POLYURETHANE CLEAR COAT

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SECTION 1: IDENTIFICATION OF THE SUBSTANCE/MIXTURE AND OF THE COMPANY/UNDERTAKING

1.1 Product identifier: POLYURETHANE CLEAR COAT

Other means of identification:

UFI: 1ESN-00K9-U00R-Y21U

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

Relevant uses: Products for ships, boats, ... (construction, repair, ...); paints and varnishes

Uses advised against: All uses not specified in this section or in section 7.3

1.3 Details of the supplier of the safety data sheet:

Troton Sp. z o.o.
Ząbrowo 14A
78-120 Gościno - Zachodniopomorskie - Polska
Phone: +48 94 35 123 94 - Fax: +48 94 35 126 22
troton@troton.com.pl
www.troton.pl / www.troton.eu

1.4 Emergency telephone number: (8am-4pm)+48 094 35 123 94; 112

SECTION 2: HAZARDS IDENTIFICATION

2.1 Classification of the substance or mixture:

CLP Regulation (EC) No 1272/2008:

Classification of this product has been carried out in accordance with CLP Regulation (EC) No 1272/2008.

Aquatic Chronic 3: Hazardous to the aquatic environment, long-term hazard, Category 3, H412
Eye Irrit. 2: Eye irritation, Category 2, H319
Flam. Liq. 3: Flammable liquids, Category 3, H226
Skin Irrit. 2: Skin irritation, Category 2, H315
STOT RE 2: Specific target organ toxicity — Repeated exposure, Hazard Category 2 (Oral), H373
STOT SE 3: Respiratory tract toxicity, single exposure, Category 3, H335
STOT SE 3: Specific toxicity causing drowsiness and dizziness, single exposure, Category 3, H336

2.2 Label elements:

CLP Regulation (EC) No 1272/2008:

Warning



Hazard statements:

Aquatic Chronic 3: H412 - Harmful to aquatic life with long lasting effects.
Eye Irrit. 2: H319 - Causes serious eye irritation.
Flam. Liq. 3: H226 - Flammable liquid and vapour.
Skin Irrit. 2: H315 - Causes skin irritation.
STOT RE 2: H373 - May cause damage to organs through prolonged or repeated exposure (Oral).
STOT SE 3: H335 - May cause respiratory irritation.
STOT SE 3: H336 - May cause drowsiness or dizziness.

Precautionary statements:

P101: If medical advice is needed, have product container or label at hand.
P102: Keep out of reach of children.
P210: Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking.
P264: Wash thoroughly after handling.
P280: Wear protective gloves/face protection/protective clothing/respiratory protection/protective footwear.
P305+P351+P338: IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
P370+P378: In case of fire: Use ABC powder extinguisher to extinguish.
P501: Dispose of contents/container according to the separated collection system used in your municipality.

Supplementary information:

EUH066: Repeated exposure may cause skin dryness or cracking.

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SECTION 2: HAZARDS IDENTIFICATION (continued)

Substances that contribute to the classification

N-butyl acetate; Hydrocarbons, C9, aromatics (Benzene < 1 % w/w); Xylene

2.3 Other hazards:

Product fails to meet PBT/vPvB criteria
Endocrine-disrupting properties: The product fails to meet the criteria.

SECTION 3: COMPOSITION/INFORMATION ON INGREDIENTS

3.1 Substance:

Non-applicable

3.2 Mixture:

Chemical description: Mixture composed of chemical products

Components:

In accordance with Annex II of Regulation (EC) No 1907/2006 (point 3), the product contains:

Identification	Chemical name/Classification		Concentration
CAS: 123-86-4 EC: 204-658-1 Index: 607-025-00-1 REACH: 01-2119485493-29-XXXX	**N-butyl acetate**(1)	ATP CLP00	**25 - <50 %**
	Regulation 1272/2008	Flam. Liq. 3: H226; STOT SE 3: H336; EUH066 - Warning 	
CAS: 128601-23-0 EC: Non-applicable Index: Non-applicable REACH: 01-2119455851-35-XXXX	**Hydrocarbons, C9, aromatics (Benzene < 1 % w/w)**(1)	Self-classified	**10 - <25 %**
	Regulation 1272/2008	Aquatic Chronic 2: H411; Asp. Tox. 1: H304; Flam. Liq. 3: H226; STOT SE 3: H335; STOT SE 3: H336; EUH066 - Danger 	
CAS: 1330-20-7 EC: 215-535-7 Index: 601-022-00-9 REACH: 01-2119488216-32-XXXX	**Xylene**(1)	Self-classified	**10 - <25 %**
	Regulation 1272/2008	Acute Tox. 4: H312+H332; Aquatic Chronic 3: H412; Asp. Tox. 1: H304; Eye Irrit. 2: H319; Flam. Liq. 3: H226; Skin Irrit. 2: H315; STOT RE 2: H373; STOT SE 3: H335 - Danger 	
CAS: 112-07-2 EC: 203-933-3 Index: 607-038-00-2 REACH: 01-2119475112-47-XXXX	**2-butoxyethyl acetate**(1)	ATP CLP00	**5 - <10 %**
	Regulation 1272/2008	Acute Tox. 4: H312+H332 - Warning 	
CAS: 100-41-4 EC: 202-849-4 Index: 601-023-00-4 REACH: 01-2119489370-35-XXXX	**Ethylbenzene**(1)	ATP ATP06	**2,5 - <5 %**
	Regulation 1272/2008	Acute Tox. 4: H332; Asp. Tox. 1: H304; Flam. Liq. 2: H225; STOT RE 2: H373 - Danger 	
CAS: 80-62-6 EC: 201-297-1 Index: 607-035-00-6 REACH: 01-2119452498-28-XXXX	**Methyl methacrylate**(2)	ATP CLP00	**<1 %**
	Regulation 1272/2008	Flam. Liq. 2: H225; Skin Irrit. 2: H315; Skin Sens. 1: H317; STOT SE 3: H335 - Danger 	

(1) Substances presenting a health or environmental hazard which meet criteria laid down in Regulation (EU) No. 2020/878
(2) Substance with a Union workplace exposure limit

To obtain more information on the hazards of the substances consult sections 11, 12 and 16.

