

Glass edge laquer

Revision date: 08/01/2023

Product code: BO5007005

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1. Identification
Product identifier

Glass edge laquer

Recommended use of the chemical and restrictions on use
Use of the substance/mixture

Clear coating

Details of the supplier of the safety data sheet
Manufacturer

| | | |
|-------------------------|-------------------|------------------------------|
| Company name: | BOHLE AG | |
| Street: | Dieselstr. 10 | |
| Place: | D-42781 Haan | |
| Telephone: | +49 2129 5568-0 | Telefax: +49 2129 5568-282 |
| e-mail: | info@bohle.de | |
| Contact person: | Dr. Martin Schade | Telephone: +49 2129 5568-300 |
| e-mail: | MSDS@bohle.de | |
| Internet: | www.bohle.com | |
| Responsible Department: | Chemie | |

Trader of the product

| | |
|--------------------------|---------------------------------|
| Company name: | Bohle America, Inc. |
| Street: | 10924 Granite Street, Suite 200 |
| Place: | USA-NC 28273 Charlotte |
| e-mail (Contact person): | sales@bohle.com |

Emergency phone number: Emergency CONTACT (24-Hour-Number): GBK GmbH +49 (0)6132-84463

2. Hazard(s) identification
Classification of the chemical
Regulation (EC) No 1272/2008

Flam. Liq. 2; H225
 Eye Dam. 1; H318
 STOT SE 3; H336
 Aquatic Chronic 3; H412

Full text of hazard statements: see SECTION 16.

Label elements
Regulation (EC) No 1272/2008
Hazard components for labelling

isopropyl acetate
 Naphtha (petroleum), hydrotreated light; Low boiling point hydrogen treated naphtha
 2-methylpropan-1-ol; iso-butanol
 butan-1-ol; n-butanol

Signal word: Danger

Pictograms:

Hazard statements

H225 Highly flammable liquid and vapor

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H318 Causes serious eye damage
 H336 May cause drowsiness or dizziness
 H412 Harmful to aquatic life with long lasting effects

Precautionary statements

P210 Keep away from heat/sparks/open flames/hot surfaces. - No smoking.
 P243 Take precautionary measures against static discharge.
 P271 Use only outdoors or in a well-ventilated area.
 P273 Avoid release to the environment.
 P280 Wear protective gloves/protective clothing/eye protection/face protection.
 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.
 P370+P378 In case of fire: Use Carbon dioxide (CO₂), Sand, Extinguishing powder to extinguish.

Special labelling of certain mixtures

EUH066 Repeated exposure may cause skin dryness or cracking.

3. Composition/information on ingredients
Mixtures
Chemical characterization

One-pack performance coatings

Hazardous components

| CAS No | Components | | | Quantity |
|------------|--|--------------|------------------|----------|
| | EC No | Index No | REACH No | |
| | Classification (Regulation (EC) No 1272/2008) | | | |
| 108-21-4 | isopropyl acetate | | | <25 % |
| | 203-561-1 | 607-024-00-6 | 01-2119537214-46 | |
| | Flam. Liq. 2, Eye Irrit. 2, STOT SE 3; H225 H319 H336 EUH066 | | | |
| 64742-49-0 | Naphtha (petroleum), hydrotreated light; Low boiling point hydrogen treated naphtha | | | <25 % |
| | 265-151-9 | | 01-2119473851-33 | |
| | Flam. Liq. 2, STOT SE 3, Asp. Tox. 1, Aquatic Chronic 2; H225 H336 H304 H411 | | | |
| 67-63-0 | propan-2-ol; isopropyl alcohol; isopropanol | | | <10 % |
| | 200-661-7 | 603-117-00-0 | 01-2119457558-25 | |
| | Flam. Liq. 2, Eye Irrit. 2, STOT SE 3; H225 H319 H336 | | | |
| 123-86-4 | n-butyl acetate | | | <10 % |
| | 204-658-1 | 607-025-00-1 | 01-2119485493-29 | |
| | Flam. Liq. 3, STOT SE 3; H226 H336 EUH066 | | | |
| 78-83-1 | 2-methylpropan-1-ol; iso-butanol | | | <10 % |
| | 201-148-0 | 603-108-00-1 | 01-2119484609-23 | |
| | Flam. Liq. 3, Skin Irrit. 2, Eye Dam. 1, STOT SE 3, STOT SE 3; H226 H315 H318 H335 H336 | | | |
| 71-36-3 | butan-1-ol; n-butanol | | | <2,5 % |
| | 200-751-6 | 603-004-00-6 | | |
| | Flam. Liq. 3, Acute Tox. 4, Skin Irrit. 2, Eye Dam. 1, STOT SE 3, STOT SE 3; H226 H302 H315 H318 H335 H336 | | | |
| 107-98-2 | 1-methoxy-2-propanol; monopropylene glycol methyl ether | | | <2,5 % |
| | 203-539-1 | 603-064-00-3 | 01-2119457435-35 | |
| | Flam. Liq. 3, STOT SE 3; H226 H336 | | | |

