

according to Regulation (EC) No. 1907/2006 (REACH) and Regulation (EU) No 453/2010

Revision date: 23/12/2014 Version: 7 Language: en-GB,IE Date of first version: 5/11/2008

TMR 2001A

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

1.1 Product identifier

Trade name: TMR 2001A

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

General use: Epoxy resin.

Reserved for industrial and professional use.

1.3 Details of the supplier of the safety data sheet

Company name: AIRTECH EUROPE SARL

Street/POB-No.: Z.I. Haneboesch
Postal Code, city: 4562 Differdange

Luxemburg

 www.
 www.airtech.lu

 E-mail:
 sales@airtech.lu

 Telephone:
 +352-582282-1

 Telefax:
 +352-584935

Dept. responsible for information:

Telephone: +352-582282-1, E-mail: sales@airtech.lu

1.4 Emergency telephone number

GIZ-Nord, Germany Telephone: +49 (0)551-19240

SECTION 2: Hazards identification

2.1 Classification of the substance or mixture

Classification according to EC regulation 1272/2008 (CLP)

Skin Irrit. 2; H315 Causes skin irritation.

Eye Irrit. 2; H319 Causes serious eye irritation.
Skin Sens. 1; H317 May cause an allergic skin reaction.

Aquatic Chronic 2; H411 Toxic to aquatic life with long lasting effects.

Classification according to Directive 67/548/EEC or 1999/45/EC

Xi; R36/38 Irritating to eyes and skin.

Sens.; R43 May cause sensitisation by skin contact.

N; R51-53 Toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment.

2.2 Label elements

Labelling (CLP)



Signal word: 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.



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Precautionary statements: P261 Avoid breathing vapours.

P273 Avoid release to the environment.

P280 Wear protective gloves/protective clothing/eye protection/face protection.

P302+P352 IF ON SKIN: Wash with plenty of water/soap.

P305+P351+P338

IF IN EYES: Rinse cautiously with water for several minutes. Remove contact

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

P333+P313 If skin irritation or rash occurs: Get medical advice/attention.

P337+P313 If eye irritation persists: Get medical advice/attention.

P501 Dispose of contents/container to hazardous or special waste collection point.

Labelling (67/548/EEC or 1999/45/EC)



Χi



irritant dangerous for the environment

R phrase(s): R 36/38 Irritating to eyes and skin.

R 43 May cause sensitisation by skin contact.

R 51/53 Toxic to aquatic organisms, may cause long-term adverse effects in the

aquatic environment.

S phrase(s): S 24/25 Avoid contact with skin and eyes.

S 37 Wear suitable gloves.

S 61 Avoid release to the environment. Refer to special instructions/Safety data

sheets.

Special labelling

Text for labelling: Contains Bisphenol A epoxy resin, Bisphenol-F-epichlorhydrine resin and

1,4-bis(2,3-Epoxypropoxy)butane.

2.3 Other hazards

May cause respiratory irritation. May be harmful if swallowed.

SECTION 3: Composition / information on ingredients

3.1 Substances: not applicable

3.2 Mixtures

Chemical characterisation: Mixture of the following listed substances with safe additions.

Hazardous ingredients:

Ingredient	Designation	Content	Classification
EC No CAS 25085-99-8	Bisphenol A epoxy resin	>= 25 %	DSD/DPD: Xi, N; R 36/38, 43, 51/53 CLP: Skin Irrit. 2; H315. Eye Irrit. 2; H319. Skin Sens. 1; H317. Aquatic Chronic 2; H411.
EC No. 500-006-8 CAS 28064-14-4	Bisphenol-F- epichlorhydrine resin	>= 25 %	DSD/DPD: Sens.; R43. N; R51-53. Xi; R36/38. CLP: Skin Irrit. 2; H315. Eye Irrit. 2; H319. Skin Sens. 1; H317. Aquatic Chronic 2; H411.
EC No. 219-371-7 CAS 2425-79-8	1,4-bis(2,3- Epoxypropoxy) butane	< 20 %	DSD/DPD: Sens.; R43. R52-53. Xi; R36/38. Xn; R20/21. CLP: Acute Tox. 4; H312. Acute Tox. 4; H332. Skin Irrit. 2; H315. Eye Irrit. 2; H319. Skin Sens. 1; H317. Aquatic Chronic 3; H412.



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SECTION 4: First aid measures

4.1 Description of first aid measures

In case of inhalation: Provide fresh air. In case of breathing difficulties administer oxygen. Immediately get

medical attention.

In case of skin contact: After contact with skin, wash immediately with soap and plenty of water. Take off

contaminated clothing and wash it before reuse. Seek medical treatment in case of

troubles.

After eye contact: Immediately flush eyes with plenty of flowing water for 10 to 15 minutes holding eyelids

apart. Subsequently consult an ophthalmologist.

After swallowing: Rinse mouth immediately and drink plenty of water. Never give anything by mouth to an

unconscious person. Do not induce vomiting. Immediately get medical attention.

