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

SAFETY DATA SHEET



Epoxy HR Comp A

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

1.1 Product identifier	1.1	Prod	luct	ider	ntifier
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Product name	: Epoxy HR Comp A
Product code	: 1505
Product description	: Paint.
Product type	: Liquid.
Other means of identification	: Not available.

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

Use in coatings - Industrial use Use in coatings - Professional use

1.3 Details of the supplier of the safety data sheet

Jotun A/S P.O.Box 2021 3202 Sandefjord Norway

Tel: + 47 33 45 70 00 Fax: +47 33 45 72 42 E-mail: SDSJotun@jotun.no

1.4 Emergency telephone number

Norwegian National Poison Centre: +47 22 59 13 00

SECTION 2: Hazards identification

2.1 Classification of the substance or mixture

: Mixture

Classification according to Regulation (EC) No. 1272/2008 [CLP/GHS]

Flam. Liq. 3, H226 Skin Irrit. 2, H315 Eye Dam. 1, H318 Skin Sens. 1, H317 Aquatic Chronic 3, H412

Product definition

The product is classified as hazardous according to Regulation (EC) 1272/2008 as amended.

See Section 16 for the full text of the H statements declared above.

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

2.2 Label elements

Hazard pictograms



SECTION 2: Hazards identification

SECTION 2. Hazarus	ю	lentincation
Signal word	:	Danger.
Hazard statements	:	H226 - Flammable liquid and vapour. H315 - Causes skin irritation. H317 - May cause an allergic skin reaction. H318 - Causes serious eye damage. H412 - Harmful to aquatic life with long lasting effects.
Precautionary statements		
General	:	Not applicable.
Prevention	:	 P280 - Wear protective gloves. Wear eye or face protection. P210 - Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking. P273 - Avoid release to the environment. P261 - Avoid breathing vapour.
Response		 P362 + P364 - Take off contaminated clothing and wash it before reuse. P302 + P352 - IF ON SKIN: Wash with plenty of water. P333 + P313 - If skin irritation or rash occurs: Get medical advice or attention. P305 + P351 + P338, P310 - IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Immediately call a POISON CENTER or doctor.
Storage	4	Not applicable.
Disposal	1	P501 - Dispose of contents and container in accordance with all local, regional, national and international regulations.
Hazardous ingredients	:	epoxy resin (MW ≤ 700) xylene phenol, polymer with formaldehyde, glycidyl ether butan-1-ol
Supplemental label elements	:	EUH205 - Contains epoxy constituents. May produce an allergic reaction. EUH211 - Warning! Hazardous respirable droplets may be formed when sprayed. Do not breathe spray or mist.
Annex XVII - Restrictions on the manufacture, placing on the market and use of certain dangerous substances, mixtures and articles	:	Not applicable.
Special packaging requirem	en	<u>its</u>
Containers to be fitted with child-resistant fastenings	:	Not applicable.
Tactile warning of danger	÷	Not applicable.
2.3 Other hazards		
Product meets the criteria for PBT or vPvB according to Regulation (EC) No. 1907/2006, Annex XIII	:	This mixture does not contain any substances that are assessed to be a PBT or a vPvB.
Other hazards which do not result in classification	1	None known.
The mixture may be a skin se	nsi	itiser. It may also be a skin irritant and repeated contact may increase this effect.

SECTION 3: Composition/information on ingredients

3.2 Mixtures	: Mixture				
Product/ingredient name	Identifiers	%	Classification	Specific Conc. Limits, M-factors and ATEs	Туре
<mark>¢</mark> poxy resin (MW ≤ 700)	REACH #: 01-2119456619-26 EC: 216-823-5 CAS: 1675-54-3 Index: 603-073-00-2	≥10 - ≤17	Skin Irrit. 2, H315 Eye Irrit. 2, H319 Skin Sens. 1B, H317 Aquatic Chronic 2, H411	Skin Irrit. 2, H315: C ≥ 5% Eye Irrit. 2, H319: C ≥ 5%	[1]
xylene	REACH #: 01-2119488216-32 EC: 215-535-7 CAS: 1330-20-7 Index: 601-022-00-9	≤13	Flam. Liq. 3, H226 Acute Tox. 4, H312 Acute Tox. 4, H332 Skin Irrit. 2, H315 Eye Irrit. 2, H319 STOT SE 3, H335 Asp. Tox. 1, H304 Aquatic Chronic 3, H412	ATE [Dermal] = 1100 mg/kg ATE [Inhalation (vapours)] = 11 mg/ I	[1] [2]
phenol, polymer with formaldehyde, glycidyl ether	REACH #: 01-2119454392-40 EC: 701-263-0 CAS: 28064-14-4	≤7.5	Skin Irrit. 2, H315 Skin Sens. 1, H317 Aquatic Chronic 2, H411	-	[1]
butan-1-ol	REACH #: 01-2119484630-38 EC: 200-751-6 CAS: 71-36-3 Index: 603-004-00-6	≤6.2	Flam. Liq. 3, H226 Acute Tox. 4, H302 Skin Irrit. 2, H315 Eye Dam. 1, H318 STOT SE 3, H335 STOT SE 3, H336	ATE [Oral] = 500 mg/kg	[1] [2]
ethylbenzene	REACH #: 01-2119489370-35 EC: 202-849-4 CAS: 100-41-4 Index: 601-023-00-4	≤5	Flam. Liq. 2, H225 Acute Tox. 4, H332 STOT RE 2, H373 (hearing organs) Asp. Tox. 1, H304 Aquatic Chronic 3, H412 See Section 16 for	ATE [Inhalation (vapours)] = 11 mg/ I	[1] [2]
			the full text of the H statements declared above.		

