Safety Data Sheet

according to Regulation (EC) No. 1907/2006 (REACH) with its amendment Regulation (EC) No. 453/2010

Date of issue: 1/7/2013 Revision date: 10/3/2017 Supersedes: 10/3/2017 Version: 6.4

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

Product identifier

Product form : Mixture

: Epoxy Crystal Clear Product name Pro B component Type of product : Hardener (Crosslinker)

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

Relevant identified uses 1.2.1.

Intended for general public

: Industrial use Main use category

Industrial/Professional use spec : Intended for general public

Industrial

Use of the substance/mixture : Laminating hardener, casting, injection, winding, infusion, gluing, foaming, coatings and

sealants.

1.2.2. Uses advised against

No additional information available

Details of the supplier of the safety data sheet

Nedform BV

Hofdwarsweg 20, 6161DD Geleen, The Netherlands

info@nedform.com +31(0)464106260

Emergency telephone number

Emergency number : ORFILA (FRANCE): +33 (0)1 45 42 59 59 (24h/24, 7j/7)

Country	Organisation/Company	Address	Emergency number	Comment
United Kingdom	National Poisons Information Service Edinburgh Royal Infirmary of Edinburgh	Little France Crescent EH16 4SA Edinburgh	0344 892 0111	
United Kingdom	Guy's & St Thomas' Poisons Unit Medical Toxicology Unit, Guy's & St Thomas' Hospital Trust	Avonley Road SE14 5ER London	0870 243 2241	

SECTION 2: Hazards identification

Classification of the substance or mixture

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

Acute toxicity (oral), Category 4 H302 Acute toxicity (dermal), Category 4 H312 Serious eye damage/eye irritation, Category H318

Hazardous to the aquatic environment —

Chronic Hazard, Category 2

Full text of H statements : see section 16

Adverse physicochemical, human health and environmental effects

No additional information available

Label elements 2.2.

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

Hazard pictograms (CLP)





Signal word (CLP)

Hazardous ingredients : Propylidynetrimethanol, propoxylated, reaction products with ammonia

: H302+H312 - Harmful if swallowed or in contact with skin Hazard statements (CLP)

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H318 - Causes serious eye damage.

H411 - Toxic to aquatic life with long lasting effects.

Precautionary statements (CLP) : P102 - Keep out of reach of children.

P270 - Do not eat, drink or smoke when using this product.

P271 - Use only outdoors or in a well-ventilated area.

P273 - Avoid release to the environment.

P281 - Use personal protective equipment as required.

P301+P330+P331 - IF SWALLOWED: rinse mouth. Do NOT induce vomiting.

P304+P340 - IF INHALED: Remove person to fresh air and keep comfortable for breathing. P303+P361+P353 - IF ON SKIN (or hair): Take off immediately all contaminated clothing.

Rinse skin with water/shower.

P305+P351+P338 - IF IN EYES: Rinse cautiously with water for several minutes. Remove

contact lenses, if present and easy to do. Continue rinsing.

P501 - Dispose of contents/container to hazardous or special waste collection point, in

accordance with local, regional, national and/or international regulation.

2.3. Other hazards

No additional information available

SECTION 3: Composition/information on ingredients

3.1. Substances

Not applicable

3.2. Mixtures

Name	Product identifier	%	Classification according to Regulation (EC) No. 1272/2008 [CLP]
Propylidynetrimethanol, propoxylated, reaction products with ammonia	(CAS-No.) 39423-51-3 (EC-No.) 500-105-6 (REACH-no) 01- 2119556886-20	50 - 100	Acute Tox. 4 (Oral), H302 Acute Tox. 4 (Dermal), H312 Eye Dam. 1, H318 Aquatic Chronic 2, H411

Full text of H-statements: see section 16

SECTION 4: First aid measures

First-aid measures after inhalation

4.1.	Description	of first	aid measures

First-aid measures general : In all cases of doubt, o

: In all cases of doubt, or when symptoms persist, seek medical attention. Never give anything

by mouth to an unconscious person.

: Remove person to fresh air and keep comfortable for breathing. Assure fresh air breathing. Respiratory arrest: artificial respiration or oxygen. If unconscious place in recovery position and

seek medical advice.

First-aid measures after skin contact : Wash contaminated clothing before reuse. Take off contaminated clothes, wash skin with

plenty of water or have a shower (during minimum 15 minutes) and if necessary take medical advice. If on skin and if skin irritation or rash occurs, seek medical advice and attention.

First-aid measures after eye contact : Rinse immediately with plenty of water. Remove contact lenses, if present and easy to do.

