

SAFETY DATA SHEET

1. Identification

Product identifier REDIPOXY Adhesive Part A

Other means of identification Not available.

Recommended use Adhesive.

Recommended restrictions None known.

Manufacturer / Importer / Supplier / Distributor information

Company NameTile Redi USA LLCAddress4450 NW 126th Ave

Coral Springs, FL 33065

Telephone (203) -393-0010
Contact person Steve Fine
Website www.tileredi.com

Emergency phone number Call CHEMTREC day or night

USA/Canada - 1.800.424.9300 Mexico - 1.800.681.9531 Outside USA/Canada 1.703.527.3887

2. Hazard(s) identification

Physical hazards Not classified.

Health hazards Skin corrosion/irritation Category 1B

Serious eye damage/eye irritation Category 1
Sensitization, skin Category 1

Specific target organ toxicity, single exposure Category 3 respiratory tract irritation

Category 3

Environmental hazards Hazardous to the aquatic environment, acute Category 3

hazard

Hazardous to the aquatic environment,

long-term hazard

Not classified.

Label elements

OSHA defined hazards



Signal word Danger

Hazard statement Causes severe skin burns and eye damage. May cause an allergic skin reaction. May cause

respiratory irritation. Harmful to aquatic life with long lasting effects.

Precautionary statement

PreventionUse only outdoors or in a well-ventilated area. Do not breathe mist or vapor. Wash thoroughly

after handling. Wear protective gloves/protective clothing/eye protection/face protection. Contaminated work clothing should not be allowed out of the workplace. Avoid release to the

environment.

Response If swallowed: Rinse mouth. Do NOT induce vomiting. If on skin (or hair): Take off immediately all

contaminated clothing. Rinse skin with water/shower. If skin irritation or rash occurs: Get medical advice/attention. Wash contaminated clothing before reuse. If inhaled: Remove person to fresh air and keep comfortable for breathing. Immediately call a poison center/doctor. If in eyes: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do.

Continue rinsing.

Storage Store in a well-ventilated place. Keep container tightly closed. Store locked up.

Disposal Dispose of contents/container in accordance with local/regional/national/international regulations.

Hazard(s) not otherwise

classified (HNOC)

Not classified.

3. Composition/information on ingredients

Mixtures

Chemical name	CAS number	%
Fatty acids, tall-oil, reaction products with tetraethylenepentamine	68953-36-6	70 - 75
Tetraethylene pentamine	112-57-2	8 - 10
2-Piperazin-1-ylethylamine	140-31-8	3 - 5
2,4,6-Tris-(dimethylaminometh yl)- phenol	90-72-2	1 - 3

Composition comments

All concentrations are in percent by weight unless ingredient is a gas. Gas concentrations are in percent by volume.

4. First-aid measures

Inhalation Remove victim to fresh air and keep at rest in a position comfortable for breathing. Get medical

attention if any discomfort continues.

Skin contactTake off immediately all contaminated clothing. Chemical burns must be treated by a physician.

Wash contaminated clothing before reuse. Get medical attention immediately.

Eye contact Immediately flush eyes with plenty of water for at least 15 minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Get medical attention immediately.

present and easy to do. Continue mising. Get medical attention immediately.

Rinse mouth. Do not induce vomiting. If vomiting occurs, keep head low so that stomach content doesn't get into the lungs. Get medical attention if any discomfort continues.

Most important symptoms/effects, acute and delayed

Ingestion

media

Rash. Corrosive effects. Symptoms may include stinging, tearing, redness, swelling, and blurred vision. Permanent eye damage including blindness could result.

Indication of immediate medical attention and special treatment needed

Provide general supportive measures and treat symptomatically. Symptoms may be delayed. Chemical burns: Flush with water immediately. While flushing, remove clothes which do not adhere to affected area. Call an ambulance. Continue flushing during transport to hospital.

treatment needed
General information

Ensure that medical personnel are aware of the material(s) involved, and take precautions to protect themselves.

5. Fire-fighting measures

Suitable extinguishing media Unsuitable extinguishing Alcohol resistant foam. Water fog. Dry chemical powder. Carbon dioxide (CO2).

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

Specific hazards arising from the chemical

Heating may cause the release of ammonia vapors.

Special protective equipment and precautions for firefighters

Self-contained breathing apparatus and full protective clothing must be worn in case of fire.

Fire-fighting equipment/instructions

General fire hazards

In case of fire and/or explosion do not breathe fumes. Move containers from fire area if you can do so without risk. Use water spray to cool unopened containers.

No unusual fire or explosion hazards noted.

6. Accidental release measures

Personal precautions, protective equipment and emergency procedures Keep unnecessary personnel away. Keep people away from and upwind of spill/leak. Wear appropriate protective equipment and clothing during clean-up. Do not touch damaged containers or spilled material unless wearing appropriate protective clothing. Ensure adequate ventilation. Local authorities should be advised if significant spillages cannot be contained.

Methods and materials for containment and cleaning up

Large Spills: Stop the flow of material, if this is without risk. Dike the spilled material, where this is possible. Absorb in vermiculite, dry sand or earth and place into containers. Following product recovery, flush area with water.

Small Spills: Wipe up with absorbent material (e.g. cloth, fleece). Clean surface thoroughly to remove residual contamination.

Environmental precautions

Never return spills in original containers for re-use. For waste disposal, see Section 13 of the SDS. Avoid release to the environment. Do not discharge into drains, water courses or onto the ground. Environmental manager must be informed of all major releases.