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, are PBTs, vPvBs or Substances of equivalent concern, or have been assigned a workplace exposure limit and hence require reporting in this section.

<u>Type</u>

[1] Substance classified with a health or environmental hazard

[2] Substance with a workplace exposure limit

This mixture contains \geq 1% of titanium dioxide. The Annex VI classification of titanium dioxide does not apply to this mixture according to Note 10.

Occupational exposure limits, if available, are listed in Section 8.

SECTION 4: First aid measures

4.1 Description of first aid n	neas	sures
General	:	In all cases of doubt, or when symptoms persist, seek medical attention. Never give anything by mouth to an unconscious person. If unconscious, place in recovery position and seek medical advice.
Eye contact	:	Check for and remove any contact lenses. Immediately flush eyes with running water for at least 15 minutes, keeping eyelids open. Seek immediate medical attention.
Inhalation	:	Remove to fresh air. Keep person warm and at rest. If not breathing, if breathing is irregular or if respiratory arrest occurs, provide artificial respiration or oxygen by trained personnel.
Skin contact	:	Remove contaminated clothing and shoes. Wash skin thoroughly with soap and water or use recognised skin cleanser. Do NOT use solvents or thinners.
Ingestion	:	If swallowed, seek medical advice immediately and show the container or label. Keep person warm and at rest. Do NOT induce vomiting.
Protection of first-aiders	:	No action shall be taken involving any personal risk or without suitable training. If it is suspected that fumes are still present, the rescuer should wear an appropriate mask or self-contained breathing apparatus. It may be dangerous to the person providing aid to give mouth-to-mouth resuscitation. Wash contaminated clothing thoroughly with water before removing it, or wear gloves.

4.2 Most important symptoms and effects, both acute and delayed

<u>Over-exposure signs/sy</u>	r <u>mptoms</u>
Eye contact	: Adverse symptoms may include the following: pain watering redness
Inhalation	: No specific data.
Skin contact	: Adverse symptoms may include the following: pain or irritation redness blistering may occur
Ingestion	: Adverse symptoms may include the following: stomach pains
4.3 Indication of any imm	ediate medical attention and special treatment needed
Notes to physician	: Treat symptomatically. Contact poison treatment specialist immediately if large quantities have been ingested or inhaled.

Specific treatments : No specific treatment.

See toxicological information (Section 11)

SECTION 5: Firefighting measures

5.1 Extinguishing media Suitable extinguishing media	: Recommended: alcohol-resistant foam, CO ₂ , powders, water spray.	
Unsuitable extinguishing media	: Do not use water jet.	

5.2 Special hazards arising from the substance or mixture

Hazards from the substance or mixture	: Fire will produce dense black smoke. Exposure to decomposition products may cause a health hazard.
Hazardous combustion products	: Decomposition products may include the following materials: carbon monoxide, carbon dioxide, smoke, oxides of nitrogen.

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SECTION 5: Firefighting measures

5.3 Advice for firefighters

Special protective actions for fire-fighters	:	Cool closed containers exposed to fire with water. Do not release runoff from fire to drains or watercourses.
Special protective equipment for fire-fighters	1	Appropriate breathing apparatus may be required.

SECTION 6: Accidental release measures

6.1 Personal precautions, protective equipment and emergency procedures				
For non-emergency personnel	:	Exclude sources of ignition and ventilate the area. Avoid breathing vapour or mist. Refer to protective measures listed in sections 7 and 8.		
For emergency responders	:	If specialised clothing is required to deal with the spillage, take note of any information in Section 8 on suitable and unsuitable materials. See also the information in "For non-emergency personnel".		
6.2 Environmental precautions	:	Do not allow to enter drains or watercourses. If the product contaminates lakes, rivers, or sewers, inform the appropriate authorities in accordance with local regulations.		
6.3 Methods and material for containment and cleaning up	:	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 (see Section 13). Preferably clean with a detergent. Avoid using solvents.		
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

The information in this section contains generic advice and guidance. The list of Identified Uses in Section 1 should be consulted for any available use-specific information provided in the Exposure Scenario(s).