Continue rinsing. Continue to rinse eye with clean water for 20-30 minutes, retracting eyelids

often. Consult an eye specialist if necessary.

First-aid measures after ingestion : Rinse mouth. Do not induce vomiting because of corrosive effects. Immediately call a POISON

CENTER/doctor.

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

Symptoms/effects after inhalation : Cough. May cause respiratory irritation. Severe inhalation hazard.

Symptoms/effects after skin contact : May cause moderate irritation.

Symptoms/effects after eye contact : May cause moderate irritation, including burning sensation, tearing, redness or swelling. Risk of

damage to eyes.

Symptoms/effects after ingestion : May cause burns or irritation of the linings of the mouth, throat, and gastrointestinal tract.

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

For the Anti-poison Center indicate all the components including the non dangerous ones to obtain (when possible) a total of 100 %.

SECTION 5: Firefighting measures

5.1. Extinguishing media

Suitable extinguishing media : Water spray. Foam. Dry powder. Carbon dioxide.

Unsuitable extinguishing media : Do not use a heavy water stream.

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5.2. Special hazards arising from the substance or mixture

Fire hazard : Do not breathe fumes from fires or vapours from decomposition.

Hazardous decomposition products in case of

fire

: Carbon dioxide. Carbon monoxide. Nitrogen oxides.

5.3. Advice for firefighters

Precautionary measures fire : Evacuate personnel to a safe area. Do not enter fire area without proper protective equipment,

including respiratory protection.

Firefighting instructions : Exercise caution when fighting any chemical fire. Unauthorized persons are not admitted.

Eliminate all ignition sources if safe to do so. Prevent fire fighting water from entering the

environment

Protection during firefighting : Do not enter fire area without proper protective equipment, including respiratory protection.

Wear a self contained breathing apparatus. Special protective equipment for fire-fighters.

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

General measures : No open flame

: No open flames. No smoking. Spill should be handled by trained cleaning personnel properly equipped with respiratory and eye protection.

6.1.1. For non-emergency personnel

No additional information available

6.1.2. For emergency responders

No additional information available

6.2. Environmental precautions

Avoid release to the environment. Notify authorities if liquid enters sewers or public waters.

6.3. Methods and material for containment and cleaning up

Methods for cleaning up : Clean up any spills as soon as possible, using an absorbent material to collect it. Do not allow

to enter drains or water courses.

6.4. Reference to other sections

Concerning personal protective equipment to use, see section 8. Concerning disposal elimination after cleaning, see section 13.

SECTION 7: Handling and storage

7.1. Precautions for safe handling

Precautions for safe handling

 Provide good ventilation in process area to prevent formation of vapour. Avoid all unnecessary exposure. Do not handle until all safety precautions have been read and understood. Keep containers closed

Hygiene measures

: Wash contaminated clothing before reuse. Contaminated work clothing should not be allowed out of the workplace. Do not eat, drink or smoke when using this product. Wash hands and other exposed areas with mild soap and water before eating, drinking or smoking and when leaving work.

7.2. Conditions for safe storage, including any incompatibilities

Storage conditions

: Store in original container. Store, if possible, in a cool, well ventilated place away from incompatible materials.

Incompatible products

 $: \ \, {\hbox{\bf Strong acids.}} \,\, {\hbox{\bf Oxidizing agent.}} \,\, {\hbox{\bf Halogenated hydrocarbons.}}$

Incompatible materials : Heat sources

7.3. Specific end use(s)

No additional information available

SECTION 8: Exposure controls/personal protection

8.1. Control parameters

No additional information available

8.2. Exposure controls

Personal protective equipment:

Self-contained breathing apparatus. Gloves. Gas mask. Protective clothing. Protective goggles. High gas/vapour concentration: gas mask with filter type K.

Hand protection:

Nitrile-rubber protective gloves. Chemical resistant gloves (according to European standard NF EN 374 or equivalent)

Eye protection:

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Chemical goggles or face shield

Skin and body protection:

Wear suitable protective clothing

Respiratory protection:

[In case of inadequate ventilation] wear respiratory protection. High gas/vapour concentration: gas mask with filter type K

Personal protective equipment symbol(s):











Consumer exposure controls:

Avoid contact during pregnancy/while nursing.

Other information:

Do not eat, drink or smoke during use.

SECTION 9: Physical and chemical properties

9.1. Information on basic physical and chemical properties

Physical state : Liquid

Colour : colourless to slightly yellow.