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

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Specific Conc. Limits, M-factors and ATE

| CAS No | EC No | Components | Quantity |
|----------|-----------|--|----------|
| | | Specific Conc. Limits, M-factors and ATE | |
| 108-21-4 | 203-561-1 | isopropyl acetate | <25 % |
| | | inhalation: LC50 = 50,6 mg/l (vapours); dermal: LD50 = > 17400 mg/kg; oral: LD50 = 6750 mg/kg | |
| 67-63-0 | 200-661-7 | propan-2-ol; isopropyl alcohol; isopropanol | <10 % |
| | | inhalation: LC50 = 30 mg/l (vapours); dermal: LD50 = 13400 mg/kg; oral: LD50 = 4570 mg/kg | |
| 78-83-1 | 201-148-0 | 2-methylpropan-1-ol; iso-butanol | <10 % |
| | | inhalation: LC50 = > 24 mg/l (vapours); dermal: LD50 = > 2000 mg/kg; oral: LD50 = > 2830 mg/kg | |
| 71-36-3 | 200-751-6 | butan-1-ol; n-butanol | <2,5 % |
| | | oral: ATE = 500 mg/kg | |
| 107-98-2 | 203-539-1 | 1-methoxy-2-propanol; monopropylene glycol methyl ether | <2,5 % |
| | | dermal: LD50 = 11000 mg/kg; oral: LD50 = > 5000 mg/kg | |

4. First-aid measures**Description of first aid measures****General information**

Take off immediately all contaminated clothing.

After inhalation

Move to fresh air. Consult a physician after significant exposure. If victim is unconscious but breathing: Victim to lie down in the recovery position, cover and keep him warm. Call a physician immediately.

After contact with skin

Wash off immediately with soap and plenty of water. If skin irritation persists, call a physician.

After contact with eyes

IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
If eye irritation persists, consult a specialist.

After ingestion

Clean mouth with water and drink afterwards plenty of water. Do NOT induce vomiting. Give sodium sulfate as laxative (1 tablespoon in 1 glass of water) with plenty of activated coal.

Most important symptoms and effects, both acute and delayed

No information available.

Indication of any immediate medical attention and special treatment needed

No information available.

5. Fire-fighting measures**Extinguishing media****Suitable extinguishing media**

alcohol-resistant foam, dry chemical, carbon dioxide (CO₂)

Unsuitable extinguishing media

high volume water jet

Specific hazards arising from the chemical

In use, may form flammable/explosive vapor-air mixture.
Fire may cause evolution of: Carbon monoxide, Carbon dioxide)

Special protective equipment and precautions for fire-fighters

In the event of fire, wear self-contained breathing apparatus. Standard procedure for chemical fires.

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Additional information

Use water spray to cool unopened containers.

Collect contaminated fire extinguishing water separately. Do not allow entering drains or surface water.

