Safety Data Sheet
3C Sealants Smooth Finish 2 in 1 Part A
Safety Data Sheet dated 08/06/2023 version 1

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

1.1. Product identifier

Mixture identification:

Trade name: SMOOTH FINISH 2 IN 1 PART A
Trade Code: CCC0084

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

Recommended use: Epoxy filler

Uses advised against: Not intended for consumer use

1.3. Details of the supplier of the safety data sheet

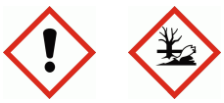
Company:
County Construction Chemicals Ltd.
Unit 4 Chingford Industrial Centre, Hall Lane
London, E4 8DJ

Responsable:

1.4. Emergency telephone number

020 8524 1931

SECTION 2: Hazards identification



2.1. Classification of the substance or mixture

Regulation (EC) n. 1272/2008 (CLP)

Skin Irrit. 2	Causes skin irritation.
Eye Irrit. 2	Causes serious eye irritation.
Skin Sens. 1	May cause an allergic skin reaction.
Aquatic Chronic 2	Toxic to aquatic life with long lasting effects.

Adverse physicochemical, human health and environmental effects:

No other hazards

2.2. Label elements

Regulation (EC) No 1272/2008 (CLP):

Pictograms and Signal Words

Warning

Hazard statements

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.

Precautionary statements

P261	Avoid breathing dust/fume/gas/mist/vapours/spray.
P273	Avoid release to the environment.
P280	Wear protective gloves/clothing and eye/face protection.
P333+P313	If skin irritation or rash occurs: Get medical advice/attention.
P337+P313	If eye irritation persists: Get medical advice/attention.
P391	Collect spillage.

Special Provisions:

EUH205	Contains epoxy constituents. May produce an allergic reaction.

Contains:

2-Propenoic acid, reaction products with dipentaerythritol

bis-[4-(2,3-epoxipropoxi)phenyl]propane

Formaldehyde, oligomeric reaction products with 1-chloro-2,3-epoxypropane and phenol

oxirane, mono[(C12-14-alkyloxy)methyl] derivs.

2-Propenoic acid, reaction products with pentaerythritol

Special provisions according to Annex XVII of REACH and subsequent amendments:

None.

2.3. Other hazards

No PBT, vPvB or endocrine disruptor substances present in concentration >= 0.1%

No other hazards

SECTION 3: Composition/information on ingredients

3.1. Substances

N.A.

3.2. Mixtures

Mixture identification: SMOOTH FINISH 2 IN 1 PART A

Hazardous components within the meaning of the CLP regulation and related classification:

Qty	Name	Ident. Numb.	Classification	Registration Number
≥30 - <40 %	bis-[4-(2,3-epoxipropoxi)phenyl]propane	CAS:1675-54-3 EC:216-823-5 Index:603-073-00-2	Skin Irrit. 2, H315 Eye Irrit. 2, H319 Skin Sens. 1, H317 Aquatic Chronic 2, H411 Specific Concentration Limits: 5% ≤ C < 100%: Skin Irrit. 2 H315 5% ≤ C < 100%: Eye Irrit. 2 H319	01-2119456619-26-xxxx
≥15 - <20 %	2-Propenoic acid, reaction products with dipentaerythritol	CAS:1384855-91-7 EC:800-838-4	Eye Irrit. 2, H319; Skin Sens. 1A, H317; Aquatic Chronic 3, H412	01-2119980666-22-xxxx
≥7 - <10 %	Formaldehyde, oligomeric reaction products with 1-chloro-2,3-epoxypropane and phenol	EC:701-263-0	Skin Irrit. 2, H315; Skin Sens. 1, H317; Aquatic Chronic 2, H411	01-2119454392-40-xxxx
≥5 - <7 %	oxirane, mono[(C12-14-alkyloxy)methyl] derivs.	CAS:68609-97-2 EC:271-846-8 Index:603-103-00-4	Skin Irrit. 2, H315; Skin Sens. 1, H317	01-2119485289-22-xxxx
≥0.3 - <0.5 %	2-Propenoic acid, reaction products with pentaerythritol	CAS:1245638-61-2 EC:629-850-6	Acute Tox. 4, H302; Skin Irrit. 2, H315; Eye Dam. 1, H318; Skin Sens. 1, H317; Aquatic Chronic 2, H411	01-2119490003-49-xxxx
≥0.1 - <0.3 %	Silica crystalline, quartz (respirable fraction)	CAS:14808-60-7 EC:238-878-4	STOT RE 1, H372	Exempted
≥0.025 - <0.05 %	acrylic acid	CAS:79-10-7 EC:201-177-9 Index:607-061-00-8	Flam. Liq. 3, H226 Acute Tox. 4, H312 Acute Tox. 4, H332 Acute Tox. 4, H302 Skin Corr. 1A, H314 Eye Dam. 1, H318 STOT SE 3, H335 Aquatic Acute 1, H400 Aquatic Chronic 2, H411, M:1 Specific Concentration Limits: 1% ≤ C < 100%: STOT SE 3 H335	Acute Toxicity Estimate: ATE - Dermal: 1100mg/kg bwATE - Inhalation (Vapours):