Odour : Amine-like.
Odour threshold : No data available
pH : No data available
Relative evaporation rate (butylacetate=1) : No data available
Melting point : No data available
Freezing point : No data available

Boiling point : No data available
Flash point : No data available
Auto-ignition temperature : No data available
Decomposition temperature : No data available
Flammability (solid, gas) : No data available
Vapour pressure : No data available
Relative vapour density at 20 °C : No data available

Relative density : 0.96

Solubility : No data available
Log Pow : No data available
Viscosity, kinematic : No data available

Viscosity, dynamic : 80 mPa.s

Explosive properties : No data available
Oxidising properties : No data available
Explosive limits : No data available

9.2. Other information

No additional information available

SECTION 10: Stability and reactivity

10.1. Reactivity

No additional information available

10.2. Chemical stability

Stable in use and storage conditions as recommended in item 7.

10.3. Possibility of hazardous reactions

No additional information available

10.4. Conditions to avoid

Heat. Open flame. Sparks.

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10.5. Incompatible materials

Strong acids. Oxidizing agent. metals. halogenated hydrocarbons.

10.6. Hazardous decomposition products

Carbon monoxide. Carbon dioxide. Nitrogen oxides.

SECTION 11: Toxicological information

11.1. Information on toxicological effects

Acute toxicity (oral) : Oral: Harmful if swallowed.

Acute toxicity (dermal) : Dermal: Harmful in contact with skin.

Acute toxicity (inhalation) : Not classified

ATE CLP (oral) 500 mg/kg bodyweight
ATE CLP (dermal) 1100 mg/kg bodyweight

Skin corrosion/irritation : Not classified

Serious eye damage/irritation : Causes serious eye damage.

Respiratory or skin sensitisation : Not classified
Germ cell mutagenicity : Not classified
Carcinogenicity : Not classified
Reproductive toxicity : Not classified
STOT-single exposure : Not classified
STOT-repeated exposure : Not classified
Aspiration hazard : Not classified

SECTION 12: Ecological information

12.1. Toxicity

Acute aquatic toxicity : Not classified

Chronic aquatic toxicity : Toxic to aquatic life with long lasting effects.

12.2. Persistence and degradability

No additional information available

12.3. Bioaccumulative potential

No additional information available

12.4. Mobility in soil

No additional information available

12.5. Results of PBT and vPvB assessment

No additional information available

12.6. Other adverse effects

No additional information available

SECTION 13: Disposal considerations

13.1. Waste treatment methods

No additional information available

SECTION 14: Transport information

In accordance with ADR / RID / IMDG / IATA / ADN

ADR	IMDG	IATA	ADN	RID	
14.1. UN number	14.1. UN number				
3082	3082	3082	3082	3082	
14.2. UN proper shippi	14.2. UN proper shipping name				
ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S.	ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S.	Environmentally hazardous substance, liquid, n.o.s.	ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S.	ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S.	
Transport document description					
UN 3082 ENVIRONMENTALLY HAZARDOUS	UN 3082 ENVIRONMENTALLY HAZARDOUS	UN 3082 Environmentally hazardous substance, liquid, n.o.s.	UN 3082 ENVIRONMENTALLY HAZARDOUS	UN 3082 ENVIRONMENTALLY HAZARDOUS	

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ADR	IMDG	IATA	ADN	RID	
SUBSTANCE, LIQUID, N.O.S. (Propylidynetrimethanol, propoxylated, reaction products with ammonia), 9, III	SUBSTANCE, LIQUID, N.O.S. (Propylidynetrimethanol, propoxylated, reaction products with ammonia), 9, III, MARINE POLLUTANT	(Propylidynetrimethanol, propoxylated, reaction products with ammonia), 9, III	SUBSTANCE, LIQUID, N.O.S. (Propylidynetrimethanol, propoxylated, reaction products with ammonia), 9, III	SUBSTANCE, LIQUID, N.O.S. (Propylidynetrimethanol, propoxylated, reaction products with ammonia), 9, III	
14.3. Transport hazard	class(es)				
9	9	9	9	9	
14.4. Packing group					
III	III	III	III	III	
14.5. Environmental hazards					
Dangerous for the environment : Yes	Dangerous for the environment : Yes Marine pollutant : Yes	Dangerous for the environment : Yes	Dangerous for the environment : Yes	Dangerous for the environment : Yes	
No supplementary information available					

14.6. Special precautions for user

- Overland transport

Classification code (ADR) : M6

Special provisions (ADR) : 274, 335, 375, 601

Limited quantities (ADR) : 51 Excepted quantities (ADR) : E1

: P001, IBC03, LP01, R001 Packing instructions (ADR)