SECTION 4: FIRST AID MEASURES

4.1 Description of first aid measures:

The symptoms resulting from intoxication can appear after exposure, therefore, in case of doubt, seek medical attention for direct exposure to the chemical product or persistent discomfort, showing the SDS of this product.

By inhalation:

Remove the person affected from the area of exposure, provide with fresh air and keep at rest. In serious cases such as cardiorespiratory failure, artificial resuscitation techniques will be necessary (mouth to mouth resuscitation, cardiac massage, oxygen supply, etc.) requiring immediate medical assistance.

By skin contact:

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SECTION 4: FIRST AID MEASURES (continued)

Remove contaminated clothing and footwear, rinse skin or shower the person affected if appropriate with plenty of cold water and neutral soap. In serious cases see a doctor. If the product causes burns or freezing, clothing should not be removed as this could worsen the injury caused if it is stuck to the skin. If blisters form on the skin, these should never be burst as this will increase the risk of infection.

By eye contact:

Rinse eyes thoroughly with lukewarm water for at least 15 minutes. Do not allow the person affected to rub or close their eyes. If the injured person uses contact lenses, these should be removed unless they are stuck to the eyes, in which case this could cause further damage. In all cases, after cleaning, a doctor should be consulted as quickly as possible with the SDS of the product.

By ingestion/aspiration:

Do not induce vomiting, but if it does happen keep the head down to avoid aspiration. Keep the person affected at rest. Rinse out the mouth and throat, as they may have been affected during ingestion.

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

Acute and delayed effects are indicated in sections 2 and 11.

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

Non-applicable

SECTION 5: FIREFIGHTING MEASURES

5.1 Extinguishing media:

Suitable extinguishing media:

If possible use polyvalent powder fire extinguishers (ABC powder), alternatively use foam or carbon dioxide extinguishers (CO_2).

Unsuitable extinguishing media:

IT IS RECOMMENDED NOT to use full jet water as an extinguishing agent.

5.2 Special hazards arising from the substance or mixture:

As a result of combustion or thermal decomposition reactive sub-products are created that can become highly toxic and, consequently, can present a serious health risk.

5.3 Advice for firefighters:

Depending on the magnitude of the fire it may be necessary to use full protective clothing and self-contained breathing apparatus (SCBA). Minimum emergency facilities and equipment should be available (fire blankets, portable first aid kit,...) in accordance with Directive 89/654/EC.

Additional provisions:

Act in accordance with the Internal Emergency Plan and the Information Sheets on actions to take after an accident or other emergencies. Eliminate all sources of ignition. In case of fire, cool the storage containers and tanks for products susceptible to combustion, explosion or BLEVE as a result of high temperatures. Avoid spillage of the products used to extinguish the fire into an aqueous medium.

SECTION 6: ACCIDENTAL RELEASE MEASURES

6.1 Personal precautions, protective equipment and emergency procedures:

For non-emergency personnel:

Isolate leaks provided that there is no additional risk for the people performing this task. Evacuate the area and keep out those without protection. Personal protection equipment must be used against potential contact with the spilt product (See section 8). Above all prevent the formation of any vapour-air flammable mixtures, through either ventilation or the use of an inert medium. Remove any source of ignition. Eliminate electrostatic charges by interconnecting all the conductive surfaces on which static electricity could form, and also ensuring that all surfaces are connected to the ground.

For emergency responders:

Wear protective equipment. Keep unprotected persons away. See section 8.

6.2 Environmental precautions:

Avoid at all cost any type of spillage into an aqueous medium. Contain the product absorbed appropriately in hermetically sealed containers. Notify the relevant authority in case of exposure to the general public or the environment.

6.3 Methods and material for containment and cleaning up:

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SECTION 6: ACCIDENTAL RELEASE MEASURES (continued)

It is recommended:

Absorb the spillage using sand or inert absorbent and move it to a safe place. Do not absorb in sawdust or other combustible absorbents. For any concern related to disposal consult section 13.

6.4 Reference to other sections:

See sections 8 and 13.

SECTION 7: HANDLING AND STORAGE

7.1 Precautions for safe handling:

A.- General precautions for safe use

Comply with the current legislation concerning the prevention of industrial risks. Keep containers hermetically sealed. Control spills and residues, destroying them with safe methods (section 6). Avoid leakages from the container. Maintain order and cleanliness where dangerous products are used.

B.- Technical recommendations for the prevention of fires and explosions

Transfer in well ventilated areas, preferably through localized extraction. Fully control sources of ignition (mobile phones, sparks,…) and ventilate during cleaning operations. Avoid the existence of dangerous atmospheres inside containers, applying inertization systems where possible. Transfer at a slow speed to avoid the creation of electrostatic charges. Against the possibility of electrostatic charges: ensure a perfect equipotential connection, always use groundings, do not wear work clothes made of acrylic fibres, preferably wearing cotton clothing and conductive footwear. Comply with the essential security requirements for equipment and systems defined in Directive 2014/34/EC (ATEX 100) and with the minimum requirements for protecting the security and health of workers under the selection criteria of Directive 1999/92/EC (ATEX 137). Consult section 10 for conditions and materials that should be avoided.

C.- Technical recommendations on general occupational hygiene

Do not eat or drink during the process, washing hands afterwards with suitable cleaning products.