4.2 Most important symptoms and effects, both acute and delayed

Causes serious eye irritation. Causes skin irritation. May cause an allergic skin reaction.

4.3 Indication of any immediate medical attention and special treatment needed

Treat symptomatically.

SECTION 5: Firefighting measures

5.1 Extinguishing media

Suitable extinguishing media:

Water fog, extinguishing powder, foam, carbon dioxide.

Extinguishing media which must not be used for safety reasons:

High power water jet.

5.2 Special hazards arising from the substance or mixture

This material is combustible, but will not ignite readily. May form dangerous gases and vapours in case of fire. Formation of numerous unknown compounds is possible.

In case of fire may be liberated: Aldehydes, acids, phenols, carbon monoxide and carbon

dioxide.

5.3 Advice for firefighters

Special protective equipment for firefighters:

Wear a self-contained breathing apparatus and chemical protective clothing.

Additional information: Hazchem-Code: •3Z

Seal off endangered area. Cool endangered containers with water spray and, if possible, remove from danger zone. Use water spray jet to knock down vapours. Do not inhale explosion and combustion gases. Do not allow fire water to penetrate into surface or

ground water.

SECTION 6: Accidental release measures

6.1 Personal precautions, protective equipment and emergency procedures

Avoid contact with skin, eyes, and clothing. Avoid the formation of aerosol. Do not breathe vapour/aerosol. Wear protective equipment. Keep away from unprotected people. Provide adequate ventilation.

6.2 Environmental precautions

Do not allow to penetrate into soil, waterbodies or drains. In case of release, notify competent authorities.



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6.3 Methods and material for containment and cleaning up

Soak up with absorbent materials such as sand, siliceus earth, acid- or universal binder. Store in special closed containers and dispose of according to ordinance. Wash spill area

with hot water.

Additional information: Special danger of slipping by leaking/spilling product.

6.4 Reference to other sections

Refer additionally to section 8 and 13.

SECTION 7: Handling and storage

7.1 Precautions for safe handling

Advices on safe handling: Provide adequate ventilation, and local exhaust as needed. Avoid contact with skin, eyes,

and clothing. Avoid the formation of aerosol. Do not breathe vapour/aerosol. Wear protective equipment. Handle and open container with care. When using do not eat, drink or smoke. After work, wash hands and face.

Precautions against fire and explosion:

Take standard precautions to prevent fire. Protect from excessive heat. Keep away from

sources of ignition. - No smoking.

7.2 Conditions for safe storage, including any incompatibilities

Requirements for storerooms and containers:

Keep container tightly closed in a cool, well-ventilated place. Keep container dry. Keep away from heat sources, sparks and open flames. Take care when re-opening already used containers. Store containers in upright position. Keep away from incompatible

materials

Hints on joint storage: Incompatible materials: Strong acids, strong oxidizing agents, amines (aliphatic).

Storage class: 10 = Combustible liquids, unless storage class 3

7.3 Specific end use(s)

No information available.

SECTION 8: Exposure controls/personal protection

8.1 Control parameters

Occupational exposure limit values:

CAS No.	Designation	Туре	Limit value
471-34-1	Calcium carbonate	Great Britain: WEL-TWA Great Britain: WEL-TWA	10 mg/m³ (inhalable fraction) 4 mg/m³ (respirable fraction)
14807-96-6	Talcum	Great Britain: WEL-TWA Ireland: 8 hours Ireland: 8 hours	1 mg/m³ (respirable fraction) 0.8 mg/m³ (respirable fraction) 10 mg/m³ (inhalable fraction)
1333-86-4	Carbon	Great Britain: WEL-STEL Great Britain: WEL-TWA Ireland: 15 minutes Ireland: 8 hours	7 mg/m ³ 3.5 mg/m ³ 7 mg/m ³ 3.5 mg/m ³

8.2 Exposure controls

Provide adequate ventilation, and local exhaust as needed.



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Personal protection equipment

Occupational exposure controls

Respiratory protection: Use a breathing protection against vapours/aerosol.

Recommended: Use filter type A (= against vapours of organic substances) according to

EN 14387.

The filter class must be suitable for the maximum contaminant concentration (gas/vapour/aerosol/particulates) that may arise when handling the product. If the concentration is exceeded, self-contained breathing apparatus must be used.

Hand protection: Protective gloves according to EN 374.

Glove material: Nitrile rubber or neoprene.

Observe glove manufacturer's instructions concerning penetrability and breakthrough time.

Eye protection: Tightly sealed goggles according to EN 166

Body protection: Wear suitable protective clothing.

General protection and hygiene measures:

Avoid contact with skin, eyes, and clothing. Take off contaminated clothing and wash it before reuse. Do not breathe vapour/aerosol. Eye wash facility must be provided. When

using do not eat, drink or smoke.

Wash hands before breaks and after work.