6. Accidental release measures**Personal precautions, protective equipment and emergency procedures****General advice**

Use personal protective equipment. Keep people away from and upwind of spill/leak.

Ensure adequate ventilation.

Keep away from heat and sources of ignition.

Avoid contact with skin and eyes. Do not breathe vapour.

Environmental precautions

Do not flush into surface water or sanitary sewer system.

Due to danger of explosion, prevent leakage of vapors into cellars, flues and ditches.

Local authorities should be advised if significant spillages cannot be contained.

Methods and material for containment and cleaning up**Other information**

Provide adequate ventilation. Soak up with inert absorbent material (e.g. sand, silica gel, acid binder, universal binder, sawdust). Collect in closed and suitable containers for disposal.

Reference to other sections

Safe handling: see section 7

Personal protection equipment (PPE): see section 8

Disposal: see section 13

7. Handling and storage**Precautions for safe handling****Advice on safe handling**

Provide adequate ventilation as well as local exhaust at critical locations.

Provide room air exhaust at ground level.

Avoid formation of aerosol. Do not breathe vapour/aerosol.

Avoid contact with the skin and the eyes.

Advice on protection against fire and explosion

Take precautionary measures against static discharges. Vapours are heavier than air and may spread along floors. Vapours may form explosive mixtures with air. Keep away from heat and sources of ignition. Do not smoke.

Advice on general occupational hygiene

Avoid contact with skin, eyes and clothing. Provide adequate ventilation. Take off all contaminated clothing immediately. Keep away from food, drink and animal feedingstuffs. When using do not eat or drink. Do not smoke. Wash hands before breaks and at the end of workday.

Conditions for safe storage, including any incompatibilities**Requirements for storage rooms and vessels**

Keep containers tightly closed in a cool, well-ventilated place.

8. Exposure controls/personal protection**Control parameters**

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Exposure limits

| CAS No | Substance | ppm | mg/m ³ | f/cc | Category | Origin |
|----------|-----------------------------------|------|-------------------|------|---------------|--------|
| 64-17-5 | Ethyl alcohol (Ethanol) | 1000 | 1900 | | TWA (8 h) | PEL |
| 64-17-5 | Ethyl alcohol | 1000 | 1900 | | TWA (8 h) | REL |
| 78-83-1 | Isobutyl alcohol | 100 | 300 | | TWA (8 h) | PEL |
| | | 50 | 150 | | TWA (8 h) | REL |
| 108-21-4 | Isopropyl acetate | 250 | 950 | | TWA (8 h) | PEL |
| 67-63-0 | Isopropyl alcohol | 400 | 980 | | TWA (8 h) | PEL |
| | | 400 | 980 | | TWA (8 h) | REL |
| | | 500 | 1225 | | STEL (15 min) | REL |
| 123-86-4 | n-Butyl acetate | 150 | 710 | | TWA (8 h) | REL |
| | | 200 | 950 | | STEL (15 min) | REL |
| 71-36-3 | n-Butyl alcohol | 100 | 300 | | TWA (8 h) | PEL |
| | | C 50 | C 150 | | Ceiling | REL |
| 123-86-4 | n-Butyl-acetate | 150 | 710 | | TWA (8 h) | PEL |
| 107-98-2 | Propylene glycol monomethyl ether | 100 | 360 | | TWA (8 h) | REL |
| | | 150 | 540 | | STEL (15 min) | REL |

DNEL/DMEL values

| CAS No | Substance | Exposure route | Effect | Value |
|--------------------------|---|----------------|----------|-----------------------|
| 67-63-0 | propan-2-ol; isopropyl alcohol; isopropanol | | | |
| Consumer DNEL, long-term | | oral | systemic | 26 mg/kg bw/day |
| Consumer DNEL, long-term | | dermal | systemic | 319 mg/kg bw/day |
| Worker DNEL, long-term | | dermal | systemic | 888 mg/kg bw/day |
| Consumer DNEL, long-term | | inhalation | systemic | 89 mg/m ³ |
| Worker DNEL, long-term | | inhalation | systemic | 500 mg/m ³ |