7.1 Precautions for safe handling

Prevent the creation of flammable or explosive concentrations of vapours in air and avoid vapour concentrations higher than the occupational exposure limits.

In addition, the product should only be used in areas from which all naked lights and other sources of ignition have been excluded. Electrical equipment should be protected to the appropriate standard.

Mixture may charge electrostatically: always use earthing leads when transferring from one container to another. Operators should wear antistatic footwear and clothing and floors should be of the conducting type.

Keep away from heat, sparks and flame. No sparking tools should be used.

Avoid contact with skin and eyes. Avoid the inhalation of dust, particulates, spray or mist arising from the application of this mixture. Avoid inhalation of dust from sanding.

Eating, drinking and smoking should be prohibited in areas where this material is handled, stored and processed. Put on appropriate personal protective equipment (see Section 8).

Never use pressure to empty. Container is not a pressure vessel.

Always keep in containers made from the same material as the original one.

Comply with the health and safety at work laws.

Do not allow to enter drains or watercourses.

Information on fire and explosion protection

Vapours are heavier than air and may spread along floors. Vapours may form explosive mixtures with air.

When operators, whether spraying or not, have to work inside the spray booth, ventilation is unlikely to be sufficient to control particulates and solvent vapour in all cases. In such circumstances they should wear a compressed air-fed respirator during the spraying process and until such time as the particulates and solvent vapour concentration has fallen below the exposure limits.

7.2 Conditions for safe storage, including any incompatibilities

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SECTION 7: Handling and storage

Store in accordance with local regulations.

Notes on joint storage

Keep away from: oxidising agents, strong alkalis, strong acids.

Additional information on storage conditions

Observe label precautions. Store in a dry, cool and well-ventilated area. Keep away from heat and direct sunlight. Keep away from sources of ignition. No smoking. Prevent unauthorised access. Containers that have been opened must be carefully resealed and kept upright to prevent leakage.

Seveso Directive - Reporting thresholds

Danger criteria

• •	Notification and MAPP threshold	Safety report threshold	
P5c	5000 tonne	50000 tonne	

See Technical Data Sheet / packaging for further information.

7.3 Specific end use(s)

Recommendations Industrial sector specific solutions Not available.Not available.

SECTION 8: Exposure controls/personal protection

The list of Identified Uses in Section 1 should be consulted for any available use-specific information provided in the Exposure Scenario(s).

8.1 Control parameters

Occupational exposure limits

Product/ingredient name	Exposure limit values
x ylene	FOR-2011-12-06-1358 (Norway, 12/2022). [xylen] Absorbed
	through skin. Notes: H E
	TWA: 108 mg/m ³ 8 hours.
	TWA: 25 ppm 8 hours.
butan-1-ol	FOR-2011-12-06-1358 (Norway, 12/2022). Absorbed through
	skin. Notes: H T
	CEIL: 75 mg/m ³
	CEIL: 25 ppm
ethylbenzene	FOR-2011-12-06-1358 (Norway, 12/2022). Absorbed through
	skin. Notes: H K E
	TWA: 5 ppm 8 hours.
	TWA: 20 mg/m ³ 8 hours.

Recommended monitoring procedures : Reference should be made to monitoring standards, such as the following: European Standard EN 689 (Workplace atmospheres - Guidance for the assessment of exposure by inhalation to chemical agents for comparison with limit values and measurement strategy) European Standard EN 14042 (Workplace atmospheres - Guide for the application and use of procedures for the assessment of exposure to chemical and biological agents) European Standard EN 482 (Workplace atmospheres - General requirements for the performance of procedures for the measurement of chemical agents) Reference to national guidance documents for methods for the determination of hazardous substances will also be required.