D.- Technical recommendations to prevent environmental risks

Due to the danger of this product for the environment it is recommended to use it within an area containing contamination control barriers in case of spillage, as well as having absorbent material in close proximity.

7.2 Conditions for safe storage, including any incompatibilities:

A.- Technical measures for storage

Minimum Temp.: 10 ºC

Maximum Temp.: 25 ºC

Maximum time: 12 Months

B.- General conditions for storage

Avoid sources of heat, radiation, static electricity and contact with food. For additional information see subsection 10.5

7.3 Specific end use(s):

Except for the instructions already specified it is not necessary to provide any special recommendation regarding the uses of this product.

SECTION 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

8.1 Control parameters:

Substances whose occupational exposure limits have to be monitored in the workplace (European OEL, not country-specific legislation):

Directive (EU) 2000/39, Directive 2004/37/EC,Directive (EU) 2006/15, Directive (EU) 2009/161, Directive (EU) 2017/164, Directive (EU) 2019/1831:

Identification	Occupational exposure limits		
N-butyl acetate	IOELV (8h)	50 ppm	241 mg/m³
CAS: 123-86-4 EC: 204-658-1	IOELV (STEL)	150 ppm	723 mg/m³
Xylene	IOELV (8h)	50 ppm	221 mg/m³
CAS: 1330-20-7 EC: 215-535-7	IOELV (STEL)	100 ppm	442 mg/m³
2-butoxyethyl acetate	IOELV (8h)	20 ppm	133 mg/m³
CAS: 112-07-2 EC: 203-933-3	IOELV (STEL)	50 ppm	333 mg/m³
Ethylbenzene	IOELV (8h)	100 ppm	442 mg/m³
CAS: 100-41-4 EC: 202-849-4	IOELV (STEL)	200 ppm	884 mg/m³

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SECTION 8: EXPOSURE CONTROLS/PERSONAL PROTECTION (continued)

Directive (EU) 2000/39, Directive 2004/37/EC,Directive (EU) 2006/15, Directive (EU) 2009/161, Directive (EU) 2017/164, Directive (EU) 2019/1831:

Identification	Occupational exposure limits		
Methyl methacrylate	IOELV (8h)	50 ppm	
CAS: 80-62-6 EC: 201-297-1	IOELV (STEL)	100 ppm	

DNEL (Workers):

Identification		Short exposure		Long exposure	
		Systemic	Local	Systemic	Local
N-butyl acetate	Oral	Non-applicable	Non-applicable	Non-applicable	Non-applicable
CAS: 123-86-4	Dermal	11 mg/kg	Non-applicable	11 mg/kg	Non-applicable
EC: 204-658-1	Inhalation	600 mg/m³	600 mg/m³	300 mg/m³	300 mg/m³
Hydrocarbons, C9, aromatics (Benzene < 1 % w/w)	Oral	Non-applicable	Non-applicable	Non-applicable	Non-applicable
CAS: 128601-23-0	Dermal	Non-applicable	Non-applicable	25 mg/kg	Non-applicable
EC: Non-applicable	Inhalation	Non-applicable	Non-applicable	150 mg/m³	Non-applicable
Xylene	Oral	Non-applicable	Non-applicable	Non-applicable	Non-applicable
CAS: 1330-20-7	Dermal	Non-applicable	Non-applicable	212 mg/kg	Non-applicable
EC: 215-535-7	Inhalation	442 mg/m³	442 mg/m³	221 mg/m³	221 mg/m³
2-butoxyethyl acetate	Oral	Non-applicable	Non-applicable	Non-applicable	Non-applicable
CAS: 112-07-2	Dermal	120 mg/kg	Non-applicable	169 mg/kg	Non-applicable
EC: 203-933-3	Inhalation	Non-applicable	333 mg/m³	133 mg/m³	Non-applicable
Ethylbenzene	Oral	Non-applicable	Non-applicable	Non-applicable	Non-applicable
CAS: 100-41-4	Dermal	Non-applicable	Non-applicable	180 mg/kg	Non-applicable
EC: 202-849-4	Inhalation	Non-applicable	293 mg/m³	77 mg/m³	Non-applicable
Methyl methacrylate	Oral	Non-applicable	Non-applicable	Non-applicable	Non-applicable
CAS: 80-62-6	Dermal	Non-applicable	Non-applicable	13,67 mg/kg	Non-applicable
EC: 201-297-1	Inhalation	Non-applicable	416 mg/m³	348,4 mg/m³	208 mg/m³

DNEL (General population):

Identification		Short exposure		Long exposure	
		Systemic	Local	Systemic	Local
N-butyl acetate	Oral	2 mg/kg	Non-applicable	2 mg/kg	Non-applicable
CAS: 123-86-4	Dermal	6 mg/kg	Non-applicable	6 mg/kg	Non-applicable
EC: 204-658-1	Inhalation	300 mg/m³	300 mg/m³	35,7 mg/m³	35,7 mg/m³
Hydrocarbons, C9, aromatics (Benzene < 1 % w/w)	Oral	Non-applicable	Non-applicable	11 mg/kg	Non-applicable
CAS: 128601-23-0	Dermal	Non-applicable	Non-applicable	11 mg/kg	Non-applicable
EC: Non-applicable	Inhalation	Non-applicable	Non-applicable	32 mg/m³	Non-applicable
Xylene	Oral	Non-applicable	Non-applicable	12,5 mg/kg	Non-applicable
CAS: 1330-20-7	Dermal	Non-applicable	Non-applicable	125 mg/kg	Non-applicable
EC: 215-535-7	Inhalation	260 mg/m³	260 mg/m³	65,3 mg/m³	65,3 mg/m³
2-butoxyethyl acetate	Oral	36 mg/kg	Non-applicable	8,6 mg/kg	Non-applicable
CAS: 112-07-2	Dermal	72 mg/kg	Non-applicable	102 mg/kg	Non-applicable
EC: 203-933-3	Inhalation	Non-applicable	200 mg/m³	80 mg/m³	Non-applicable
Ethylbenzene	Oral	Non-applicable	Non-applicable	1,6 mg/kg	Non-applicable
CAS: 100-41-4	Dermal	Non-applicable	Non-applicable	Non-applicable	Non-applicable
EC: 202-849-4	Inhalation	Non-applicable	Non-applicable	15 mg/m³	Non-applicable
Methyl methacrylate	Oral	Non-applicable	Non-applicable	8,2 mg/kg	Non-applicable
CAS: 80-62-6	Dermal	Non-applicable	Non-applicable	8,2 mg/kg	Non-applicable
EC: 201-297-1	Inhalation	Non-applicable	208 mg/m³	74,3 mg/m³	104 mg/m³