7. Handling and storage

Precautions for safe handling

Do not breathe mist or vapor. Do not get in eyes, on skin, on clothing. Persons susceptible for allergic reactions should not handle this product. Use with adequate ventilation. Wear appropriate personal protective equipment. Observe good industrial hygiene practices.

Keep container tightly closed. Store in a cool and well-ventilated place. Store away from incompatible materials (See Section 10).

8. Exposure controls/personal protection

Occupational exposure limits

US. Workplace Environmental Exposure Level (WEEL) Guides

Components	Туре	Value	Form	
Tetraethylene pentamine (CAS 112-57-2)	TWA	5 mg/m3	Aerosol.	
(5.15.1.2.1.2)		1 ppm	Aerosol.	

Biological limit values No biological exposure limits noted for the ingredient(s).

Exposure guidelines

US WEEL Guides: Skin designation

Tetraethylene pentamine (CAS 112-57-2)

Can be absorbed through the skin.

Appropriate engineering

controls

Good general ventilation (typically 10 air changes per hour) should be used. Ventilation rates should be matched to conditions. If applicable, use process enclosures, local exhaust ventilation, or other engineering controls to maintain airborne levels below recommended exposure limits. If exposure limits have not been established, maintain airborne levels to an acceptable level. Provide eyewash station.

Individual protection measures, such as personal protective equipment

Eye/face protection Wear safety glasses with side shields (or goggles). Face-shield. Wear a full-face respirator, if

needed.

Skin protection

Hand protectionOtherWear appropriate chemical resistant gloves.Wear appropriate chemical resistant clothing.

Respiratory protection In case of insufficient ventilation, wear suitable respiratory equipment.

Thermal hazards Wear appropriate thermal protective clothing, when necessary.

General hygiene considerations

Always observe good personal hygiene measures, such as washing after handling the material and before eating, drinking, and/or smoking. Routinely wash work clothing and protective

equipment to remove contaminants.

9. Physical and chemical properties

Appearance Viscous liquid.

Physical state
Form
Color
Color
Amber.

Odor
Ammonia.

Odor threshold
PH
Not applicable
Melting point/freezing point
Initial boiling point and boiling
Not available.

range

Flash point Non flammable.

Evaporation rate Not applicable

Flammability (solid, gas) Not available.

Upper/lower flammability or explosive limits

Flammability limit - lower

(%)

Not available.

Flammability limit - upper

(%)

Not available.

Explosive limit - lower (%) Not available.

Explosive limit - upper (%) Not available.

Vapor pressure Not applicable.

Vapor density Not applicable

Relative density 0.99

Solubility(ies)

Solubility (water) Insoluble

Partition coefficient Not available.

(n-octanol/water)

Not available. **Auto-ignition temperature Decomposition** temperature Not available. **Viscosity** Not available.

10. Stability and reactivity

Reactivity The product is stable and non-reactive under normal conditions of use, storage and transport.

Chemical stability Material is stable under normal conditions.

Possibility of hazardous

reactions

No dangerous reaction known under conditions of normal use.

Conditions to avoid Heat, flames and sparks. Contact with incompatible materials.

Incompatible materials Alkaline metals. Oxidizing agents. Strong acids.

Hazardous decomposition

products

Carbon dioxide (CO2). Carbon monoxide. Nitrogen oxides.

11. Toxicological information

Information on likely routes of exposure

Ingestion May cause burns of the gastrointestinal tract if swallowed.

Inhalation May cause respiratory irritation.

Causes skin burns. May cause an allergic skin reaction. Skin contact

Causes serious eye damage. Eve contact

Symptoms related to the physical, chemical and toxicological characteristics Rash. Corrosive effects. Symptoms may include stinging, tearing, redness, swelling, and blurred

vision. Permanent eye damage including blindness could result.

Information on toxicological effects

Acute toxicity May cause discomfort if swallowed.

Test Results Components **Species**

2-Piperazin-1-ylethylamine (CAS 140-31-8)

Acute

Dermal

LD50 Rabbit 880 mg/kg

Fatty acids, tall-oil, reaction products with tetraethylenepentamine (CAS 68953-36-6)

Acute Oral

LD50 Rat > 2000 mg/kg

Tetraethylene pentamine (CAS 112-57-2)

Acute

Dermal

Rabbit LD50 0.66 g/kg

Oral

LD50 Rat 2.1 g/kg

Skin corrosion/irritation Causes severe skin burns and eye damage.

Serious eye damage/eye

Causes serious eye damage.

irritation

Respiratory or skin sensitization

Respiratory sensitization No data available.

Skin sensitization May cause an allergic skin reaction.

No data available to indicate product or any components present at greater than 0.1% are Germ cell mutagenicity

mutagenic or genotoxic.

This product is not considered to be a carcinogen by IARC, ACGIH, NTP, or OSHA. Carcinogenicity

Reproductive toxicity Not classified.

Specific target organ toxicity -

single exposure

May cause respiratory irritation.

Specific target organ toxicity -

repeated exposure

No data available.

Aspiration hazard Not classified.

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Chronic effects No data available.

12. Ecological information

Ecotoxicity Harmful to aquatic life with long lasting effects.

Components Species Test Results

2-Piperazin-1-ylethylamine (CAS 140-31-8)

Aquatic

Fish LC50 Fathead minnow (Pimephales promelas) 1950 - 2460 mg/l, 96 hours

Persistence and degradability No data is available on the degradability of this product.

Bioaccumulative potential

Partition coefficient n-octanol / water (log Kow)

Tetraethylene pentamine (CAS 112-57-2) 1.503

Mobility in soil Not available.