DNELs/DMELs

Product/ingredient name	Туре	Exposure	Value	Population	Effects
epoxy resin (MW ≤ 700)	DNEL	Long term Dermal	89.3 µg/kg	General	Systemic
			bw/day	population	-
	DNEL	Long term Oral	0.5 mg/kg	General	Systemic
			bw/day	population	
	DNEL	Long term Dermal	0.75 mg/	Workers	Systemic
		5	kg bw/day		,
	DNEL	Long term	0.87 mg/m ³	General	Systemic
		Inhalation	0	population	,
	DNEL	Long term	4.93 mg/m ³	Workers	Systemic
		Inhalation	<u></u>		,
xylene	DNEL	Long term Oral	5 mg/kg	General	Systemic
,		5	bw/day	population	,
	DNEL	Long term	65.3 mg/m ³	General	Local
		Inhalation		population	
	DNEL	Long term	65.3 mg/m ³	General	Systemic
		Inhalation		population	,
	DNEL	Long term Dermal	125 mg/kg	General	Systemic
			bw/day	population	systemic
	DNEL	Long term Dermal	212 mg/kg	Workers	Systemic
			bw/day		- , - , - , - , - , - , - , - , - , - ,
	DNEL	Long term	221 mg/m ³	Workers	Local
	DILLE	Inhalation	22 i mg/m	Workers	Loodi
	DNEL	Long term	221 mg/m ³	Workers	Systemic
	DITE	Inhalation	22 i mg/m	Workoro	Cyclonic
	DNEL	Short term	260 mg/m ³	General	Local
	DILLE	Inhalation	200 mg/m	population	Loodi
	DNEL	Short term	260 mg/m ³	General	Systemic
	DILLE	Inhalation	200 mg/m	population	Cysternio
	DNEL	Short term	442 mg/m ³	Workers	Local
	DILLE	Inhalation	442 mg/m	Workers	Loodi
	DNEL	Short term	442 mg/m ³	Workers	Systemic
		Inhalation	442 mg/m	WOIKEI3	Oysternic
butan-1-ol	DNEL	Long term Oral	1.5625 mg/	General	Systemic
	DIVLL	Long term Oran	kg bw/day	population	Oysternic
	DNEL	Long term Dermal	3.125 mg/	General	Systemic
	DIVLL	Long term Derma	kg bw/day	population	Oysternic
	DNEL	Long term	55.357 mg/	General	Systemic
		Inhalation	m ³	population	
	DNEL	Long term	155 mg/m ³	General	Local
		Inhalation	100 mg/m	population	
	DNEL	Long term	310 mg/m ³	Workers	Local
		Inhalation	o to mg/m		
ethylbenzene	DMEL	Long term	442 mg/m ³	Workers	Local
		Inhalation	++ 2 mg/m		20001
	DMEL	Short term	884 mg/m³	Workers	Systemic
		Inhalation	JO- mg/m		Systemic
	DNEL	Long term Oral	1.6 mg/kg	General	Systemic
	DIVEL		bw/day	population	Systemic
	DNEL	Long term	15 mg/m ³	General	Systemic
	DIVEL	Inhalation	13 mg/m	population	Systemic
	DNEL		$77 ma/m^3$	Workers	Systemia
	DINEL	Long term	77 mg/m³	VVUIKEIS	Systemic
		Inhalation	190 ma/ka	Workors	Sustamia
	DNEL	Long term Dermal	180 mg/kg	Workers	Systemic
		Chart tarm	bw/day	Morkers.	
	DNEL	Short term	293 mg/m ³	Workers	Local
		Inhalation			

PNECs

Product/ingredient name	Compartment Detail	Value	Method Detail
epoxy resin (MW ≤ 700)	Fresh water	0.006 mg/l	-
	Marine	0.0006 mg/l	-
	Sewage Treatment	10 mg/l	-
	Plant	U U	
	Fresh water sediment	0.996 mg/l	-
	Marine water sediment	0.0996 mg/l	-
	Soil	0.196 mg/l	-
xylene	Fresh water	0.327 mg/l	-
,	Marine	0.327 mg/l	-
	Sewage Treatment	6.58 mg/l	-
	Plant	5	
	Fresh water sediment	12.46 mg/kg dwt	-
	Marine water sediment	12.46 mg/kg dwt	-
	Soil	2.31 mg/kg dwt	-
butan-1-ol	Fresh water	0.082 mg/l	-
	Marine	0.0082 mg/l	-
	Sewage Treatment	2476 mg/l	-
	Plant	- U	
	Fresh water sediment	0.178 mg/kg dwt	-
	Marine water sediment	0.0178 mg/kg dwt	-
	Soil	0.015 mg/kg dwt	-
ethylbenzene	Fresh water	0.1 mg/l	-
5	Marine	0.01 mg/l	-
	Sewage Treatment	9.6 mg/l	-
	Plant	U.	
	Fresh water sediment	13.7 mg/kg dwt	-
	Soil	2.68 mg/kg dwt	-
	Secondary Poisoning	20 mg/kg	-

8.2 Exposure controls Appropriate engineering controls	: Provide adequate ventilation. Where reasonably practicable, this should be achieved by the use of local exhaust ventilation and good general extraction. If these are not sufficient to maintain concentrations of particulates and solvent vapours below the OEL, suitable respiratory protection must be worn.
Individual protection measu	<u>ires</u>
Hygiene measures	: Wash hands, forearms and face thoroughly after handling chemical products, before eating, smoking and using the lavatory and at the end of the working period. Appropriate techniques should be used to remove potentially contaminated clothing. Contaminated work clothing should not be allowed out of the workplace. Wash contaminated clothing before reusing. Ensure that eyewash stations and safety showers are close to the workstation location.
Eye/face protection	: Safety eyewear complying to ISO 16321-1:2022 should be used when a risk assessment indicates this is necessary to avoid exposure to liquid splashes, mists, gases or dusts. 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

There is no one glove material or combination of materials that will give unlimited resistance to any individual or combination of chemicals.

