

**Safety data sheet**  
**complying with Regulation 1907/2006/EC (REACH Regulation),**  
**EU 2020/878 and Regulation No 1272/2008/EC (CLP)**

Printing date 02.06.2021

Version number 4 (replaces version 3)

Revision: 02.06.2021

**SECTION 1: Identification of the substance/mixture and of the company/undertaking****1.1 Product identifier****Trade name:** PENEPOX™ CS - B**UFI:** 4Q30-100H-800D-9NW3**1.2 Relevant identified uses of the substance or mixture and uses advised against**

No further relevant information available.

**Application of the substance / the mixture:** Epoxy coating**1.3 Details of the supplier of the safety data sheet****Manufacturer/Supplier:**

PENETRON HELLAS S.A. G.E.MH. No: 07278001000

50, THRAKOMAKEDONON AV., 136 79 ACHARNES, GREECE

TEL.: +30 210 2448250 - FAX: + 30 210 2476803

Email: info@penetron.gr Site: www.penetron.gr

**1.4 Emergency telephone number:**

European Emergency Tel.: 112

**SECTION 2: Hazards identification****2.1 Classification of the substance or mixture****Classification according to Regulation EC No 1272/2008 CLP:**

GHS05 corrosion

Skin Corr. 1B

H314 Causes severe skin burns and eye damage.

Eye Dam. 1

H318 Causes serious eye damage.



GHS07

Acute Tox. 4

H302 Harmful if swallowed.

Skin Sens. 1

H317 May cause an allergic skin reaction.

Aquatic Chronic 3 H412 Harmful to aquatic life with long lasting effects.

**2.2 Label elements****Labelling according to Regulation EC No 1272/2008 CLP:**

The product is classified and labelled according to the CLP regulation.

**Hazard pictograms:**

GHS05 GHS07

**Signal word:** Danger

(Contd. on page 2)

GB

**Safety data sheet**  
**complying with Regulation 1907/2006/EC (REACH Regulation),**  
**EU 2020/878 and Regulation No 1272/2008/EC (CLP)**

Printing date 02.06.2021

Version number 4 (replaces version 3)

Revision: 02.06.2021

**Trade name:** PENEPOX™ CS - B

(Contd. of page 1)

**Hazard-determining components of labelling:**

benzyl alcohol  
 3-aminomethyl-3,5,5-trimethylcyclohexylamine

**Hazard statements:**

H302 Harmful if swallowed.  
 H314 Causes severe skin burns and eye damage.  
 H317 May cause an allergic skin reaction.  
 H412 Harmful to aquatic life with long lasting effects.

**Precautionary statements**

P102 Keep out of reach of children.  
 P261 Avoid breathing dust/fume/gas/mist/vapours/spray.  
 P273 Avoid release to the environment.  
 P280 Wear protective gloves/protective clothing/eye protection/face protection/hearing protection.  
 P301+P312 IF SWALLOWED: Call a POISON CENTER/doctor if you feel unwell.  
 P303+P361+P353 IF ON SKIN (or hair): Take off immediately all contaminated clothing. Rinse skin with water [or 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.  
 P405 Store locked up.  
 P501 Dispose of contents/container in accordance with local/regional/national/international regulations.

**2.3 Other hazards****Results of PBT and vPvB assessment**

**PBT:** Not applicable.  
**vPvB:** Not applicable.

\* **SECTION 3: Composition/information on ingredients****3.2 Mixtures****Description:** Mixture: consisting of the following components.**Ingredients according Regulation (EU) 2020/878:**

CAS: 100-51-6 EINECS: 202-859-9 Index number: 603-057-00-5 Reg.nr.: 01-2119492630-38-XXXX	benzyl alcohol ⚠ Acute Tox. 4, H302; Acute Tox. 4, H332	25-50%
CAS: 2855-13-2 EINECS: 220-666-8 Index number: 612-067-00-9 Reg.nr.: 01-2119514687-32-XXXX	3-aminomethyl-3,5,5-trimethylcyclohexylamine ⚠ Skin Corr. 1B, H314; ⚠ Acute Tox. 4, H302; Acute Tox. 4, H312; Skin Sens. 1, H317; Aquatic Chronic 3, H412	25-50%

GB

(Contd. on page 3)

**Safety data sheet**  
**complying with Regulation 1907/2006/EC (REACH Regulation),**  
**EU 2020/878 and Regulation No 1272/2008/EC (CLP)**

Printing date 02.06.2021

Version number 4 (replaces version 3)

Revision: 02.06.2021

**Trade name:** PENEPOX™ CS - B

(Contd. of page 2)

#### SECTION 4: First aid measures

##### 4.1 Description of first aid measures

###### General information:

Take affected persons out into the fresh air.  
 Seek immediate medical advice.