SECTION 9: Physical and chemical properties

9.1 Information on basic physical and chemical properties

Appearance: Form: liquid

Colour: black

Odour: pleasant odour
Odour threshold: pleasant odour
no data available

pH value: neutral

Melting point/freezing point:

no data available
no data available
no data available

Flash point/flash point range: > 176 °C

Evaporation rate: no data available

Flammability: This material is combustible, but will not ignite readily.

Explosive properties: no data available Explosion limits: no data available

Vapour pressure: negligible

Vapour density: no data available

Density: 1.04 g/mL

Solubility:

Partition coefficient: n-octanol/water:

Auto-ignition temperature:

Thermal decomposition:

Viscosity, dynamic:

Explosive properties:

Oxidizing characteristics:

no data available
no data available
no data available
no data available

9.2 Other information

Additional information: no data available



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SECTION 10: Stability and reactivity

10.1 Reactivity

See section: Possibility of hazardous reactions

10.2 Chemical stability

Stable under recommended storage conditions.

10.3 Possibility of hazardous reactions

No hazardous reaction when handled and stored according to provisions.

10.4 Conditions to avoid

Keep away from heat.

10.5 Incompatible materials

Strong acids, bases, oxidizing agents.

10.6 Hazardous decomposition products

In case of fire may be liberated: aldehyde, acids, phenols, carbon monoxide and carbon

dioxide. Formation of numerous unknown compounds is possible.

Thermal decomposition: no data available

SECTION 11: Toxicological information

11.1 Information on toxicological effects

Toxicological effects: Acute toxicity (oral): Lack of data.

Acute toxicity (dermal): Lack of data. Acute toxicity (inhalative): Lack of data.

Skin corrosion/irritation: Skin Irrit. 2; H315 = Causes skin irritation.

The product has not been tested. The statement is derived from the properties of the

single components.

Eye damage/irritation: Eye Irrit. 2; H319 = Causes serious eye irritation.

The product has not been tested. The statement is derived from the properties of the

single components.

Sensitisation to the respiratory tract: Lack of data.

Skin sensitisation: Skin Sens. 1; H317 = May cause an allergic skin reaction.

The product has not been tested. The statement is derived from the properties of the single components.

Germ cell mutagenicity/Genotoxicity: Lack of data.

Carcinogenicity: Lack of data. Reproductive toxicity: Lack of data.

Effects on or via lactation: Lack of data.

Specific target organ toxicity (single exposure): Lack of data.

Specific target organ toxicity (repeated exposure): Lack of data.

Aspiration hazard: Lack of data.

Other information: Pre-existing skin and respiratory conditions including dermatitis, asthma and chronic lung

disease might be aggravated by exposure.



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Symptoms

In case of inhalation: May cause respiratory irritation. In case of ingestion: May be harmful if swallowed.

After eye contact: Upon direct contact with eyes may cause burning, tearing, redness.

SECTION 12: Ecological information

12.1 Toxicity

Aquatic toxicity: The product has not been tested. The statement is derived from the properties of the

single components.

Toxic to aquatic life with long lasting effects.

12.2. Persistence and degradability

Further details: no data available

12.3 Bioaccumulative potential

Partition coefficient: n-octanol/water:

no data available

12.4 Mobility in soil

no data available

12.5 Results of PBT and vPvB assessment

no data available

12.6 Other adverse effects

General information: Do not allow to penetrate into soil, waterbodies or drains.

SECTION 13: Disposal considerations

13.1 Waste treatment methods

Product

Waste key number: 08 04 09* = Waste adhesives and sealants containing organic solvents or other

dangerous substances.

MFSU = manufacture, formulation, supply and use

* = Evidence for disposal must be provided.

Incinerate as hazardous waste according to applicable local, state, and federal regulations. Recommendation:

Contaminated packaging

Empty carefully and completely, if possible. Dispose of waste according to applicable Recommendation:

legislation. Handle contaminated packages in the same way as the substance itself. Do not remove label until container is thoroughly cleaned. Non-contaminated packages may

be recycled.

SECTION 14: Transport information

14.1 UN number

ADR/RID, IMDG, IATA: 3082

14.2 UN proper shipping name

ADR/RID, IMDG, IATA: UN 3082, ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S.

(Bisphenol A epoxy resin, Bisphenol-F-epichlorhydrine resin.)



