

Safety Data Sheet

according to Regulation (EC) No 1907/2006 (REACH)
Classifications according to Regulation (EC) No 1272/2008.
Printdate 16 Jan 2025

1. IDENTIFICATION OF THE SUBSTANCE/MIXTURE AND OF THE COMPANY/UNDERTAKING

1.1. Product name:

Carbamazepine

1.1. Catalog No.:

689771

1.2. Relevant identified uses of the substance or mixture

Identified: Laboratory chemical
uses: R&D

1.3. Uses advised against:

HPC Standards GmbH
Am Wieseneck 7

04451 Cunnersdorf
Deutschland

Tel. +49 34291 3372-36
Fax. +49 34291 3372-39
contact@hpc-standards.com

1.4. Emergency telephone number

HPC Standards Tel. +49 34291 3372-36
This number is only available during office hours.

2. HAZARDS IDENTIFICATION

· 2.1 Classification of the substance or mixture
· Classification according to Regulation (EC) No 1272/2008
GHS08 health hazard
Resp. Sens. 1 H334 May cause allergy or asthma symptoms or breathing difficulties if inhaled.
Repr. 2 H361d Suspected of damaging the unborn child.
GHS07
Acute Tox. 4 H302 Harmful if swallowed.
Skin Sens. 1 H317 May cause an allergic skin reaction.
Aquatic Chronic 3 H412 Harmful to aquatic life with long lasting effects

2.2. Label elements

2.2.1. Pictogram



2.2.2.

- 2.2 Label elements
- Labelling according to Regulation (EC) No 1272/2008
- The substance is classified and labelled according to the CLP regulation.
- Hazard pictograms
- GHS07 GHS08
- Signal word Danger
- Hazard statements
- H302 Harmful if swallowed.
- H334 May cause allergy or asthma symptoms or breathing difficulties if inhaled.
- H317 May cause an allergic skin reaction.
- H361d Suspected of damaging the unborn child.
- H412 Harmful to aquatic life with long lasting effects.
- Precautionary statements
- P261 Avoid breathing dust/fume/gas/mist/vapours/spray.
- P280 Wear protective gloves/protective clothing/eye protection/face protection.
- P284 [In case of inadequate ventilation] wear respiratory protection.
- P321 Specific treatment (see on this label).
- P405 Store locked up.
- P501 Dispose of contents/container in accordance with local/regional/national/international regulations.
- 2.3 Other hazards
- Results of PBT and vPvB assessment
- PBT: Not applicable.
- vPvB: Not applicable.

3. COMPOSITION/INFORMATION ON INGREDIENTS

- 3.1 Chemical characterisation: Substances
- CAS No. Description
- 298-46-4 Carbamazepine
- Identification number(s) None
- EC number: 206-062-7
- RTECS: HN8225000
- Additional information: For the wording of the listed hazard phrases refer to section 16.

3.1.1. Formula

C₁₅H₁₂N₂O

3.1.2. Molecular Weight (g/mol)

236.27

3.1.3. CAS-No.

298-46-4

4. FIRST AID MEASURES

- 4.1 Description of first aid measures
- General information:
Symptoms of poisoning may occur even after several hours; therefore medical observation for at least 48 hours after the accident is recommended
- After inhalation:
Supply fresh air and call a doctor.
In case of unconsciousness place patient in recovery position for transport.
- 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:
Rinse mouth. Do not induce vomiting.
Seek medical treatment.
- 4.2 Most important symptoms and effects, both acute and delayed No further relevant information available.
- 4.3 Indication of any immediate medical attention and special treatment needed
No further relevant information available.

5. FIRE-FIGHTING MEASURES

- 5.1 Extinguishing media
- Suitable extinguishing agents: Use fire extinguishing methods suitable for surrounding conditions.
- 5.2 Special hazards arising from the substance or mixture
Formation of toxic gases is possible during heating or in case of fire.
- 5.3 Advice for firefighters
- Protective equipment: Wear self-contained respiratory protective device.

6. ACCIDENTAL RELEASE MEASURES

- 6.1 Personal precautions, protective equipment and emergency procedures Avoid formation of dust.
- 6.2 Environmental precautions:
Inform respective authorities in case of seepage into water course or sewage system.
Do not allow to enter sewers/ surface or ground water.
- 6.3 Methods and material for containment and cleaning up:
Dispose of contaminated material as waste according to item 13.
- 6.4 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

8. EXPOSURE CONTROLS/PERSONAL PROTECTION

- Additional information about design of technical facilities: No further data; see item 7.
- 8.1 Control parameters
- Ingredients with limit values that require monitoring at the workplace: Not required.
- Additional information: Lists used were valid at the time of SDS preparation.
- 8.2 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:
In case of brief exposure or low pollution use respiratory filter device. In case of intensive or longer exposure use self-contained respiratory protective device.
Follow the OSHA respirator regulations found in 29 CFR 1910.134 or European Standard EN 149. Use a NIOSH/MSHA or European Standard EN 149 approved respirator if exposure limits are exceeded or if irritation or other symptoms are experienced
- Protection of hands:
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
The protective gloves to be used must comply with the specifications of EC Directive 89/686/EEC and the related standard EN374
Protective gloves
- Material of gloves Butyl rubber, BR
- 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: Safety glasses