Other adverse effects No other adverse environmental effects (e.g. ozone depletion, photochemical ozone creation

potential, endocrine disruption, global warming potential) are expected from this component.

13. Disposal considerations

Disposal instructionsCollect and reclaim or dispose in sealed containers at licensed waste disposal site. This material

and its container must be disposed of as hazardous waste. Do not allow this material to drain into sewers/water supplies. Do not contaminate ponds, waterways or ditches with chemical or used container. Dispose of contents/container in accordance with local/regional/national/international

regulations.

Hazardous waste code The waste code should be assigned in discussion between the user, the producer and the waste

disposal company.

Waste from residues / unused

products

Dispose of in accordance with local regulations. Empty containers or liners may retain some product residues. This material and its container must be disposed of in a safe manner (see:

Disposal instructions).

Contaminated packaging Empty containers should be taken to an approved waste handling site for recycling or disposal.

Since emptied containers may retain product residue, follow label warnings even after container is

emptied.

14. Transport information

DOT

UN number UN2735

UN proper shipping name

Transport hazard class(es)

Amines, liquid, corrosive, n.o.s. (Tetraethylene pentamine, 2-Piperazin-1-ylethylamine)

Class 8
Subsidiary risk Packing group III
Environmental hazards

nvironmentai nazards

Marine pollutant No

Special precautions for user Read safety instructions, SDS and emergency procedures before handling.

Special provisions IB3, T7, TP1, TP28

Packaging exceptions 154
Packaging non bulk 203
Packaging bulk 241

IATA

UN number UN2735

UN proper shipping name Amines, liquid, corrosive, n.o.s. (Tetraethylene pentamine, 2-Piperazin-1-ylethylamine)

Transport hazard class(es)

 Class
 8

 Subsidiary risk

 Label(s)
 8

 Packing group
 III

 Environmental hazards
 No

 ERG Code
 8L

Special precautions for user Read safety instructions, SDS and emergency procedures before handling.

IMDG

UN number UN2735

UN proper shipping name Transport hazard class(es) AMINES, LIQUID, CORROSIVE, N.O.S. (Tetraethylene pentamine, 2-Piperazin-1-ylethylamine)

Class 8 Subsidiary risk -

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Label(s) 8
Packing group

Environmental hazards

Marine pollutant No F-A, S-B

Special precautions for user Read safety instructions, SDS and emergency procedures before handling.

Transport in bulk according to Annex II of MARPOL 73/78 and

This substance/mixture is not intended to be transported in bulk.

the IBC Code

Further information IATA classification is not relevant as the material is not transported by air.

15. Regulatory information

US federal regulations This product is a "Hazardous Chemical" as defined by the OSHA Hazard Communication

Standard, 29 CFR 1910.1200.

TSCA Section 12(b) Export Notification (40 CFR 707, Subpt. D)

Not regulated.

US. OSHA Specifically Regulated Substances (29 CFR 1910.1001-1050)

Not listed

CERCLA Hazardous Substance List (40 CFR 302.4)

Not listed.

Superfund Amendments and Reauthorization Act of 1986 (SARA)

Hazard categories Immediate Hazard - Yes

Delayed Hazard - Yes Fire Hazard - No Pressure Hazard - No Reactivity Hazard - No

SARA 302 Extremely hazardous substance

Not listed.

SARA 311/312 Hazardous

chemical

SARA 313 (TRI reporting)

Not regulated.

Other federal regulations

Clean Air Act (CAA) Section 112 Hazardous Air Pollutants (HAPs) List

Yes

Not regulated.

Clean Air Act (CAA) Section 112(r) Accidental Release Prevention (40 CFR 68.130)

Not regulated.

Safe Drinking Water Act

(SDWA)

Not regulated.

US state regulations California Safe Drinking Water and Toxic Enforcement Act of 1986 (Proposition 65): This material

is not known to contain any chemicals currently listed as carcinogens or reproductive toxins.

US. Massachusetts RTK - Substance List

2-Piperazin-1-ylethylamine (CAS 140-31-8) Tetraethylene pentamine (CAS 112-57-2)

US. New Jersey Worker and Community Right-to-Know Act

2-Piperazin-1-ylethylamine (CAS 140-31-8) Tetraethylene pentamine (CAS 112-57-2)

US. Pennsylvania Worker and Community Right-to-Know Law

2-Piperazin-1-ylethylamine (CAS 140-31-8) Tetraethylene pentamine (CAS 112-57-2)

US. Rhode Island RTK

Not regulated.

US. California Proposition 65

California Safe Drinking Water and Toxic Enforcement Act of 1986 (Proposition 65): This material is not known to contain any chemicals currently listed as carcinogens or reproductive toxins.

US - California Proposition 65 - Carcinogens & Reproductive Toxicity (CRT): Listed substance

Not listed.

International Inventories

Country(s) or region	Inventory name	On inventory (yes/no)*
Australia	Australian Inventory of Chemical Substances (AICS)	Yes
Canada	Domestic Substances List (DSL)	Yes
Canada	Non-Domestic Substances List (NDSL)	No
China	Inventory of Existing Chemical Substances in China (IECSC)	Yes
Europe	European Inventory of Existing Commercial Chemical Substances (EINECS)	Yes
Europe	European List of Notified Chemical Substances (ELINCS)	No
Japan	Inventory of Existing and New Chemical Substances (ENCS)	Yes
Korea	Existing Chemicals List (ECL)	Yes
New Zealand	New Zealand Inventory	Yes
Philippines	Philippine Inventory of Chemicals and Chemical Substances (PICCS)	Yes

United States & Puerto Rico Toxic Substances Control Act (TSCA) Inventory

16. Other information, including date of preparation or last revision

Issue date25-November-2013Revision date25-November-2013

Version # 02

NFPA Ratings



References HSDB® - Hazardous Substances Data Bank

Registry of Toxic Effects of Chemical Substances (RTECS)

Disclaimer The information in this (M)SDS was obtained from sources which we believe are reliable but

cannot guarantee. Additionally, your use of this information is beyond our control and may be beyond our knowledge. Therefore, the information is provided without any representation or

warranty express or implied.