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14.3 Transport hazard class(es)

ADR/RID: Class 9, Code: M6
IMDG: Class 9, Subrisk -

IATA: Class 9

14.4 Packing group

ADR/RID, IMDG, IATA:

14.5 Environmental hazards

Marine pollutant: Yes

14.6 Special precautions for user

Land transport (ADR/RID)

Warning board: ADR/RID: Kemmler-number 90, UN number 3082

Hazard label: 9

Special provisions: 274 335 601

Limited quantities: 5 L EQ: E1

Contaminated packaging - Instructions: P001 IBC03 LP01 R001

Contaminated packaging - Special provisions: PP1
Special provisions for packing together: MP19
Portable tanks - Instructions: T4
Portable tanks - Special provisions: TP1 TP29
Tank coding: LGBV
Tunnel restriction code: E

Sea transport (IMDG)

EmS: F-A, S-F
Special provisions: 274, 335
Limited quantities: 5 L
EQ: E1

Tank instructions - UN:

Tank instructions - Provisions:

The provisions:

The provisions of the provision o

Properties and observations:

Air transport (IATA)

Hazard: Miscellaneous

EQ: E1

Passenger Ltd.Qty.: Pack.Instr. Y964 - Max. Net Qty/Pkg. 30 kg G
Passenger: Pack.Instr. 964 - Max. Net Qty/Pkg. 450 L
Cargo: Pack.Instr. 964 - Max. Net Qty/Pkg. 450 L

Special Provisioning: A97 A158

ERG: 9L













14.7 Transport in bulk according to Annex II of MARPOL 73/78 and the IBC Code

no data available



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SECTION 15: Regulatory information

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

National regulations - Great Britain

Hazchem-Code: •3Z

National regulations - EC member states

Labelling of packaging with <= 125mL content





Signal word: Warning

Hazard statements: H317 May cause an allergic skin reaction.

Precautionary statements: P261 Avoid breathing vapours.

P280 Wear protective gloves/protective clothing/eye protection/face protection.

P302+P352 IF ON SKIN: Wash with plenty of water/soap.

P333+P313 If skin irritation or rash occurs: Get medical advice/attention.

15.2 Chemical Safety Assessment

For this mixture a chemical safety assessment is not required.

SECTION 16: Other information

Further information

Wording of the H-phrases under paragraph 2 and 3:

H312 = Harmful in contact with skin.

H315 = Causes skin irritation.

H317 = May cause an allergic skin reaction.

H319 = Causes serious eye irritation.

H332 = Harmful if inhaled.

H411 = Toxic to aquatic life with long lasting effects. H412 = Harmful to aquatic life with long lasting effects.

Wording of the R-phrases under section 2 and 3:

R 20/21 = Harmful by inhalation and in contact with skin.

R 36/38 = Irritating to eyes and skin.

R 43 = May cause sensitisation by skin contact.

R 51/53 = Toxic to aquatic organisms, may cause long-term adverse effects in the

aquatic environment.

R 52/53 = Harmful to aquatic organisms, may cause long-term adverse effects in the

aquatic environment.

Reason of change: Changes in section 7, 10: General revision

Department issuing data sheet

Contact person: see section 1: Dept. responsible for information



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For abbreviations and acronyms, see: ECHA Guidance on information requirements and chemical safety assessment, chapter R.20 (Table of terms and abbreviations).

This data sheet cannot cover all possible situations which the user may experience during processing. Each aspect of your operation should be examined to determine if, and which additional precautions may be necessary. All health and safety information contained in this data sheet should be provided to your employees and customers. It is your responsibility to develop appropriate workplace instructions and training programmes for employees.

As the conditions and methods of use are beyond our control, we do not assume any responsibility and expressly disclaim any liability for any use of this product. The information supplied on this safety data sheet complies with our current level of knowledge as well as with national and EU regulations. All statements or suggestions are made without warranty, expressed or implied, regarding accuracy of information, the hazards connected with the use of the product or the results to be obtained from the use thereof.



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

1.1 Product identifier

Trade name: TMH 2001B

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

General use: Curing agent for TMR 2001A.

Reserved for industrial and professional use.

1.3 Details of the supplier of the safety data sheet

Company name: AIRTECH EUROPE SARL

Street/POB-No.: Z.I. Haneboesch
Postal Code, city: 4562 Differdange

Luxemburg

 www.
 www.airtech.lu

 E-mail:
 sales@airtech.lu

 Telephone:
 +352-582282-1

 Telefax:
 +352-584935

Dept. responsible for information:

Telephone: +352-582282-1, E-mail: sales@airtech.lu

1.4 Emergency telephone number

GIZ-Nord, Germany Telephone: +49 (0)551-19240

SECTION 2: Hazards identification

2.1 Classification of the substance or mixture

Classification according to EC regulation 1272/2008 (CLP)

Acute Tox. 4; H302 Harmful if swallowed.

Acute Tox. 4; H312 Harmful in contact with skin.

Acute Tox. 4; H332 Harmful if inhaled.

Skin Corr. 1B; H314 Causes severe skin burns and eye damage.

Skin Sens. 1; H317 May cause an allergic skin reaction. Repr. 2; H361f Suspected of damaging fertility.

Aquatic Chronic 2; H411 Toxic to aquatic life with long lasting effects.

Classification according to Directive 67/548/EEC or 1999/45/EC

Repr. Cat. 3; R63 Possible risk of harm to the unborn child.

C; R34 Causes burns.

Xn; R20/21/22 Harmful by inhalation, in contact with skin and if swallowed.

Sens.; R43 May cause sensitisation by skin contact.

N; R51-53 Toxic to aquatic organisms, may cause long-term adverse effects in the aquatic

environment.