PNEC:

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SECTION 8: EXPOSURE CONTROLS/PERSONAL PROTECTION (continued)

Identification				
N-butyl acetate	STP	35,6 mg/L	Fresh water	0,18 mg/L
CAS: 123-86-4	Soil	0,09 mg/kg	Marine water	0,018 mg/L
EC: 204-658-1	Intermittent	0,36 mg/L	Sediment (Fresh water)	0,981 mg/kg
	Oral	Non-applicable	Sediment (Marine water)	0,098 mg/kg
Xylene	STP	6,58 mg/L	Fresh water	0,327 mg/L
CAS: 1330-20-7	Soil	2,31 mg/kg	Marine water	0,327 mg/L
EC: 215-535-7	Intermittent	0,327 mg/L	Sediment (Fresh water)	12,46 mg/kg
	Oral	Non-applicable	Sediment (Marine water)	12,46 mg/kg
2-butoxyethyl acetate	STP	90 mg/L	Fresh water	0,304 mg/L
CAS: 112-07-2	Soil	0,415 mg/kg	Marine water	0,03 mg/L
EC: 203-933-3	Intermittent	0,56 mg/L	Sediment (Fresh water)	2,03 mg/kg
	Oral	0,06 g/kg	Sediment (Marine water)	0,203 mg/kg
Ethylbenzene	STP	9,6 mg/L	Fresh water	0,1 mg/L
CAS: 100-41-4	Soil	2,68 mg/kg	Marine water	0,01 mg/L
EC: 202-849-4	Intermittent	0,1 mg/L	Sediment (Fresh water)	13,7 mg/kg
	Oral	0,02 g/kg	Sediment (Marine water)	1,37 mg/kg
Methyl methacrylate	STP	10 mg/L	Fresh water	0,94 mg/L
CAS: 80-62-6	Soil	1,48 mg/kg	Marine water	0,094 mg/L
EC: 201-297-1	Intermittent	0,94 mg/L	Sediment (Fresh water)	10,2 mg/kg
	Oral	Non-applicable	Sediment (Marine water)	0,102 mg/kg

8.2 Exposure controls:

A.- Individual protection measures, such as personal protective equipment

As a preventative measure it is recommended to use basic Personal Protective Equipment, with the corresponding <<CE marking>> in accordance with Regulation (EU) 2016/425. For more information on Personal Protective Equipment (storage, use, cleaning, maintenance, class of protection,…) consult the information leaflet provided by the manufacturer. For more information see subsection 7.1. All information contained herein is a recommendation which needs some specification from the labour risk prevention services as it is not known whether the company has additional measures at its disposal.

B.- Respiratory protection

Pictogram	PPE	Labelling	CEN Standard	Remarks
 Mandatory respiratory tract protection	Filter mask for gases and vapours	CE CAT III	EN 405:2002+A1:2010	Replace when there is a taste or smell of the contaminant inside the face mask. If the contaminant comes with warnings it is recommended to use isolation equipment.

C.- Specific protection for the hands

Pictogram	PPE	Labelling	CEN Standard	Remarks
 Mandatory hand protection	Chemical protective gloves (Material: Linear low-density polyethylene (LLDPE), Breakthrough time: > 480 min, Thickness: 0.062 mm)	CE CAT III	EN ISO 21420:2020	Replace the gloves at any sign of deterioration.

As the product is a mixture of several substances, the resistance of the glove material can not be calculated in advance with total reliability and has therefore to be checked prior to the application.

D.- Eye and face protection

Pictogram	PPE	Labelling	CEN Standard	Remarks
 Mandatory face protection	Face shield	CE CAT II	EN 166:2002 EN 167:2002 EN 168:2002 EN ISO 4007:2018	Clean daily and disinfect periodically according to the manufacturer´s instructions. Use if there is a risk of splashing.

E.- Body protection

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SECTION 8: EXPOSURE CONTROLS/PERSONAL PROTECTION (continued)

Pictogram	PPE	Labelling	CEN Standard	Remarks
 Mandatory complete body protection	Disposable clothing for protection against chemical risks, with antistatic and fireproof properties	CE CAT III	EN 1149-1,2,3 EN 13034:2005+A1:2009 EN ISO 13982-1:2004/A1:2010 EN ISO 6529:2013 EN ISO 6530:2005 EN ISO 13688:2013 EN 464:1994	For professional use only. Clean periodically according to the manufacturer´s instructions.
 Mandatory foot protection	Safety footwear for protection against chemical risk, with antistatic and heat resistant properties	CE CAT III	EN ISO 13287:2020 EN ISO 20345:2011 EN 13832-1:2019	Replace boots at any sign of deterioration.