PNEC values

| CAS No | Substance | Value |
|--|---|------------|
| 67-63-0 | propan-2-ol; isopropyl alcohol; isopropanol | |
| Freshwater | | 140,9 mg/l |
| Freshwater (intermittent releases) | | 140,9 mg/l |
| Marine water | | 140,9 mg/l |
| Freshwater sediment | | 552 mg/kg |
| Marine sediment | | 552 mg/kg |
| Micro-organisms in sewage treatment plants (STP) | | 2251 mg/l |
| Soil | | 28 mg/kg |

Exposure controls
Appropriate engineering controls

Even in case of a full release, due to the small amount of substances present, it is not expected that exposure limits will be reached. However it is the duty of the user to verify this and follow given exposure limits at the workplace.

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Individual protection measures, such as personal protective equipment
Eye/face protection

safety glasses with side-shields conforming to EN166

Hand protection

The selected protective gloves have to satisfy the specifications of EU Directive 89/689/EEC and the standard EN 374 derived from it.

 Glove material: Butyl caoutchouc (butyl rubber) $\geq 0,5\text{mm}$, NBR (Nitrile rubber) $\geq 0,35\text{mm}$

 Breakthrough time: ≥ 480 min.

Skin protection

impervious clothing

Respiratory protection

This product should not be used under conditions of poor ventilation unless a protective mask with an appropriate gas filter (i.e. type A1 according to standard EN 14387) is used.

9. Physical and chemical properties
Information on basic physical and chemical properties

| | |
|-----------------|----------------|
| Physical state: | liquid |
| Color: | clear |
| Odor: | characteristic |

Test method

| | |
|---|-------------------------|
| Melting point/freezing point: | not determined |
| Boiling point or initial boiling point and boiling range: | 78 °C |
| Lower explosion limits: | 0,8 vol. % |
| Upper explosion limits: | 19 vol. % |
| Flash point: | 2 °C |
| Auto-ignition temperature: | 200 °C |
| pH-Value (at 20 °C): | not applicable |
| Water solubility: | insoluble |
| Solubility in other solvents | |
| miscible with most organic solvents | |
| Vapor pressure: | 1.100 hPa |
| (at 50 °C) | |
| Density (at 20 °C): | 0,870 g/cm ³ |

DIN 51755

Other information
Information with regard to physical hazard classes
Explosive properties

In use, may form flammable/explosive vapour-air mixture.

Self-ignition temperature

not auto-flammable

Other safety characteristics

| | |
|--------------------------|----------------|
| Solvent separation test: | <3% |
| Solvent content: | ca. 79% |
| Solid content: | 21% |
| Viscosity / dynamic: | not determined |
| (at 20 °C) | |
| Flow time: | 13 s |
| (at 20 °C) | |

10. Stability and reactivity

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Reactivity

None under normal processing.

Chemical stability

No decomposition if used as directed.

Possibility of hazardous reactions

Vapours may form explosive mixture with air.

Conditions to avoid

Keep away from heat and sources of ignition.

Take precautionary measures against static discharge.

Incompatible materials

strong acids and oxidizing agents

Hazardous decomposition products

None known.