2.2 Label elements

Labelling (CLP)



Signal word: Danger



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Hazard statements: 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.

H361f Suspected of damaging fertility.

H411 Toxic to aquatic life with long lasting effects.

Precautionary statements: P201 Obtain special instructions before use.

P260 Do not breathe vapours.

Use only outdoors or in a well-ventilated area.

P273 Avoid release to the environment.

P280 Wear protective gloves/protective clothing/eye protection/face protection.

P303+P361+P353

IF ON SKIN (or hair): Remove/Take off immediately all contaminated

clothing. Rinse skin with water/shower.

P310 Immediately call a POISON CENTER/doctor.

P405 Store locked up.

Labelling (67/548/EEC or 1999/45/EC)





corrosive dangerous for the environment

R phrase(s): R 20/21/22 Harmful by inhalation, in contact with skin and if swallowed.

R 34 Causes burns.

R 43 May cause sensitisation by skin contact.

R 51/53 Toxic to aquatic organisms, may cause long-term adverse effects in the

aquatic environment.

Possible risk of harm to the unborn child.

S phrase(s): S 1 Keep locked up.

s 26 In case of contact with eyes, rinse immediately with plenty of water and

seek medical advice.

S 36/37/39 Wear suitable protective clothing, gloves and eye/face protection.

In case of accident or if you feel unwell, seek medical advice immediately

(show the label where possible).

S 61 Avoid release to the environment. Refer to special instructions/Safety data

sheets.

Special labelling

Text for labelling: Contains m-Phenylenebis(methylamine), Bisphenol A epoxy resin, triethylentetramine,

4,4'-Isopropylidenediphenol. Restricted to professional users.

2.3 Other hazards

Special danger of slipping by leaking/spilling product.

SECTION 3: Composition / information on ingredients

3.1 Substances: not applicable

3.2 Mixtures

Chemical characterisation: Amine adduct with epoxy resin.



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	:	
Hazardous	ıngr	ealents:

Ingredient	Designation	Content	Classification
EC No. 216-032-5 CAS 1477-55-0	m-Phenylenebis (methylamine)	< 60 %	DSD/DPD: C; R34. Sens.; R43. R52-53. Xn; R20/22. CLP: Acute Tox. 4; H302. Acute Tox. 4; H332. Skin Corr. 1B; H314. Skin Sens. 1; H317. Aquatic Chronic 3; H412.
EC No CAS 25085-99-8	Bisphenol A epoxy resin	< 40 %	DSD/DPD: Xi, N; R 36/38, 43, 51/53 CLP: Skin Irrit. 2; H315. Eye Irrit. 2; H319. Skin Sens. 1; H317. Aquatic Chronic 2; H411.
EC No. 210-484-7 CAS 616-47-7	1-Methylimidazole	< 25 %	DSD/DPD: C; R34. Xn; R21/22. CLP: Acute Tox. 4; H302. Acute Tox. 4; H312. Skin Corr. 1B; H314.
EC No. 211-776-7 CAS 694-83-7	Cyclohex-1,2-ylenediamine	< 10 %	DSD/DPD: C; R35. Xi; R37. Xn; R20/21/22. CLP: Acute Tox. 4; H302. Acute Tox. 4; H312. Acute Tox. 4; H332. Skin Corr. 1A; H314. STOT SE 3; H335.
EC No. 203-950-6 CAS 112-24-3	Triethylentetramine	< 10 %	DSD/DPD: Xn; R21. C; R34. Sens.; R43. R52-53. CLP: Acute Tox. 4; H312. Skin Corr. 1B; H314. Skin Sens. 1; H317. Aquatic Chronic 3; H412.
EC No. 201-245-8 CAS 80-05-7	4,4'-Isopropylidenediphenol	< 10 %	DSD/DPD: Xi; R37. Xi; R41. Sens.; R43. Repr. Cat. 3; R62. R52. CLP: Eye Dam. 1; H318. Skin Sens. 1; H317. Repr. 2; H361f. STOT SE 3; H335.
EC No. 205-411-0 CAS 140-31-8	2-Piperazin-1-ylethylamine	< 5 %	DSD/DPD: C; R34. Sens.; R43. R52-53. Xn; R21/22. CLP: Acute Tox. 4; H302. Acute Tox. 4; H312. Skin Corr. 1B; H314. Skin Sens. 1; H317. Aquatic Chronic 3; H412.
EC No. 200-712-3 CAS 69-72-7	Salicylic acid	< 5 %	DSD/DPD: Xn; R22. Xi; R41. CLP: Acute Tox. 4; H302. Eye Dam. 1; H318.

SECTION 4: First aid measures

4.1 Description of first aid measures

In case of inhalation: Remove the casualty into fresh air and keep him calm. In case of breathing stop use

artificial aspiration immediately. Immediately get medical attention.

In case of skin contact: After contact with skin, wash immediately with soap and plenty of water. Take off

immediately all contaminated clothing. Cover with sterile dressing material to protect

against infection. Immediately get medical attention.