F.- Additional emergency measures

Emergency measure	Standards	Emergency measure	Standards
 Emergency shower	ANSI Z358-1 ISO 3864-1:2011, ISO 3864-4:2011	 Eyewash stations	DIN 12 899 ISO 3864-1:2011, ISO 3864-4:2011

Environmental exposure controls:

In accordance with the community legislation for the protection of the environment it is recommended to avoid environmental spillage of both the product and its container. For additional information see subsection 7.1.D

SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES

9.1 Information on basic physical and chemical properties:

For complete information see the product datasheet.

Appearance:

Physical state at 20 ºC:	Liquid
Appearance:	Colorless
Colour:	Colourless
Odour:	Characteristic
Odour threshold:	Non-applicable *

Volatility:

Boiling point at atmospheric pressure:	126 ºC
Vapour pressure at 20 ºC:	919 Pa
Vapour pressure at 50 ºC:	4622,82 Pa (4,62 kPa)
Evaporation rate at 20 ºC:	Non-applicable *

Product description:

Density at 20 ºC:	1000 kg/m³
Relative density at 20 ºC:	0,936
Dynamic viscosity at 20 ºC:	Non-applicable *
Kinematic viscosity at 20 ºC:	Non-applicable *
Kinematic viscosity at 40 ºC:	145000000 mm²/s
Concentration:	Non-applicable *
pH:	Non-applicable *
Vapour density at 20 ºC:	Non-applicable *
Partition coefficient n-octanol/water 20 ºC:	Non-applicable *
Solubility in water at 20 ºC:	Non-applicable *

*Not relevant due to the nature of the product, not providing information property of its hazards.

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SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES (continued)

Solubility properties:	Non-applicable *
Decomposition temperature:	Non-applicable *
Melting point/freezing point:	Non-applicable *
Flammability:	
Flash Point:	24 ºC
Flammability (solid, gas):	Non-applicable *
Autoignition temperature:	415 ºC
Lower flammability limit:	Not available
Upper flammability limit:	Not available
Particle characteristics:	
Median equivalent diameter:	Non-applicable

9.2 Other information:

Information with regard to physical hazard classes:

Explosive properties:	Non-applicable *
Oxidising properties:	Non-applicable *
Corrosive to metals:	Non-applicable *
Heat of combustion:	Non-applicable *
Aerosols-total percentage (by mass) of flammable components:	Non-applicable *
Other safety characteristics:	
Surface tension at 20 ºC:	Non-applicable *
Refraction index:	Non-applicable *

*Not relevant due to the nature of the product, not providing information property of its hazards.

SECTION 10: STABILITY AND REACTIVITY

10.1 Reactivity:

No hazardous reactions are expected because the product is stable under recommended storage conditions. See section 7.

10.2 Chemical stability:

Chemically stable under the indicated conditions of storage, handling and use.

10.3 Possibility of hazardous reactions:

Under the specified conditions, hazardous reactions that lead to excessive temperatures or pressure are not expected.

10.4 Conditions to avoid:

Applicable for handling and storage at room temperature:

Shock and friction	Contact with air	Increase in temperature	Sunlight	Humidity
Not applicable	Not applicable	Risk of combustion	Avoid direct impact	Not applicable

10.5 Incompatible materials:

Acids	Water	Oxidising materials	Combustible materials	Others
Avoid strong acids	Not applicable	Avoid direct impact	Not applicable	Avoid alkalis or strong bases

10.6 Hazardous decomposition products:

See subsection 10.3, 10.4 and 10.5 to find out the specific decomposition products. Depending on the decomposition conditions, complex mixtures of chemical substances can be released: carbon dioxide (CO_2), carbon monoxide and other organic compounds.

SECTION 11: TOXICOLOGICAL INFORMATION

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

The experimental information related to the toxicological properties of the product itself is not available

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SECTION 11: TOXICOLOGICAL INFORMATION (continued)

Dangerous health implications:

In case of exposure that is repetitive, prolonged or at concentrations higher than the recommended occupational exposure limits, adverse effects on health may result, depending on the means of exposure:

A- Ingestion (acute effect):

- Acute toxicity : Based on available data, the classification criteria are not met, as it does not contain substances classified as hazardous for consumption. For more information see section 3
- Corrosivity/Irritability: The consumption of a considerable dose can cause irritation in the throat, abdominal pain, nausea and vomiting.

B- Inhalation (acute effect):

- Acute toxicity : Based on available data, the classification criteria are not met. However, it contains substances classified as hazardous for inhalation. For more information see section 3.
- Corrosivity/Irritability: Causes irritation in respiratory passages, which is normally reversible and limited to the upper respiratory passages.

C- Contact with the skin and the eyes (acute effect):

- Contact with the skin: Produces skin inflammation.
- Contact with the eyes: Produces eye damage after contact.

D- CMR effects (carcinogenicity, mutagenicity and toxicity to reproduction):

- Carcinogenicity: Based on available data, the classification criteria are not met, as it does not contain substances classified as hazardous for the effects mentioned. For more information see section 3.
  IARC: Methyl methacrylate (3); Ethylbenzene (2B); Xylene (3)
- Mutagenicity: Based on available data, the classification criteria are not met, as it does not contain substances classified as hazardous for this effect. For more information see section 3.
- Reproductive toxicity: Based on available data, the classification criteria are not met, as it does not contain substances classified as hazardous for this effect. For more information see section 3.

E- Sensitizing effects:

- Respiratory: Based on available data, the classification criteria are not met, as it does not contain substances classified as hazardous with sensitising effects. For more information see section 3.
- Skin: Based on available data, the classification criteria are not met. However, it contains substances classified as dangerous with sensitising effects. For more information see section 3.

F- Specific target organ toxicity (STOT) - single exposure:

Causes irritation in respiratory passages, which is normally reversible and limited to the upper respiratory passages.

