

# Safety data sheet

## according to Regulation (EC) No. 1907/2006



Printing date 07.09.2012

Version number 1

Revision: 07.09.2012

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

· **Product identifier**

· **Trade name:** Oil of mandarin, Italian

· **Article number:** 3796

· **CAS Number:**

84929-38-4

· **EC number:**

284-521-0

· **Registration number**

A registration number is not available for this substance as the substance or its use are exempted from registration according to Article 2 REACH Regulation (EC) No 1907/2006, the annual tonnage does not require a registration or the registration is envisaged for a later registration deadline.

· **Relevant identified uses of the substance or mixture and uses advised against**

No further relevant information available.

· **Application of the substance / the preparation** Laboratory chemical

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

· **Manufacturer/Supplier:**

Carl Roth GmbH + Co. KG

Schoemperlenstraße 3-5

76185 Karlsruhe

Germany

Telefon: +49/(0)721 5606-0

Telefax: +49/(0)721 5606-149

E-Mail: [sicherheit@carlroth.de](mailto:sicherheit@carlroth.de)

· **Further information obtainable from:** Department Health, Safety and Environment

· **Emergency telephone number:** Poison Centre Munich

Telefon +49/(0)89 19240

### 2 Hazards identification

· **Classification of the substance or mixture**

· **Classification according to Regulation (EC) No 1272/2008**



GHS02 flame

Flam. Liq. 3

H226 Flammable liquid and vapour.



GHS08 health hazard

Asp. Tox. 1

H304 May be fatal if swallowed and enters airways.



GHS09 environment

Aquatic Acute 1 H400 Very toxic to aquatic life.

Aquatic Chronic 1 H410 Very toxic to aquatic life with long lasting effects.



GHS07

Skin Irrit. 2

H315 Causes skin irritation.

Skin Sens. 1

H317 May cause an allergic skin reaction.

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### Classification according to Directive 67/548/EEC or Directive 1999/45/EC



Xn; Harmful

R65: Harmful: may cause lung damage if swallowed.



Xi; Irritant

R38: Irritating to skin.



Xi; Sensitising

R43: May cause sensitisation by skin contact.



N; Dangerous for the environment

R50/53: Very toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment.

R10: Flammable.

### Label elements

#### Labelling according to Regulation (EC) No 1272/2008

The substance is classified and labelled according to the CLP regulation.

### Hazard pictograms



GHS02



GHS07



GHS08



GHS09

### Signal word Danger

### Hazard statements

H226 Flammable liquid and vapour.

H315 Causes skin irritation.

H317 May cause an allergic skin reaction.

H304 May be fatal if swallowed and enters airways.

H410 Very toxic to aquatic life with long lasting effects.

### Precautionary statements

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

P280 Wear protective gloves/protective clothing/eye protection/face protection.

P273 Avoid release to the environment.

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.

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

### Other hazards

All chemicals are potentially dangerous. They should only be handled by specially trained personnel.

### Results of PBT and vPvB assessment

#### PBT: Not applicable.

#### vPvB: Not applicable.

## 3 Composition/information on ingredients

### Chemical characterization: Substances

#### CAS No. Description

84929-38-4 Oil of tangerine

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- Identification number(s)
- EC number: 284-521-0

## 4 First aid measures



### · Description of first aid measures

#### · General information:

General advice: No induce of vomiting by layman.

Remove any clothing soiled by the product.

- **After inhalation:** Supply fresh air; if there is any trouble seek medical help.

#### · After skin contact:

Wash with water and soap.

If skin irritation continues, consult a doctor.

- **After eye contact:** Rinse opened eye for 10 minutes under running water. Then consult a doctor.

#### · After swallowing:

Rinse out mouth and drink a glass of water. Do not induce vomiting.

In case of spontaneous vomiting: Risk of aspiration. Pulmonary failure possible.

Seek medical treatment.

#### · 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:

Use fire extinguishing methods suitable to surrounding conditions.

CO<sub>2</sub>, powder or water spray. Fight larger fires with water spray or alcohol resistant foam.

- **For safety reasons unsuitable extinguishing agents:** Water with full jet

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

In the event of fire development of hazardous combustion gases or vapours possible.

#### · Advice for firefighters

#### · Protective equipment:

Wear self-contained respiratory protective device.

Wear fully protective suit.

- **Additional information** Prevent fire-fighting water from entering surface water or groundwater.

## 6 Accidental release measures

### · Personal precautions, protective equipment and emergency procedures

Do not breathe vapour/spray.

