

#### **MATERIAL SAFETY DATA SHEET**

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

#### 1.1 Product identifier

Product name. Urethane Clear topcoat part A

#### 1.2 Recommended use and restriction on use Floor Coating

General use Do not use except to purpose

Restriction on Use

#### 1.3 Details of the supplier of the safety data sheet

Ultra epoxy,Corp 1201 Ave H, Grand Prairie, TX 75050 214-753-4423

#### 1.4 Emergency telephone number

214-753-4423

#### **SECTION 2: Hazards identification**

#### 2.1 GHS classification

Physical hazards Flammable liquids: 3 Health hazards Acute toxicity(dermal): 4

Skin corrosion/irritation:2

Serious eye damage/eye irritation: 2A

Skin sensitization: 1

Environmental Hazardous to the aqutic hazards

environment: 2

#### 2.2 Label elements

GHS label elements, including precautionary statements Hazard symbols

Signal words Hazard statements







#### Danger

H226 Flammable liquid and vapor

H304 May be fatal if swallowed and enters airways.

H315 Causes skin irritation.

H319 Causes serious eye irritation.

H335 May cause respiratory irritation.

H373 May cause organ damage through prolonged or repeated exposure.

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Precautionary statements P210 Keep away from heat/sparks/open flames/hot surfaces. - No smoking.

Prevent P233 Keep container tightly closed P242 Use only non-sparking tools.

P243 Take precautions against static electricity. P260 Do not breathe (gas/mist/vapors/spray). P261 Avoid breathing (gas/mist/vapors/spray). P264 Wash hands thoroughly after handling.

P270 Do not eat, drink or smoke when using this product. P271 Handle only outdoors or in a well-ventilated area.

P280 Wear protective gloves/protective clothing/safety glasses/face protection.

Response P301+P310 If swallowed, seek medical attention immediately.

P302+P352 If on skin: Wash with plenty of soap and water.

P303+P361+P353 If on skin (or hair): Take off or remove all contaminated clothing.

Wash skin with water.

P304+P340 If inhaled: Move to fresh air and keep at rest in a position comfortable

for breathing.

P305+P351+P338 If in eyes: Rinse cautiously with water for several minutes.

If possible, remove contact lenses.

P312 If you feel uncomfortable, consult a medical institution (doctor).

P321 Give necessary first aid.

P332+P313 If skin irritation occurs: Get medical advice/attention. P337+P313 If eye irritation persists: Get medical advice/attention. P362 Take off contaminated clothing and wash before reuse. P370+P378 In case of fire, use a fire extinguisher to put out the fire.

P403+P233 Keep container tightly closed in a well-ventilated place.

P403+P235 Store in a well-ventilated place and keep at low temperature.

P405 Store in a locked storage location.

Disposal P501 Dispose of contents/container in accordance with

local/regional/national/international regulations.

#### **SECTION 3: Composition/information on ingredients**

Chemical name	Trade name and Synonyms	CAS No	Content (%)
1,6-Diisocyanatohexane homopolymer	POLY(HEXAMETHYLENE DIISOCYANATE)	28182-81-2	30-40
Hexamethylene diisocyanate	Hexamethylene di-isocyanate	822-06-0	0.1-0.2
1,4-Benzenedicarboxylic acid bis (2-ethylhexyl) ester	bis(2-ethylhexyl) terephthalate	6422-86-2	5-10
Solvent naphtha (petroleum), light arom.	-	64742-95-6	35-45
Dipropylene glycol dimethyl ether	Modified propylene glycol ether	111109-77-4	17-23

#### **SECTION 4: First aid measures**

Storage

General advice Seek medical advice or medical attention if condition persists.

A. Eye contact Flush eyes with plenty of water for at least 15 minutes.

Get urgent medical attention.

If eye irritation persists, seek medical advice/attention. If you are wearing contact lenses, remove them first.

do not rub your eyes

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B. Skin contact

Take off contaminated clothing and shoes and wash immediately with soap

and water for at least 15 minutes.

Wash contaminated clothing thoroughly before reuse.

Immediately seek medical attention from a medical institution (doctor).

If skin irritation occurs: Get medical advice/attention.

Wash thoroughly after handling.

If exposed to large amounts of vapor or mist, move to a place with fresh air.

