PTC

SAFETY DAT SHEET

Conforms to Regulation (EC) No. 1907/2006 (REACH), Annex II, as amended by Commission Regulation (EU) 2020/878

Version: 2

Date of previous version: 29.05.2024
Revision: 20.06.2024

SECTION 1: Identification of the substance/mixture and of the company/undertaking

1.1. Product identifier

Product Name: Planet Nails Stain Resistant Top Coat
PTC

1.2. Relevant identified uses of the substance or mixture and uses advised against

Identified uses	Cosmetic.
Uses advised against	Manufacture of food products.

1.3. Details of the supplier of the safety data sheet

Responsible person:

Planet Nails Pty Ltd
8 Conara Road Kunda Park, QLD Australia 4556
Phone: 07 52110037
E-mail: info@planetnails.com.au
Web page: http://planetnails.com.au

1.4. Emergency telephone number

AU:000
Emergency telephone for other regions to be filled out by local business

SECTION 2: Hazards identification

2.1. Classification of the substance or mixture

According to regulation (EC) No 1272/2008:

Eye Irrit. 2 (H319) – Serious eye damage/eye irritation, Hazard Category 2.
Aquatic Chronic 2 (H411) – Long-term (chronic) aquatic hazard, Category 2.
Causes skin irritation. May cause an allergic skin reaction Causes serious eye irritation.
Toxic to aquatic life with long lasting effects.

Important adverse physicochemical, human health and environmental effects:

2.2. Label elements

According to regulation (EC) No 1272/2008:

Skin Irrit. 2 (H315) – Skin corrosion/ irritation, Hazard Category 2.
Skin Sens. 1A (H317) – Sensitisation — Skin, hazard category 1A.

Danger

H315 Causes skin irritation.
H317 May cause an allergic skin reaction.
H319 Causes serious eye irritation.
H411 Toxic to aquatic life with long lasting effects.

Contains: URETHANE ACRYLATE; Pentaerythritol tetrakis(3-mercaptopropionate); Methacrylic acid, monoester with propane-1,2-diol; (1-Methyl-1,2-Ethanediyl)bis [oxy(methyl-2,1-ethanediyl)] diacrylate; 2-Hydroxyethyl acrylate.

P101 If medical advice is needed, have product container or label at hand.
P102 Keep out of reach of children.
P103 Read carefully and follow all instructions.
P233 Keep container tightly closed.
P261 Avoid breathing mist/vapours/ spray.
P264 Wash hands/ affected body parts thoroughly after handling.
P271 Use only outdoors or in a well-ventilated area.
P273 Avoid release to the environment.
P280 Wear protective gloves/eye protection.
P302+P352 IF ON SKIN: Wash with plenty of water/soap.
P333+P313 If skin irritation or rash occurs: Get medical advice/attention.
P362+P364 Take off contaminated clothing and wash it before reuse.
P305+P351+P338 IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
P337+P313 If eye irritation persists: Get medical advice/ attention.
P391 Collect spillage.
P501 Dispose of contents/container to in accordance with local/ regional/ national/ international regulation.

2.3. Other hazards

Product does not meet the criteria for PBT or vPvB in accordance with Annex XIII of REACH (Regulation (EC) No 1907/2006).
Toxicological information/Ecological information: Based on available data the mixture does not contain ingredients considered to have endocrine disrupting properties according to REACH Article 57(f) or Commission Delegated Regulation (EU) 2017/2100 or Commission Regulation (EU) 2018/605 at a concentration of 0.1% or more. **See section 11 for more detailed information on health effects and symptoms.**

SECTION 3: Composition/information on ingredients

3.1. Substances Not relevant.

3.2. Mixtures

Ingredient name (INCI)	INDEX No.	CAS No.	EINECS/ EC No.	Conc. (%)	Classification Regulation (EC) 1272/2008 (CLP)	Type
URETHANE ACRYLATE	N/A	N/A	N/A	45-50	Skin Irrit. 2, H315 Skin Sens. 1, H317 Eye Irrit. 2, H319 Aquatic Chronic 3, H412	[1]
Pentaerythritol tetrakis(3mercaptopropionate) [PENTAERYTHRITYL TETRAMERCAPTOPROPIONATE]	N/A	7575-23-7	231-472-8	10-15	Acute Tox. 4, H302 Skin Sens. 1A, H317 Aquatic Acute 1, H400 (M=1) Aquatic Chronic 1, H410 (M=1)	[1]

Propylidynetrimethyl trimethacrylate [TRIMETHYLOLPROPANE TRIMETHACRYLATE]	N/A	3290-92-4	221-950-4	10-15	Aquatic Chronic 2, H411	[1]
Methacrylic acid, monoester with propane-1,2-diol [HYDROXYPROPYL METHACRYLATE]	N/A	27813-02-1	248-666-3	5-10	Skin Sens. 1, H317 Eye Irrit. 2, H319	[1]
Exo-1,7,7-trimethylbicyclo[2.2.1]hept-2-yl methacrylate [ISOBORNYL METHACRYLATE]	N/A	7534-94-3	231-403-1	5-10	Skin Irrit. 2, H315 Eye Irrit. 2, H319 STOT SE 3, H335 Aquatic Chronic 3, H412	[1]
Hydroxycyclohexyl phenyl ketone [HYDROXYCYCLOHEXYL PHENYL KETONE]	N/A	947-19-3	213-426-9	1-3	Aquatic Chronic 3, H412	[1]
Ethylene phosphite [ETHYLENE PHOSPHITE]	N/A	1003-11-8	621-992-7	1-3	Acute Tox. 4, H302 Skin Irrit. 2, H315 Eye Irrit. 2, H319 STOT SE 3, H335	[1]
(1-Methyl-1,2-Ethanediyl)bis [oxy(methyl-2,1-ethanediyl)] diacrylate [TRIPROPYLENE GLYCOL DIACRYLATE]	607-249-00-X	42978-66-5	256-032-2	1-3	Skin Irrit. 2, H315 Eye Irrit. 2, H319 Skin Sens. 1, H317 STOT SE 3, H335 Aquatic Chronic 2, H411 *Specific Concentration limits:* STOT SE 3; H335: C ≥ 10%	[1] [5]
2-Hydroxyethyl acrylate [2-HYDROXYETHYL ACRYLATE]	607-072-00-8	818-61-1	212-454-9	<0.3	Acute Tox. 4, H302 Acute Tox. 3, H311 Skin Corr. 1B, H314 Skin Sens. 1, H317 Aquatic Acute 1, H400 *Specific Concentration limits:* Skin Sens. 1; H317: C ≥ 0,2%	[1] [2] [5]

There are no additional ingredients present which, within the current knowledge of the supplier and in the concentrations applicable, are classified as hazardous to health or the environment and hence require reporting in this section.
See section 16 for the full text of the R and H phrases declared above. Occupational exposure limits, if available, are listed in section 8.