Avoid contact with the eyes and skin.

Keep away from ignition sources.

Ensure adequate ventilation

Wear protective clothing.

#### · Environmental precautions:

Inform respective authorities in case of seepage into water course or sewage system.

Do not allow to enter sewers/ground water or penetrate the soil.

Keep contaminated washing water and dispose of appropriately.

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- **Methods and material for containment and cleaning up:**  
Absorb with liquid-binding material (e.g. Rotisorb® Art.-Nr. 1710.1).  
Dispose of the material collected according to regulations.  
Dispose contaminated material as waste according to item 13.
- **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**  
Do not spray on a naked flame or any incandescent material.  
Ensure good interior ventilation, especially at floor level. (Fumes are heavier than air).  
Handling corresponding to laboratory safety guidelines.
- **Information about fire - and explosion protection:**  
Fumes can combine with air to form an explosive mixture.  
Do not spray onto a naked flame or any incandescent material.



Keep ignition sources away - Do not smoke.

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:** Store away from foodstuffs.
- **Further information about storage conditions:**  
Keep away from sources of ignition and heat.  
Keep container tightly sealed.
- **Specific end use(s)** No further relevant information available.

## 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:** Not required.
- **Additional information:** The lists valid during the making were used as basis.
- **Exposure controls**
- **Personal protective equipment:**
- **General protective and hygienic measures:**  
Do not eat, drink, smoke or sniff while working.  
Keep away from foodstuffs, beverages and feed.  
Immediately remove all soiled and contaminated clothing.  
Wash hands before breaks and at the end of work.  
Avoid contact with the eyes and skin.
- **Individual protection measures**  
Protective clothing needs to be selected specifically for the workplace, depending on concentrations and quantities of the hazardous substances handled. The chemical resistance of the protective equipment should be enquired at the respective supplier.

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- **Respiratory protection:**



Required when vapours/aerosols are generated.

- **Protection of hands:**



Protective gloves

Due to missing tests no recommendation to the glove material can be given for the product.

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.

- **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

- **Body protection:** Protective work clothing

## 9 Physical and chemical properties

- **Information on basic physical and chemical properties**

- **General Information**

- **Appearance:**

Form:	Oily
Colour:	Red-brown
Odour:	Characteristic
Odour threshold:	Not determined.

· pH-value:	Not determined.
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- **Change in condition**

Melting point/Melting range:	Undetermined.
Boiling point/Boiling range:	Undetermined.

· Flash point:	50°C
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· Flammability (solid, gaseous):	Not applicable.
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· Ignition temperature:	No information available
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· Decomposition temperature:	Not determined.
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· <b>Self-igniting:</b>	Not determined.
· <b>Danger of explosion:</b>	Product is not explosive. However, formation of explosive air/vapour mixtures is possible.
· <b>Explosion limits:</b>	
Lower:	Not determined.
Upper:	Not determined.
· <b>Vapour pressure:</b>	Not determined.
· <b>Density at 20°C:</b>	0.85 g/cm <sup>3</sup>
· <b>Relative density</b>	Not determined.
· <b>Vapour density</b>	Not determined.
· <b>Evaporation rate</b>	Not determined.
· <b>Solubility in / Miscibility with water:</b>	Not miscible or difficult to mix.
· <b>Partition coefficient (n-octanol/water):</b>	Not determined.
· <b>Viscosity:</b>	
Dynamic:	Not determined.
Kinematic:	Not determined.
· <b>Other information</b>	No further relevant information available.

## 10 Stability and reactivity

- **Reactivity**
- **Chemical stability**
- **Thermal decomposition / conditions to be avoided:**  
No decomposition if used and stored according to specifications.
- **Possibility of hazardous reactions** No information available.
- **Conditions to avoid** No further relevant information available.
- **Incompatible materials:** No information available.
- **Hazardous decomposition products:** In case of fire: see item 5.

## 11 Toxicological information

- **Information on toxicological effects**
- **Acute toxicity:**

### · **LD/LC50 values relevant for classification:**

Oral	LD50	4400 mg/kg (rat)
Dermal	LD50	> 5000 mg/kg (rabbit)

- **Specific symptoms in biological assay:** No information available.
- **Primary irritant effect:**
- on the skin:**  
Irritant to skin and mucous membranes.  
Risk of skin sensitization.
- on the eye:** No information available.
- **after inhalation:** No information available.
- **Sensitization:** Sensitization possible through skin contact.
- **Subacute to chronic toxicity:** No information available.
- **Additional toxicological information:** May cause lung damage if swallowed. Risk of aspiration.
- **Further information:** The product should be handled with the care usual when dealing with chemicals.
- **Toxicokinetics, metabolism and distribution** No information available.
- **Acute effects (acute toxicity, irritation and corrosivity)** No information available.