Move to fresh air.

Take action as necessary.

If swallowed, seek medical attention immediately.

If the substance is ingested or inhaled, use the mouth-to-mouth method.

Please use appropriate respiratory medical equipment. If swallowed, rinse mouth. Don't try to make him vomit.

i swallowed, finse mouth. Don't try to make hii

Take action as necessary.

#### **SECTION 5: Firefighting measures**

A. Extinguish media

C. Inhalation

D. Swallowing

Suitable Unsuitable Water spray, Dry powder, Carbon-dioxide, Foam.

Do not use water jet as an extinguisher, as this will spread

the fire.

B. Specific hazards arising from the

chemical

In case of fire toxic rumes might be formed.

Heat, spark, fire can explosive

C. Fire-fighting equipment/instruction

Fire-fighter must standard protective equip,ent including flame retardant coat, helmet, with face shield,g;oves, rubber boots,& in enclosed spaces,SCBA. Withdraw immediately in case of rising sound from venting safety device or any discoloration of tanks due to fire. Move containers from dire area if you can do so without risk. For massive fire in cargo area,use unmanned hose holder or monitor nozzle,if possible. If not,withdraw and let fire burn out. Some of these materials, if spilled,may evaporlate leaving a flammableresidue. Cool containers exposed to flames with water until well after the fire is

out.

#### SECTION 6: Accidental release measures

A. Personal precautions, protective equipment and emergency procedures

B. Evironmental precautions

Dust, fumes, gas, mist or vapor, Avoid inhalation of spray.

Wipe spills immediately that, protection protest Follow precautions.

Please remove all sources of ignition

If you do not risk a leak, stop it

Without appropriate protective clothing Do not touch damaged containers or

spills

There is no leak at the front of the fire protection of beams arc vapor Wear

Please stop the spread by covering it with plastic sheets

Prevent formation of dust

Please note that to avoid substances and conditions

Avoid release to the environment.

Waterways, sewers, basements, please avoid entering into a confined space

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C. Methods and materials for containment and cleaning up

Embankments built for the digestion of water collection please. Inert material (eg dry sand or earth), and to absorb spill, chemical waste, put it in a container.

Moisten with water to remove dust and prevent scattering follow.

To absorb the liquid detergent and wash contaminated area in the press.

When large amounts of liquid spills and leaks by far Make a ditch Clean spillage collected using explosion-proof tools and follow a loosely

covered plastic container and add

A shovel to clean spillage clean, dry container containing a loosely closed containers from spill area after the turn to move

Leak powder to prevent the spread by covering it with plastic sheeting to keep dry, please

Small spills on sand, non-combustible material to absorb and container fence to follow

Handling / storage please use caution.

Open your carefully before opening the cap.

Long-term or continuous skin contact barricade.

Please note that to avoid substances and conditions

Please pay attention to high-temperature Disposal according to local regulations

#### SECTION 7: Handling and storage

A. Precautions for safe handling

Read and understand all safety precautions before you Do not handle.

Dust, fumes, gas, mist or vapor Avoid inhalation of spray.

Wash hands thoroughly after handling.

When using this product, eat, drink or Do not breathe.

A well-ventilated area or outdoors Please treat.

Workplace Do not export out of the contaminated clothing.

Pressure or, cut, or welding, soldering, bonding, drilling, grinding or heat, uncovered, flames, sparks, static electricity or other sources of ignition Do not expose to.

Product containers have been emptied of debris may remain after all MSDS / label precautions Follow.

Handling / storage please use caution.

Open your carefully before opening the cap.

Long-term or continuous skin contact barricade.

Please note that to avoid substances and conditions

Please pay attention to high-temperature

B. Conditions for safe storage

Do not use damaged containers.

Check periodically for leaks.

Do not apply heat directly.

Keep away from heat, sparks, open flames and high temperatures -

No smoking, no fire, please collect in an airtight container.

Be aware of substances and conditions to avoid.

Store away from water supplies and sewers.

Store container tightly closed in a well-ventilated place.

Store in a well-ventilated place and keep at low temperature.

Avoid static electricity and store away from heat sources such as

boilers or combustibles.