11. Toxicological information
Information on toxicological effects
Acute toxicity

LD50/oral/rat = >2000mg/kg

| CAS No | Components | | | | |
|----------|---|-----------------------|---------|--------|--------|
| | Exposure route | Dose | Species | Source | Method |
| 108-21-4 | isopropyl acetate | | | | |
| | oral | LD50 mg/kg 6750 | Rat | GESTIS | |
| | dermal | LD50 mg/kg > 17400 | Rabbit | GESTIS | |
| | inhalation (4 h) vapour | LC50 50,6 mg/l | Rat | | |
| 67-63-0 | propan-2-ol; isopropyl alcohol; isopropanol | | | | |
| | oral | LD50 mg/kg 4570 | Rat | | |
| | dermal | LD50 mg/kg 13400 | Rabbit | | |
| | inhalation (4 h) vapour | LC50 30 mg/l | Rat | | |
| 78-83-1 | 2-methylpropan-1-ol; iso-butanol | | | | |
| | oral | LD50 mg/kg > 2830 | Rat | | |
| | dermal | LD50 mg/kg > 2000 | Rat | | |
| | inhalation (4 h) vapour | LC50 > 24 mg/l | Rat | | |
| 71-36-3 | butan-1-ol; n-butanol | | | | |
| | oral | ATE mg/kg 500 | | | |
| 107-98-2 | 1-methoxy-2-propanol; monopropylene glycol methyl ether | | | | |
| | oral | LD50 mg/kg > 5000 | Rat | IUCLID | |
| | dermal | LD50 mg/kg 11000 | Rabbit | | |

Information on other hazards

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Other information

Repeated or prolonged contact with the preparation may cause removal of natural fat from the skin resulting in non-allergic contact dermatitis and absorption through the skin. Inhalation of high vapour concentrations may cause symptoms like headache, dizziness, tiredness, nausea and vomiting.

12. Ecological information
Ecotoxicity

Ecological injuries are not known or expected under normal use.

| CAS No | Components | | | | | |
|----------|---|---------------|-----------------|---------|---|--------|
| | Aquatic toxicity | Dose | [h] [d] | Species | Source | Method |
| 67-63-0 | propan-2-ol; isopropyl alcohol; isopropanol | | | | | |
| | Acute fish toxicity | LC50 mg/l | 9640 | 96 h | Pimephales promelas (fathead minnow) | |
| | Acute algae toxicity | ErC50 mg/l | >2000 | 72 h | Desmodesmus subspicatus | |
| 78-83-1 | 2-methylpropan-1-ol; iso-butanol | | | | | |
| | Acute fish toxicity | LC50 mg/l | 1430 | 96 h | Pimephales promelas | |
| | Acute algae toxicity | ErC50 mg/l | 1250 | | Desmodesmus subspicatus | |
| | Acute crustacea toxicity | EC50 mg/l | 1439 | 48 h | Daphnia magna | |
| 107-98-2 | 1-methoxy-2-propanol; monopropylene glycol methyl ether | | | | | |
| | Acute fish toxicity | LC50 mg/l | 4600 - 10000 | 96 h | Leuciscus idus | IUCLID |
| | Acute algae toxicity | ErC50 mg/l | > 1000 | 72 h | Selenastrum capricornutum | |
| | Acute crustacea toxicity | EC50 mg/l | > 500 | 48 h | Daphnia magna | IUCLID |

Persistence and degradability

Readily biodegradable, according to appropriate OECD test.

Partition coefficient n-octanol/water

| CAS No | Components | Log Pow |
|----------|---|---------|
| 108-21-4 | isopropyl acetate | 1,02 |
| 67-63-0 | propan-2-ol; isopropyl alcohol; isopropanol | -0,16 |
| 78-83-1 | 2-methylpropan-1-ol; iso-butanol | 0,79 |
| 107-98-2 | 1-methoxy-2-propanol; monopropylene glycol methyl ether | -0,437 |

Mobility in soil

The product evaporates readily.

Results of PBT and vPvB assessment

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

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

Endocrine disrupting properties

This product does not contain a substance that has endocrine disrupting properties with respect to non-target organisms as no components meets the criteria.

Further information

hazardous to water (WGK 2)

Do not let product enter drains.

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13. Disposal considerations

Waste treatment methods**Disposal recommendations**

In accordance with local and national regulations.