01-
21194524
49-31-
xxxx

11mg/l

SECTION 4: First aid measures

4.1. Description of first aid measures

In case of skin contact:

Remove contaminated clothing immediatley and dispose off safely.

Areas of the body that have - or are only even suspected of having - come into contact with the product must be rinsed immediately with plenty of running water and possibly with soap.

Wash thoroughly the body (shower or bath).

In case of eyes contact:

After contact with the eyes, rinse with water with the eyelids open for a sufficient length of time, then consult an opthalmologist immediately.

Protect uninjured eye.

In case of Ingestion:

Do not induce vomiting, get medical attention showing the SDS and label hazardous.

In case of Inhalation:

Remove casualty to fresh air and keep warm and at rest.

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

The symptoms and effects are as expected from the hazards as shown in section 2.

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

In case of accident or unwellness, seek medical advice immediately (show directions for use or safety data sheet if possible).

SECTION 5: Firefighting measures

5.1. Extinguishing media

Suitable extinguishing media:

CO_2, powder extinguisher, foam, water spray.

Extinguishing media which must not be used for safety reasons:

Water jet.

5.2. Special hazards arising from the substance or mixture

Burning produces heavy smoke.

Do not inhale explosion and/or combustion gases (carbon monoxide, carbon dioxide, nitrogen oxides).

5.3. Advice for firefighters

Use suitable breathing apparatus .

Collect contaminated fire extinguishing water separately. This must not be discharged into drains.

Move undamaged containers from immediate hazard area if it can be done safely.

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

Wear personal protection equipment.

Remove persons to safety.

See protective measures under point 7 and 8.

6.2. Environmental precautions

Do not allow to enter into soil/subsoil. Do not allow to enter into surface water or drains.

In case of gas escape or of entry into waterways, soil or drains, inform the responsible authorities.

6.3. Methods and material for containment and cleaning up

Material suitable for collection: inert absorbent material (e.g. sand, vermiculite)

After the product has been recovered, rinse the area and materials involved with water.

Retain contaminated washing water and dispose it.

6.4. Reference to other sections

See also section 8 and 13

SECTION 7: Handling and storage

7.1. Precautions for safe handling

Avoid contact with skin and eyes, inhalation of vapours and mists.

Don't use empty container before they have been cleaned.

Before making transfer operations, assure that there aren't any incompatible material residuals in the containers.

Advice on general occupational hygiene:

Contamined clothing should be changed before entering eating areas.

Do not eat or drink while working.

See also section 8 for recommended protective equipment.

7.2. Conditions for safe storage, including any incompatibilities

Keep away from food, drink and feed.

Incompatible materials:

See chapter 10.5

Instructions as regards storage premises:

Adequately ventilated premises.

7.3. Specific end use(s)

Recommendation(s)

See chapter 1.2

Industrial sector specific solutions:

None in particular

SECTION 8: Exposure controls/personal protection

8.1. Control parameters

Community Occupational Exposure Limits (OEL)