G- Specific target organ toxicity (STOT)-repeated exposure:

- Specific target organ toxicity (STOT)-repeated exposure: Exposure in high concentration can interfere with the central nervous system causing headache, dizziness, vertigo, nausea, vomiting, confusion, and in serious cases, loss of consciousness.
- Skin: Repeated exposure may cause skin dryness or cracking

H- Aspiration hazard:

Based on available data, the classification criteria are not met. However, it does contain substances classified as hazardous for this effect. For more information see section 3.

Other information:

Non-applicable

Specific toxicology information on the substances:

Identification	Acute toxicity		Genus
Hydrocarbons, C9, aromatics (Benzene < 1 % w/w)	LD50 oral	>2000 mg/kg	
CAS: 128601-23-0	LD50 dermal	>2000 mg/kg	
EC: Non-applicable	LC50 inhalation	>20 mg/L	
2-butoxyethyl acetate	LD50 oral	2100 mg/kg	Rat
CAS: 112-07-2	LD50 dermal	1480 mg/kg	Rabbit
EC: 203-933-3	LC50 inhalation	11 mg/L (4 h)	Rat
Ethylbenzene	LD50 oral	3500 mg/kg	Rat
CAS: 100-41-4	LD50 dermal	15354 mg/kg	Rabbit
EC: 202-849-4	LC50 inhalation	17,2 mg/L (4 h)	Rat

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SECTION 11: TOXICOLOGICAL INFORMATION (continued)

Identification	Acute toxicity		Genus
N-butyl acetate	LD50 oral	12789 mg/kg	Rat
CAS: 123-86-4	LD50 dermal	14112 mg/kg	Rabbit
EC: 204-658-1	LC50 inhalation	23,4 mg/L (4 h)	Rat
Xylene	LD50 oral	2100 mg/kg	Rat
CAS: 1330-20-7	LD50 dermal	1100 mg/kg	Rat
EC: 215-535-7	LC50 inhalation	11 mg/L (ATEi)	
Methyl methacrylate	LD50 oral	>2000 mg/kg	
CAS: 80-62-6	LD50 dermal	>2000 mg/kg	
EC: 201-297-1	LC50 inhalation	>20 mg/L	

11.2 Information on other hazards:

Endocrine disrupting properties

Endocrine-disrupting properties: The product fails to meet the criteria.

Other information

Non-applicable

SECTION 12: ECOLOGICAL INFORMATION

The experimental information related to the eco-toxicological properties of the product itself is not available

12.1 Toxicity:

Acute toxicity:

Identification	Concentration		Species	Genus
N-butyl acetate	LC50	Non-applicable		
CAS: 123-86-4	EC50	Non-applicable		
EC: 204-658-1	EC50	675 mg/L (72 h)	Scenedesmus subspicatus	Algae
Hydrocarbons, C9, aromatics (Benzene < 1 % w/w)	LC50	>1 - 10 mg/L (96 h)		Fish
CAS: 128601-23-0	EC50	>1 - 10 mg/L (48 h)		Crustacean
EC: Non-applicable	EC50	>1 - 10 mg/L (72 h)		Algae
Xylene	LC50	>10 - 100 mg/L (96 h)		Fish
CAS: 1330-20-7	EC50	>10 - 100 mg/L (48 h)		Crustacean
EC: 215-535-7	EC50	>10 - 100 mg/L (72 h)		Algae
2-butoxyethyl acetate	LC50	80 mg/L (48 h)	Leuciscus idus	Fish
CAS: 112-07-2	EC50	37 mg/L (48 h)	Daphnia magna	Crustacean
EC: 203-933-3	EC50	500 mg/L (72 h)	Scenedesmus subspicatus	Algae
Ethylbenzene	LC50	42,3 mg/L (96 h)	Pimephales promelas	Fish
CAS: 100-41-4	EC50	75 mg/L (48 h)	Daphnia magna	Crustacean
EC: 202-849-4	EC50	63 mg/L (3 h)	Chlorella vulgaris	Algae
Methyl methacrylate	LC50	191 mg/L (96 h)	Lepomis macrochirus	Fish
CAS: 80-62-6	EC50	69 mg/L (48 h)	Daphnia magna	Crustacean
EC: 201-297-1	EC50	170 mg/L (96 h)	Selenastrum capricornutum	Algae

Chronic toxicity:

Identification	Concentration		Species	Genus
N-butyl acetate	NOEC	Non-applicable		
CAS: 123-86-4 EC: 204-658-1	NOEC	23,2 mg/L	Daphnia magna	Crustacean
Xylene	NOEC	1,3 mg/L	Oncorhynchus mykiss	Fish
CAS: 1330-20-7 EC: 215-535-7	NOEC	1,17 mg/L	Ceriodaphnia dubia	Crustacean
Ethylbenzene	NOEC	Non-applicable		
CAS: 100-41-4 EC: 202-849-4	NOEC	0,96 mg/L	Ceriodaphnia dubia	Crustacean
Methyl methacrylate	NOEC	9,4 mg/L	Danio rerio	Fish
CAS: 80-62-6 EC: 201-297-1	NOEC	37 mg/L	Daphnia magna	Crustacean

12.2 Persistence and degradability:

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SECTION 12: ECOLOGICAL INFORMATION (continued)

Substance-specific information:

Identification	Degradability		Biodegradability	
N-butyl acetate	BOD5	Non-applicable	Concentration	Non-applicable
CAS: 123-86-4	COD	Non-applicable	Period	5 days
EC: 204-658-1	BOD5/COD	Non-applicable	% Biodegradable	84 %
Xylene	BOD5	Non-applicable	Concentration	Non-applicable
CAS: 1330-20-7	COD	Non-applicable	Period	28 days
EC: 215-535-7	BOD5/COD	Non-applicable	% Biodegradable	88 %
2-butoxyethyl acetate	BOD5	Non-applicable	Concentration	30 mg/L
CAS: 112-07-2	COD	Non-applicable	Period	28 days
EC: 203-933-3	BOD5/COD	Non-applicable	% Biodegradable	77,3 %
Ethylbenzene	BOD5	Non-applicable	Concentration	100 mg/L
CAS: 100-41-4	COD	Non-applicable	Period	14 days
EC: 202-849-4	BOD5/COD	Non-applicable	% Biodegradable	90 %
Methyl methacrylate	BOD5	Non-applicable	Concentration	100 mg/L
CAS: 80-62-6	COD	Non-applicable	Period	14 days
EC: 201-297-1	BOD5/COD	Non-applicable	% Biodegradable	94,3 %