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Yes

^{*}A "Yes" indicates this product complies with the inventory requirements administered by the governing country(s).

A "No" indicates that one or more components of the product are not listed or exempt from listing on the inventory administered by the governing country(s).



SAFETY DATA SHEET

1. Identification

Product identifier REDIPOXY Adhesive Part B

Other means of identification Not available.

Recommended use Adhesive.

Recommended restrictions None known.

Manufacturer / Importer / Supplier / Distributor information

Company Name
Tile Redi USA LLC
4450 NW 126th Ave
Coral Springs, FL 33065

Telephone (203) - 393-0010 Contact person Steve Fine

Website www.tileredi.com

Emergency phone number Call CHEMTREC day or night

USA/Canada - 1.800.424.9300 Mexico - 1.800.681.9531 Outside USA/Canada 1.703.527.3887

2. Hazard(s) identification

Physical hazards Not classified.

Health hazards Skin corrosion/irritation Category 2

Serious eye damage/eye irritation Category 2B
Sensitization, skin Category 1
Hazardous to the aquatic environment, acute Category 2

hazard

nazard

Hazaru

Hazardous to the aquatic environment, long-term hazard

Category 2

OSHA defined hazards Not classified.

Label elements

Environmental hazards



Signal word Warning

Hazard statement Causes skin irritation. Causes serious eye irritation. May cause an allergic skin reaction. Toxic to

aquatic life with long lasting effects.

Precautionary statement

Prevention Avoid breathing dust/fume/gas/mist/vapors/spray. Wash thoroughly after handling. Contaminated

work clothing should not be allowed out of the workplace. Wear protective gloves and eye/face

protection. Avoid release to the environment.

Response If on skin: Wash with plenty of water. If skin irritation or rash occurs: Get medical advice/attention.

Take off contaminated clothing and wash it before reuse. If in eyes: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. If eye

irritation persists: Get medical advice/attention. Collect spillage.

Storage Store away from incompatible materials.

Disposal Dispose of contents/container in accordance with local/regional/national/international regulations.

Hazard(s) not otherwise

classified (HNOC)

Not classified.

3. Composition/information on ingredients

Mixtures

 Chemical name
 CAS number
 %

 Propane,
 25085-99-8
 64-75

2,2-bis[p-(2,3-epoxypropoxy)ph

enyl]-, polymers

REDIPOXY Adhesive Part B SDS US

917048 Version #: 01 Revision date: - Issue date: 10-March-2014

Reaction product: Bisphenol 28064-14-4 14-25 F-(epichlorohydrin); epoxy Alkyl(C12-14) glycidyl ether 68609-97-2 9-15

Composition comments

All concentrations are in percent by weight unless ingredient is a gas. Gas concentrations are in percent by volume.

4. First-aid measures

Move to fresh air. Call a physician if symptoms develop or persist. Inhalation

Remove contaminated clothing immediately and wash skin with soap and water. In case of Skin contact

eczema or other skin disorders: Seek medical attention and take along these instructions.

Immediately flush eyes with plenty of water for at least 15 minutes. Remove contact lenses, if Eye contact

present and easy to do. Continue rinsing. Get medical attention if irritation develops and persists.

Rinse mouth. Get medical attention if symptoms occur. Ingestion Rash. Irritant effects.

Most important

symptoms/effects, acute and

delayed

Indication of immediate medical attention and special Provide general supportive measures and treat symptomatically. Symptoms may be delayed.

treatment needed General information

Ensure that medical personnel are aware of the material(s) involved, and take precautions to protect themselves. If you feel unwell, seek medical advice (show the label where possible). Wash contaminated clothing before reuse.

5. Fire-fighting measures

Suitable extinguishing media

Unsuitable extinguishing media

Water fog. Foam. Dry chemical powder. Carbon dioxide (CO2). Do not use water jet as an extinguisher, as this will spread the fire.

During fire, gases hazardous to health may be formed.

Specific hazards arising from the chemical

Special protective equipment

Self-contained breathing apparatus and full protective clothing must be worn in case of fire.

and precautions for firefighters Fire-fighting

In case of fire and/or explosion do not breathe fumes. Move containers from fire area if you can do so without risk.

General fire hazards No unusual fire or explosion hazards noted.

6. Accidental release measures

Personal precautions, protective equipment and emergency procedures

equipment/instructions

Keep unnecessary personnel away. Wear appropriate protective equipment and clothing during clean-up. Do not touch damaged containers or spilled material unless wearing appropriate protective clothing. Ensure adequate ventilation. Local authorities should be advised if significant spillages cannot be contained.

Methods and materials for containment and cleaning up Large Spills: Stop the flow of material, if this is without risk. Absorb in vermiculite, dry sand or earth and place into containers. Following product recovery, flush area with water.

Small Spills: Wipe up with absorbent material (e.g. cloth, fleece). Clean surface thoroughly to remove residual contamination.