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### SECTION 8: Exposure controls/personal protection

A.Exposures limit value, biological limit value etc

Composition	Domestic Provision	ACGIH Provision	
1,6-Diisocyanatohexane homopolymer	No data	No data	
Hexamethylene diisocyanate	TWA: 0.034 mg/m3 (0.005 ppm)	TWA : 0.005 ppm	
1,4-Benzenedicarboxylic acid bis (2-ethylhexyl) ester	No data	No data	
Solvent naphtha (petroleum), light arom.	No data	No data	
Dipropylene glycol dimethyl ether	TWA : 20 ppm	TWA : 20 ppm	

B. Approriate engineering controls

Process isolation, local exhaust, or air to adjust to levels below the exposure guidelines go for the other engineering controls.

During operation of dust, fume or mist occurs, the air pollution please ventilation

to maintain exposures below occupational limits

Store or use this material, washing facilities and safety shower facility below to install.

C. Individual protection measures Respiratory protection

Under conditions of frequent use or heavy exposure, respiratory protection may be needed

Respiratory protection is ranked in order from minimum to maximum.

Keep Consider warning properties before use. Respirator (direct type small, organic gas)

Any chemical cartridge respirator (full facepiece and an organic vapor

canister)

Any air-purifying respirator (full facepiece and an organic vapor canister) For Unknown Concentrations or Immediately Dangerous to Life or Health if: Any supplied-air respirator (compound airline mask), air respirator with

a full facepiece

Eye/face protection

Protection from non-hazardous liquid products or Wear safety glasses. Wash facilities and emergency workshop near three facilities

(shower type) Keep installed.

Wear appropriate chemical resistant gloves.

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#### **SECTION 9: Physical and chemical properties**

A. Appearance

Physical state Liquid color Clear

B. Odour Not available D. pH Not available E. Boiling point Not available F. Melting point Not available G. Freezing point Not available H. Flash point > 32 °C (89 °F) I. SP.Gr Not available J. Viscosity Not available K. Viper density Not available L. Viper pressure Not available M. Solubility Insoluble N. Explotion limits in air Not available O. specific gravity  $1.0 \pm 0.05$  (Water :1)

#### SECTION 10: Stability and reactivity

Skin protection

A. Stability & hazardous Stable under recommended storage and handling.

reaction potential Containers may explode when heated.

In case of fire, irritating, corrosive and toxic gases may be generated.

Flammable liquids and vapors

B. Condition to avoid Keep away from heat, sparks, open flames and high temperatures.

-No smoking. Avoid incompatible substances and conditions.

C. Incompatible materials combustible material

Avoid incompatible substances and conditions.

D. Hazardous decomposition Irritating, toxic gas

products Irritating and extremely harmful due to thermal decomposition or combustion

during burning. Toxic gases may be generated

#### **SECTION 11: Toxicological information**

\*Information on likely May cause irritation, nausea, vomiting, and headache.

route of exposure Causes serious eye irritation.

May cause irritation (sometimes severe).

A. Information on healthy hazards

Acute oral toxicity

1,6-Diisocyanatohexane homopolymer LD50 > 2500 mg/kg(Rat) Hexamethylene diisocyanate LD50 746 mg/kg Rat

1,4-Benzenedicarboxylic acid bis No data

(2-ethylhexyl) ester

Solvent naphtha (petroleum), light arom. LD50(Rat):>5000mg/kg(IUCLID)

Dipropylene glycol dimethyl ether LD50, Rat, 3,300 mg/kg

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#### **Transcutaneous**

1,6-Diisocyanatohexane homopolymer LD50 > 2000 mg/kg(Rat)
Hexamethylene diisocyanate LD50 559 mg/kg Rabbit

1,4-Benzenedicarboxylic acid bis No data

(2-ethylhexyl) ester

Solvent naphtha (petroleum), light arom. LD50(Rabbit):>2000mg/kg (IUCLID)

Dipropylene glycol dimethyl ether LD50, Rat, > 2,000 mg/kg

Inhalation

1,6-Diisocyanatohexane homopolymer LC50 390~453 mg/kg, 4 hr, Rat LC50 0.124 mg/L (124 mg/m³ 4hr) Rat

1,4-Benzenedicarboxylic acid bis No data

(2-ethylhexyl) ester

Solvent naphtha (petroleum), light arom. LC50(Rat):5.2mg/L (IUCLID)
Dipropylene glycol dimethyl ether LC50, Rat, 4 h, vapor, > 5.25 mg/l

Skin corrosion or irritation

1,6-Diisocyanatohexane homopolymer Prolonged skin contact may cause temporary irritation.