[1] Substance classified with a health or environmental hazard
[2] Substance with a workplace exposure limit
[3] PBT-substance
[4] vPvB-substance
[5] SEVESO SUBSTANCE

SECTION 4: First aid measures

4.1. Description of first aid measures

General advice: Remove contaminated clothing.

Inhalation: Remove victim to fresh air and keep at rest in a position comfortable for breathing. If not breathing, if breathing is irregular or if respiratory arrest occurs, provide artificial respiration or oxygen by trained personnel. It may be dangerous to the person providing aid to give mouth-to-mouth resuscitation. If unconscious, place in recovery position and get medical attention immediately. Maintain an open airway.

Skin contact: Wash with plenty of soap and water. Remove contaminated clothing and shoes. Continue to rinse for at least 10 minutes. Get medical attention if symptoms persist.

Eye contact: Flush eyes with plenty of water, occasionally lifting the upper and lower eyelids. Check for and remove any contact lenses. Continue to rinse for at least 10 minutes. Get medical attention if symptoms persist.

Ingestion: Wash out mouth with water. Remove dentures if any. Remove victim to fresh air and keep at rest in a position comfortable for breathing. If material has been swallowed and the exposed person is conscious, give small quantities of water to drink. Stop if the exposed person feels sick as vomiting may be dangerous. Do not induce vomiting unless directed to do so by medical personnel. If vomiting occurs, the head should be kept low so that vomit does not enter the lungs. Get medical attention if adverse health effects persist or are severe. Never give anything by mouth to an unconscious person. If unconscious, place in recovery position and get medical attention immediately. Maintain an open airway. Loosen tight clothing such as a collar, tie, belt or waistband.

4.2. Most important symptoms and effects, both acute and delayed

Eye contact: May causes serious eye irritation.
Symptoms might be as follows: Conjunctivitis, lacrimation, redness, irritation or pain, reversible cornea damage and swelling of eyes.

Inhalation: May cause nose, throat and respiratory tract irritation.
Symptoms might be as follows: Irritation, coughing, shortness of breath, dizziness, headache or nausea.

Skin contact: Irritating to the skin, might cause skins sensitization.
Symptoms might be as follows: Redness, inflammation, rash, urticaria, pain or irritation and dermatitis.

Ingestion: May be harmful if ingested.
Symptoms might be as follows: Gastrointestinal symptoms, such as nausea, vomiting, abdominal pain or irritation, and diarrhoea could develop.

4.3. Indication of any immediate medical attention and special treatment needed

Specific treatments: Treatment: Treat according to symptoms (decontamination, vital functions), no known specific antidote.

See section 11 for more detailed information on health effects and symptoms.

SECTION 5: Firefighting measures

5.1. Extinguishing media

Suitable extinguishing media: Water spray, foam, dry chemical, carbon dioxide. *Unsuitable extinguishing media:* Do not use full power water jet.

5.2. Special hazards arising from the substance or mixture

Hazards from the substance or mixture: In a fire or if heated, a pressure increase will occur and the container may burst.
Hazardous decomposition products may include:
Carbon monoxide (CO)
Carbon dioxide (CO_2)
Other unidentified organic and inorganic substances.

This material is toxic to aquatic life with long lasting effects. Fire water contaminated with this material must be contained and prevented from being discharged to any waterways, sewer or drain.

5.3. Advice for firefighters

If water is used to cool closed containers to prevent pressure build-up, fog nozzles are preferred.

Full protective equipment, including self-contained breathing apparatus is needed to protect fire-fighters from exposure to coating's hazardous ingredients and hazardous decomposition products.

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

For non-emergency personnel: No action shall be taken involving any personal risk or without suitable training. Evacuate surrounding areas. Keep unnecessary and unprotected personnel from entering. Do not touch or walk through spilt material. Avoid breathing vapour or mist. Provide adequate ventilation. Wear appropriate respirator when ventilation is inadequate. Put on appropriate personal protective equipment.

For emergency responders: If specialised clothing is required to deal with the spillage, take note of any information in Section "Exposure controls/personal protection" on suitable and unsuitable materials. See also the information in "For non-emergency personnel".

6.2. Environmental precautions

Avoid dispersal of spilt material and runoff and contact with soil, waterways, drains and sewers. Inform the relevant authorities if the product has caused environmental pollution (sewers, waterways, soil or air). Water polluting material. May be toxic to the environment if released in large quantities. Collect spillage.

6.3. Methods and material for containment and cleaning up

Small spill: Stop leak if without risk. Move containers from spill area. Dilute with water and mop up if water-soluble. Alternatively, or if water-insoluble, absorb with an inert dry material and place in an appropriate waste disposal container. Dispose of via a licensed waste disposal contractor.

Large spill: Stop leak if without risk. Move containers from spill area. Approach the release from upwind. Prevent entry into sewers, water courses, basements or confined areas. Wash spillages into an effluent treatment plant or proceed as follows. Contain and collect spillage with non-combustible, absorbent material e.g. sand, earth, vermiculite or diatomaceous earth and place in container for disposal according to local regulations. Dispose of via a licensed waste disposal contractor. Contaminated absorbent material may pose the same hazard as the spilt product.

6.4. Reference to other sections

See Section 1 for emergency contact information.
See Section 8 for information on appropriate personal protective equipment.
See Section 13 for additional waste treatment information.