12.3 Bioaccumulative potential:

Substance-specific information:

Identification	Bioaccumulation potential	
N-butyl acetate	BCF	4
CAS: 123-86-4	Pow Log	1.78
EC: 204-658-1	Potential	Low
Xylene	BCF	9
CAS: 1330-20-7	Pow Log	2.77
EC: 215-535-7	Potential	Low
2-butoxyethyl acetate	BCF	3
CAS: 112-07-2	Pow Log	1.51
EC: 203-933-3	Potential	Low
Ethylbenzene	BCF	1
CAS: 100-41-4	Pow Log	3.15
EC: 202-849-4	Potential	Low
Methyl methacrylate	BCF	7
CAS: 80-62-6	Pow Log	1.38
EC: 201-297-1	Potential	Low

12.4 Mobility in soil:

Identification	Absorption/desorption		Volatility	
N-butyl acetate	Koc	Non-applicable	Henry	Non-applicable
CAS: 123-86-4	Conclusion	Non-applicable	Dry soil	Non-applicable
EC: 204-658-1	Surface tension	2,478E-2 N/m (25 ºC)	Moist soil	Non-applicable
Xylene	Koc	202	Henry	524,86 Pa·m³/mol
CAS: 1330-20-7	Conclusion	Moderate	Dry soil	Yes
EC: 215-535-7	Surface tension	Non-applicable	Moist soil	Yes
2-butoxyethyl acetate	Koc	Non-applicable	Henry	5,532E-1 Pa·m³/mol
CAS: 112-07-2	Conclusion	Non-applicable	Dry soil	No
EC: 203-933-3	Surface tension	Non-applicable	Moist soil	Yes
Ethylbenzene	Koc	520	Henry	798,44 Pa·m³/mol
CAS: 100-41-4	Conclusion	Moderate	Dry soil	Yes
EC: 202-849-4	Surface tension	2,859E-2 N/m (25 ºC)	Moist soil	Yes
Methyl methacrylate	Koc	Non-applicable	Henry	Non-applicable
CAS: 80-62-6	Conclusion	Non-applicable	Dry soil	Non-applicable
EC: 201-297-1	Surface tension	2,551E-2 N/m (25 ºC)	Moist soil	Non-applicable

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SECTION 12: ECOLOGICAL INFORMATION (continued)

12.5 Results of PBT and vPvB assessment:

Product fails to meet PBT/vPvB criteria

12.6 Endocrine disrupting properties:

Endocrine-disrupting properties: The product fails to meet the criteria.

12.7 Other adverse effects:

Not described

SECTION 13: DISPOSAL CONSIDERATIONS

13.1 Waste treatment methods:

Code	Description	Waste class (Regulation (EU) No 1357/2014)
08 01 11* 15 01 10*	waste paint and varnish containing organic solvents or other hazardous substances packaging containing residues of or contaminated by hazardous substances	Dangerous

Type of waste (Regulation (EU) No 1357/2014):

HP14 Ecotoxic, HP3 Flammable, HP5 Specific Target Organ Toxicity (STOT)/Aspiration Toxicity, HP4 Irritant — skin irritation and eye damage

Waste management (disposal and evaluation):

Consult the authorized waste service manager on the assessment and disposal operations in accordance with Annex 1 and Annex 2 (Directive 2008/98/EC). As under 15 01 (2014/955/EC) of the code and in case the container has been in direct contact with the product, it will be processed the same way as the actual product. Otherwise, it will be processed as non-dangerous residue. Waste should not be disposed of to drains. See paragraph 6.2.

Regulations related to waste management:

In accordance with Annex II of Regulation (EC) No 1907/2006 (REACH) the community or state provisions related to waste management are stated

Community legislation: Directive 2008/98/EC, 2014/955/EU, Regulation (EU) No 1357/2014

SECTION 14: TRANSPORT INFORMATION

Transport of dangerous goods by land:

With regard to ADR 2021 and RID 2021:



14.1 UN number or ID number: UN1866

14.2 UN proper shipping name: RESIN SOLUTION

14.3 Transport hazard class(es): 3

Labels: 3

14.4 Packing group: III

14.5 Environmental hazards: No

14.6 Special precautions for user

Special regulations: Non-applicable

Tunnel restriction code: D/E

Physico-Chemical properties: see section 9

Limited quantities: 5 L

14.7 Maritime transport in bulk according to IMO instruments: Non-applicable

Transport of dangerous goods by sea:

With regard to IMDG 40-20:

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SECTION 14: TRANSPORT INFORMATION (continued)



14.1 UN number or ID number: UN1866
14.2 UN proper shipping name: RESIN SOLUTION
14.3 Transport hazard class(es): 3
Labels: 3
14.4 Packing group: III
14.5 Marine pollutant: No
14.6 Special precautions for user
Special regulations: 955, 223
EmS Codes: F-E, S-E
Physico-Chemical properties: see section 9
Limited quantities: 5 L
Segregation group: Non-applicable
14.7 Maritime transport in bulk according to IMO instruments: Non-applicable

Transport of dangerous goods by air:

With regard to IATA/ICAO 2022:



14.1 UN number or ID number: UN1866
14.2 UN proper shipping name: RESIN SOLUTION
14.3 Transport hazard class(es): 3
Labels: 3
14.4 Packing group: III
14.5 Environmental hazards: No
14.6 Special precautions for user
Physico-Chemical properties: see section 9
14.7 Maritime transport in bulk according to IMO instruments: Non-applicable

SECTION 15: REGULATORY INFORMATION

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

Candidate substances for authorisation under the Regulation (EC) No 1907/2006 (REACH): Non-applicable

Substances included in Annex XIV of REACH ("Authorisation List") and sunset date: Non-applicable

Regulation (EC) No 1005/2009, about substances that deplete the ozone layer: Non-applicable

Article 95, REGULATION (EU) No 528/2012: Non-applicable

REGULATION (EU) No 649/2012, in relation to the import and export of hazardous chemical products: Non-applicable

Seveso III:

Section	Description	Lower-tier requirements	Upper-tier requirements
P5c	FLAMMABLE LIQUIDS	5000	50000

Limitations to commercialisation and the use of certain dangerous substances and mixtures (Annex XVII REACH, etc ....):

Shall not be used in:
—ornamental articles intended to produce light or colour effects by means of different phases, for example in ornamental lamps and ashtrays,
—tricks and jokes,
—games for one or more participants, or any article intended to be used as such, even with ornamental aspects.

Specific provisions in terms of protecting people or the environment:

It is recommended to use the information included in this safety data sheet as a basis for conducting workplace-specific risk assessments in order to establish the necessary risk prevention measures for the handling, use, storage and disposal of this product.

Other legislation:

- CONTINUED ON NEXT PAGE -

SECTION 15: REGULATORY INFORMATION (continued)

The product could be affected by sectorial legislation

15.2 Chemical safety assessment:

The supplier has not carried out evaluation of chemical safety.

SECTION 16: OTHER INFORMATION

Legislation related to safety data sheets:

The SDS shall be supplied in an official language of the country where the product is placed on the market. This safety data sheet has been designed in accordance with ANNEX II-Guide to the compilation of safety data sheets of Regulation (EC) No 1907/2006 (COMMISSION REGULATION (EU) 2020/878).

Modifications related to the previous Safety Data Sheet which concerns the ways of managing risks.:

COMMISSION REGULATION (EU) 2020/878

Texts of the legislative phrases mentioned in section 2:

H335: May cause respiratory irritation.
H336: May cause drowsiness or dizziness.
H412: Harmful to aquatic life with long lasting effects.
H315: Causes skin irritation.
H373: May cause damage to organs through prolonged or repeated exposure (Oral).
H226: Flammable liquid and vapour.
H319: Causes serious eye irritation.

Texts of the legislative phrases mentioned in section 3:

The phrases indicated do not refer to the product itself; they are present merely for informative purposes and refer to the individual components which appear in section 3

CLP Regulation (EC) No 1272/2008:

Acute Tox. 4: H312+H332 - Harmful in contact with skin or if inhaled.
Acute Tox. 4: H332 - Harmful if inhaled.
Aquatic Chronic 2: H411 - Toxic to aquatic life with long lasting effects.
Aquatic Chronic 3: H412 - Harmful to aquatic life with long lasting effects.
Asp. Tox. 1: H304 - May be fatal if swallowed and enters airways.
Eye Irrit. 2: H319 - Causes serious eye irritation.
Flam. Liq. 2: H225 - Highly flammable liquid and vapour.
Flam. Liq. 3: H226 - Flammable liquid and vapour.
Skin Irrit. 2: H315 - Causes skin irritation.
Skin Sens. 1: H317 - May cause an allergic skin reaction.
STOT RE 2: H373 - May cause damage to organs through prolonged or repeated exposure (Oral).
STOT RE 2: H373 - May cause damage to organs through prolonged or repeated exposure.
STOT SE 3: H335 - May cause respiratory irritation.
STOT SE 3: H336 - May cause drowsiness or dizziness.

Classification procedure:

STOT SE 3: Calculation method
STOT SE 3: Calculation method
Aquatic Chronic 3: Calculation method
Skin Irrit. 2: Calculation method
STOT RE 2: Calculation method
Flam. Liq. 3: Calculation method (2.6.4.3)
Eye Irrit. 2: Calculation method

Advice related to training:

Training is recommended in order to prevent industrial risks for staff using this product and to facilitate their comprehension and interpretation of this safety data sheet, as well as the label on the product.

Principal bibliographical sources:

http://echa.europa.eu
http://eur-lex.europa.eu

Abbreviations and acronyms:

- CONTINUED ON NEXT PAGE -

SECTION 16: OTHER INFORMATION (continued)

ADR: European agreement concerning the international carriage of dangerous goods by road
IMDG: International maritime dangerous goods code
IATA: International Air Transport Association
ICAO: International Civil Aviation Organisation
COD: Chemical Oxygen Demand
BOD5: 5day biochemical oxygen demand
BCF: Bioconcentration factor
LD50: Lethal Dose 50
LC50: Lethal Concentration 50
EC50: Effective concentration 50
LogPOW: Octanolwater partition coefficient
Koc: Partition coefficient of organic carbon
UFI: unique formula identifier
IARC: International Agency for Research on Cancer

The information contained in this safety data sheet is based on sources, technical knowledge and current legislation at European and state level, without being able to guarantee its accuracy. This information cannot be considered a guarantee of the properties of the product, it is simply a description of the security requirements. The occupational methodology and conditions for users of this product are not within our awareness or control, and it is ultimately the responsibility of the user to take the necessary measures to obtain the legal requirements concerning the manipulation, storage, use and disposal of chemical products. The information on this safety data sheet only refers to this product, which should not be used for needs other than those specified.

- END OF SAFETY DATA SHEET -