	OEL Type	Country	Long Term mg/m3	Long Term ppm	Short Term mg/m3	Short Term ppm	Notes
Silica crystalline, quartz (respirable fraction) CAS: 14808-60-7	ACGIH		0.025				(R), A2 - Pulm fibrosis, lung cancer
	EU		0.1				
	MAK	AUSTRIA	0.050				
	VLEP	FRANCE	0.100				Respirable aerosol
	ÁK	HUNGARY	0.150				Respirable aerosol
	NDS	POLAND	0.100				
	VLA	SPAIN	0.050				
	SUVA	SWITZERLAND	0.150				Respirable aerosol
	MAC	NETHERLANDS	0.075				Respirable dust
	GVI	CROATIA	0.100				
	MV	SLOVENIA	0.150				
	IPRV	LITHUANIA	0.100				
acrylic acid CAS: 79-10-7	ACGIH			2.000			Skin, A4 - URT irr
	EU		29.000	10.000	59.000	20.000	STEL duration: 1 min
	MAK	AUSTRIA	29.000	10.000	59.000	20.000	
	VLEP	BELGIUM	6.000	2.000	59.000	20.000	Additional indication "D" means that the absorption of the agent through the skin, mucous membranes or eyes is an important part of the total exposure. It can be the result of both direct contact and its presence in the air.
	VLEP	FRANCE	29.000	10.000	59.000	20.000	
	AGW	GERMANY	30	10	30.000	10.000	
	MAK	GERMANY	30.000	10.000	30.000	10.000	
	VLEP	ITALY	29.000	10.000	59.000	20.000	Skin
	NDS	POLAND	29.500		10.000		Skin
	VLEP	ROMANIA	29.000	10.000	59.000	20.000	Skin
	VLA	SPAIN	29.000	10.000	59.000	20.000	Skin
	SUVA	SWITZERLAND	29.000	10.000	59.000	20.000	
	WEL	U.K.	29.000	10.000	59.000	20.000	
	GVI	CROATIA	29.000	10.000	59.000	20.000	
	TLV	CZECHIA	29.000	9.686	59.000	19.706	duration: 1 min

Predicted No Effect Concentration (PNEC) values

	PNEC Limit	Exposure Route	Exposure Frequency	Remark
bis-[4-(2,3-epoxipropoxi)phenyl] propane CAS: 1675-54-3	0.006 mg/l	Fresh Water		
	0.001 mg/l	Marine water		
	0.341 mg/kg	Freshwater sediments		
	0.034 mg/kg	Marine water sediments		
	0.065 mg/kg	Soil (agricultural)		
	10 mg/l	Microorganisms in sewage treatments		
2-Propenoic acid, reaction products with dipentaerythritol CAS: 1384855-91-7	0.013 mg/l	Fresh Water		
	0.001 mg/l	Marine water		
	0.28 mg/kg	Marine water sediments		
	2.8 mg/kg	Freshwater sediments		
	0.22 mg/kg	Soil (agricultural)		
	10 mg/l	Microorganisms in sewage treatments		
Formaldehyde, oligomeric reaction products with 1-chloro-2,3-epoxypropane and phenol	0.003 mg/l	Fresh Water		
	0.3 µg/l	Marine water		
	10 mg/l	Microorganisms in sewage treatments		
	0.029 mg/kg	Marine water sediments		
	0.294 mg/kg	Freshwater sediments		
	0.237 mg/kg	Soil		
oxirane, mono[(C12-14-alkyloxy)methyl] derivs. CAS: 68609-97-2	0.007 mg/l	Fresh Water		
	0.001 mg/l	Marine water		
	10 mg/l	Microorganisms in sewage treatments		
	30.72 mg/kg	Marine water sediments		

	307.16 mg/kg	Freshwater sediments
2-Propenoic acid, reaction products with pentaerythritol CAS: 1245638-61-2	3 µg/l	Fresh Water
	0.3 µg/l	Marine water
	10 mg/l	Microorganisms in sewage treatments
	1.73 mg/kg	Freshwater sediments
	0.173 mg/kg	Marine water sediments
	0.34 mg/kg	Soil
acrylic acid CAS: 79-10-7	0.3 µg/l	Marine water
	0.003 mg/l	Fresh Water
	0.9 mg/l	Microorganisms in sewage treatments
	0.002 mg/kg	Marine water sediments
	0.024 mg/kg	Freshwater sediments
	1 mg/kg	Soil (agricultural)

Derived No Effect Level (DNEL) values

	Worker Industry	Worker Professional	Consumer	Exposure Route	Exposure Frequency	Remark
bis-[4-(2,3-epoxipropoxi) phenyl]propane CAS: 1675-54-3		0.75 mg/kg	0.089 mg/kg	Human Dermal	Long Term, systemic effects	
		4.93 mg/m3	0.87 mg/m3	Human Inhalation	Long Term, systemic effects	
			0.5 mg/kg	Human Oral	Long Term, systemic effects	
2-Propenoic acid, reaction products with dipentaerythritol CAS: 1384855-91-7		1.76 mg/m3	0.008 mg/cm2		8.7 mg/m3	
		0.5 mg/kg	29.39 mg/m3			
Formaldehyde, oligomeric reaction products with 1-chloro-2,3-epoxypropane and phenol		104.15 mg/kg		62.5 mg/kg		