###### After inhalation:

Supply fresh air and to be sure call for a doctor.  
 In case of unconsciousness place patient stably in side position for transportation.  
 Seek medical treatment in case of complaints.

###### After skin contact:

Immediately wash with water and soap and rinse thoroughly.  
 If skin irritation continues, consult a doctor.

###### After eye contact:

Rinse opened eye for at least 15 minutes under running water.  
 Protect unharmed eye.  
 Seek immediate medical advice.

###### After swallowing:

Do not induce vomiting; call for medical help immediately.  
 Drink plenty of water and provide fresh air. Call for a doctor immediately.  
 Seek immediate medical advice.

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

No further relevant information available.

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

No further relevant information available.

#### SECTION 5: Firefighting measures

##### 5.1 Extinguishing media

**Suitable extinguishing agents:** CO<sub>2</sub>, powder or water spray. Fight larger fires with water spray.

**For safety reasons unsuitable extinguishing agents:** Water with full jet

##### 5.2 Special hazards arising from the substance or mixture

Carbon monoxide (CO)

Carbon dioxide (CO<sub>2</sub>)

##### 5.3 Advice for firefighters

###### Protective equipment:

Mouth respiratory protective device.

Wear fully protective suit.

###### Additional information

Collect contaminated fire fighting water separately. It must not enter the sewage system.

#### SECTION 6: Accidental release measures

##### 6.1 Personal precautions, protective equipment and emergency procedures:

Wear protective equipment. Keep unprotected persons away.

Avoid inhalation of vapors.

Wear protective clothing.

Keep away from ignition sources.

Avoid contact with the skin, eyes and clothing.

##### 6.2 Environmental precautions:

Do not allow to enter sewers/ surface or ground water.

(Contd. on page 4)

**Safety data sheet**  
**complying with Regulation 1907/2006/EC (REACH Regulation),**  
**EU 2020/878 and Regulation No 1272/2008/EC (CLP)**

Printing date 02.06.2021

Version number 4 (replaces version 3)

Revision: 02.06.2021

**Trade name:** PENEPOX™ CS - B

(Contd. of page 3)

Do not allow to penetrate the ground/soil.

**6.3 Methods and material for containment and cleaning up:**

Collect with absorbent material (sand, diatomite).

Ensure adequate ventilation.

Absorb liquid components with liquid-binding material.

**6.4 Reference to other sections:**

See Section 7 for information on safe handling.

See Section 8 for information on personal protection equipment.

See Section 13 for disposal information.

**SECTION 7: Handling and storage****7.1 Precautions for safe handling**

No special precautions are necessary if used correctly.

Ensure good ventilation/exhaustion at the workplace.

Avoid contact with eyes, hands and clothing.

**Information about fire - and explosion protection:**

Keep ignition sources away - Do not smoke.

Protect against electrostatic charges.

**7.2 Conditions for safe storage, including any incompatibilities****Storage:****Requirements to be met by storerooms and receptacles:**

Store in a cool location.

Store away from sources of ignition

Prevent any seepage into the ground.

Provide ventilation for receptacles.

**Further information about storage conditions:**

Keep container tightly sealed.

Store in cool, dry conditions in well sealed receptacles.

Protect from heat and direct sunlight.

**7.3 Specific end use(s)** No further relevant information available.**SECTION 8: Exposure controls/personal protection****8.1 Control parameters****Ingredients with limit values that require monitoring at the workplace:**

The product does not contain any relevant quantities of materials with critical values that have to be monitored at the workplace.

**8.2 Exposure controls****8.2.1. Appropriate engineering controls**

Take appropriate protective measures with regard to the handling of chemicals and mixtures.

**Individual protection measures, such as personal protective equipment****General protective and hygienic measures:**

Keep away from foodstuffs, beverages and feed.

Wash hands before breaks and at the end of work.

(Contd. on page 5)

**Safety data sheet**  
**complying with Regulation 1907/2006/EC (REACH Regulation),**  
**EU 2020/878 and Regulation No 1272/2008/EC (CLP)**

Printing date 02.06.2021

Version number 4 (replaces version 3)

Revision: 02.06.2021

**Trade name:** PENEPOX™ CS - B

(Contd. of page 4)

Store protective clothing separately.  
 Do not inhale gases / fumes / aerosols.  
 Avoid contact with the eyes and skin.