The breakthrough time must be greater than the end use time of the product.

The instructions and information provided by the glove manufacturer on use, storage, maintenance and replacement must be followed.

Gloves should be replaced regularly and if there is any sign of damage to the glove material.

Always ensure that gloves are free from defects and that they are stored and used correctly.

The performance or effectiveness of the glove may be reduced by physical/chemical damage and poor maintenance.

SECTION 8: Exposure controls/personal protection

Barrier creams may help to protect the exposed areas of the skin but should not be applied once exposure has occurred.

<u>Gloves</u>

Wear suitable gloves tested to ISO 374-1:2016.

May be used, gloves(breakthrough time) 4 - 8 hours: Viton® (> 0.7 mm), neoprene (> 0.35 mm), butyl rubber (> 0.4 mm)

Not recommended, gloves(breakthrough time) < 1 hour: PVC (> 0.5 mm)

Recommended, gloves(breakthrough time) > 8 hours: nitrile rubber (> 0.75 mm), 4H/Silver Shield® (> 0.07 mm), Teflon (> 0.35 mm), polyvinyl alcohol (PVA) (> 0.3 mm)

For right choice of glove materials, with focus on chemical resistance and time of penetration, seek advice by the supplier of chemical resistant gloves.

The user must check that the final choice of type of glove selected for handling this product is the most appropriate and takes into account the particular conditions of use, as included in the user's risk assessment.

Body protection	 Personnel should wear antistatic clothing made of natural fibres or of high- temperature-resistant synthetic fibres.
Other skin 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.
Respiratory protection	: If workers are exposed to concentrations above the exposure limit, they must use a respirator according to EN 140. Use respiratory mask with charcoal and dust filter when spraying this product, according to EN 14387 (as filter combination A2-P2). In confined spaces, use compressed-air or fresh-air respiratory equipment. When use of roller or brush, consider use of charcoalfilter.
Environmental exposure controls	: Do not allow to enter drains or watercourses.

SECTION 9: Physical and chemical properties

The conditions of measurement of all properties are at standard temperature and pressure unless otherwise indicated.

9.1 Information on basic physical and chemical properties

<u>Appearance</u>				
Physical state	: Liquid.			
Colour	: Aluminium, Grey, Red, White.			
Odour	: Characteristic.			
Odour threshold	lot applicable.			
Melting point/freezing point	: Not applicable.			
Initial boiling point and boiling range	: I ∕owest known value: 119°C (246.2°F) (butan-1-ol). Weighted average: 192.18°C (377.9°F)			
Flammability	: Not applicable.			
Lower and upper explosion limit	: 0.8 - 11.3%			
Flash point	Closed cup: 25°C			
Auto-ignition temperature	Lowest known value: 355°C (671°F) (butan-1-ol).			
Decomposition temperature	: Not available.			
рН	: Not applicable.			
Viscosity	: Kinematic (40°C): >20.5 mm²/s			
Solubility in water	: cold water Not soluble hot water Not soluble			
Partition coefficient: n-octanol/ water	: Not available.			
Vapour pressure	Ħighest known value: 1.2 kPa (9.3 mm Hg) (at 20°C) (ethylbenzene). Weighted average: 0.58 kPa (4.35 mm Hg) (at 20°C)			

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SECTION 9: Physical and chemical properties

Evaporation rate	: Highest known value: 0.84 (ethylbenzene) Weighted average: 0.7compared with butyl acetate
Density	: 1.529 to 1.66 g/cm ³
Vapour density	: Highest known value: 11.7 (Air = 1) (epoxy resin (MW ≤ 700)). Weighted average: 6.66 (Air = 1)
Explosive properties	: Not available.
Oxidising properties	: Not available.
Particle characteristics	
Median particle size	: Not applicable.

9.2 Other information

No additional information.

