

Ident-No: RENLAM M-1 CI**HAZARDOUS SUBSTANCE. DANGEROUS GOODS**

Version 1

Print Date 27.09.2007

Revision Date 27.09.2007

1. IDENTIFICATION OF THE SUBSTANCE/PREPARATION AND THE COMPANY/UNDERTAKING**Product information**

Trade name : RENLAM M-1 CI
 Use : Resin for tooling systems

Company : Huntsman Advanced Materials (Australia)
 PTY Ltd
 Gate 3, Ballarat Road
 3023 Deer Park

Telephone : +61393616060
 Telefax : +61393616066
 Emergency telephone : Australia: 1800 786 152/New Zealand : 0800 767 437/Asia
 number Pacific: + 65 6336 6011

2. COMPOSITION/INFORMATION ON INGREDIENTS**Chemical nature**

Formulated bisphenol A epoxy resin
 preparation

Hazardous components

Chemical Name	CAS-No.	Symbol(s):	R-phrases)	Concentration [%]
reaction product: bisphenol A-(epichlorhydrin); epoxy resin (number average molecular weight < 700)	25068-38-6	Xi, N	R36/38 R43 R51/53	70.00 - 82.00

Also contains other ingredients not hazardous to the criteria of NOHSC.

3. HAZARDS IDENTIFICATION

Poison schedule: 5

Irritating to eyes and skin.
 May cause sensitization by skin contact.
 Toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment.

4. FIRST AID MEASURES

Inhalation : Move to fresh air.
 Call a physician immediately.

Eye contact : Rinse immediately with plenty of water for at least 15 minutes.
 If eye irritation persists, consult a specialist.

Skin contact : Wash off immediately with soap and plenty of water.
 If skin irritation persists, call a physician.

Ingestion : Immediately give plenty of water (if possible charcoal slurry).
 Obtain medical attention.

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Do not induce vomiting.

Notes to physician

Treatment : No specific antidote. Treat symptomatically.
 First aid facility: Eye wash station . Showering facility.
 Poisons Information Centres (131 126 in Australia and 0800
 764 766 in New Zealand) in each State capital city can provide
 advice for scheduled poisons.

5. FIRE-FIGHTING MEASURES

Suitable extinguishing media : Water spray.
 Carbon dioxide (CO2).
 Foam.
 Dry powder.

Extinguishing media which must not be used for safety reasons : High volume water jet.

Special protective equipment for fire-fighters : Wear self-contained breathing apparatus and protective suit.

Further information : Burning produces obnoxious and toxic fumes.
 Carbon oxides.

6. ACCIDENTAL RELEASE MEASURES

Personal precautions : Keep away from sources of ignition - No smoking.
 Avoid contact with skin, eyes and clothing.
 Do not breathe vapours/dust.

Environmental precautions : Prevent product from entering drains.
 Do not contaminate surface water.
 Avoid subsoil penetration.

If in doubt contact Huntsman Advanced Materials. Limited using contact details provided on this SDS.

Methods for cleaning up : Soak up with inert absorbent material and dispose of as hazardous waste.

7. HANDLING AND STORAGE**Handling**

Advice on safe handling : Provide sufficient air exchange and/or exhaust in work rooms.
 Handle and open container with care.

Storage

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Further information on storage conditions : Keep away from food, drink and animal feeding stuffs.
Keep container tightly closed.
Keep at temperatures between 2 and 40°C.

8. EXPOSURE CONTROLS / PERSONAL PROTECTION**Components with workplace control parameters**

Components	CAS-No.	Control parameters	Update	Basis
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Engineering measures

Wherever possible, the workplace must be ventilated sufficiently to ensure that exposure standards are met. Ensure airflow, where this product is being used, is directed away from the operators.

If cured material made from this product is to be cut or sanded, ensure that dust is kept below the Worksafe Exposure Standard for inspirable dusts (10mg/m³) or the ACGIH Exposure Standard for respirable dusts (3mg/m³).

Personal protective equipment

Respiratory protection : In case of insufficient ventilation wear suitable respiratory equipment.
Filter type AX-P2 (organic vapours, particles)

Eye protection : Tightly fitting safety goggles.

Hand protection : Material of gloves for long term application (BTT>480 min):
Butyl rubber
Ethyl Vinyl Alcohol Laminate (EVAL)
Material of gloves for short term/splash application (10 min<BTT<480 min):
Nitrile rubber
Use gloves approved to relevant standards e.g. EN 374 (Europe), F739 (US).
Suitability and durability of a glove is dependent on usage, e.g. frequency and duration of contact, chemical resistance of glove material and dexterity. Always seek advice from glove suppliers.
Additional information can be found for instance at www.gisbau.de

Skin and body protection : long sleeved clothing

Hygiene measures : Keep away from food, drink and animal feeding stuffs.
Wash hands before breaks and immediately after handling the product.

Protective measures : Avoid contact with skin and eyes by wearing long impervious gloves, (Rubber, Neoprene, PVC complying to AS 2161) and industrial safety glasses. Respiratory protection complying with AS 1715, 1716 should be worn if ventilation at the workplace is inadequate. Apply barrier creams to exposed skin areas.

Keep away from sources of ignition - No smoking.

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Avoid contact with skin, eyes and clothing.