List of Wastes Code - used product

080111 WASTES FROM THE MANUFACTURE, FORMULATION, SUPPLY AND USE (MFSU) OF COATINGS (PAINTS, VARNISHES AND VITREOUS ENAMELS), ADHESIVES, SEALANTS AND PRINTING INKS; wastes from MFSU and removal of paint and varnish; waste paint and varnish containing organic solvents or other hazardous substances; hazardous waste

List of Wastes Code - contaminated packaging

150110 WASTE PACKAGING; ABSORBENTS, WIPING CLOTHS, FILTER MATERIALS AND PROTECTIVE CLOTHING NOT OTHERWISE SPECIFIED; packaging (including separately collected municipal packaging waste); packaging containing residues of or contaminated by hazardous substances; hazardous waste

Contaminated packaging

Non-contaminated packages may be recycled.

Contaminated packages must be completely emptied and can be re-used following proper cleaning.

Cleaning agent: n-Butyl acetate

14. Transport information

Land transport (ADR/RID)

UN number or ID number: UN 1263
UN proper shipping name: Paint
Transport hazard class(es): 3
Packing group: II
 Hazard label: 3



Classification Code: F1
 Special Provisions: 601
 Limited quantity: 1 L
 Excepted quantity: E2
 Transport category: 2
 Hazard No: 33
 Tunnel restriction code: D/E

Inland waterways transport (ADN)

UN number or ID number: UN 1263
UN proper shipping name: Paint
Transport hazard class(es): 3
Packing group: II
 Hazard label: 3



Classification Code: F1
 Special Provisions: 601
 Limited quantity: 1 L
 Excepted quantity: E2

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Marine transport (IMDG)

UN number or ID number: UN 1263
UN proper shipping name: Paint
Transport hazard class(es): 3
Packing group: II
 Hazard label: 3



Special Provisions: -
 Limited quantity: 1 L
 Excepted quantity: E2
 EmS: F-E, S-D

Air transport (ICAO-TI/IATA-DGR)

UN number or ID number: UN 1263
UN proper shipping name: Paint
Transport hazard class(es): 3
Packing group: II
 Hazard label: 3



Special Provisions: A180
 Limited quantity Passenger: 1 L
 Passenger LQ: Y341
 Excepted quantity: E2
 IATA-packing instructions - Passenger: 353
 IATA-max. quantity - Passenger: 5 L
 IATA-packing instructions - Cargo: 364
 IATA-max. quantity - Cargo: 60 L

Environmental hazards

ENVIRONMENTALLY HAZARDOUS: No

Special precautions for user

none

Transport in bulk according to Annex II of MARPOL 73/78 and the IBC Code

not relevant

15. Regulatory information
Safety, health and environmental regulations/legislation specific for the substance or mixture
EU regulatory information

Restrictions on use (REACH, annex XVII):

Entry 3, Entry 29, Entry 40, Entry 75

2004/42/EC (VOC): 79%
687g/l

Subcategory (EU-VOC): Special finishes - All types, VOC limit value: 840 g/l

National regulatory information

Employment restrictions: Observe employment restrictions for young people. Observe employment restrictions for child bearing mothers and nursing.

Water hazard class (D): 3 - highly hazardous to water

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Chemical Safety Assessment

For this substance a chemical safety assessment has not been carried out.

16. Other information**Changes**

This data sheet contains changes from the previous version in section(s): 15.

Relevant H statements (full text)

| | |
|--------|---|
| H225 | Highly flammable liquid and vapor |
| H226 | Flammable liquid and vapor |
| H302 | Harmful if swallowed |
| H304 | May be fatal if swallowed and enters airways |
| H315 | Causes skin irritation |
| H318 | Causes serious eye damage |
| H319 | Causes serious eye irritation |
| H335 | May cause respiratory irritation |
| H336 | May cause drowsiness or dizziness |
| H411 | Toxic to aquatic life with long lasting effects |
| H412 | Harmful to aquatic life with long lasting effects |
| EUH066 | Repeated exposure may cause skin dryness or cracking. |

Other data

The information is based on the present level of our knowledge. It does not, however, give assurance of product properties and establishes no contract legal rights. The receiver of our product is singularly responsible for adhering to existing laws and regulations.

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