After eye contact: Immediately flush eyes with plenty of flowing water for 10 to 15 minutes holding eyelids

apart. Subsequently seek the immediate attention of an ophthalmologist.

After swallowing: Never give anything by mouth to an unconscious person.

Rinse mouth immediately and drink plenty of water.

Do not induce vomiting. Immediately get medical attention.

4.2 Most important symptoms and effects, both acute and delayed

Harmful by inhalation, in contact with skin and if swallowed. Causes severe skin burns and eye damage. May cause an allergic skin reaction. Suspected of damaging fertility.



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4.3 Indication of any immediate medical attention and special treatment needed

Treat symptomatically.

SECTION 5: Firefighting measures

5.1 Extinguishing media

Suitable extinguishing media

Water fog, extinguishing powder, foam, carbon dioxide.

Extinguishing media which must not be used for safety reasons:

High power water jet.

5.2 Special hazards arising from the substance or mixture

This material is combustible, but will not ignite readily... May form dangerous gases and vapours in case of fire. Formation of numerous unknown compounds is possible.

In case of fire may be liberated: ammonia, nitrogen oxides (NOx), carbon monoxide and

carbon dioxide.

5.3 Advice for firefighters

Special protective equipment for firefighters:

Wear a self-contained breathing apparatus and chemical protective clothing.

Hazchem-Code: 2X Additional information:

> Seal off endangered area. Cool endangered containers with water spray and, if possible, remove from danger zone. Use water spray jet to knock down vapours. Do not inhale explosion and combustion gases. Do not allow fire water to penetrate into surface or

ground water.

SECTION 6: Accidental release measures

6.1 Personal precautions, protective equipment and emergency procedures

Avoid exposure. Wear protective equipment. Avoid formation of aerosols/vapours. Do not breathe vapour/aerosol/mist. Respiratory protection in case of aerosol or vapour formation. Ensure adequate ventilation, especially in confined areas. Keep away from unprotected people.

6.2 Environmental precautions

Do not allow to penetrate into soil, waterbodies or drains. If necessary notify appropriate authorities. In case of release, notify competent authorities.

6.3 Methods and material for containment and cleaning up

Dam spills. Absorb with liquid-binding material (e.g. sand, diatomaceous earth, acid- or universal binding agents) and place in closed containers for disposal. Final cleaning.

Dispose of waste according to applicable legislation.

Special danger of slipping by leaking/spilling product. Additional information:

6.4 Reference to other sections

Refer additionally to section 8 and 13.



according to Regulation (EC) No. 1907/2006 (REACH) and Regulation (EU) No 453/2010

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SECTION 7: Handling and storage

7.1 Precautions for safe handling

Advices on safe handling: Provide adequate ventilation, and local exhaust as needed. Execute works under fume

hood.

Avoid exposure. Avoid contact with skin, eyes, and clothing. Avoid the formation of aerosol.

Wear self-contained breathing apparatus. Do not breathe vapour/aerosol/mist. Wear suitable protective clothing. When using do not eat, drink or smoke.

Precautions against fire and explosion:

Take standard precautions to prevent fire. Protect from excessive heat. Avoid open flames.

7.2 Conditions for safe storage, including any incompatibilities

Requirements for storerooms and containers:

Store container tightly closed in a dry and cool place. Keep container in a well-ventilated place. Refrigerated storage is recommended to maintain product quality. Do not drop,

drag or bang the container. Keep away from incompatible materials.

Hints on joint storage: Incompatible materials: Acrylate, strong acids, strong oxidizing agents, epoxides,

aldehydes, ketone, halogenated organic compounds.

Keep away from food and drinks.

Storage class: 8A = Combustible corrosive substances

7.3 Specific end use(s)

No information available.

SECTION 8: Exposure controls/personal protection

8.1 Control parameters

Occupational exposure limit values:

CAS No.	Designation	Туре	Limit value
00 00 .	4,4'- Isopropylidenediphenol	Europe: IOELV: TWA	10 mg/m³
		Great Britain: WEL-TWA Ireland: 8 hours	10 mg/m³ (inhalable fraction) 10 mg/m³

8.2 Exposure controls

Provide adequate ventilation, and local exhaust as needed.

Recommended: Execute works under fume hood.

Personal protection equipment

Occupational exposure controls

Respiratory protection: Use a breathing protection against vapours/aerosol.

Recommended: Use filter type A (= against vapours of organic substances) according to

EN 14387

The filter class must be suitable for the maximum contaminant concentration (gas/vapour/aerosol/particulates) that may arise when handling the product. If the concentration is exceeded, self-contained breathing apparatus must be used.

Hand protection: Protective gloves according to EN 374.

Glove material: Rubber or neoprene Layer thickness (recommended): >0.5 mm.

Breakthrough time: not tested.

Observe glove manufacturer's instructions concerning penetrability and breakthrough time.

Eye protection: Tightly sealed goggles according to EN 166.