SECTION 10: Stability and reactivity

10.1 Reactivity	No specific test data related to reactivity available for this product or its in	gredients.
10.2 Chemical stability	Stable under recommended storage and handling conditions (see Section	n 7).
10.3 Possibility of hazardous reactions	Inder normal conditions of storage and use, hazardous reactions will not	occur.
10.4 Conditions to avoid	When exposed to high temperatures may produce hazardous decomposi products.	ition
10.5 Incompatible materials	Keep away from the following materials to prevent strong exothermic read oxidising agents, strong alkalis, strong acids.	ctions:
10.6 Hazardous decomposition products	Decomposition products may include the following materials: carbon mon carbon dioxide, smoke, oxides of nitrogen.	noxide,

SECTION 11: Toxicological information

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

Acute toxicity

Product/ingredient name	Result	Species	Dose	Exposure
epoxy resin (MW ≤ 700)	LD50 Dermal	Rabbit	20 g/kg	-
	LD50 Oral	Mouse	15600 mg/kg	-
xylene	LC50 Inhalation Vapour	Rat	11 mg/l	4 hours
	LD50 Oral	Rat	4300 mg/kg	-
	TDLo Dermal	Rabbit	4300 mg/kg	-
butan-1-ol	LD50 Oral	Rat	790 mg/kg	-
ethylbenzene	LC50 Inhalation Vapour	Rat - Male	11 mg/l	4 hours
	LD50 Dermal	Rabbit	>5000 mg/kg	-
	LD50 Oral	Rat	3500 mg/kg	-

Acute toxicity estimates

Product/ingredient name	Oral (mg/ kg)	Dermal (mg/kg)	Inhalation (gases) (ppm)	Inhalation (vapours) (mg/l)	Inhalation (dusts and mists) (mg/l)
Epoxy HR Comp A	9124.1	9176.9	N/A	68.8	N/A
xylene	4300	1100	N/A	11	N/A
butan-1-ol	500	N/A	N/A	N/A	N/A
ethylbenzene	3500	N/A	N/A	11	N/A

Irritation/Corrosion

SECTION 11: Toxicological information

Product/ingredient name	Result	Species	Score	Exposure	Observation
epoxy resin (MW ≤ 700)	Eyes - Severe irritant	Rabbit	-	24 hours 2 milligrams	-
	Skin - Mild irritant	Rabbit	-	500 milligrams	-
xylene	Eyes - Mild irritant	Rabbit	-	87 milligrams	-
	Skin - Mild irritant	Rat	-	8 hours 60 microliters	-
phenol, polymer with formaldehyde, glycidyl ether	Eyes - Mild irritant	Mammal - species unspecified	-	-	-
	Skin - Mild irritant	Mammal - species unspecified	-	-	-

Sensitisation

Product/ingredient name	Route of exposure	Species	Result
poxy resin (MW ≤ 700)	skin	Mammal - species unspecified	Sensitising
phenol, polymer with formaldehyde, glycidyl ether	skin	Mammal - species unspecified	Sensitising

Mutagenicity

No known significant effects or critical hazards.

Carcinogenicity

No known significant effects or critical hazards.

Reproductive toxicity

Developmental effects

: No known significant effects or critical hazards.

Fertility effects : No known significant effects or critical hazards.

Teratogenicity

No known significant effects or critical hazards.

Specific target organ toxicity (single exposure)

Product/ingredient name	Category	Route of exposure	Target organs
xylene	Category 3	-	Respiratory tract irritation
butan-1-ol	Category 3	-	Respiratory tract irritation
	Category 3		Narcotic effects

Specific target organ toxicity (repeated exposure)

Product/ingredient name	Category	Route of exposure	Target organs
ethylbenzene	Category 2	-	hearing organs

Aspiration hazard

Product/ingredient name	Result	
₩ylene	ASPIRATION HAZARD - Category 1	
ethylbenzene	ASPIRATION HAZARD - Category 1	

11.2 Information on other hazards

11.2.1 Endocrine disrupting properties

Not available.

11.2.2 Other information

SECTION 11: Toxicological information

Not available.

SECTION 12: Ecological information

12.1 Toxicity

There are no data available on the mixture itself. Do not allow to enter drains or watercourses.

The mixture has been assessed following the summation method of the CLP Regulation (EC) No 1272/2008 and is classified for eco-toxicological properties accordingly. See Sections 2 and 3 for details.

Product/ingredient name	Result	Species	Exposure
epoxy resin (MW ≤ 700)	Acute EC50 1.4 mg/l	Daphnia	48 hours
	Acute LC50 3.1 mg/l	Fish - pimephales promelas	96 hours
	Chronic NOEC 0.3 mg/l	Fish	21 days
xylene	Acute LC50 8500 µg/l Marine water	Crustaceans - Palaemonetes	48 hours
	Acute LC50 13400 µg/l Fresh water	Fish - Pimephales promelas	96 hours
phenol, polymer with formaldehyde, glycidyl ether	Acute EC50 3.3 mg/l	Daphnia	48 hours
, , , , , ,	Acute LC50 7.5 mg/l	Fish	96 hours
ethylbenzene	Acute EC50 7700 µg/l Marine water	Algae - Skeletonema costatum	96 hours
5	Acute EC50 2.93 mg/l	Daphnia	48 hours
	Acute LC50 4.2 mg/l	Fish	96 hours

Conclusion/Summary

: This material is harmful to aquatic life with long lasting effects.