Hexamethylene diisocyanate Rabbits: Corrosive to skin.

1,4-Benzenedicarboxylic acid bis Causes mild irritation in humans upon occasional skin exposure.

(2-ethylhexyl) ester

Solvent naphtha (petroleum), light arom. May cause irritation.

Dipropylene glycol dimethyl ether No irritation.

Serious eye damage or irritation

1,6-Diisocyanatohexane homopolymer Direct eye contact may cause temporary irritation.

Hexamethylene diisocyanate Rabbit: Causes eye irritation.

1,4-Benzenedicarboxylic acid bis No data

(2-ethylhexyl) ester

Solvent naphtha (petroleum), light arom. Slightly to moderately irritating.

Dipropylene glycol dimethyl ether a little irritation

**Respiratory sensitization** 

1,6-Diisocyanatohexane homopolymer

Hexamethylene diisocyanate

Not a respiratory sensitizer

Rabbit, causes sensitization.

1,4-Benzenedicarboxylic acid bis No data

(2-ethylhexyl) ester

Solvent naphtha (petroleum), light arom. Not applicable

Dipropylene glycol dimethyl ether No data

Skin sensitization

1,6-Diisocyanatohexane homopolymer

Hexamethylene diisocyanate

Not considered to cause skin sensitization.

Guinea pigs, sensitized at 1.0% concentration.

1,4-Benzenedicarboxylic acid bis No data

(2-ethylhexyl) ester

Solvent naphtha (petroleum), light arom.

Not applicable

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Carcinogenicity	IARC	OSHA	ACGIH	NTP	EU CLP
1,6-Diisocyanatohexane homopolymer Hexamethylene diisocyanate 1,4-Benzenedicarboxylic acid bis	Not applicable Not applicable No data		Not applicable Not applicable No data		Not applicable Not applicable Not applicable
(2-ethylhexyl) ester Solvent naphtha (petroleum), light arom. Dipropylene glycol dimethyl ether	Not applicable No data	Not applicable No data	Not applicable No data	Not applicable No data	Not applicable Not applicable

### **SECTION 12: Ecological information**

#### A. Aquatic/terrarium toxicity

**Fishes** 

1,6-Diisocyanatohexane homopolymer LCL0, > 100 mg/l, 96 h (Pisces)

Hexamethylene diisocyanate LC0 Danio rerio ≥82.8 mg/L 96h (ECHA)

No data

1,4-Benzenedicarboxylic acid bis (2-ethylhexyl) ester

Solvent naphtha (petroleum), light arom.

Dipropylene glycol dimethyl ether

LC50=9.22mg/l, 96h, Oncorhynchus mykiss

LC50/EC50/EL50/LL50>100mg/L

Crustacea

1,6-Diisocyanatohexane homopolymer

Hexamethylene diisocyanate

1,4-Benzenedicarboxylic acid bis

(2-ethylhexyl) ester

Solvent naphtha (petroleum), light arom.

Dipropylene glycol dimethyl ether

EC50 >= 89.1 mg/  $\ell$  48 hr (NITE) No data

LC50, 127 mg/l, 48 h (Water flea)

No data

LC50,(Water flea), 24 h, > 1,000 mg/l

**Birds** 

1,6-Diisocyanatohexane homopolymer

Hexamethylene diisocyanate

1,4-Benzenedicarboxylic acid bis

(2-ethylhexyl) ester

Solvent naphtha (petroleum), light arom.

Dipropylene glycol dimethyl ether

EC50 > 1000 mg/l, 72, (Algae) EC50 >77.4 mg/ \ell 72 hr (ECHA)

No data

No data

No data

B. Persistence and degradability

Persistence

1,6-Diisocyanatohexane homopolymer

Hexamethylene diisocyanate

1,4-Benzenedicarboxylic acid bis

(2-ethylhexyl) ester

Solvent naphtha (petroleum), light arom.