9. PHYSICAL AND CHEMICAL PROPERTIES

- 9.1 Information on basic physical and chemical properties
- General Information
- Appearance:
Form: Solid
Colour: White
- Odour: Odourless
- Odour threshold: Not determined.
- pH-value: Not applicable.
- Change in condition
Melting point/freezing point: 191 (dec.) °C
Initial boiling point and boiling range: Not determined.
- Flash point: Not applicable.
- Flammability (solid, gas): Not determined.
- Ignition temperature: 550 °C
- Decomposition temperature: Not determined.
- Auto-ignition temperature: Not determined.
- Explosive properties: Not determined.
- Explosion limits:
Lower: Not determined.
Upper: Not determined.
- Vapour pressure: Not applicable.
- Density: Not determined.
- Relative density Not determined.
- Vapour density Not applicable.

- Evaporation rate Not applicable.
- Solubility in / Miscibility with Dimethyl Sulfoxide, Methanol
- water at 25 °C: 0.17 g/l
- Partition coefficient: n-octanol/water: 1.76-2.45 log P
- Viscosity:
Dynamic: Not applicable.
Kinematic: Not applicable.
- 9.2 Other information No further relevant information available

10. STABILITY AND REACTIVITY

- 10.1 Reactivity
Stable under normal conditions.
No further relevant information available.
- 10.2 Chemical stability Stable under normal conditions.
- Thermal decomposition / conditions to be avoided:
Formation of toxic gases is possible during heating or in case of fire.
- 10.3 Possibility of hazardous reactions No dangerous reactions known.
- 10.4 Conditions to avoid Heat.
- 10.5 Incompatible materials: Strong oxidizing agents.
- 10.6 Hazardous decomposition products:
Formation of toxic gases is possible during heating or in case of fire.

11. TOXICOLOGICAL INFORMATION

- 11.1 Information on toxicological effects
- Acute toxicity
Harmful if swallowed.
- LD/LC50 values relevant for classification:
Oral LD50 529 mg/kg (mouse)
1,957 mg/kg (rat)
- Primary irritant effect:
· Skin corrosion/irritation Based on available data, the classification criteria are not met.
- Serious eye damage/irritation Based on available data, the classification criteria are not met.
- Respiratory or skin sensitisation
May cause allergy or asthma symptoms or breathing difficulties if inhaled.
May cause an allergic skin reaction.
- CMR effects (carcinogenicity, mutagenicity and toxicity for reproduction)
Oral Reproductive 765 mg/kg (rat)
Repr. 2
- Germ cell mutagenicity Based on available data, the classification criteria are not met.
- Carcinogenicity Based on available data, the classification criteria are not met.
- Reproductive toxicity
Suspected of damaging the unborn child.
- 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.

12. ECOLOGICAL INFORMATION

- 12.1 Toxicity
 - Aquatic toxicity:
EC50/48 h 97.8 mg/l (crustacean)
EC50/24h 92 mg/L (daphnia)
LC50/96 h 43 mg/l (fish)
- 12.2 Persistence and degradability No further relevant information available.
- 12.3 Bioaccumulative potential No further relevant information available.
- 12.4 Mobility in soil No further relevant information available.
- Ecotoxicological effects:
 - Remark: Harmful to fish
- Additional ecological information:
- General notes:
Water hazard class 2 (German Regulation) (Assessment by list): 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.
Harmful to aquatic organisms
- 12.5 Results of PBT and vPvB assessment
 - PBT: Not applicable.
 - vPvB: Not applicable.
- 12.6 Other adverse effects No further relevant information available

13. DISPOSAL CONSIDERATIONS

- 13.1 Waste treatment methods
 - Recommendation
Must not be disposed of together with household garbage. Do not allow product to reach sewage system.
- European waste catalogue
Waste disposal key numbers from EWC have to be assigned depending on origin and processing.
- Uncleaned packaging:
 - Recommendation: Dispose of in accordance with national regulations

14. TRANSPORT INFORMATION

- 14.1 UN-Number
- ADR, IMDG, IATA Not applicable
- ADR, IMDG, IATA Not applicable
- 14.3 Transport hazard class(es)
- ADR, ADN, IMDG, IATA
- Class Not applicable- 14.4 Packing group
- ADR, IMDG, IATA Not applicable
- 14.5 Environmental hazards: Not applicable.
- 14.6 Special precautions for user Not applicable.
- 14.7 Transport in bulk according to Annex II of Marpol and the IBC Code Not applicable.
- UN "Model Regulation": Not applicable

15. REGULATORY INFORMATION

- 15.1 Safety, health and environmental regulations/legislation specific for the substance or mixture
 - Directive 2012/18/EU

- Named dangerous substances - ANNEX I Substance is not listed.
- 15.2 Chemical safety assessment: A Chemical Safety Assessment has not been carried out.

16. OTHER INFORMATION

The above information is believed to be correct but does not purport to be all inclusive and shall be used only as a guide. The information in this document is based on the present state of our knowledge and is applicable to the product with regard to appropriate safety precautions. It does not represent any guarantee of the properties of the product. For lab use only!