Human Inhalation	Long Term, systemic effects	Short Term, local effects
HumanDermal		
HumanDermal		
HumanDermal	Long Term, systemic effects	Long Term, systemic effects
Human Inhalation		
	Long Term, systemic effects	
	Long Term, systemic effects	

		6.25 mg/kg	Human Oral	Long Term, systemic effects
oxirane, mono[(C12-14-alkyloxy)methyl] derivs. CAS: 68609-97-2	3.6 mg/m3	0.87 mg/m3	Human Inhalation	Long Term, systemic effects
	1 mg/kg	0.5 mg/kg	Human Dermal	Long Term, systemic effects
		0.5 mg/kg	Human Oral	Long Term, systemic effects
acrylic acid CAS: 79-10-7	30 mg/m3	3.6 mg/m3	Human Inhalation	Short Term, local effects
	30 mg/m3	3.6 mg/m3	Human Inhalation	Long Term, local effects
	30 mg/m3	3.6 mg/m3	Human Inhalation	Short Term, systemic effects
	30 mg/m3	3.6 mg/m3	Human Inhalation	Long Term, systemic effects
		0.4 mg/kg	Human Oral	Long Term, systemic effects
		1.2 mg/kg	Human Oral	Short Term, systemic effects

8.2. Exposure controls

Provide adequate ventilation. Where reasonably practicable, this should be achieved by the use of local exhaust ventilation and good general extraction.

Eye protection:

Eye glasses with side protection (EN 166).

Protection for skin:

Use suitable clothing that provides complete protection to the skin according to activity and exposure (EN 14605/EN 13982), e.g. overall, apron, safety shoes, suitable clothing.

Protection for hands:

There is no material or combination of materials for gloves that can guarantee unlimited resistance to any individual chemical or combination of chemicals.

For prolonged or repeated handling, use chemical resistant gloves.

Suitable materials for safety gloves (EN 374/EN 16523); FKM (Fluorinated rubber): thickness >= 0.4 mm; permeation time >= 480 min.; NBR (Nitril rubber): thickness >= 0.4 mm; permeation time >= 480 min.

The choice of suitable gloves does not only depend on the material, but also on other quality characteristics that vary from one manufacturer to another and on the manner and times according to which the mixture is used.

Respiratory protection:

If workers are exposed to concentrations above the exposure limit they must use appropriate, certified respirators.

Combination filtering device (EN 14387).

Environmental exposure controls:

See point 6.2

Hygienic and Technical measures

See section 7.

SECTION 9: Physical and chemical properties

9.1. Information on basic physical and chemical properties

Appearance: thick liquid

Color: beige

Odour: slight

Odour threshold: N.D.

Melting point / freezing point: N.D.

Initial boiling point and boiling range: N.D.

Flammability: Non-flammable

Upper/lower flammability or explosive limits: N.D.

Flash point: > 93°C (Internal assessment)

Auto-ignition temperature: N.D.

Decomposition temperature: N.D.

pH: N.A. (Not applicable due to nature of the product)
Kinematic viscosity: > 20,5 mm2/sec (40 °C)
Relative density: 1.50 ± 0.03 kg/l (Internal method)
Vapour density: N.D.
Vapour pressure: N.D.
Solubility in water: Insoluble
Solubility in oil: No data available
Partition coefficient (n-octanol/water): N.A.

Particle characteristics:

This product contains amorphous nanomaterials that are surface treated/coated.

9.2. Other information

Conductivity: N.D.
Explosive properties: N.D.
Oxidizing properties: N.D.
Evaporation rate: N.A.

SECTION 10: Stability and reactivity

10.1. Reactivity

Stable under normal conditions

10.2. Chemical stability

The product can generate liquid phases over time.

10.3. Possibility of hazardous reactions

It may catch fire on contact with powerful oxidising agents.
Because of heat or fire the preparation can release carbon oxides and vapours which may be harmful to health.
Keep away from oxidising agents and strongly alkaline and strongly acid materials in order to avoid exothermic reactions.

10.4. Conditions to avoid

Keep away from heat sources.

