effects.*
- ◊ Precautionary statements  
P210 *Keep away from heat/sparks/open flames/hot surfaces. - No smoking.*  
P241 *Use explosion-proof electrical/ventilating/lighting/equipment.*  
P301+P310 *IF SWALLOWED: Immediately call a POISON CENTER or doctor/physician.*  
P303+P361+P353 *IF ON SKIN (or hair): Remove/Take off immediately all contaminated clothing. Rinse skin with water/shower.*  
P405 *Store locked up.*  
P501 *Dispose of contents/container in accordance with local/regional/national/international regulations.*
- ◊ **Chemical safety assessment:** A Chemical Safety Assessment has not been carried out.

### 16. Other information

*This information is based on our present knowledge. However, this shall not constitute a guarantee for any specific product features and shall not establish a legally valid contractual relationship.*

- ◊ Relevant phrases  
H226 *Flammable liquid and vapour.*  
H304 *May be fatal if swallowed and enters airways.*  
H315 *Causes skin irritation.*  
H317 *May cause an allergic skin reaction.*  
H400 *Very toxic to aquatic life.*  
H410 *Very toxic to aquatic life with long lasting effects.*  
H411 *Toxic to aquatic life with long lasting effects.*
- R10 *Flammable.*  
R22 *Harmful if swallowed.*  
R38 *Irritating to skin.*  
R43 *May cause sensitisation by skin contact.*  
R50/53 *Very toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment.*  
R51/53 *Toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment.*  
R65 *Harmful: may cause lung damage if swallowed.*
- ◊ **Department issuing MSDS:** Regulatory Affairs
- ◊ **Contact:** Dr. Maja Zippel
- ◊ **Abbreviations and acronyms:**  
RID: *Règlement international concernant le transport des marchandises dangereuses par chemin de fer (Regulations Concerning the International Transport of Dangerous Goods by Rail)*  
ICAO: *International Civil Aviation Organization*  
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*
- ◊ \* Data compared to the previous version altered.