SECTION 7: Handling and storage

7.1. Precautions for safe handling

Protective measures: Put on appropriate personal protective equipment (see Section "Exposure controls/ personal protection"). Persons with a history of skin sensitization problems should not be employed in any process in which this product is used. Do not get in eyes or on skin or clothing. Do not ingest. Avoid breathing vapour or mist. Avoid release to the environment. Keep in the original container or an approved alternative made from a compatible material, kept tightly closed when not in use. Empty containers retain product residue and can be hazardous. Do not reuse container.

Advice on general occupational hygiene: Good industrial hygiene practices should be observed. Provide sufficient air exchange and/or exhaust in work rooms.

Wash hands before work breaks and after finishing work.
Do not eat, drink or smoke while working.
Take off all contaminated clothing immediately.
Use of dispensing equipment is recommended to minimise the risk of skin or eye contact.
See also Section 8 for additional information on hygiene measures.

7.2. Conditions for safe storage, including any incompatibilities

Storage: Store in accordance with local regulations. Store in original container protected from direct sunlight in a dry, cool and well-ventilated area, away from incompatible materials (see section 10) and food and drink. Keep container tightly closed and sealed until ready for use. Containers that have been opened must be carefully resealed and kept upright to prevent leakage. Do not store in unlabelled containers. Use appropriate containment to avoid environmental contamination. Empty container may retain product residues (vapour or liquid).

7.3. Specific end use(s)

Industrial sector specific solutions: Not available.

SECTION 8: Exposure controls/personal protection

8.1. Control parameters

Occupational exposure limits: Limit values are laid down throughout the EU, but each Member State establishes its own national OELs, often going beyond EU legislation. OELs are set by competent national authorities and other relevant institutions. **EU (IOELV):**

Not available.

United Kingdom (EH40):

Not available.

Latvia (AER, reg.325/2011):

2-Hydroxyethyl acrylate:

Long-term exposure limit: 8 hrs: 0.5 mg/m^3

Germany (TRGS-900):

Not available.

Recommended monitoring procedures: If this product contains ingredients with exposure limits, personal, workplace atmosphere or biological monitoring may be required to determine the effectiveness of the ventilation or other control measures and/or the necessity to use respiratory protective equipment. Reference should be made to European Standard EN 689 for methods for the assessment of exposure by inhalation to chemical agents and national guidance documents for methods for the determination of hazardous substances.

8.2. Exposure controls

Appropriate engineering Controls: Use only with adequate ventilation. If user operations generate fumes, gas, vapor or mist, use process enclosures, local exhaust ventilation or other engineering controls to keep worker exposure to airborne contaminants below any recommended or statutory limits - comply with the Occupational Exposure Limits found in National Guidance documents.

Individual protection measures:

Hygiene measures: Eating, drinking and smoking should be prohibited in areas where this material is handled, stored and processed.
Workers should wash hands and face before eating, drinking and smoking. Remove contaminated clothing and protective equipment before entering eating areas. Appropriate techniques should be used to remove potentially contaminated clothing. Wash contaminated clothing before reusing.

Respiratory protection: Ensure adequate ventilation.
An approved mask or respirator fitted with an organic vapour cartridge should be worn if the product is used in a poorly ventilated area.
Filter type: A

Eye/face protection: Safety eyewear complying with an approved standard should be used when a risk assessment indicates this is necessary to avoid exposure to liquid splashes, mists or gases. If contact is possible, the following protection should be worn, unless the assessment indicates a higher degree of protection: chemical splash goggles and/or face shield. If inhalation hazards exist, a full-face respirator may be required instead.

Skin protection:

Hand protection:	Chemical-resistant, impervious gloves complying with an approved standard (EN 374) should be worn at all times when handling chemical products if a risk assessment indicates this is necessary. Considering the parameters specified by the glove manufacturer, check during use that the gloves are still retaining their protective properties. It should be noted that the time to breakthrough for any glove material may be different for different glove manufacturers. In the case of mixtures, consisting of several substances, the protection time of the gloves cannot be accurately estimated. If signs of wear and tear are noticed, then the gloves should be replaced.
Body protection:	Appropriate footwear and any additional skin protection measures should be selected based on the task being performed and the risks involved and should be approved by a specialist before handling this product.

Environmental exposure controls:

Emissions from ventilation or work process equipment should be checked to ensure they comply with the requirements of environmental protection legislation. In some cases, fume scrubbers, filters or engineering modifications to the process equipment will be necessary to reduce emissions to acceptable levels.

SECTION 9: Physical and chemical properties

9.1. Information on basic physical and chemical properties

a) Physical state	Liquid.
b) Colour	Transparent, slightly yellow.
c) Odour	Not available.
d) Melting point/freezing point	Not available.
e) Initial boiling point and boiling range	Not available.
f) Flammability	Not available.
g) Lower and upper explosion limit	Not available.
h) Flash point	Not available.
i) Auto-ignition temperature	Not available.
j) Decomposition temperature	Not available.
k) pH	Not available.
l) Kinematic viscosity	Not available.
m) Solubility (-ies)	Not available.
n) Partition coefficient noctanol/water (log value)	Not available.
o) Vapour pressure	Not available.
p) Density and/or relative density	Not available.
q) Relative vapour density	Not available.
r) Particle characteristics	Not available.

9.2. Other information

9.2.1. Information with regard to physical hazard classes

Not available

9.2.2. Other safety characteristics

Impurity	Not available
Explosive properties	Not available.
Oxidising properties	Not available

SECTION 10: Stability and reactivity

10.1. Reactivity

No hazardous reactions if stored and handled as prescribed/indicated.

10.2. Chemical stability

Stable under recommended storage conditions.

10.3. Possibility of hazardous reactions

Stable under recommended storage conditions.

10.4. Conditions to avoid

Sun-Light, un-clean conditions to avoid during storage.

10.5. Incompatible materials

None known.

10.6. Hazardous decomposition products

Fumes produced when heated to decomposition may include: Toxic carbon monoxide, carbon dioxide.