10.5. Incompatible materials

Powerful oxidising agents, powerful reducing agents, aliphatic and aromatic amines.
Avoid contact with strong mineral acids and reducing agents.
See chapter 10.3

10.6. Hazardous decomposition products

No hazardous decomposition products when stored and handled correctly.
See chapter 5.2

SECTION 11: Toxicological information

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

Liquid epoxy resin contained in this material causes only minor skin irritation. However, all epoxy resins are capable of causing sensitizing of the skin. Susceptibility to skin irritation and sensitization varies from person to person.

In a sensitized individual the allergic dermatitis may not appear until after several days or weeks of frequent and prolonged contact. Therefore, even though the skin irritation potential is slight, skin contact should be avoided.

Once sensitization has occurred, exposure of the skin to very small quantities of the material may cause erythema and edema.

Toxicological Information of the Preparation

a) acute toxicity	Not classified
	Based on available data, the classification criteria are not met
b) skin corrosion/irritation	The product is classified: Skin Irrit. 2(H315)
c) serious eye damage/irritation	The product is classified: Eye Irrit. 2(H319)
d) respiratory or skin sensitisation	The product is classified: Skin Sens. 1(H317)
e) germ cell mutagenicity	Not classified
	Based on available data, the classification criteria are not met
f) carcinogenicity	Not classified
	Based on available data, the classification criteria are not met
g) reproductive toxicity	Not classified
	Based on available data, the classification criteria are not met
h) STOT-single exposure	Not classified
	Based on available data, the classification criteria are not met
i) STOT-repeated exposure	Not classified
	Based on available data, the classification criteria are not met
j) aspiration hazard	Not classified

Based on available data, the classification criteria are not met

Toxicological information on main components of the mixture:

bis-[4-(2,3-epoxipropoxi)phenyl] propane	a) acute toxicity	LD50 Oral Rat > 2000 mg/kg
		LD50 Skin Rat > 2000 mg/kg
2-Propenoic acid, reaction products with dipentaerythritol	a) acute toxicity	LD50 Oral Rat > 2000 mg/kg
		LD50 Skin Rabbit > 2000 mg/kg
Formaldehyde, oligomeric reaction products with 1-chloro-2,3-epoxypropane and phenol	a) acute toxicity	LD50 Skin Rat > 2000 mg/kg
		LD50 Oral Rat > 5000 mg/kg
oxirane, mono[(C12-14-alkyloxy)methyl] derivs.	a) acute toxicity	LC0 Inhalation Vapour Rat > 0.15 mg/l 7h
2-Propenoic acid, reaction products with pentaerythritol	a) acute toxicity	LD50 Oral Rat 540 mg/kg
		LD50 Skin Rabbit > 2000 mg/kg
acrylic acid	a) acute toxicity	ATE - Dermal : 1100 mg/kg bw ATE - Inhalation (Vapours) : 11 mg/l LD50 Oral Rat 617 mg/kg

11.2. Information on other hazards

Endocrine disrupting properties:

No endocrine disruptor substances present in concentration >= 0.1%

SECTION 12: Ecological information

Adopt good working practices, so that the product is not released into the environment.

12.1. Toxicity

Eco-Toxicological Information:

Toxic to aquatic life with long lasting effects.

List of Eco-Toxicological properties of the product

The product is classified: Aquatic Chronic 2(H411)

List of Eco-Toxicological properties of the components

Component	Ident. Numb.	Ecotox Data
bis-[4-(2,3-epoxipropoxi)phenyl]propane	CAS: 1675-54-3 - EINECS: 216-823-5 - INDEX: 603-073-00-2	a) Aquatic acute toxicity : EC50 Daphnia 1.8 mg/l 48h
		a) Aquatic acute toxicity : LC50 Fish 2 mg/l 96h
		a) Aquatic acute toxicity : EC50 Algae 11 mg/l 72h
		b) Aquatic chronic toxicity : NOEC Daphnia 0.3 mg/l 21d
2-Propenoic acid, reaction products with dipentaerythritol	CAS: 1384855-91-7 - EINECS: 800-838-4	a) Aquatic acute toxicity : LL50 Fish 13 mg/l 96h
		a) Aquatic acute toxicity : EL50 Daphnia 35 mg/l 48h
		a) Aquatic acute toxicity : ErL50 Algae > 100 mg/l 72h
		b) Aquatic chronic toxicity : ErC10 Algae 13 mg/l 72h
		c) Bacteria toxicity : EC50 > 100 mg/l 3h