9. PHYSICAL AND CHEMICAL PROPERTIES

Form	: liquid
Colour	: light yellow
Odour	: slight
Boiling point	: > 200 °C
Thermal decomposition	: > 200 °C
Flash point	: > 200 °C Method: DIN 51758 (Pensky-Martens Closed Cup)
Vapour pressure	: < 0.01 Pa at 20 °C
Density	: 1.1 g/cm ³ at 25 °C
Water solubility	: at 20 °C Note: practically insoluble
Miscibility with water	: immiscible at 20 °C
Viscosity, dynamic	: 1,275 - 1,625 mPa.s at 25 °C

10. STABILITY AND REACTIVITY

Conditions to avoid	: Note: Take necessary action to avoid static electricity discharge.
Materials to avoid	: Strong acids and strong bases. Strong oxidizing agents.
Hazardous decomposition products	: Product will not decompose explosively. Carbon oxides. Burning produces obnoxious and toxic fumes.
Hazardous reactions	: Product as received will not present a dust explosion hazard. If cured material made using this product is to be machined, or sanded, a dust explosion hazard may be created. All dust generated should be removed as quickly as possible, preferably by the use of a vacuum cleaner.

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11. TOXICOLOGICAL INFORMATION

- Acute oral toxicity : LD50 rat
Dose: > 5,000 mg/kg
- Remarks: No adverse health effects expected, however large amounts may cause nausea and vomiting.
- Acute inhalation toxicity : Remarks: Where product is used in poorly ventilated areas, and/or in confined spaces and/or at elevated temperatures, vapours may be irritating to the respiratory system.
- Eye irritation : irritating
rabbit
- Skin irritation : irritating
rabbit
dermal
- Sensitization : Causes sensitization.
guinea pig
dermal
- Further information : Chronic exposure: Product is a skin sensitizer. Repeated or prolonged skin contact may result in allergic contact dermatitis.

12. ECOLOGICAL INFORMATION**Elimination information (persistence and degradability)**

- Biodegradability : Result: Not readily biodegradable.

Ecotoxicity effects**Further information on ecology**

- Additional ecological information : Avoid subsoil penetration.
Prevent product from entering drains.
Do not contaminate surface water.

13. DISPOSAL CONSIDERATIONS

- Product : Spilt / waste material should be disposed of by incineration by an approved agent according to local regulations.
- Container : Empty containers should either be sent to an approved agent for cleaning and recycling or incineration according to local regulations.

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14. TRANSPORT INFORMATION**Land transport***Road/ADR:*

UN-No: 3082
Class: 9
Item: M6
Risk No.: 90
ADR/RID-Labels: 9
Proper shipping name: ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID,
N.O.S.
contains: BISPHENOL A EPOXY RESIN
contains: DIISOPROPYLNAPHTHALENE ISOMERS

HAZCHEM-CODE: 2X*Rail/RID:*

UN-No: 3082
Class: 9
Item: M6
Risk No.: 90
ADR/RID-Labels: 9
Proper shipping name: ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID,
N.O.S.
contains: BISPHENOL A EPOXY RESIN
contains: DIISOPROPYLNAPHTHALENE ISOMERS

Sea transport*IMDG:*

UN-No: 3082
Class: 9
Packaging group: III
ADR/RID-Labels: 9
MFAG:
EmS: F-A S-F
Proper shipping name: ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID,
N.O.S.
contains: (BISPHENOL A EPOXY RESIN)
contains: (DIISOPROPYLNAPHTHALENE ISOMERS)
MARINE POLLUTANT

Air transport*IATA-DGR:*

UN/ID No.: UN 3082
Class: 9
Packaging group: III

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Packing instruction (cargo aircraft): 914
 ADR/RID-Labels: 9
 Proper shipping name: ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S.
 contains: (BISPHENOL A EPOXY RESIN)
 contains: (DIISOPROPYLNAPHTHALENE ISOMERS)

15. REGULATORY INFORMATION**Labelling according to EEC Directive**

Labelling required

Symbol(s):	: Xi N	Irritant Dangerous for the environment
R-phrases(s)	: R36/38 R43 R51/53	Irritating to eyes and skin. May cause sensitization by skin contact. Toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment.
S-phrases(s)	: S28 S36/37/39 S61	After contact with skin, wash immediately with plenty of soap and water. Wear suitable protective clothing, gloves and eye/face protection. Avoid release to the environment. Refer to special instructions/safety data sheets.
Exceptional labelling of special preparations	: Contains epoxy constituents. See information supplied by the manufacturer.	
Hazardous components which must be listed on the label	: reaction product: bisphenol A-(epichlorhydrin); epoxy resin (number average molecular weight < 700)	

National legislation**Notification status**

: EINECS yes
 : TSCA yes
 : DSL yes

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- : AICS yes
- : KECI (KR) yes
- : ENCS (JP) yes
- : INV (CN) yes
- : PICCS (PH) yes

16. OTHER INFORMATION

All information is based on results gained from experience and tests and is believed to be accurate but is given without acceptance of liability for loss or damage attributable to reliance thereon as conditions of use lie outside our control. Users should always carry out sufficient tests to establish the suitability of any products for their intended applications. No statements shall be incorporated in any contract unless expressly agreed in writing nor construed as recommending the use of any product in conflict of any patent. All goods are supplied subject to Huntsman Advanced Materials General Conditions of Sale.

CONTACT POINT:

EH&S MANAGER

TELEPHONE: +61 3 9361 6062

FACSIMILE: +61 3 9361 6095