SECTION 11: Toxicological information

11.1. Information on hazard classes as defined in Regulation (EC) No 1272/2008 a)

Acute toxicity

Data on the product or its components:

Mixture/ Ingredient name	Result	Species	Dose	Exposure
Amanda Smart Top Light AMT-V61	**ATE (Oral)**	**-**	**ca. 4 762 mg/kg bw**	**-**
	ATE (Dermal)	**-**	**100 000 mg/kg bw**	**-**
Pentaerythritol tetrakis(3mercaptopropionate) [PENTAERYTHRITYL TETRAMERCAPTOPROPIONATE]	LD_{50} (Oral)	Rat	> 1 000 - < 2 000 mg/kg bw	-
	LC_{50} (Inhalation)	Rat	> 3 363 mg/m³ air (analytical)	4 h
Propylidynetrimethyl trimethacrylate [TRIMETHYLOLPROPANE TRIMETHACRYLATE]	LD_0 (Oral)	Rat	> 2 000 mg/kg bw	-
	LD_0 (Dermal)	Rat	> 2 000 mg/kg bw	-
Methacrylic acid, monoester with propane-1,2-diol [HYDROXYPROPYL METHACRYLATE]	LD_{50} Oral	Rat	> 2 000 mg/kg bw	-
	LD_{50} Dermal	Rabbit	> 5 000 mg/kg bw	-
Exo-1,7,7-trimethylbicyclo[2.2.1]hept-2-yl methacrylate [ISOBORNYL METHACRYLATE]	LD_{50} Oral	Rat	3 160 mg/kg bw	-
	LD_{50} Dermal	Rabbit	> 3 000 mg/kg bw	-
Hydroxycyclohexyl phenyl ketone [HYDROXYCYCLOHEXYL PHENYL KETONE]	LD_{50} Oral	Rat	> 2 500 mg/kg bw	-
	LC_{50} (Inhalation: Aerosol)	Rat	> 1 000 mg/m³ air (nominal)	4 h
	LD_{50} (Dermal)	Rat	> 5 000 mg/ kg bw	-
Ethylene phosphite [ETHYLENE PHOSPHITE]	ATE Oral	-	500 mg/kg bw	-
(1-methyl-1,2-Ethanediyl)bis[oxy(methyl-2,1-ethanediyl)] diacrylate [TRIPROPYLENE GLYCOL DIACRYLATE]	LD_{50} (Oral)	Rat	> 2 000 mg/kg bw	-
	LC_0 (Inhalation: Vapour)	Rat	0.001 mg/L air	7 h
	LD_{50} (Dermal)	Rabbit	> 2 000 mg/ kg bw	-
2-Hydroxyethyl acrylate [2-HYDROXYETHYL ACRYLATE]	LD_{50} (Oral)	Rat	540 mg/kg bw	-
	ATE (Dermal)	-	300 mg/kg bw	-

Conclusion/Summary: **According to classification method described in CLP regulation, this product has ATE (oral) value aprox. 4 762 mg per kg of body weight and ATE (dermal) value aprox. 100 000 mg per kg of body weight - the product is NOT classified as harmful or toxic if swallowed or after contact with skin.**

b) Serious eye damage/irritation

Data on the product or its components:

Mixture/ Ingredient name	Effect
URETHANE ACRYLATE	Causes moderate irritation.
Methacrylic acid, monoester with propane-1,2-diol [HYDROXYPROPYL METHACRYLATE]	Category 2B (mildly irritating to eyes) based on GHS criteria. Species: Rabbit. Amount applied (volume): 0.1 ml. Duration of treatment / exposure: Till end of observation period Observation period (in vivo): 24, 48, 72 h, 4, 5, 7 days Guideline: Appraisal of the safety of Chemicals in foods, drugs and cosmetics by staff of the Division of Pharmacology, FDA acc. to Draize.

Irritation parameter	Time point	Score	Max	Reversibility score
Cornea opacity score	24/48/72 h	0-1	4	Fully reversible within: 4 days
Iris score	24/48/72 h	0	2	No indication of irritation
Conjunctivae score	24/48/72 h	0.33-2	3	Fully reversible within: 4 days
Chemosis score	24/48/72 h	0-0.3	4	Fully reversible within: 48 hours

Exo-1,7,7-trimethylbicyclo[2.2.1]hept-2-yl methacrylate [ISOBORNYL METHACRYLATE]	Slightly irritating.
Ethylene phosphite [ETHYLENE PHOSPHITE]	Irritating.
(1-methyl-1,2-Ethanediyl)bis[oxy(methyl-2,1-ethanediyl)] diacrylate [TRIPROPYLENE GLYCOL DIACRYLATE]	Mildly irritating to eyes. Guideline: OECD Guideline 405 (Acute Eye Irritation / Corrosion)/ EU Method B.5 (Acute Toxicity: Eye Irritation / Corrosion). Species: Rabbit. Amount / concentration applied: 0.1 ml Duration of treatment / exposure: 24 hours Observation period (in vivo): 7 days

Irritation parameter	Time point	Score	Max score	Reversibility
Cornea opacity score	24/48/72 h	1	4	Fully reversible within: 7 days
Iris score	24/48/72 h	0.3-0.7	2	Fully reversible within: 72 hours
Conjunctivae score	24/48/72 h	2-2.7	3	Fully reversible within: 7 days
Chemosis score	24/48/72 h	1.3-2	4	Fully reversible within: 7

days

2-Hydroxyethyl acrylate [2-HYDROXYETHYL ACRYLATE]	Category 1 (irreversible effects on the eye) based on GHS criteria Species: Rabbit (Strain: New Zealand White). Amount / concentration applied: 0.1 ml (undiluted or 10 % aqueous solution) Duration of treatment / exposure: Once Observation period (in vivo): 7 days

Irritation parameter	Time point	Score	Max	Reversibility score
Cornea opacity score	24 h	3	4	Not fully reversible within: 7 days

Conclusion/Summary:	**According to classification method described in CLP regulation, this product is classified as mixture that causes serious eye irritation. (Eye Irrit. 2, H319).**

c) Skin corrosion/irritation

Data on the product or its components:

Mixture/ Ingredient name	Effect
URETHANE ACRYLATE	Causes skin irritation.
Exo-1,7,7-trimethylbicyclo[2.2.1]hept-2-yl methacrylate [ISOBORNYL METHACRYLATE]	Irritating.
Ethylene phosphite [ETHYLENE PHOSPHITE]	Irritating. Mild irritant.