Body protection: Protective work clothing, chemical resistant safety shoes..

Wear face protection if necessary.



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General protection and hygiene measures:

Odour:

Avoid exposure. Avoid contact with skin, eyes, and clothing. Change contaminated clothing. Do not breathe vapour/aerosol/mist. Work place should be equipped with a shower and an eye rinsing apparatus.

After work, wash hands and face. When using do not eat, drink or smoke.

SECTION 9: Physical and chemical properties

9.1 Information on basic physical and chemical properties

Appearance: Form: liquid

Colour: amber characteristic

Odour threshold:

pH value:

no data available

no data available

Melting point/freezing point:

no data available

no data available

no data available

no data available

Flash point/flash point range: > 93 °C

Evaporation rate:

Flammability:

Explosive properties:

Explosion limits:

No data available

no data available

no data available

vapour pressure:

Vapour density:

no data available

no data available

no data available

Density: 1.10 g/mL

Solubility:

Partition coefficient: n-octanol/water:

Auto-ignition temperature:

Thermal decomposition:

Viscosity, dynamic:

Explosive properties:

Oxidizing characteristics:

no data available
no data available
no data available
no data available

9.2 Other information

Additional information: no data available

SECTION 10: Stability and reactivity

10.1 Reactivity

Refer to section: Possibility of hazardous reactions.

10.2 Chemical stability

Stable under recommended storage conditions.

10.3 Possibility of hazardous reactions

Exothermic reactions with oxidizing agents, acids, aldehydes, ketone and halogenated organic compounds

10.4 Conditions to avoid

Protect from excessive heat. Avoid formation of aerosols/vapours.

10.5 Incompatible materials

Strong oxidizing agents, acids, aldehydes, ketone and halogenated organic compounds



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10.6 Hazardous decomposition products

ammonia, nitrogen oxides (NOx), carbon monoxide and carbon dioxide.

Formation of numerous unknown compounds is possible.

Thermal decomposition: no data available

SECTION 11: Toxicological information

11.1 Information on toxicological effects

Toxicological effects: Acute toxicity (oral): Acute To

Acute toxicity (oral): Acute Tox. 4; H302 = Harmful if swallowed.

The product has not been tested. The statement is derived from the properties of the

single components.

ATEmix (calculated): 300< ATE<= 2000.

Acute toxicity (dermal): Acute Tox. 4; H312 = Harmful in contact with skin.

The product has not been tested. The statement is derived from the properties of the

single components.

ATEmix (calculated): 1000< ATE<= 2000.

Acute toxicity (inhalative): Acute Tox. 4; H332 = Harmful if inhaled.

The product has not been tested. The statement is derived from the properties of the

single components.

ATEmix (calculated): 1< ATE<= 5.

Skin corrosion/irritation, eye damage/irritation: Skin Corr. 1B; H314 = Causes severe skin

burns and eye damage.

Sensitisation to the respiratory tract: Lack of data.

Skin sensitisation: Skin Sens. 1; H317 = May cause an allergic skin reaction.

The product has not been tested. The statement is derived from the properties of the single components.

Germ cell mutagenicity/Genotoxicity: Lack of data.

Carcinogenicity: Lack of data.

Reproductive toxicity: Repr. 2; H361f = Suspected of damaging fertility.

The product has not been tested. The statement is derived from the properties of the single components.

Effects on or via lactation: Lack of data.

Specific target organ toxicity (single exposure): Lack of data.

Specific target organ toxicity (repeated exposure): Based on available data, the classification criteria are not met.

The product has not been tested. The statement is derived from the properties of the single components.

Chronic toxicity: Possible danger of damage to liver and kidneys.

Aspiration hazard: Lack of data.

Carcinogenic, germ cell mutagen and reproduction effects:

Repr. Cat. 3 - Possible risk of harm to the unborn child.

Symptoms

In case of inhalation: Sore throat, headache, fatigue, dizziness, cough, nausea, vomiting. In case of ingestion: Burns in the mouth, pharynx, oesophagus, and gastrointestinal tract. Other symptoms: Danger of stomach perforation. Abdominal pain, nausea, sore throat, vomiting, thirst and coma.

After contact with skin: Burns, causes poorly healing wounds.

After eye contact: Danger of loss of sight, burns.



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SECTION 12: Ecological information

12.1 Toxicity

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

12.2. Persistence and degradability

Further details: no data available

12.3 Bioaccumulative potential

Partition coefficient: n-octanol/water:

no data available

12.4 Mobility in soil

no data available

12.5 Results of PBT and vPvB assessment

no data available

12.6 Other adverse effects

General information: Do not allow to enter into ground-water, surface water or drains.

SECTION 13: Disposal considerations

13.1 Waste treatment methods

Product

Waste key number: 08 04 09* = Waste adhesives and sealants containing organic solvents or other

dangerous substances.

MFSU = manufacture, formulation, supply and use

* = Evidence for disposal must be provided.