**Respiratory protection:**

Use suitable respiratory protective device in case of insufficient ventilation. Respiratory protection required in insufficiently ventilated working areas and during spraying. An air-fed mask, or for short periods of work, a combination of charcoal filter and particulate filter A2-P2 (EN529) is recommended.

**Hand protection**

Protective gloves resistant to chemicals (standard EN 374-1)

The glove material has to be impermeable and resistant to the product/ the substance/ the preparation. Due to missing tests no recommendation to the glove material can be given for the product/ the preparation/ the chemical mixture.

Selection of the glove material on consideration of the penetration times, rates of diffusion and the degradation

**Material of gloves**

Hand protection when handling the product at room temperature:

Butyl rubber - IIR: thickness  $\geq 0,5\text{mm}$ ; breakthrough time  $\geq 480\text{min}$ .

Fluorinated rubber - FKM: thickness  $\geq 0,4\text{mm}$ ; breakthrough time  $\geq 480\text{min}$ .

Recommendation: contaminated gloves should be disposed of.

The selection of the suitable gloves does not only depend on the material, but also on further marks of quality and varies from manufacturer to manufacturer. As the product is a mixture of several substances, the resistance of the glove material can not be calculated in advance and has therefore to be checked prior to the application.

**Penetration time of glove material**

The determined penetration times according to EN 16523-1:2015 are not performed under practical conditions. Therefore a maximum wearing time, which corresponds to 50% of the penetration time, is recommended.

**Eye/face protection**

Safety glasses with side-shields (frame goggles) (e.g. EN 166)

**Body protection:**

Chemically resistant, protective work clothing (EN 14605) and boots.

\* **SECTION 9: Physical and chemical properties****9.1 Information on basic physical and chemical properties****General Information**

<b>Physical state</b>	Liquid
<b>Colour:</b>	Yellowish
<b>Odour:</b>	
<b>Odour threshold:</b>	Not determined
<b>Melting point/freezing point:</b>	Not determined
<b>Flammability</b>	Not applicable

(Contd. on page 6)

GB

**Safety data sheet**  
**complying with Regulation 1907/2006/EC (REACH Regulation),**  
**EU 2020/878 and Regulation No 1272/2008/EC (CLP)**

Printing date 02.06.2021

Version number 4 (replaces version 3)

Revision: 02.06.2021

**Trade name:** PENEPOX™ CS - B

(Contd. of page 5)

**Lower and upper explosion limit**

<b>Lower:</b>	Not determined
<b>Upper:</b>	Not determined
<b>Flash point:</b>	Not determined
<b>Auto-ignition temperature:</b>	Product is not selfigniting.
<b>Decomposition temperature:</b>	Not determined
<b>Viscosity:</b>	
<b>Kinematic viscosity</b>	Not determined
<b>Kinematic viscosity</b>	
<b>Dynamic at 25 °C:</b>	300-600 mPas
<b>Solubility</b>	
<b>water:</b>	Not determined
<b>Partition coefficient n-octanol/water (log value)</b>	Not determined
<b>Vapour pressure:</b>	Not determined
<b>Density and/or relative density</b>	
<b>Density:</b>	Not determined
<b>Relative density</b>	Not determined
<b>Vapour density</b>	Not determined

**9.2 Other information****Appearance:****Form:** Liquid**Important information on protection of health and environment, and on safety.**

**Auto-ignition temperature:** Not determined

**Explosive properties:** Product is not explosive. However, formation of explosive air/vapour mixtures are possible.

**Cloud point / clarification point:****Oxidising properties** Not considered as oxidising.**Evaporation rate** Not determined**Information with regard to physical hazard classes**

<b>Explosives</b>	Void
<b>Flammable gases</b>	Void
<b>Aerosols</b>	Void
<b>Oxidising gases</b>	Void
<b>Gases under pressure</b>	Void
<b>Flammable liquids</b>	Void
<b>Flammable solids</b>	Void
<b>Self-reactive substances and mixtures</b>	Void
<b>Pyrophoric liquids</b>	Void
<b>Pyrophoric solids</b>	Void
<b>Self-heating substances and mixtures</b>	Void
<b>Substances and mixtures, which emit flammable gases in contact with water</b>	Void
<b>Oxidising liquids</b>	Void
<b>Oxidising solids</b>	Void
<b>Organic peroxides</b>	Void
<b>Corrosive to metals</b>	Void

(Contd. on page 7)

**Safety data sheet**  
**complying with Regulation 1907/2006/EC (REACH Regulation),**  
**EU 2020/878 and Regulation No 1272/2008/EC (CLP)**