Special packing provisions (ADR) : PP1 Mixed packing provisions (ADR) : MP19 Portable tank and bulk container instructions : T4 (ADR)

Portable tank and bulk container special

: TP1, TP29 provisions (ADR)

Tank code (ADR) : LGBV : AT Vehicle for tank carriage : 3 Transport category (ADR) Special provisions for carriage - Packages : V12 (ADR)

Special provisions for carriage - Loading,

unloading and handling (ADR)

Hazard identification number (Kemler No.) Orange plates

90 3082

: CV13

EAC code : •3Z

- Transport by sea

Special provisions (IMDG) : 274, 335, 969

Limited quantities (IMDG) : 5 L Excepted quantities (IMDG) : E1 Packing instructions (IMDG) : P001, LP01 Special packing provisions (IMDG) : PP1 IBC packing instructions (IMDG) : IBC03 Tank instructions (IMDG) : T4 Tank special provisions (IMDG) : TP2, TP29 : F-A EmS-No. (Fire) : S-F EmS-No. (Spillage) Stowage category (IMDG) : A

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- Air transport

PCA Excepted quantities (IATA) : E1
PCA Limited quantities (IATA) : Y964
PCA limited quantity max net quantity (IATA) : 30kgG
PCA packing instructions (IATA) : 964
PCA max net quantity (IATA) : 450L
CAO packing instructions (IATA) : 964
CAO max net quantity (IATA) : 450L

Special provisions (IATA) : A97, A158, A197

ERG code (IATA) : 9L

- Inland waterway transport

Classification code (ADN) : M6

Special provisions (ADN) : 274, 335, 375, 601

Limited quantities (ADN) : 5 L

Excepted quantities (ADN) : E1

Carriage permitted (ADN) : T

Equipment required (ADN) : PP

Number of blue cones/lights (ADN) : 0

- Rail transport

Classification code (RID) : M6

Special provisions (RID) : 274, 335, 375, 601

Limited quantities (RID) : 5L Excepted quantities (RID) : E1

Packing instructions (RID) : P001, IBC03, LP01, R001

Special packing provisions (RID) : PP1
Mixed packing provisions (RID) : MP19
Portable tank and bulk container instructions : T4

RID)

Portable tank and bulk container special : TP1, TP29

provisions (RID)

Tank codes for RID tanks (RID) : LGBV
Transport category (RID) : 3
Special provisions for carriage – Packages : W12

(RID)

Special provisions for carriage - Loading,

unloading and handling (RID)

: CW13, CW31

Colis express (express parcels) (RID) : CE8
Hazard identification number (RID) : 90

14.7. Transport in bulk according to Annex II of Marpol and the IBC Code

Not applicable

SECTION 15: Regulatory information

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

15.1.1. EU-Regulations

Contains no REACH substances with Annex XVII restrictions

Contains no substance on the REACH candidate list

Contains no REACH Annex XIV substances

15.1.2. National regulations

No additional information available

15.2. Chemical safety assessment

No additional information available

SECTION 16: Other information

Indication of changes:

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Revision - See: *.

Data sources : REGULATION (EC) No 1272/2008 OF THE EUROPEAN PARLIAMENT AND OF THE

COUNCIL of 16 December 2008 on classification, labelling and packaging of substances and mixtures, amending and repealing Directives 67/548/EEC and 1999/45/EC, and amending

Regulation (EC) No 1907/2006.

Other information : Information in this safety data sheet is based on actual knowledge in our possession and our

experience. This does not in any way excuse the user from knowing and applying all the regulations governing his activity. It is the sole responsibility of the user to take all precautions required in handling the product. It is the user's responsibility to take mentioned precaution measures and ensure that this information is complete and sufficient for the use of this product.

Full text of H- and EUH-statements:

Acute Tox. 4 (Dermal)	Acute toxicity (dermal), Category 4
Acute Tox. 4 (Oral)	Acute toxicity (oral), Category 4
Aquatic Chronic 2	Hazardous to the aquatic environment — Chronic Hazard, Category 2
Eye Dam. 1	Serious eye damage/eye irritation, Category 1
H302	Harmful if swallowed.
H312	Harmful in contact with skin.
H318	Causes serious eye damage.
H411	Toxic to aquatic life with long lasting effects.

SDS EU (REACH Annex II)

This information is based on our current knowledge and is intended to describe the product for the purposes of health, safety and environmental requirements only. It should not therefore be construed as guaranteeing any specific property of the product