12.2 Persistence and degradability

Conclusion/Summary	: Not available.		
Product/ingredient name	Aquatic half-life	Photolysis	Biodegradability
poxy resin (MW ≤ 700) xylene phenol, polymer with formaldehyde, glycidyl ether	- - -		Not readily Readily Not readily
ethylbenzene	-	-	Readily

12.3 Bioaccumulative potential

Product/ingredient name	LogPow	BCF	Potential
epoxy resin (MW ≤ 700)	2.64 to 3.78	31	low
xylene	3.12	8.1 to 25.9	low
butan-1-ol	1	-	low
ethylbenzene	3.6		low

12.4 Mobility in soil	
Soil/water partition coefficient (Koc)	: Not available.
Mobility	: Not available.

12.5 Results of PBT and vPvB assessment

This mixture does not contain any substances that are assessed to be a PBT or a vPvB.

12.6 Endocrine disrupting properties

Not available.

12.7 Other adverse effects

Date of issue/Date of revision

SECTION 12: Ecological information

No known significant effects or critical hazards.

SECTION 13: Disposal considerations

The information in this section contains generic advice and guidance. The list of Identified Uses in Section 1 should be consulted for any available use-specific information provided in the Exposure Scenario(s).

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 non-recyclable 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	1	Yes.
Disposal considerations	:	Do not allow to enter drains or watercourses. Dispose of according to all federal, state and local applicable regulations. If this product is mixed with other wastes, the original waste product code may no longer apply and the appropriate code should be assigned. For further information, contact your local waste authority.

European waste catalogue (EWC)

The European Waste Catalogue classification of this product, when disposed of as waste, is:

Waste code	Waste designation			
08 01 11*	Waste paint and varnish containing organic solvents or other dangerous substances			
Packaging				
Methods of disposal	 The generation of waste should be avoided or minimised wherever possible. W packaging should be recycled. Incineration or landfill should only be considered when recycling is not feasible. 			
Disposal considerations	 Using information provided in this safety data sheet, advice should be obtained fr the relevant waste authority on the classification of empty containers. Empty containers must be scrapped or reconditioned. Dispose of containers contaminated by the product in accordance with local or national legal provisions. 			
Type of packaging		European waste catalogue (EWC)		
CEPE Guidelines	15 01 10*	packaging containing residues of or contaminated by hazardous substances		
Special precautions	taken when ha Empty containe	nd its container must be disposed of in a safe way. Care should be ndling emptied containers that have not been cleaned or rinsed out. ers or liners may retain some product residues. Vapour from product create a highly flammable or explosive atmosphere inside the		

residues may create a highly flammable or explosive atmosphere inside the container. Do not cut, weld or grind used containers unless they have been cleaned thoroughly internally. Avoid dispersal of spilt material and runoff and contact with soil, waterways, drains and sewers.

	ADR/RID	ADN	IMDG	IATA
14.1 UN number or ID number	UN1263	UN1263	UN1263	UN1263
14.2 UN proper shipping name	Paint	Paint	Paint	Paint

Enory	HR	Comp	Δ
LPUNY	IIIV	Comp	

Γ

Epoxy HR Comp A					
SECTION 14:	Transp	or	t information		
14.3 Transport hazard class(es)	3	•	3	3	3
14.4 Packing group	111				III
14.5 Environmental hazards	No.		Yes.	No.	No.
Additional informa	tion				
ADN IMDG		 Hazard identification number 30 <u>Tunnel code</u> (D/E) MDR/RID: Viscous substance. Not goods of class 3, ref. 2.2.3.1.5 (only applica receptacles < 450 litre capacity). The product is only regulated as an environmentally hazardous substance whe transported in tank vessels. <u>Emergency schedules</u> F-E, <u>S-E</u> MDG: Viscous substance. Transport in accordance with 2.3.2.5 of the IMDG 0 (only applicable to receptacles < 450 litre capacity). 			
UN		: Viscous substance. Not goods of class 3, ref. 2.3.2.5 (only applicable to receptacles < 450 litre capacity).			
14.6 Special precau user	itions for	:		that persons transpo	sport in closed containers that are rting the product know what to do i
14.7 Maritime trans bulk according to II instruments		:	Not available.		