Printing date 02.06.2021

Version number 4 (replaces version 3)

Revision: 02.06.2021

**Trade name:** PENEPOX™ CS - B**Desensitised explosives**

Void

(Contd. of page 6)

**SECTION 10: Stability and reactivity****10.1 Reactivity** No further relevant information available.**10.2 Chemical stability****Thermal decomposition / conditions to be avoided** Stable at environment temperature.**10.3 Possibility of hazardous reactions** No dangerous reactions known.**10.4 Conditions to avoid** Avoid heat, sparkles, naked flame or other sources of ignition.**10.5 Incompatible materials** No further relevant information available.**10.6 Hazardous decomposition products** No dangerous decomposition products known.**SECTION 11: Toxicological information****11.1 Information on hazard classes as defined in Regulation (EC) No 1272/2008****Acute toxicity** Harmful if swallowed.**LD/LC50 values relevant for classification:****ATE (Acute Toxicity Estimates)**

Oral	LD50	904 mg/kg
Dermal	LD50	3,143 mg/kg
Inhalative	LC50/4 h (vapour)	22 mg/l (rat)

**CAS: 100-51-6 benzyl alcohol**

Oral	LD50	1,230 mg/kg (rat)
Dermal	LD50	2,000 mg/kg (rabbit)
Inhalative	LC50/4 h (vapour)	8.8 mg/l (rat)

**CAS: 2855-13-2 3-aminomethyl-3,5,5-trimethylcyclohexylamine**

Oral	LD50	1,030 mg/kg (rat)
------	------	-------------------

**Skin corrosion/irritation** Causes severe skin burns and eye damage.**Serious eye damage/irritation** Causes serious eye damage.**Respiratory or skin sensitisation** May cause an allergic skin reaction.**Germ cell mutagenicity** Based on available data, the classification criteria are not met.**Carcinogenicity** Based on available data, the classification criteria are not met.**Reproductive toxicity** Based on available data, the classification criteria are not met.**STOT-single exposure** Based on available data, the classification criteria are not met.**STOT-repeated exposure** Based on available data, the classification criteria are not met.**Aspiration hazard** Based on available data, the classification criteria are not met.**Additional toxicological information:****Repeated dose toxicity** Based on available data, the classification criteria are not met.**11.2 Information on other hazards****Endocrine disrupting properties**

None of the ingredients is listed.

**SECTION 12: Ecological information****12.1 Toxicity****Aquatic toxicity:** No further relevant information available.**12.2 Persistence and degradability** No further relevant information available.

(Contd. on page 8)

**Safety data sheet**  
**complying with Regulation 1907/2006/EC (REACH Regulation),**  
**EU 2020/878 and Regulation No 1272/2008/EC (CLP)**

Printing date 02.06.2021

Version number 4 (replaces version 3)

Revision: 02.06.2021

**Trade name:** PENEPOX™ CS - B

(Contd. of page 7)

**12.3 Bioaccumulative potential** No further relevant information available.**12.4 Mobility in soil** No further relevant information available.**12.5 Results of PBT and vPvB assessment****PBT:** Not applicable.**vPvB:** Not applicable.**12.6 Endocrine disrupting properties** For information on endocrine disrupting properties see section 11.**12.7 Other adverse effects****Remark:** Harmful to fish**Additional ecological information:****General notes:**

The product contains materials that are harmful to the environment.

Must not reach sewage water or drainage ditch undiluted or unneutralised.

Harmful to aquatic organisms

**SECTION 13: Disposal considerations****13.1 Waste treatment methods****Recommendation**

Dispose according to National Regulations.



Must not be disposed together with household garbage. Do not allow product to reach sewage system.

**Uncleaned packaging:****Recommendation:**

Disposal must be made according to official regulations.

Packaging may be reused or recycled after cleaning.

**SECTION 14: Transport information****14.1 UN number or ID number****ADR, IMDG, IATA**

UN1760

**14.2 UN proper shipping name****ADR**1760 CORROSIVE LIQUID, N.O.S.  
(ISOPHORONEDIAMINE)  
CORROSIVE LIQUID, N.O.S.  
(ISOPHORONEDIAMINE)**IMDG, IATA****14.3 Transport hazard class(es)****ADR, IMDG, IATA****Class**

8 Corrosive substances.

**Label**

8

(Contd. on page 9)

**Safety data sheet**  
**complying with Regulation 1907/2006/EC (REACH Regulation),**  
**EU 2020/878 and Regulation No 1272/2008/EC (CLP)**

Printing date 02.06.2021

Version number 4 (replaces version 3)

Revision: 02.06.2021

**Trade name:** PENEPOX™ CS - B

(Contd. of page 8)

**14.4 Packing group****ADR, IMDG, IATA**

II

**14.5 Environmental hazards:**

Not applicable.