Dipropylene glycol dimethyl ether

Degradability No data

Log Kow 9.81 (ECHA) log Kow 1.07 (ICSC)

log Kow = 8.390 (est, NLM: HSDB)

Oxidized by photochemical reaction in the presence of air

No data

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C. Bioaccumulative potential Accumulative potential

1,6-Diisocyanatohexane homopolymerNo dataHexamethylene diisocyanateNo data1,4-Benzenedicarboxylic acid bisNo data

(2-ethylhexyl) ester

Solvent naphtha (petroleum), light arom. Possible.

Dipropylene glycol dimethyl ether BCF<100 or Log Pow <3, low concentration potential.

Biodegradability

1,6-Diisocyanatohexane homopolymer 1%, 28d (O2 consumption), (ECHA)

Hexamethylene diisocyanate 42% 28 days, (ECHA)

1,4-Benzenedicarboxylic acid bis No data

(2-ethylhexyl) ester

Solvent naphtha (petroleum), light arom. No data

Dipropylene glycol dimethyl ether 18~32%, 28 days, OECD Test Guideline 301B

F. Mobility in soil

1,6-Diisocyanatohexane homopolymerNo dataHexamethylene diisocyanateNo data1,4-Benzenedicarboxylic acid bisKo = 870,000

(2-ethylhexyl) ester

Solvent naphtha (petroleum), light arom. No data
Dipropylene glycol dimethyl ether 0<Koc<50

G. Other adverse effect No data

#### **SECTION 13: Disposal considerations**

Waste is a mixture of two or more is specified, the process is difficult to A. Disposal methods

separate

In case of incineration or similar may be stabilized reduction Detachable water separation leading the way will be pre-treated

Will be incinerated

Keep high-temperature incineration.

Substances such as organic solvents, recycling and recovery of the

high-temperature incineration residues Keep

B. Disposal Considerations Operators to discharge industrial waste (industrial waste emitters) in the

workplace Themselves or waste treatment, waste disposal contractor, and others who regeneration of waste, waste treatment facilities, person who

establish and operate should be handled.

#### **SECTION 14: Transport information**

A. UN number 1263

B. UN Proper shipping name PAINT (including paint, lacquer, enamel, stain, shellac,

varnish, polish, liquid filler and liquid lacquer base)

C. Transport hazard class Class 3

D. Packing group

E. Environmental hazards Not available

In case of fire emergency F - E Emergency spill S - E

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### SECTION 15: Regulatory information

#### A. National and/or international regulatory information

POPs Management Law Not applicable

U.S. Federal regulations

**OSHA PROCESS SAFETY** Not applicable **CERCLA Section 103** Not applicable **EPCRA Section 302** Not applicable **EPCRA Section 304** Not applicable **EPCRA Section 313** Not applicable **Rotterdam Convention listed** Not applicable

ingredients

Stockholm Convention listed Not applicable

ingredients

Montreal Protocol listed Not applicable ingredients Not applicable

Information of EU Classification(Classification)

Information of EU Classification(Risk Phrases)

R36/38 Irritating to eyes and skin.

R43 May cause sensitization by skin contact.

R51/53 Toxic to aquatic life, long lasting in the aquatic environment

May cause adverse effects.

Information of EU Classification(Safety Phrase)

S2 Keep out of reach of children.

S24/25 Avoid contact with skin and eyes.

S37/39 Wear suitable protective gloves and eye/face protection

S61 Avoid release to the environment.

Refer to environment-related laws and health data

#### **SECTION 16: Other information**

A. The source of data

-The information contained herein is believed to be accurate. It is provided independently of any sale of the product for purpose of hazardcommunication.

It is not intended to constitute performance information concerning the product.

No express warranty, or implied warranty ofmerchantability or fitness for a particular purpose is made with respect to the product or the information contained herein.

- This Safety Data Sheet was compiled with data and information from the following sources: OSHA, NITE, ESIS, NLM, SIDS, IPCS

Hazardous Material Information System (HMIS):

Scale 0-4 NFPA HMIS

4=Severe Hazard Health: 2 3=Serious Hazard Flammability: 2 2=Moderate Hazard Reactivity: 0

1=Slight Hazard 0=Minimal Hazard

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 quaranteeing any specific property of the product.