(1-methyl-1,2-Ethanediyl)bis[oxy(methyl-2,1-ethanediyl)] diacrylate [TRIPROPYLENE GLYCOL DIACRYLATE]	Guideline: OECD Guideline 404 (Acute Dermal Irritation / Corrosion)/ EU Method B.4 (Acute Tox Dermal Irritation / Corrosion) Species: Rabbit. Amount / concentration applied: 0.5 ml Duration of treatment / exposure: 4 hours Observation period (in vivo): 15 days

Irritation parameter	Time point	Score	Max score	Reversibility
Erythema score	24/48/72 h	1.6-2	4	Fully reversible within: 14 days
Edema score	24/48/72 h	0.6-1	4	Fully reversible within: 8 days

2-Hydroxyethyl acrylate [2-HYDROXYETHYL ACRYLATE]	Category 1B (corrosive) based on GHS criteria Species: Rabbit (Strain: Vienna White). Amount / concentration applied: undiluted, no amount specified Duration of treatment / exposure: 1 min, 5 min, 15 min, 20 hrs Observation period (in vivo): 8 days

Irritation parameter	Time point	Score	Max	Reversibility score
Erythema score	24/48/72 h	2	4	Not fully reversible within: 8 days
Edema score	24/48/72 h	0-0.7	4	Fully reversible within: 48 hrs

Conclusion/Summary: **According to classification method described in CLP regulation, this product is classified as irrit to the skin (Skin Irrit. 2, H315).**

d) Respiratory or skin sensitisation Data on the product or its components:

Mixture/ Ingredient name	Effect
URETHANE ACRYLATE	Sensitising to the skin.
Pentaerythritol tetrakis(3mercaptopropionate) [PENTAERYTHRITYL TETRAMERCAPTOPROPIONATE]	Strong sensitizer (Category 1A). Guideline: OECD Guideline 406 (Skin Sensitisation). Type of study: Guinea pig maximisation test. Species: Guinea pig.
Methacrylic acid, monoester with propane-1,2-diol [HYDROXYPROPYL METHACRYLATE]	Skin sensitizer (May cause an allergic skin reaction).
(1-methyl-1,2-Ethanediyl)bis[oxy(methyl-2,1-ethanediyl)] diacrylate [TRIPROPYLENE GLYCOL DIACRYLATE]	Category 1 (skin sensitising) based on GHS criteria. Guideline: OECD Guideline 406 (Skin Sensitisation). Endpoint: Skin sensitisation: in vivo (non-LLNA). Type of study: Guinea pig maximisation test. Species: Guinea pig
2-Hydroxyethyl acrylate [2-HYDROXYETHYL ACRYLATE]	Category 1 (skin sensitising) based on GHS criteria. Type of study: mouse local lymph node assay (LLNA) Species: mouse (Strain: CBA/Ca)

Conclusion/Summary: **According to classification method described in CLP regulation, this product is classified as very sensitising to the skin (Skin Sens. 1A, H317).**

e) Germ cell mutagenicity

Data on the product or its components:

No data on adverse effects on humans or animals are available.

Conclusion/Summary: **Based on available data, classification criteria not met.**

f) Carcinogenicity

Data on the product or its components:

No data on adverse effects on humans or animals are available.

Conclusion/Summary: **Based on available data, classification criteria not met.**

g) Reproductive toxicity

Data on the product or its components:

No data on adverse effects on humans or animals are available.

Conclusion/Summary: **Based on available data, classification criteria not met.**

h) Specific target organ toxicity - Single exposure Data on the product or its components:

Mixture/ Ingredient name	Effect
Exo-1,7,7-trimethylbicyclo[2.2.1]hept-2-yl methacrylate [ISOBORNYL METHACRYLATE]	Hazard category: Specific target organ toxicity - Single Exposure, Category 3 Hazard statement: May cause respiratory irritation. Affected organs: respiratory tract. Route of exposure: inhalation.
Ethylene phosphite [ETHYLENE PHOSPHITE]	Hazard category: Specific target organ toxicity - Single Exposure, Category 3 Hazard statement: May cause respiratory irritation. Affected organs: respiratory tract Route of exposure: inhalation
(1-methyl-1,2-Ethanediyl)bis[oxy(methyl-2,1-ethanediyl)] diacrylate [TRIPROPYLENE GLYCOL DIACRYLATE]	Hazard category: Specific target organ toxicity - single exposure category 3 Hazard statement: May cause respiratory irritation. Affected organs: respiratory tract Route of exposure: inhalation

Conclusion/Summary: **According to classification method described in CLP regulation, this product is not classified as mixture that can be harmful if inhaled (STOT SE 3, H335), but the hazard might still be present if high amount of vapour accumulates or in the case of prolonged contact with the product fumes.**

j) Specific target organ toxicity - Repeated exposure Data on the product or its components:

No data on adverse effects on humans or animals are available.

Conclusion/Summary: **Based on available data, classification criteria not met.**

i) Aspiration hazard

Data on the product or its components:

No data on adverse effects on humans or animals are available.

Conclusion/Summary: **Based on available data, classification criteria not met.**

Potential acute health effects

Eye contact: May causes serious eye irritation.
Inhalation: May cause nose and throat irritation. May cause respiratory irritation, headache or nausea.
Skin contact: Causes skin sensitisation and skin irritation.
Ingestion: Might be harmful if swallowed.

Symptoms related to the physical, chemical and toxicological characteristics

Eye contact: Conjunctivitis, lacrimation, redness, irritation or pain, reversible cornea damage and swelling of eyes.
Inhalation: Irritation, coughing, shortness of breath, dizziness, headache or nausea.
Skin contact: Redness, inflammation, rash, urticaria, pain or irritation and dermatitis.
Ingestion: Gastrointestinal symptoms, such as nausea, vomiting, abdominal pain or irritation, and diarrhoea could develop.

Delayed and immediate effects and also chronic effects from short and long term exposure Short term exposure:

Potential immediate effects: Not available.
Potential delayed effects: **Long** Not available.

term exposure:

Potential immediate effects: Not available.
Potential delayed effects: Not available.

11.2. Information on other hazards Endocrine disrupting properties

Based on available data the mixture does not contain ingredients considered to have endocrine disrupting properties according to REACH Article 57(f) or Commission Delegated Regulation (EU) 2017/2100 or Commission Regulation (EU) 2018/605 at a concentration of 0.1% or more.