**14.6 Special precautions for user**

Warning: Corrosive substances.

**Hazard identification number (Kemler code):**

80

**EMS Number:**

F-A,S-B

**Stowage Category**

A

**14.7 Maritime transport in bulk according to IMO instruments**

Not applicable.

**Transport/Additional information:****ADR****Limited quantities (LQ)**

1L

**Excepted quantities (EQ)**

Code: E2

Maximum net quantity per inner packaging: 30 ml

Maximum net quantity per outer packaging: 500 ml

**Transport category**

2

**Tunnel restriction code**

E

**IMDG****Limited quantities (LQ)**

1L

**Excepted quantities (EQ)**

Code: E2

Maximum net quantity per inner packaging: 30 ml

Maximum net quantity per outer packaging: 500 ml

**UN "Model Regulation":**UN 1760 CORROSIVE LIQUID, N.O.S.  
(ISOPHORONEDIAMINE), 8, II**\* SECTION 15: Regulatory information****15.1 Safety, health and environmental regulations/legislation specific for the substance or mixture**

REACH Regulation 1907/2006/EC

Regulation (EU) 2020/878

CLP Regulation 1272/2008/EC

Directive 98/24/EC on the protection of health and safety of workers from the risks related to chemicals agents at work.

Council Directive 94/33/EC on the protection of young people at work, as amended.

Directive 92/85/EEC on the introduction of measures to encourage improvements in the safety and health at work of pregnant workers and workers who have recently given birth or are breastfeeding, as amended

**Directive 2012/18/EU****Named dangerous substances - ANNEX I** Substance is not listed.**REGULATION (EC) No 1907/2006 ANNEX XVII** Conditions of restriction: 3**National regulations:****Other regulations, limitations and prohibitive regulations****Substances of very high concern (SVHC) according to REACH, Article 57**

It doesn't contain substances of very high concern (SVHC).

(Contd. on page 10)

GB

**Safety data sheet**  
**complying with Regulation 1907/2006/EC (REACH Regulation),**  
**EU 2020/878 and Regulation No 1272/2008/EC (CLP)**

Printing date 02.06.2021

Version number 4 (replaces version 3)

Revision: 02.06.2021

**Trade name:** PENEPOX™ CS - B

(Contd. of page 9)

**15.2 Chemical safety assessment:** A Chemical Safety Assessment has not been carried out.

### SECTION 16: Other information

This information is based on our present knowledge. However, this shall not constitute a guarantee for any specific product features and shall not establish a legally valid contractual relationship.

#### Relevant phrases

H302 Harmful if swallowed.

H312 Harmful in contact with skin.


H314 Causes severe skin burns and eye damage.

H317 May cause an allergic skin reaction.

H332 Harmful if inhaled.

H412 Harmful to aquatic life with long lasting effects.

#### Department issuing SDS:

 SUSTCHEM S.A.  
 REACH & Chemical Services Department  
 A: 144, 3rd Septemvriou, GR 112 51 | Athens, Greece  
 T: +30 210 8252510 | F: +30 210 8252575  
 W: www.sustchem.gr | E: info@suschem.gr

#### Version number of previous version: 3

#### Abbreviations and acronyms:

ADR: Accord relatif au transport international des marchandises dangereuses par route (European Agreement Concerning the International Carriage of Dangerous Goods by Road)

IMDG: International Maritime Code for Dangerous Goods

IATA: International Air Transport Association

GHS: Globally Harmonised System of Classification and Labelling of Chemicals

EINECS: European Inventory of Existing Commercial Chemical Substances

ELINCS: European List of Notified Chemical Substances

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

LC50: Lethal concentration, 50 percent

LD50: Lethal dose, 50 percent

PBT: Persistent, Bioaccumulative and Toxic

SVHC: Substances of Very High Concern

vPvB: very Persistent and very Bioaccumulative

Acute Tox. 4: Acute toxicity – Category 4

Skin Corr. 1B: Skin corrosion/irritation – Category 1B

Eye Dam. 1: Serious eye damage/eye irritation – Category 1

Skin Sens. 1: Skin sensitisation – Category 1

Aquatic Chronic 3: Hazardous to the aquatic environment - long-term aquatic hazard – Category 3

**\* Data compared to the previous version altered.**