Environmental precautions

Never return spills in original containers for re-use. For waste disposal, see Section 13 of the SDS. Avoid release to the environment. Contact local authorities in case of spillage to drain/aquatic environment. Prevent further leakage or spillage if safe to do so. Do not contaminate water. Avoid discharge into drains, water courses or onto the ground. Environmental manager must be informed

7. Handling and storage

Precautions for safe handling

Avoid breathing mist or vapor. Avoid contact with eyes, skin, and clothing. Persons with epoxy allergy should not work with this product. Wear appropriate personal protective equipment. Provide adequate ventilation. Observe good industrial hygiene practices.

Conditions for safe storage, including any incompatibilities

Keep container tightly closed. Store in a well-ventilated place. Store away from incompatible materials (See Section 10).

8. Exposure controls/personal protection

Occupational exposure limits

No exposure limits noted for ingredient(s).

No biological exposure limits noted for the ingredient(s). **Biological limit values**

of all releases.

Appropriate engineering

controls

Good general ventilation (typically 10 air changes per hour) should be used. Ventilation rates should be matched to conditions. If applicable, use process enclosures, local exhaust ventilation, or other engineering controls to maintain airborne levels below recommended exposure limits. If exposure limits have not been established, maintain airborne levels to an acceptable level. Provide evewash station.

Individual protection measures, such as personal protective equipment

Wear safety glasses with side shields (or goggles). Eye/face protection

Skin protection

Hand protection Wear appropriate chemical resistant gloves. Other Wear appropriate chemical resistant clothing.

In case of insufficient ventilation, wear suitable respiratory equipment. Respiratory protection

Thermal hazards Wear appropriate thermal protective clothing, when necessary.

Always observe good personal hygiene measures, such as washing after handling the material General hygiene and before eating, drinking, and/or smoking. Routinely wash work clothing and protective considerations

equipment to remove contaminants.

9. Physical and chemical properties

Off-white liquid. **Appearance**

Physical state Liquid.

Form Viscous liquid. Color Off-white. Odor Not available. **Odor threshold** Not available. Not available. рН Not available. Melting point/freezing point Initial boiling point and boiling Not available.

range

Non flammable. Flash point Not available. **Evaporation rate** Flammability (solid, gas) Not available. Upper/lower flammability or explosive limits

Flammability limit - lower

Not available.

Flammability limit - upper

Not available.

Explosive limit - lower (%) Not available. Not available. Explosive limit - upper (%) Vapor pressure Not available. Not available. Vapor density

Relative density 1.1

Solubility(ies)

Solubility (water) Insoluble Partition coefficient Not available.

(n-octanol/water)

Viscosity

Auto-ignition temperature

Not available. Decomposition temperature Not available.

Not available.

10. Stability and reactivity

Reactivity The product is stable and non-reactive under normal conditions of use, storage and transport.

Chemical stability Material is stable under normal conditions.

Possibility of hazardous Masses of more than 1 pound of product plus an aliphatic amine will cause irreversible

polymerization with considerable heat build up. reactions

Conditions to avoid Excessive heat. Contact with incompatible materials.

Incompatible materials Strong oxidizing agents.

Hazardous decomposition At thermal decomposition temperatures, carbon monoxide and carbon dioxide. Aldehydes.

products

REDIPOXY Adhesive Part B SDS US

917048 Version #: 01 Revision date: -Issue date: 10-March-2014

11. Toxicological information

Information on likely routes of exposure

Ingestion May cause discomfort if swallowed.

InhalationNo adverse effects due to inhalation are expected.Skin contactIrritating to skin. May cause an allergic skin reaction.

Eye contact Irritating to eyes.

Symptoms related to the Rash. Irritant effects.

physical, chemical and toxicological characteristics

Information on toxicological effects

Acute toxicity May cause discomfort if swallowed.

Skin corrosion/irritation Causes skin irritation.

Serious eye damage/eye

irritation

Causes serious eye irritation.

Respiratory or skin sensitization

Respiratory sensitization No data available.

Skin sensitization May cause an allergic skin reaction.

Germ cell mutagenicity Not expected to be mutagenic.

Carcinogenicity This product is not considered to be a carcinogen by IARC, ACGIH, NTP, or OSHA.

Reproductive toxicityThis product is not expected to cause reproductive or developmental effects.

Specific target organ toxicity -

single exposure

No data available.

Specific target organ toxicity -

repeated exposure

No data available.

Aspiration hazard No data available.

Chronic effects Prolonged or repeated contact may cause drying, cracking, or irritation.

12. Ecological information

Ecotoxicity Toxic to aquatic life with long lasting effects.

Components Species Test Results

Propane, 2,2-bis[p-(2,3-epoxypropoxy)phenyl]-, polymers (CAS 25085-99-8)

Aquatic

Acute

 Algae
 IC50
 Algae
 11 mg/l, 72 hours

 Crustacea
 EC50
 Daphnia
 1.8 mg/l, 48 hours

 Fish
 LC50
 Fish
 1 - 10 mg/l

Reaction product: Bisphenol F-(epichlorohydrin); epoxy resin (CAS 28064-14-4)

Aquatic

Acute

Fish LC50 Fish 1 - 10 mg/l

Persistence and degradability

No data is available on the degradability of this product.

Bioaccumulative potential

No data available for this product.

Mobility in soil

Not available.

Other adverse effects

No other adverse environmental effects (e.g. ozone depletion, photochemical ozone creation potential, endocrine disruption, global warming potential) are expected from this component.

13. Disposal considerations

Disposal instructionsCollect and reclaim or dispose in sealed containers at licensed waste disposal site. This material

and its container must be disposed of as hazardous waste. Do not allow this material to drain into sewers/water supplies. Do not contaminate ponds, waterways or ditches with chemical or used container. Dispose of contents/container in accordance with local/regional/national/international

regulations.