SECTION 15: Regulatory information

15.1 Safety, health and environmental regulations/legislation specific for the substance or mis	xture
EU Regulation (EC) No. 1907/2006 (REACH)	

Annex XIV - List of substances subject to authorisation

Annex XIV

None of the components are listed.

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.
Other EU regulations	
VOC	: The provisions of Directive 2004/42/EC on VOC apply to this product. Refer to the product label and/or technical data sheet for further information.
VOC for Ready-for-Use Mixture	: Not available.

SECTION 15: Regulatory information

SECTION 15. Regulato	
Industrial emissions : (integrated pollution prevention and control) - Air	Not listed
Industrial emissions : (integrated pollution prevention and control) - Water	Not listed
Ozone depleting substances	<u>(1005/2009/EU)</u>
Not listed.	
Prior Informed Consent (PIC) Not listed.	(649/2012/EU)
Persistent Organic Pollutants Not listed.	2
Seveso Directive	
This product may add to the ca major accident hazards.	Iculation for determining whether a site is within the scope of the Seveso Directive on
National regulations	
Industrial use :	The information contained in this safety data sheet does not constitute the user's own assessment of workplace risks, as required by other health and safety legislation. The provisions of the national health and safety at work regulations apply to the use of this product at work.
<u>Norway</u>	
Product registration : number	92652
International regulations	
Chemical Weapon Convention Not listed.	List Schedules I, II & III Chemicals
Montreal Protocol Not listed.	
Stockholm Convention on Per Not listed.	sistent Organic Pollutants
Rotterdam Convention on Price Not listed.	or Informed Consent (PIC)
UNECE Aarhus Protocol on PC	<u>DPs and Heavy Metals</u>
Not listed.	- —

15.2 Chemical safety : Not applicable. assessment

SECTION 16: Other information

Indicates information that has changed from previously issued version.

Abbreviations and acronyms	 ATE = Acute Toxicity Estimate CLP = Classification, Labelling and Packaging Regulation [Regulation (EC) No. 1272/2008] DMEL = Derived Minimal Effect Level DNEL = Derived No Effect Level EUH statement = CLP-specific Hazard statement N/A = Not available PBT = Persistent, Bioaccumulative and Toxic PNEC = Predicted No Effect Concentration
	Theo - Theorem No Ellect Concentration

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SECTION 16: Other information

RRN = REACH Registration Number

SGG = Segregation Group

vPvB = Very Persistent and Very Bioaccumulative

Procedure used to derive the classification according to Regulation (EC) No. 1272/2008 [CLP/GHS]

Classification	Justification
Flam. Liq. 3, H226	On basis of test data
Skin Irrit. 2, H315	Calculation method
Eye Dam. 1, H318	Calculation method
Skin Sens. 1, H317	Calculation method
Aquatic Chronic 3, H412	Calculation method

Full text of abbreviated H statements

H225	Highly flammable liquid and vapour.
H226	Flammable liquid and vapour.
H302	Harmful if swallowed.
H304	May be fatal if swallowed and enters airways.
H312	Harmful in contact with skin.
H315	Causes skin irritation.
H317	May cause an allergic skin reaction.
H318	Causes serious eye damage.
H319	Causes serious eye irritation.
H332	Harmful if inhaled.
H335	May cause respiratory irritation.
H336	May cause drowsiness or dizziness.
H373	May cause damage to organs through prolonged or repeated exposure.
H411	Toxic to aquatic life with long lasting effects.
H412	Harmful to aquatic life with long lasting effects.

Full text of classifications [CLP/GHS]

Cute Tox. 4	ACUTE TOXICITY - Category 4	
Aquatic Chronic 2	LONG-TERM (CHRONIC) AQUATIC HAZARD - Category 2	
Aquatic Chronic 3	LONG-TERM (CHRONIC) AQUATIC HAZARD - Category 3	
Asp. Tox. 1	ASPIRATION HAZARD - Category 1	
Eye Dam. 1	SERIOUS EYE DAMAGE/EYE IRRITATION - Category 1	
Eye Irrit. 2	SERIOUS EYE DAMAGE/EYE IRRITATION - Category 2	
Flam. Liq. 2	FLAMMABLE LIQUIDS - Category 2	
Flam. Liq. 3	FLAMMABLE LIQUIDS - Category 3	
Skin Irrit. 2	SKIN CORROSION/IRRITATION - Category 2	
Skin Sens. 1	SKIN SENSITISATION - Category 1	
Skin Sens. 1B	SKIN SENSITISATION - Category 1B	
STOT RE 2	SPECIFIC TARGET ORGAN TOXICITY - REPEATED EXPOSURE - Category 2	
STOT SE 3	SPECIFIC TARGET ORGAN TOXICITY - SINGLE EXPOSURE - Category 3	
Data of printing	. 45.02.2024	

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