Formaldehyde, oligomeric reaction products with 1-chloro-2,3-epoxypropane and phenol	EINECS: 701-263-0	a) Aquatic acute toxicity : LC50 Fish 2.54 mg/l 96h
		a) Aquatic acute toxicity : EC50 Algae 1.8 mg/l 72h
		a) Aquatic acute toxicity : EC50 Daphnia 2.55 mg/l 48h
		b) Aquatic chronic toxicity : NOEC Daphnia 0.3 mg/l 21d
oxirane, mono[(C12-14-alkyloxy)methyl] derivs.	CAS: 68609-97-2 - EINECS: 271-846-8 - INDEX: 603-103-00-4	a) Aquatic acute toxicity : LL50 Fish > 100 mg/l 96h
		a) Aquatic acute toxicity : EL50 Daphnia 7.2 mg/l 48h
		a) Aquatic acute toxicity : IC50 Algae 843.75 mg/l 72h
2-Propenoic acid, reaction products with pentaerythritol	CAS: 1245638-61-2 - EINECS: 629-850-6	a) Aquatic acute toxicity : LC50 Fish 3.2 mg/l 96h
		a) Aquatic acute toxicity : EC50 Crustaceans 13 mg/l 48h
		a) Aquatic acute toxicity : EC50 Algae 33 mg/l 72h
acrylic acid	CAS: 79-10-7 - EINECS: 201-177-9 - INDEX: 607-061-00-8	a) Aquatic acute toxicity : LC50 Fish 27 mg/l 96h
		a) Aquatic acute toxicity : EC50 Daphnia 47 mg/l 48h
		a) Aquatic acute toxicity : EC50 Algae 0.13 mg/l 72h
		b) Aquatic chronic toxicity : NOEC Daphnia > 12 mg/l 21d

12.2. Persistence and degradability

Component	Persitence/Degradability:
bis-[4-(2,3-epoxipropoxi)phenyl]propane	Non-readily biodegradable
2-Propenoic acid, reaction products with dipentaerythritol	Non-readily biodegradable
Formaldehyde, oligomeric reaction products with 1-chloro-2,3-epoxypropane and phenol	Non-readily biodegradable
oxirane, mono[(C12-14-alkyloxy)methyl] derivs.	Readily biodegradable
acrylic acid	Readily biodegradable

12.3. Bioaccumulative potential

N.A.

12.4. Mobility in soil

N.A.

12.5. Results of PBT and vPvB assessment

On the basis of available data, the product does not contain any PBT/vPvB in percentage ≥ 0.1%.

12.6. Endocrine disrupting properties

No endocrine disruptor substances present in concentration >= 0.1%

12.7. Other adverse effects

N.A.

SECTION 13: Disposal considerations

13.1. Waste treatment methods

Recover if possible. In so doing, comply with the local and national regulations currently in force.

Do not allow it to enter drains or watercourses.

Dispose of containers contaminated by the product in accordance with local or national legal provisions.

SECTION 14: Transport information

14.1. UN number or ID number

3077

14.2. UN proper shipping name

ADR-Shipping Name: ENVIRONMENTALLY HAZARDOUS SUBSTANCE, SOLID, N.O.S. (bis-[4-(2,3-epoxipropoxi)phenyl]propane)
IATA-Technical name: ENVIRONMENTALLY HAZARDOUS SUBSTANCE, SOLID, N.O.S. (bis-[4-(2,3-epoxipropoxi)phenyl]propane)
IMDG-Technical name: ENVIRONMENTALLY HAZARDOUS SUBSTANCE, SOLID, N.O.S. (bis-[4-(2,3-epoxipropoxi)phenyl]propane)

14.3. Transport hazard class(es)

ADR-Class: 9

IATA-Class: 9

IMDG-Class: 9

14.4. Packing group

ADR-Packing Group: III
IATA-Packing group: III
IMDG-Packing group: III

14.5. Environmental hazards

Most important toxic component: bis-[4-(2,3-epoxipropoxi)phenyl]propane
Marine pollutant: Yes
Environmental Pollutant: Yes
IMDG-EMS: F-A, S-F

14.6. Special precautions for user

Road and Rail (ADR-RID):

ADR exempt:
ADR-Label: 9

ADR - Hazard identification number: 90
ADR-Special Provisions: 274 335 375 601
ADR-Transport category (Tunnel restriction code):

Air (IATA):

IATA-Passenger Aircraft: 956
IATA-Cargo Aircraft: 956
IATA-Label: 9

IATA-Subsidiary hazards: -

IATA-Erg: 9L
IATA-Special Provisions: A97 A158 A179 A197 A215

Sea (IMDG):

IMDG-Stowage Code: Category A SW23
IMDG-Stowage Note: -

IMDG-Subsidiary hazards: -

IMDG-Special Provisions: 274 335 966 967 969

14.7. Maritime transport in bulk according to IMO instruments

N.A.