Hazardous waste code

The waste code should be assigned in discussion between the user, the producer and the waste

disposal company.

Waste from residues / unused

products

Dispose of in accordance with local regulations. Empty containers or liners may retain some product residues. This material and its container must be disposed of in a safe manner (see: Disposal instructions).

REDIPOXY Adhesive Part B SDS US

917048 Version #: 01 Revision date: - Issue date: 10-March-2014

Since emptied containers may retain product residue, follow label warnings even after container is

emptied.

14. Transport information

DOT

UN number UN3082

UN proper shipping name Environmentally hazardous substance, liquid, n.o.s. (Propane,

2,2-bis[p-(2,3-epoxypropoxy)phenyl]-, polymers, Reaction product: Bisphenol F-(epichlorohydrin);

epoxy resin)

Transport hazard class(es)

Class 9
Subsidiary risk Packing group III
Environmental hazards

Marine pollutant Yes

Special precautions for user Read safety instructions, SDS and emergency procedures before handling.

Special provisions 8, 146, 335, IB3, T4, TP1, TP29

Packaging exceptions155Packaging non bulk203Packaging bulk241

IATA

UN number UN3082

UN proper shipping name Environmentally hazardous substance, liquid, n.o.s. (Propane,

2,2-bis[p-(2,3-epoxypropoxy)phenyl]-, polymers, Reaction product: Bisphenol F-(epichlorohydrin);

epoxy resin)

Transport hazard class(es)

Class 9
Subsidiary risk Label(s) 9
Packing group III
Environmental hazards Yes
ERG Code 9L

Special precautions for user Read safety instructions, SDS and emergency procedures before handling.

IMDG

UN number UN3082

UN proper shipping name Environmentally hazardous substance, liquid, n.o.s. (Propane,

2,2-bis[p-(2,3-epoxypropoxy)phenyl]-, polymers, Reaction product: Bisphenol F-(epichlorohydrin);

epoxy resin)

Transport hazard class(es)

Class 9
Subsidiary risk Label(s) 9
Packing group III
Environmental hazards

Marine pollutant Yes EmS F-A, S-F

Special precautions for user Read safety instructions, SDS and emergency procedures before handling.

Transport in bulk according to Annex II of MARPOL 73/78 and

the IBC Code

This substance/mixture is not intended to be transported in bulk.

Further information IATA classification is not relevant as the material is not transported by air.

15. Regulatory information

US federal regulations This product is a "Hazardous Chemical" as defined by the OSHA Hazard Communication

Standard, 29 CFR 1910.1200.

TSCA Section 12(b) Export Notification (40 CFR 707, Subpt. D)

Not regulated.

US. OSHA Specifically Regulated Substances (29 CFR 1910.1001-1050)

Not listed.

CERCLA Hazardous Substance List (40 CFR 302.4)

Not listed.

Superfund Amendments and Reauthorization Act of 1986 (SARA)

Hazard categories Immediate Hazard - Yes

Delayed Hazard - No Fire Hazard - No Pressure Hazard - No Reactivity Hazard - No

SARA 302 Extremely hazardous substance

Not listed.

SARA 311/312 Hazardous Yes

chemical

SARA 313 (TRI reporting)

Not regulated.

Other federal regulations

Clean Air Act (CAA) Section 112 Hazardous Air Pollutants (HAPs) List

Not regulated.

Clean Air Act (CAA) Section 112(r) Accidental Release Prevention (40 CFR 68.130)

Not regulated.

Safe Drinking Water Act

Not regulated.

(SDWA)

US state regulations This product does not contain a chemical known to the State of California to cause cancer birth

defects or other reproductive harm.

US. Massachusetts RTK - Substance List

Not regulated.

US. New Jersey Worker and Community Right-to-Know Act

Not listed

US. Pennsylvania Worker and Community Right-to-Know Law

Not listed.

US. Rhode Island RTK

Not regulated.

US. California Proposition 65

California Safe Drinking Water and Toxic Enforcement Act of 1986 (Proposition 65): This material is not known to contain any chemicals currently listed as carcinogens or reproductive toxins.

US - California Proposition 65 - Carcinogens & Reproductive Toxicity (CRT): Listed substance

Not listed.

International Inventories

Country(s) or region	Inventory name	On inventory (yes/no)*
Australia	Australian Inventory of Chemical Substances (AICS)	Yes
Canada	Domestic Substances List (DSL)	Yes
Canada	Non-Domestic Substances List (NDSL)	No
China	Inventory of Existing Chemical Substances in China (IECSC)	Yes
Europe	European Inventory of Existing Commercial Chemical Substances (EINECS)	Yes
Europe	European List of Notified Chemical Substances (ELINCS)	No
Japan	Inventory of Existing and New Chemical Substances (ENCS)	No
Korea	Existing Chemicals List (ECL)	Yes
New Zealand	New Zealand Inventory	Yes
Philippines	Philippine Inventory of Chemicals and Chemical Substances (PICCS)	Yes
United States & Puerto Rico	Toxic Substances Control Act (TSCA) Inventory	Yes

^{*}A "Yes" indicates this product complies with the inventory requirements administered by the governing country(s).

16. Other information, including date of preparation or last revision

Issue date 10-March-2014

Revision date - 01

A "No" indicates that one or more components of the product are not listed or exempt from listing on the inventory administered by the governing country(s).