Other information

No additional information is available.

SECTION 12: Ecological information

12.1. Toxicity

Aquatic toxicity

Data on the product or its components:

Mixture/ Ingredient name	Species	Water media type	Exposure	Dose	Effect conc.
URETHANE ACRYLATE	Fish - Leucuscus idus	freshwater	96 h	LC_{50}	4.6-10 mg/L
	Crustaceans - Daphnia magna	freshwater	48 h	EC_{50}	89 mg/L
Pentaerythritol tetrakis(3-mercaptopropionate) [PENTAERYTHRITYL TETRAMERCAPTOPROPIONATE]	Fish - Oncorhynchus mykiss	freshwater	96 h	LC_{50}	0.42 mg/L
	Crustaceans - Daphnia magna	freshwater	48 h	EC_{50}	> 0.35 mg/L
	Algea - Desmodesmus subspicatus	freshwater	72 h	EC_{50}	> 0.12 mg/L
Propylidynetrimethyl trimethacrylate [TRIMETHYLOLPROPANE TRIMETHACRYLATE]	Fish - Oncorhynchus mykiss	freshwater	96 h	LC_{50}	2 mg/L
	Fish - Pimephales promelas	freshwater	32 d	NOEC	0.138 mg/L
	Crustaceans - Daphnia magna	freshwater	48 h	EC_{50}	> 9.22 mg/L
	Algea - Pseudokirchneriella subcapitata	freshwater	72 h	NOEC	0.177 mg/L
	Microorganisms - Activated sludge	freshwater	3 h	EC_{50}	> 1 000 mg/L

Exo-1,7,7-trimethylbicyclo[2.2.1]hept-2-yl methacrylate [ISOBORNYL METHACRYLATE]	Fish - Danio rerio	freshwater	96 h	LC_{50}	1.79 mg/L
	Crustaceans - Daphnia magna	freshwater	48 h	EC_{50}	> 2.57 mg/L
	Crustaceans - Daphnia magna	freshwater	21 d	NOEC	0.233 mg/L
	Algea - Pseudokirchneriella subcapitata	freshwater	72 h	EC_{50}	2.28 mg/L
Hydroxycyclohexyl phenyl ketone [HYDROXYCYCLOHEXYL PHENYL KETONE]	Fish – Danio rerio	freshwater	96 h	LC_{50}	24 mg/L
	Fish - Pimephales promelas	freshwater	32 d	NOEC	10 mg/L
	Crustaceans - Daphnia magna	freshwater	48 h	EC_{50}	53.9 mg/L
	Crustaceans - Daphnia magna	freshwater	21 d	NOEC	0.3 mg/L
	Algea - Desmodesmus subspicatus	freshwater	72 h	EC_{50}	14.4 mg/L
	Microorganisms - Activated	freshwater	3 h	EC_{50}	> 1 00 mg/L sludge
1-methyl-1,2-Ethanediyl)bis[oxy(methyl-2,1-ethanediyl)] diacrylate [TRIPROPYLENE GLYCOL DIACRYLATE]	Fish - Leuciscus idus	freshwater	96 h	LC_{50}	> 4.6-< 10 mg/L
	Crustaceans - Daphnia magna	freshwater	48 h	EC_{50}	89 mg/L
	Algea - Desmodesmus subspicatus	freshwater	72 h	EC_{50}	65.9 mg/L
	Microorganisms - Activated	freshwater	30 min	EC_{50}	> 1 000 mg/L sludge, domestic
2-Hydroxyethyl acrylate [2-HYDROXYETHYL ACRYLATE]	Fish – Pimephales promelas	freshwater	96 h	LC_{50}	4.8 mg/L
	Crustaceans - Daphnia magna	freshwater	48 h	LC_{50}	5.2 mg/L
	Crustaceans - Daphnia magna	freshwater	21 d	NOEC	0.48 mg/L
	Algea - Raphidocelis subcapitata	freshwater	72 h	EC_{50}	6 mg/L
	Microorganisms - Activated	freshwater	72 h	EC_{10}	> 1 00 mg/L sludge

Conclusion/Summary: **According to classification method described in CLP regulation, this product is classified as toxic to aquatic life with long lasting effects (Aquatic Chronic 2, H411).**

12.2. Persistence and degradability

Data on the product or its components:

Mixture/ Ingredient name	CAS no.	Degradability	Test method/ Guideline
Pentaerythritol tetrakis(3-mercaptopropionate) [PENTAERYTHRITYL TETRAMERCAPTOPROPIONATE]	7575-23-7	Not readily biodegradable. 26% Biodegradation in water on Day 28 in CO_2 evolution test.	OECD Guideline 301 B (Ready Biodegradability: CO2 Evolution Test)/ EU Method C.4-C (Determination of the "Ready" Biodegradability - Carbon Dioxide Evolution Test)
Propylidynetrimethyl trimethacrylate [TRIMETHYLOLPROPANE TRIMETHACRYLATE]	3290-92-4	Inherently biodegradable. (Ready 29% Biodegradation in water CO2 Evolution on Day 28 in CO_2 evolution test.	OECD Guideline 301 B Biodegradability: Test)

Exo-1,7,7-trimethylbicyclo[2.2.1]hept-2-yl methacrylate [ISOBORNYL METHACRYLATE]	7534-94-3	Readily biodegradable. Degradation (CO_2 evolution), 28 d: 70%	OECD Guideline 310 (Ready Biodegradability - CO2 in Sealed Vessels (Headspace Test))
Hydroxycyclohexyl phenyl ketone [HYDROXYCYCLOHEXYL PHENYL KETONE]	947-19-3	Readily biodegradable. Degradation (CO_2 evolution), 28 d: 73-80%	EU Method C.4-C (Determination of the "Ready" Biodegradability - Carbon Dioxide Evolution Test)
(1-methyl-1,2-Ethanediyl)bis[oxy(methyl-2,1-ethanediyl)] diacrylate	42978-66-5	Moderately/partly biodegradable. 48% Biodegradation in water on Day 28 in CO_2 evolution test.	OECD Guideline 301 B (Ready Biodegradability: CO2 Evolution Test)
[TRIPROPYLENE GLYCOL DIACRYLATE			
Hydroxyethyl acrylate [2-HYDROXYETHYL ACRYLATE]	818-61-1	Readily biodegradable. Degradation (CO_2 evolution), 28 d: 73-80%	OECD Guideline 301 B (Ready Biodegradability: CO2 Evolution Test)