SECTION 15: Regulatory information

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

Dir. 98/24/EC (Risks related to chemical agents at work)
Dir. 2000/39/EC (Occupational exposure limit values)
Directive 2010/75/EU
Regulation (EC) n. 1907/2006 (REACH)
Regulation (EC) n. 1272/2008 (CLP)
Regulation (EC) n. 790/2009 (ATP 1 CLP) and (EU) n. 758/2013
Regulation (EU) n. 2020/878
Regulation (EU) n. 286/2011 (ATP 2 CLP)
Regulation (EU) n. 618/2012 (ATP 3 CLP)

Regulation (EU) n. 487/2013 (ATP 4 CLP)
Regulation (EU) n. 944/2013 (ATP 5 CLP)
Regulation (EU) n. 605/2014 (ATP 6 CLP)
Regulation (EU) n. 2015/1221 (ATP 7 CLP)
Regulation (EU) n. 2016/918 (ATP 8 CLP)
Regulation (EU) n. 2016/1179 (ATP 9 CLP)
Regulation (EU) n. 2017/776 (ATP 10 CLP)
Regulation (EU) n. 2018/669 (ATP 11 CLP)
Regulation (EU) n. 2018/1480 (ATP 13 CLP)
Regulation (EU) n. 2019/521 (ATP 12 CLP)
Regulation (EU) n. 2020/217 (ATP 14 CLP)
Regulation (EU) n. 2020/1182 (ATP 15 CLP)
Regulation (EU) n. 2021/643 (ATP 16 CLP)
Regulation (EU) n. 2021/849 (ATP 17 CLP)
Regulation (EU) n. 2022/692 (ATP 18 CLP)

Restrictions related to the product or the substances contained according to Annex XVII Regulation (EC) 1907/2006 (REACH) and subsequent modifications:

Restrictions related to the product: None.

Restrictions related to the substances contained: 40, 75

Provisions related to directive EU 2012/18 (Seveso III):

Seveso III category according to Annex 1, part 1	Lower-tier threshold (tonnes)	Upper-tier threshold (tonnes)
Product belongs to category: E2	200	500

Regulation (EU) No 649/2012 (PIC regulation)

No substances listed

German Water Hazard Class.

3: Severe hazard to waters

SVHC Substances:

On the basis of available data, the product does not contain any SVHC in percentage ≥ 0.1%.

15.2. Chemical safety assessment

No Chemical Safety Assessment has been carried out for the mixture.

SECTION 16: Other information

Code	Description
H226	Flammable liquid and vapour.
H302	Harmful if swallowed.
H312	Harmful in contact with skin.
H314	Causes severe skin burns and eye damage.
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.
H372	Causes damage to organs through prolonged or repeated exposure if inhaled.
H400	Very toxic to aquatic life.
H411	Toxic to aquatic life with long lasting effects.
H412	Harmful to aquatic life with long lasting effects.

Code	Hazard class and hazard category	Description
2.6/3	Flam. Liq. 3	Flammable liquid, Category 3
3.1/4/Dermal	Acute Tox. 4	Acute toxicity (dermal), Category 4
3.1/4/Inhal	Acute Tox. 4	Acute toxicity (inhalation), Category 4
3.1/4/Oral	Acute Tox. 4	Acute toxicity (oral), Category 4
3.2/1A	Skin Corr. 1A	Skin corrosion, Category 1A
3.2/2	Skin Irrit. 2	Skin irritation, Category 2
3.3/1	Eye Dam. 1	Serious eye damage, Category 1