NFPA Ratings



References

HSDB® - Hazardous Substances Data Bank Registry of Toxic Effects of Chemical Substances (RTECS)

Disclaimer

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SAFETY DATA SHEET

1. Identification

Product identifier REDIPOXY Adhesive Part C

Other means of identification Not available.

Recommended use Adhesive.

Recommended restrictions Workers (and your customers or users in the case of resale) should be informed of the potential

presence of respirable dust and respirable crystalline silica as well as their potential hazards. Appropriate training in the proper use and handling of this material should be provided as required

under applicable regulations.

Manufacturer / Importer / Supplier / Distributor information

Company Name
Tile Redi USA LLC
4450 NW 126th Ave
Coral Springs, FL 33065

Telephone (203)-393-0010
Contact person Steve Fine
Website www.tileredi.com

Emergency phone number Call CHEMTREC day or night

USA/Canada - 1.800.424.9300 Mexico - 1.800.681.9531 Outside USA/Canada 1.703.527.3887

2. Hazard(s) identification

Physical hazards Not classified.

Health hazards Carcinogenicit

Health hazards Carcinogenicity Category 1A
Specific target organ toxicity, repeated Category 2 (Lung)

Specific target organ toxicity, repeated

exposure

Environmental hazards Not classified.

OSHA defined hazards Not classified.

Label elements



Signal word Danger

Hazard statement May cause cancer. May cause damage to organs (Lung) through prolonged or repeated

exposure.

Precautionary statement

Prevention Obtain special instructions before use. Do not handle until all safety precautions have been read

and understood. Do not breathe dust/fume. Wear protective gloves/protective clothing/eye protection/face protection. Wash thoroughly after handling. Do not eat, drink or smoke when using

this product.

Response If exposed or concerned: Get medical advice/attention.

Storage Store locked up.

Disposal Dispose of contents/container in accordance with local/regional/national/international regulations.

Hazard(s) not otherwise

classified (HNOC)

Not classified.

3. Composition/information on ingredients

Mixtures

Chemical name	CAS number	%
Silica sand	14808-60-7	35-45
Calcium carbonate	471-34-1	6-9
Titanium dioxide	13463-67-7	1-2

REDIPOXY Adhesive Part C SDS US

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All concentrations are in percent by weight unless ingredient is a gas. Gas concentrations are in percent by volume.

4. First-aid measures

Inhalation Move to fresh air. Call a physician if symptoms develop or persist.

Skin contact Wash off with soap and water. Get medical attention if irritation develops and persists.

Coughing. Dust may irritate the eyes and the respiratory system.

Use fire-extinguishing media appropriate for surrounding materials.

Eye contact Rinse with water. Get medical attention if irritation develops and persists.

Ingestion Rinse mouth. Get medical attention if symptoms occur.

Most important

symptoms/effects, acute and

delayed Indication of immediate

Provide general supportive measures and treat symptomatically. Keep victim under observation. Symptoms may be delayed.

medical attention and special treatment needed

General information

Ensure that medical personnel are aware of the material(s) involved, and take precautions to protect themselves. IF exposed or concerned: Get medical advice/attention.

5. Fire-fighting measures

Suitable extinguishing media Unsuitable extinguishing

None known.

Unsuitable extinguishing media

Specific hazards arising from the chemical

During fire, gases hazardous to health may be formed.

Special protective equipment and precautions for firefighters

Self-contained breathing apparatus and full protective clothing must be worn in case of fire.

and precautions for firefighters Fire-fighting

Use standard firefighting procedures and consider the hazards of other involved materials.

equipment/instructions
General fire hazards

No unusual fire or explosion hazards noted.

6. Accidental release measures

Personal precautions, protective equipment and emergency procedures

Wear appropriate personal protective equipment. Ensure adequate ventilation. Local authorities should be advised if significant spillages cannot be contained. For personal protection, see Section 8 of the SDS.

Methods and materials for containment and cleaning up

Sweep up or vacuum up spillage and collect in suitable container for disposal. Do not vacuum clean unless vacuum cleaners are equipped with HEPA filter. For waste disposal, see Section 13 of the SDS.

Environmental precautions

Prevent further leakage or spillage if safe to do so. Avoid discharge into drains, water courses or onto the ground.

7. Handling and storage

Precautions for safe handling

Obtain special instructions before use. Do not handle until all safety precautions have been read and understood. Keep formation of airborne dusts to a minimum. Provide appropriate exhaust ventilation at places where dust is formed. Do not breathe dust. Avoid prolonged exposure. Provide adequate ventilation. Wear appropriate personal protective equipment. Observe good industrial hygiene practices.

Conditions for safe storage, including any incompatibilities

Store locked up. Store in a cool, dry place out of direct sunlight.

8. Exposure controls/personal protection

Occupational exposure limits

US. OSHA Table Z-1 Limits for Air Contaminants (29 CFR 1910.1000)

Components	Туре	Value	Form
Calcium carbonate (CAS 471-34-1)	PEL	5 mg/m3	Respirable fraction.
ŕ		15 mg/m3	Total dust.
Titanium dioxide (CAS 13463-67-7) US. OSHA Table Z-3 (29 CFR 19	PEL	15 mg/m3	Total dust.
Components	Туре	Value	Form
Silica sand (CAS 14808-60-7)	TWA	0.3 mg/m3	Total dust.
,			

Components	Туре	Value	Form
		2.4 millions of particle	Respirable.
US. ACGIH Threshold Limit V	alues		
Components	Туре	Value	Form
Silica sand (CAS 14808-60-7)	TWA	0.025 mg/m3	Respirable fraction.

