

1 Identification of the substance/preparation and of the company/undertaking

- Product details
- Trade name: **KRISTAL TimeClear**
- Article number: 9410
- Application of the substance / the preparation Lacquer
- Manufacturer/Supplier:
 Kristal Coatings B.V.
 Platinawerf 22B
 6641 TL Beuningen - Holland
 Tel: 0031 24 67 526 36
 Fax: 0031 24 67 533 60
- Further information obtainable from: Product safety department: info@kristalcoatings.nl
- Information in case of emergency: 0031 24 67 526 36

2 Hazards identification

- Hazard description:



Xn Harmful

- 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.

At long or repeated contact with skin it may cause dermatitis due to the degreasing effect of the solvent.

R 10 Flammable.

R 20 Harmful by inhalation.

R 52/53 Harmful to aquatic organisms, may cause long-term adverse effects in the aquatic environment.

R 66 Repeated exposure may cause skin dryness or cracking.

Restricted to professional users.

- Classification system:

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

- GHS label elements

**Danger**

H225 - Highly flammable liquid and vapour.

**Warning**

H317 - May cause an allergic skin reaction.

H336 - May cause drowsiness or dizziness.

EUH066 - Repeated exposure may cause skin dryness or cracking.

Contains Mix of:

a-3-(3-(2H-benzotriazol-2-yl)-5-t-butyl-4-hydroxyphenyl)propionyl-o-hydroxypoly(oxyethylene);

1-3-(3-(2H-benzotriazol-2-yl)-5-t-butyl-4-hydroxyphenyl)propionyl-o-3-(3-(2H-benzotriazol-2-yl)-5-ter-butyl-4-hydroxyphenyl)

propionyloxypoly(oxyethylene), bis(1,2,2,6,6-pentamethyl-4-piperidyl)sebacate. May produce an allergic reaction.

- Prevention:

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

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

- Response:

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

P321 Specific treatment (see on this label).

- Storage:

P405 Store locked up.

- Disposal:

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

3 Composition/information on ingredients

- Chemical characterization
- Description: Mixture of substances listed below with nonhazardous additions.
























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· Dangerous components:

CAS: 123-86-4	n-butyl acetate	25-50%
EINECS: 204-658-1	R 10-66-67 Warning:  2.6/3;  3.8/3	
CAS: 108-10-1	4-methylpentan-2-one	2.5-10%
EINECS: 203-550-1	 Xn,  Xi,  F; R 11-20-36/37-66 Danger:  2.6/2 Warning:  3.1.1/4, 3.3/2, 3.8/3	
CAS: 1330-20-7	xylene	2.5-10%
EINECS: 215-535-7	 Xn,  Xi; R 10-20/21-38 Warning:  2.6/3;  3.1.D/4, 3.1.1/4, 3.2/2	
CAS: 100-41-4	ethylbenzene	2.5-10%
EINECS: 202-849-4	 Xn,  F; R 11-20 Danger:  2.6/2 Warning:  3.1.1/4	
ELINCS: 400-830-7	Mix of: a-3-(3-(2H-benzotriazol-2-yl)-5-t-butyl-4-hydroxyphenyl)propionyl-o-hydroxypoly(oxyethylene); 1-3-(3-(2H-benzotriazol-2-yl)-5-t-butyl-4-hydroxyphenyl)propionyl-o-3-(3-(2H-benzotriazol-2-yl)-5-ter-butyl-4-hydroxyphenyl)propionyloxypoly(oxyethylene)  Xi,  N; R 43-51/53 Warning:  3.4.S/1  4.1.C/2	≤ 0.5%
CAS: 41556-26-7	bis(1,2,2,6,6-pentamethyl-4-piperidyl)sebacate	≤ 0.5%
EINECS: 255-437-1	 Xi,  N; R 43-50/53 Warning:  4.1.C/1;  3.4.S/1	

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

4 First aid measures

· General information:

Symptoms of poisoning may even occur after several hours; therefore medical observation for at least 48 hours after the accident.