3.3/2	Eye Irrit. 2	Eye irritation, Category 2
3.4.2/1	Skin Sens. 1	Skin Sensitisation, Category 1
3.4.2/1A	Skin Sens. 1A	Skin Sensitisation, Category 1A
3.8/3	STOT SE 3	Specific target organ toxicity — single exposure, Category 3
3.9/1	STOT RE 1	Specific target organ toxicity — repeated exposure, Category 1
4.1/A1	Aquatic Acute 1	Acute aquatic hazard, category 1
4.1/C2	Aquatic Chronic 2	Chronic (long term) aquatic hazard, category 2
4.1/C3	Aquatic Chronic 3	Chronic (long term) aquatic hazard, category 3

Classification and procedure used to derive the classification for mixtures according to Regulation (EC) 1272/2008 [CLP]:

Classification according to Regulation (EC) Nr. 1272/2008	Classification procedure
3.2/2	Calculation method
3.3/2	Calculation method
3.4.2/1	Calculation method
4.1/C2	Calculation method

This document was prepared by a competent person who has received appropriate training.

Main bibliographic sources:

ECDIN - Environmental Chemicals Data and Information Network - Joint Research Centre, Commission of the European Communities

SAX's DANGEROUS PROPERTIES OF INDUSTRIAL MATERIALS - Eight Edition - Van Nostrand Reinold

Safety data sheets of raw materials suppliers.

CCNL - Appendix 1

The information contained herein is based on our state of knowledge at the above-specified date. It refers solely to the product indicated and constitutes no guarantee of particular quality.

It is the duty of the user to ensure that this information is appropriate and complete with respect to the specific use intended.

This MSDS cancels and replaces any preceding release.

Legend to abbreviations and acronyms used in the safety data sheet:

ACGIH: American Conference of Governmental Industrial Hygienists

ADR: European Agreement concerning the International Carriage of Dangerous Goods by Road.

AND: European Agreement concerning the International Carriage of Dangerous Goods by Inland Waterways

ATE: Acute Toxicity Estimate

ATEmix: Acute toxicity Estimate (Mixtures)

BCF: Biological Concentration Factor

BEI: Biological Exposure Index

BOD: Biochemical Oxygen Demand

CAS: Chemical Abstracts Service (division of the American Chemical Society).

CAV: Poison Center

CE: European Community

CLP: Classification, Labeling, Packaging.

CMR: Carcinogenic, Mutagenic and Reprotoxic

COD: Chemical Oxygen Demand

COV: Volatile Organic Compound

CSA: Chemical Safety Assessment

CSR: Chemical Safety Report

DMEL: Derived Minimal Effect Level

DNEL: Derived No Effect Level.

DPD: Dangerous Preparations Directive

DSD: Dangerous Substances Directive

EC50: Half Maximal Effective Concentration

ECHA: European Chemicals Agency

EINECS: European Inventory of Existing Commercial Chemical Substances.

ES: Exposure Scenario

GefStoffVO: Ordinance on Hazardous Substances, Germany.

GHS: Globally Harmonized System of Classification and Labeling of Chemicals.

IARC: International Agency for Research on Cancer

IATA: International Air Transport Association.

IATA-DGR: Dangerous Goods Regulation by the "International Air Transport Association" (IATA).

IC50: half maximal inhibitory concentration

ICAO: International Civil Aviation Organization.

ICAO-TI: Technical Instructions by the "International Civil Aviation Organization" (ICAO).

IMDG: International Maritime Code for Dangerous Goods.
INCI: International Nomenclature of Cosmetic Ingredients.
IRCCS: Scientific Institute for Research, Hospitalization and Health Care
KAFH: KAFH
KSt: Explosion coefficient.
LC50: Lethal concentration, for 50 percent of test population.
LD50: Lethal dose, for 50 percent of test population.
LDLo: Leathal Dose Low
N.A.: Not Applicable
N/A: Not Applicable
N/D: Not defined/ Not available
NA: Not available
NIOSH: National Institute for Occupational Safety and Health
NOAEL: No Observed Adverse Effect Level
OSHA: Occupational Safety and Health Administration.
PBT: Persistent, Bioaccumulative and Toxic
PGK: Packaging Instruction
PNEC: Predicted No Effect Concentration.
PSG: Passengers
RID: Regulation Concerning the International Transport of Dangerous Goods by Rail.
STEL: Short Term Exposure limit.
STOT: Specific Target Organ Toxicity.
TLV: Threshold Limiting Value.
TWATLV: Threshold Limit Value for the Time Weighted Average 8 hour day. (ACGIH Standard).
vPvB: Very Persistent, Very Bioaccumulative.
WGK: German Water Hazard Class.