Recommendation: Dispose of waste according to applicable legislation.

Contaminated packaging

Recommendation: Dispose of waste according to applicable legislation.

Handle contaminated packages in the same way as the substance itself. Do not remove label until container is thoroughly cleaned. Non-contaminated packages may be recycled.

SECTION 14: Transport information

14.1 UN number

ADR/RID, IMDG, IATA: 2735

14.2 UN proper shipping name

ADR/RID, IMDG, IATA: UN 2735, AMINES, LIQUID, CORROSIVE, N.O.S. or POLYAMINES, LIQUID,

CORROSIVE, N.O.S.

(m-Phenylenebis(methylamine), 1-Methylimidazole and cyclohex-1,2-ylenediamine)

14.3 Transport hazard class(es)

ADR/RID: Class 8, Code: C7
IMDG: Class 8, Subrisk -

IATA: Class 8

14.4 Packing group

ADR/RID, IMDG, IATA:



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14.5 Environmental hazards

Marine pollutant: Yes

14.6 Special precautions for user

Land transport (ADR/RID)

Warning board: ADR/RID: Kemmler-number 80, UN number 2735

Hazard label: 8
Special provisions: 274
Limited quantities: 1 L
EQ: E2

Contaminated packaging - Instructions:

Special provisions for packing together:

Portable tanks - Instructions:

Portable tanks - Special provisions:

Tank coding:

P001 IBC02

MP15

T11

T11

TP1 TP27

L4BN

Tunnel restriction code:





Sea transport (IMDG)

EmS: F-A, S-B
Special provisions: 274
Limited quantities: 1 L
EQ: E2
Contaminated packaging - Instructions: P001
Contaminated packaging - Provisions: IBC - Instructions: IBC02
IBC - Provisions: Tank instructions - IMO: Tank instructions - UN: T11

Tank instructions - Provisions: TP1, TP27

Stowage and segregation: Category A. "Separated from" acids.

Properties and observations: Colourless to yellowish liquids or solutions with a pungent

odour. Miscible with or soluble in water. When involved in a fire, evolve toxic gases. Corrosive to most metals, especially to copper and its alloys. React violently with acids. Cause burns

to skin, eyes and mucous membranes.

Segregation group: 18



Hazard: Corrosive

EQ: E2

Passenger Ltd.Qty.: Pack.Instr. Y840 - Max. Net Qty/Pkg. 0.5 L
Passenger: Pack.Instr. 851 - Max. Net Qty/Pkg. 1 L
Cargo: Pack.Instr. 855 - Max. Net Qty/Pkg. 30 L

Special Provisioning: A3 A803

ERG: 8L





14.7 Transport in bulk according to Annex II of MARPOL 73/78 and the IBC Code

no data available

SECTION 15: Regulatory information

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

National regulations - Great Britain

Hazchem-Code: 2X





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National regulations - EC member states

Labelling of packaging with <= 125mL content









Signal word:	Danger	
Hazard statements:	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.
	H361f	Suspected of damaging fertility.
Precautionary statements:	P201	Obtain special instructions before use.
	P260	Do not breathe vapours.
	P271	Use only outdoors or in a well-ventilated area.
	P280	Wear protective gloves/protective clothing/eye protection/face protection.
	P303+P361+P353	
		IF ON SKIN (or hair): Remove/Take off immediately all contaminated
		clothing. Rinse skin with water/shower.
	P310	Immediately call a POISON CENTER/doctor.
	P405	Store locked up.

15.2 Chemical Safety Assessment

For this mixture a chemical safety assessment is not required.

SECTION 16: Other information

Further information

Wording of the H-phrases under paragraph 2 and 3:

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.

H361f = Suspected of damaging fertility.

H411 = Toxic to aquatic life with long lasting effects.

H412 = Harmful to aquatic life with long lasting effects.



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Wording of the R-phrases under section 2 and 3:

R 20/21/22 = Harmful by inhalation, in contact with skin and if swallowed.

R 20/22 = Harmful by inhalation and if swallowed.

R 21 = Harmful in contact with skin.

R 21/22 = Harmful in contact with skin and if swallowed.

R 22 = Harmful if swallowed.

R 34 = Causes burns.

R 35 = Causes severe burns.

R 36/38 = Irritating to eyes and skin.

R 37 = Irritating to respiratory system.

R 41 = Risk of serious damage to eyes.

R 43 = May cause sensitisation by skin contact.

R 51/53 = Toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment.

R 52 = Harmful to aquatic organisms.

R 52/53 = Harmful to aquatic organisms, may cause long-term adverse effects in the aquatic environment.

R 62 = Possible risk of impaired fertility.

R 63 = Possible risk of harm to the unborn child.

Reason of change: Changes in section 7, 10: General revision

Department issuing data sheet

Contact person: see section 1: Dept. responsible for information

For abbreviations and acronyms, see: ECHA Guidance on information requirements and chemical safety assessment, chapter R.20 (Table of terms and abbreviations).

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