· After inhalation:

Supply fresh air. If required, provide artificial respiration. Keep patient warm. Consult doctor if symptoms persist.

In case of unconsciousness place patient stably in side position for transportation.

· After skin contact: Generally the product does not irritate the skin.

· After eye contact: Rinse opened eye for several minutes under running water.

· After swallowing: If symptoms persist consult doctor.

5 Fire-fighting measures

· Suitable extinguishing agents: CO₂, powder or water spray. Fight larger fires with water spray or alcohol resistant foam.

· For safety reasons unsuitable extinguishing agents: Water with full jet

· Protective equipment: Mouth respiratory protective device.

6 Accidental release measures

· Person-related safety precautions: Wear protective equipment. Keep unprotected persons away.

· Measures for environmental protection:

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

Do not allow to enter sewers/ surface or ground water.

· Measures for cleaning/collecting:

Absorb with liquid-binding material (sand, diatomite, acid binders, universal binders, sawdust).

Dispose contaminated material as waste according to item 13.

Ensure adequate ventilation.

7 Handling and storage

· Handling:

· Information for safe handling:

Ensure good ventilation/exhaustion at the workplace.

Prevent formation of aerosols.

· Information about fire - and explosion protection:

Keep ignition sources away - Do not smoke.

Protect against electrostatic charges.

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- Storage:
- Requirements to be met by storerooms and receptacles: Store in a cool location.
- Information about storage in one common storage facility: Not required.
- Further information about storage conditions:
Keep container tightly sealed.
Store in cool, dry conditions in well sealed receptacles.

8 Exposure controls/personal protection

- Additional information about design of technical facilities: No further data; see item 7.
- Ingredients with limit values that require monitoring at the workplace:

123-86-4 n-butyl acetate

WEL Short-term value: 966 mg/m³, 200 ppm
Long-term value: 724 mg/m³, 150 ppm

108-10-1 4-methylpentan-2-one

WEL Short-term value: 416 mg/m³, 100 ppm
Long-term value: 208 mg/m³, 50 ppm
Sk

1330-20-7 xylene

WEL Short-term value: 441 mg/m³, 100 ppm
Long-term value: 220 mg/m³, 50 ppm
Sk; BMGV

100-41-4 ethylbenzene

WEL Short-term value: 552 mg/m³, 125 ppm
Long-term value: 441 mg/m³, 100 ppm

- Additional information: The lists valid during the making were used as basis.
- Personal protective equipment:
- General protective and hygienic measures:
Keep away from foodstuffs, beverages and feed.
Wash hands before breaks and at the end of work.
Do not inhale gases / fumes / aerosols.
- 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.
- Protection of hands:
The glove material has to be impermeable and resistant to the product.
Due to missing tests no recommendation to the glove material can be given for the product.
Selection of the glove material on consideration of the penetration times, rates of diffusion and the degradation
- Material of gloves
Nitrile rubber, NBR
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.
- Penetration time of glove material
Value for the permeation: Level \geq 164 min for n-butylacetate
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

- General Information

Form:	Liquid
Colour:	Transparent
Odour:	Characteristic
- Change in condition

Melting point/Melting range:	Undetermined.
Boiling point/Boiling range:	116°C
- Flash point: 22°C

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Safety Data Sheet

according to 1907/2006/EC, Article 31

Printing date 08.02.2010

Revision: 19.01.2010

Trade name: **KRISTAL TimeClear**

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· Ignition temperature:	370°C
· Self-igniting:	Product is not selfigniting.
· Danger of explosion:	Product is not explosive. However, formation of explosive air/vapour mixtures are possible.
· Explosion limits:	
Lower:	1.2 Vol %
Upper:	7.5 Vol %
· Vapour pressure at 20°C:	10.7 hPa
· Density at 20°C:	0.97 g/cm ³
· Solubility in / Miscibility with water:	Not miscible or difficult to mix.
· Viscosity:	
Kinematic at 20°C:	38 s (DIN 53211/4)
· Solvent content:	
Organic solvents:	58.0 %
VOC (EC)	57.99 %
· Solids content:	42.0 %

10 Stability and reactivity

- Thermal decomposition / conditions to be avoided: No decomposition if used according to specifications.
- Dangerous reactions: No dangerous reactions known.
- Dangerous decomposition products: No dangerous decomposition products known.