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- **Sensitisation** No information available.
- **Repeated dose toxicity** No information available.
- **CMR effects (carcinogenity, mutagenicity and toxicity for reproduction)** No information available



### 12 Ecological information

- **Toxicity**
- **Aquatic toxicity:** Quantitative data on the ecological effect of this product are not 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.
- **Ecotoxical effects:**
- **Remark:**  
Do not allow to enter waters, waste water, or soil!  
Very toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment.  
Also poisonous for fish and plankton in water bodies.
- **Results of PBT and vPvB assessment**
- **PBT:** Not applicable.
- **vPvB:** Not applicable.
- **Other adverse effects** No further relevant information available.

### 13 Disposal considerations

- **Waste treatment methods**
- **Recommendation**  
This material and its container must be disposed of as hazardous waste.  
The disposal is regionally differently regulated, therefore the kind of disposal is to be inquired at the responsible authorities.
- **Uncleaned packaging:**
- **Recommendation:** Disposal according to official regulations.

### 14 Transport information

- |   |   |
|---|---|
| <ul style="list-style-type: none"> <li>· <b>UN-Number</b></li> <li>· <b>ADR, IMDG, IATA</b></li> </ul>  | UN1169  |
| <ul style="list-style-type: none"> <li>· <b>UN proper shipping name</b></li> <li>· <b>ADR</b></li> <li>· <b>IMDG</b></li> <li>· <b>IATA</b></li> </ul>                  | 1169 EXTRACTS, AROMATIC, LIQUID (not viscous),<br>ENVIRONMENTALLY HAZARDOUS<br>EXTRACTS, AROMATIC, LIQUID, MARINE POLLUTANT<br>EXTRACTS, AROMATIC, LIQUID |
| <ul style="list-style-type: none"> <li>· <b>Transport hazard class(es)</b></li> <li>· <b>ADR, IMDG</b></li> </ul>   |   |
|   |   |
| <ul style="list-style-type: none"> <li>· <b>Class</b></li> </ul>  | 3 Flammable liquids.  |

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· <b>Label</b>	3
· <b>IATA</b>	
	
· <b>Class</b>	3 Flammable liquids.
· <b>Label</b>	3
· <b>Packing group</b>	
· <b>ADR, IMDG, IATA</b>	III
· <b>Environmental hazards:</b>	Environmentally hazardous substance, liquid; Marine Pollutant
· <b>Marine pollutant:</b>	Yes (P) Symbol (fish and tree)
· <b>Special marking (ADR):</b>	Symbol (fish and tree)
· <b>Special precautions for user</b>	Warning: Flammable liquids.
· <b>Danger code (Kemler):</b>	30
· <b>EMS Number:</b>	F-E, S-E
· <b>Transport in bulk according to Annex II of MARPOL73/78 and the IBC Code</b>	Not applicable.
· <b>Transport/Additional information:</b>	
· <b>ADR</b>	
· <b>Limited quantities (LQ)</b>	5L
· <b>Transport category</b>	3
· <b>Tunnel restriction code</b>	D/E
· <b>UN "Model Regulation":</b>	UN1169, EXTRACTS, AROMATIC, LIQUID (not viscous), ENVIRONMENTALLY HAZARDOUS, 3, III

### 15 Regulatory information

- **Safety, health and environmental regulations/legislation specific for the substance or mixture**
- **National regulations:**
- **Information about limitation of use:** In dealing with chemicals the national laws must be observed.
- **Waterhazard class:** Water hazard class 2 (Self-assessment): hazardous for water.
- **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.

- **Department issuing MSDS:** Department: Health, Safety and Environment
- **Contact:** Herr Heine
- **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)

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)

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

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IATA: International Air Transport Association

P: Marine Pollutant

GHS: Globally Harmonized System of Classification and Labelling of Chemicals

EINECS: European Inventory of Existing Commercial Chemical Substances

CAS: Chemical Abstracts Service (division of the American Chemical Society)

LC50: Lethal concentration, 50 percent

LD50: Lethal dose, 50 percent

· **\* Data compared to the previous version altered.**

GB