12.3. Bioaccumulative potential

Data on the product or its components:

Mixture/ Ingredient name	Effect
Pentaerythritol tetrakis(3-mercaptopropionate) [PENTAERYTHRITYL TETRAMERCAPTOPROPIONATE]	Considered to have a low potential for bioaccumulation. BCF (aquatic species): 23.7
Propylidynetrimethyl trimethacrylate [TRIMETHYLOLPROPANE TRIMETHACRYLATE]	The calculated LogBCF for the substance is 0.72 (BCF = 5.25 L/kg wet weight).
Exo-1,7,7-trimethylbicyclo[2.2.1]hept-2-yl methacrylate [ISOBORNYL METHACRYLATE]	BCF: 37 dimensionless
(1-methyl-1,2-Ethanediyl)bis[oxy(methyl-2,1-ethanediyl)] diacrylate [TRIPROPYLENE GLYCOL DIACRYLATE	Accumulation in organisms is not to be expected. log Kow = 0.41 BCF values range between 0.947 and 59.29 L/kg.

12.4. Mobility in soil

Data on the product or its components:

Mixture/ Ingredient name	Effect
Pentaerythritol tetrakis(3-mercaptopropionate) [PENTAERYTHRITYL TETRAMERCAPTOPROPIONATE]	The substance is considered medium mobile. Koc at 20 °C: 347 log10 Koc = 2.54
Propylidynetrimethyl trimethacrylate [TRIMETHYLOLPROPANE TRIMETHACRYLATE]	Koc at 20 °C: 1 757 log Koc: 3.245

Exo-1,7,7-trimethylbicyclo[2.2.1]hept-2-yl methacrylate [ISOBORNYL METHACRYLATE]	Mean adsorption coefficient log Koc of 3.7.
(1-Methyl-1,2-ethanediyl)bis[oxy(methyl-2,1-ethanediyl)] diacrylate [TRIPROPYLENE GLYCOL DIACRYLATE	log Koc value is within the range between 0.4 and 3 and thus indicates no potential for adsorption. Koc at 20 °C: 1 023
2-Hydroxyethyl acrylate [2-HYDROXYETHYL ACRYLATE]	Koc value was calculated to be 1L /kg (log Koc = -0.03 - log Koc of <3 adsorption to solid soil phase is not expected).

12.5. Results of PBT and vPvB assessment

Regarding all available data on biotic and abiotic degradation, bioaccumulation and toxicity it can be stated that the substance does not fulfil the PBT criteria (not PBT) and not the vPvB criteria (not vPvB). **12.6. Endocrine disrupting properties**

Data on the product or its components:

No data on adverse effects aquatic organisms are available.

Conclusion/Summary: Based on available data the mixture does not contain ingredients considered to have endocrine disrupting properties according to REACH Article 57(f) or Commission Delegated Regulation (EU) 2017/2100 or Commission Regulation (EU) 2018/605 at a concentration of 0.1% or more.

12.7. Other adverse effects

No known significant effects or critical hazards.

SECTION 13: Disposal considerations

13.1. Waste treatment methods

Product:

Methods of disposal:	The generation of waste should be avoided or minimised wherever possible. Disposal of this product, solutions and any by-products should at all times comply with the requirements of environmental protection and waste disposal legislation and any regional local authority requirements. Dispose of surplus and nonrecyclable products via a licensed waste disposal contractor. Waste should not be disposed of untreated to the sewer unless fully compliant with the requirements of all authorities with jurisdiction.
Hazardous waste:	Within the present knowledge of the supplier, this product IS regarded as hazardous waste, as defined by Directive 2008/98/EC and EU regulation 1357/2014.
European waste catalogue (EWC):	20 01 27* paint, inks, adhesives and resins containing dangerous substances
	Note: Always check the given waste codes according to the actual conditions of manufacturing, formulation or use.

Packaging:

Methods of disposal:	The generation of waste should be avoided or minimised wherever possible. Special precautions: This material and its container must be disposed of in a safe way. Care should be taken when handling emptied containers that have not been cleaned or rinsed out. Empty containers or liners may retain some product residues. Avoid dispersal of spilt material and runoff and contact with soil, waterways, drains and sewers.
Special precautions:	This material and its container must be disposed of in a safe way.

SECTION 14: Transport information

This **preparation is classified** as dangerous according to international transport regulations (ADR/RID, IMDG or ICAO/IATA).

RCAPTOPROPIONATE)

14.1. UN number or ID number

14.2. UN proper shipping name

14.3. Transport hazard class(es)

ADR	RID	IMDG	IATA
9	9	9	9
III	III	III	III
YES	YES	Marine pollutant	YES

14.4. Packing group

14.5. Environmental hazards

14.6. Special precautions for user

ADR	RID	IMDG	IATA
UN3082			UN3082
UN3082			UN3082
Environmentally Hazardous Substance Liquid, N.O.S. (PENTAERYTHRITYL TET RA ME			
Classification code: M6	*Classification code:* M6	*Special provisions:* 274, 909, 944	*Passenger Aircraft (PAX):* *IATA Limited quantities packaging instructions*: Y964 *IATA Max Limited Quantities per package*: 30 L *IATA Packaging instructions*: 964
Special provisions: 274; 335; 375; 601	*Special provisions:* 274; 335; 375; 601	*Limited quantity:* 5 L	
Limited quantity: 5 L	*Limited quantity:* 5 L	*Packaging: Instructions:* P001, LP01	
Excepted quantity: E1	*Excepted quantity:* E1	*IBC: Instructions:* IBC03	
Packaging: Packaging instructions: P001, IBC03, LP01, R001	*Packaging: Packaging instructions:* P001, IBC03, LP01, R001	*Portable tanks and bulk containers: IMO Tank instructions:* T1	
Special packaging provisions: PP1	*Special packaging provisions:* PP1	*UN Tank instructions:* T4	*Cargo Aircraft (CAO):* *Packaging instructions*: 964 *Max Limited Quantities per package*: 30 L
Mixed packaging provisions: MP19	*Mixed packaging provisions:* MP19	*Provisions:* TP2; TP29 *EmS code:* F-A, S-F	
Portable tanks and bulk containers: Instructions: T4	*Portable tanks and bulk containers: Instructions:* T4	*Stowage and segregation:* Category A.	*IATA Special provisions:* A97, A158, A197, A215
Special provisions: TP1; TP29	*Special provisions:* TP1; TP29	*Properties and observations:* -	
ADR tank: Tank code: LGBV	*RID tank: Tank code:* LGBV		
Transport category:	*Transport category:*		