11 Toxicological information

- Acute toxicity:
- LD/LC50 values relevant for classification:

1330-20-7 xylene

Oral LD50 4300 mg/kg (rat)
 Dermal LD50 2000 mg/kg (rabbit)

- Primary irritant effect:

- on the skin: No irritant effect.
- on the eye: No irritating effect.

- Sensitization: No sensitizing effects known.

- 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:
 Harmful

12 Ecological information

- Ecotoxicological effects:
- Remark: Harmful to fish
- 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.
 Harmful to aquatic organisms

13 Disposal considerations

- Product:
- Recommendation: Must not be disposed together with household garbage. Do not allow product to reach sewage system.
- European waste catalogue
 08 01 11 waste paint and varnish containing organic solvents or other dangerous substances
- Uncleaned packaging:
- Recommendation: Disposal must be made according to official regulations.

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14 Transport information

- Land transport ADR/RID (cross-border)



- ADR/RID class: 3 Flammable liquids.
- Danger code (Kemler): 33
- UN-Number: 1263
- Packaging group: III
- Hazard label: 3
- Description of goods: 1263 PAINT

- Maritime transport IMDG:



- IMDG Class: 3
- UN Number: 1263
- Label: 3
- Packaging group: III
- EMS Number: F-E,S-E
- Marine pollutant: No
- Proper shipping name: PAINT

- Air transport ICAO-TI and IATA-DGR:



- ICAO/IATA Class: 3
- UN/ID Number: 1263
- Label: 3
- Packaging group: III
- Proper shipping name: PAINT
- UN "Model Regulation": UN1263, PAINT, 3, III

15 Regulatory information

- Labelling according to EU guidelines:
The product has been classified and marked in accordance with EU Directives / Ordinance on Hazardous Materials.

- Code letter and hazard designation of product:



Xn Harmful

- Risk phrases:
 - 10 Flammable.
 - 20 Harmful by inhalation.
 - 52/53 Harmful to aquatic organisms, may cause long-term adverse effects in the aquatic environment.
 - 66 Repeated exposure may cause skin dryness or cracking.

- Safety phrases:

23 Do not breathe fumes/aerosol.
60 This material and its container must be disposed of as hazardous waste.
61 Avoid release to the environment. Refer to special instructions/safety data sheets.

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Safety Data Sheet

according to 1907/2006/EC, Article 31

Printing date 08.02.2010

Revision: 19.01.2010

Trade name: **KRISTAL TimeClear**

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· Special labelling of certain preparations:

Restricted to professional users.

Contains Mix of:

a-3-(3-(2H-benzotriazol-2-yl)-5-t-butyl-4-hydroxyphenyl)propionyl-o-hydroxypoly(oxyethylene);

1-3-(3-(2H-benzotriazol-2-yl)-5-t-butyl-4-hydroxyphenyl)propionyl-o-3-(3-(2H-benzotriazol-2-yl)-5-ter-butyl-4-hydroxyphenyl)propionyloxypoly(oxyethylene), bis(1,2,2,6,6-pentamethyl-4-piperidyl)sebacate. May produce an allergic reaction.

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 R-phrases

10 Flammable.

11 Highly flammable.

20 Harmful by inhalation.

20/21 Harmful by inhalation and in contact with skin.

36/37 Irritating to eyes and respiratory system.

38 Irritating to skin.

43 May cause sensitisation by skin contact.

50/53 Very toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment.

51/53 Toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment.

66 Repeated exposure may cause skin dryness or cracking.

67 Vapours may cause drowsiness and dizziness.

· Department issuing MSDS: Product safety department.

· 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 internationale 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)

GHS: Globally Harmonized System of Classification and Labelling of Chemicals

VOC: Volatile Organic Compounds (USA, EU)

LC50: Lethal concentration, 50 percent

LD50: Lethal dose, 50 percent

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