Planet Nails Stain Resistant Top Coat

PTC

3

Tunnel restriction code:

(-)

Vehicle for tank carriage:

AT

Special provisions for carriage: Packages:

V12

Loading, unloading and handling:

CV13

Hazard identification:

90

3

Special provisions for carriage: Packages:

W12

Loading, unloading and handling:

CW13; CW31

Colis express (express parcels):

CE8

Hazard identification:

90

Not applicable.

14.7. Maritime transport in bulk according to IMO instruments

SECTION 15: Regulatory information

15.1. Safety, health and environmental regulations/legislation specific for the substance or mixture

REGULATION (EC) No 1272/2008 OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL of 16 December 2008 on classification, labelling and packaging of substances and mixtures (CLP).

ADR - the European Agreement concerning the International Carriage of Dangerous Goods by Road, concluded at Geneva on 30 September 1957, as amended.

RID - the Regulations concerning the International Carriage of Dangerous Goods by Rail, appearing as Appendix C to the Convention concerning International Carriage by Rail (COTIF) concluded at Vilnius on 3 June 1999, as amended. ADN - the European Agreement concerning the International Carriage of Dangerous Goods by Inland Waterways concluded at Geneva on 26 May 2000, as amended.

IMDG Code - International Maritime Dangerous Goods Code.

IATA/ICAO: ICAO - International Civil Aviation Organization. IATA - International Air Transport Association.

MARPOL 73/78 - International Convention for the Prevention of Pollution from Ships, 1973 as modified by the Protocol of 1978.

COUNCIL DIRECTIVE 1999/13/EC of 11 March 1999 on the limitation of emissions of volatile organic compounds due to the use of organic solvents in certain activities and installations, with amendments (2004/42/CE).

Directive 2008/98/EC of the European Parliament and of the Council of 19 November 2008 on waste and repealing certain Directives (Text with EEA relevance).

Commission Regulation (EU) No 1357/2014 of 18 December 2014 replacing Annex III to Directive 2008/98/EC of the European Parliament and of the Council on waste and repealing certain Directives Text with EEA relevance.

REGULATION (EC) No 1907/2006 OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL of 18 December 2006 concerning the Registration, Evaluation, Authorisation and Restriction of Chemicals (REACH):

Annex XIV - List of substances subject to authorization:	Substances of very high concern: None of the components are listed.
Annex XVII - Restrictions on the manufacture, placing on the market and use of certain dangerous substances, mixtures and articles:	Not applicable.

15.2. Chemical safety assessment

A Chemical Safety Assessment has not been carried out.

SECTION 16: Other information

Abbreviations and acronyms:

CLP: Classification, Labelling and Packaging Regulation [Regulation (EC) No.1272/2008]
ADR: The European Agreement concerning the International Carriage of Dangerous Goods by Road
RID: International Rule for Transport of Dangerous Substances by Railway
IMDG: International Maritime Code for Dangerous Goods
IATA: International Air Transport Association
CAS: Chemical Abstracts Service
EINECS: European Inventory of Existing Commercial Chemical Substances
LC50: Median lethal concentration
LD50: Median lethal dose
RD50: Exposure concentration producing a 50% respiratory rate decrease.
REACH: Registration, Evaluation and Authorisation of Chemicals PBT: Persistent, bio-accumulative and toxic vPvB: Very persistent, very bio-accumulative
bw: Body weight

Full text of classifications and H statements [CLP/ GHS]:

Acute Tox. 4, Acute toxicity (oral), Hazard Category 4;
H302 Harmful if swallowed.
Acute Tox. 3, Acute toxicity (dermal), Hazard Category 3; H311
Toxic in contact with skin.
Skin Corr. 1B, Skin corrosion/ irritation, Hazard Category 1B; H314
Causes severe skin burns and eye damage.
Skin Irrit. 2, Skin corrosion/ irritation, Hazard Category 2; H315
Causes skin irritation.
Skin Sens. 1A, 1 - Sensitisation — Skin, Hazard Category 1A, 1; H317
May cause an allergic skin reaction.
Eye Irrit. 2, Serious eye damage/eye irritation, Hazard Category 2; H319
Causes serious eye irritation.
STOT SE 3, Specific target organ toxicity — Single exposure, Hazard Category 3, Respiratory tract irritation;
H335 May cause respiratory irritation.
Aquatic Acute 1, Short-term (acute) aquatic hazard — Acute Hazard, Category 1;
H400 Very toxic to aquatic life.
Aquatic Chronic 1 - Hazardous to the aquatic environment — Chronic Hazard, Category 1;
H410 Very toxic to aquatic life with long lasting effects.
Aquatic Chronic 2 - Hazardous to the aquatic environment — Chronic Hazard, Category 2;
H411 Toxic to aquatic life with long lasting effects.
Aquatic Chronic 3 - Hazardous to the aquatic environment — Chronic Hazard, Category 3;
H412 Harmful to aquatic life with long lasting effects.

Classification system:

Classification for health effects: conventional (calculation) method is used or generic/ specific concentration limits:
Skin Irrit. 2, H315
Skin Sens. 1A, H317

Eye Irrit. 2, H319
Classification for physico-chemical effects:
Not applicable.
Classification for environmental effects: conventional (calculation) method is used.
Aquatic Chronic 2, H411 **Training**

advice:

In addition to health, safety and environmental training programs for their workers, companies must ensure that workers read, understand and apply the requirements of this SDS.

Used literature:

European Chemical Agency's homepage (http://echa.europa.eu/).
Safety data sheets of individual components.

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