US. NIOSH: Pocket Guide to Chemical Hazards

Components	Туре	Value	Form	
Calcium carbonate (CAS 471-34-1)	TWA	5 mg/m3	Respirable.	
,		10 mg/m3	Total	
Silica sand (CAS 14808-60-7)	TWA	0.05 mg/m3	Respirable dust.	

Biological limit values No biological exposure limits noted for the ingredient(s).

Occupational exposure to nuisance dust (total and respirable) and respirable crystalline silica **Exposure guidelines**

should be monitored and controlled.

TWA

Appropriate engineering controls

Titanium dioxide (CAS

13463-67-7)

Good general ventilation (typically 10 air changes per hour) should be used. Ventilation rates should be matched to conditions. If applicable, use process enclosures, local exhaust ventilation, or other engineering controls to maintain airborne levels below recommended exposure limits. If exposure limits have not been established, maintain airborne levels to an acceptable level.

10 mg/m3

Individual protection measures, such as personal protective equipment

Eye/face protection Wear safety glasses with side shields (or goggles).

Skin protection

Hand protection Use personal protective equipment as required. Use personal protective equipment as required. Other

Respiratory protection Use a particulate filter respirator for particulate concentrations exceeding the Occupational

Exposure Limit.

Wear appropriate thermal protective clothing, when necessary. Thermal hazards

General hygiene considerations

Always observe good personal hygiene measures, such as washing after handling the material and before eating, drinking, and/or smoking. Routinely wash work clothing and protective

equipment to remove contaminants.

9. Physical and chemical properties

Appearance

Physical state Solid. Powder. **Form** White. Color

Not available. Odor Not available. **Odor threshold** Not available. Melting point/freezing point Not available. Initial boiling point and boiling Not applicable.

range

Not applicable. Flash point **Evaporation rate** Not available. Non flammable. Flammability (solid, gas)

Upper/lower flammability or explosive limits Flammability limit - lower

(%)

Not available.

Flammability limit - upper

Not available.

Explosive limit - lower (%) Not available.

REDIPOXY Adhesive Part C 917137 Version #: 01 Revision date: -Issue date: 10-March-2014 Explosive limit - upper (%) Not available.

Vapor pressure Not available.

Vapor density Not available.

Relative density 2.3

Solubility(ies)

Solubility (water) Insoluble in water.

Partition coefficient Not available.

(n-octanol/water)

Auto-ignition temperature Not available.

Decomposition temperature Not available.

Viscosity Not available.

10. Stability and reactivity

ReactivityThe product is stable and non-reactive under normal conditions of use, storage and transport.

Chemical stability Material is stable under normal conditions.

Possibility of hazardous

reactions

No dangerous reaction known under conditions of normal use.

Conditions to avoid Contact with incompatible materials.

Incompatible materials None known.

Incompatible materials None k
Hazardous decomposition No haz

products

No hazardous decomposition products are known.

11. Toxicological information

Information on likely routes of exposure

IngestionMay cause discomfort if swallowed.InhalationDust may irritate respiratory system.

Skin contact May cause irritation through mechanical abrasion.

Eye contact Dust may irritate the eyes.

Symptoms related to the physical, chemical and toxicological characteristics

Coughing. Dust may irritate the eyes and the respiratory system.

Information on toxicological effects

Acute toxicity May cause discomfort if swallowed.

Components Species Test Results

Calcium carbonate (CAS 471-34-1)

Acute

Oral

LD50 Rat 6450 mg/kg

Skin corrosion/irritation May cause irritation through mechanical abrasion.

Serious eye damage/eye

irritation

Dust may irritate the eyes.

Respiratory or skin sensitization

Respiratory sensitization Based on available data, the classification criteria are not met.

Skin sensitization Not a skin sensitizer.

Germ cell mutagenicity No data available to indicate product or any components present at greater than 0.1% are

mutagenic or genotoxic.

Carcinogenicity

May cause cancer. In 1997, IARC (the International Agency for Research on Cancer) concluded that crystalline silica inhaled from occupational sources can cause lung cancer in humans. However in making the overall evaluation, IARC noted that "carcinogenicity was not detected in all industrial circumstances studied. Carcinogenicity may be dependent on inherent characteristics of the crystalline silica or on external factors affecting its biological activity or distribution of its polymorphs." (IARC Monographs on the evaluation of the carcinogenic risks of chemicals to humans, Silica, silicates dust and organic fibres, 1997, Vol. 68, IARC, Lyon, France.) In June 2003, SCOEL (the EU Scientific Committee on Occupational Exposure Limits) concluded that the main effect in humans of the inhalation of respirable crystalline silica dust is silicosis. "There is sufficient information to conclude that the relative risk of lung cancer is increased in persons with silicosis (and, apparently, not in employees without silicosis exposed to silica dust in quarries and in the ceramic industry). Therefore, preventing the onset of silicosis will also reduce the cancer risk..." (SCOEL SUM Doc 94-final, June 2003) According to the current state of the art, worker protection against silicosis can be consistently assured by respecting the existing regulatory occupational exposure limits. Occupational exposure to respirable dust and respirable crystalline silica should be monitored and controlled.

IARC Monographs. Overall Evaluation of Carcinogenicity

Silica sand (CAS 14808-60-7) 1 Carcinogenic to humans.

Titanium dioxide (CAS 13463-67-7) 2B Possibly carcinogenic to humans.

NTP Report on Carcinogens

Silica sand (CAS 14808-60-7) Known To Be Human Carcinogen.

Reproductive toxicity Based on available data, the classification criteria are not met.

Specific target organ toxicity -

single exposure

No data available.

Specific target organ toxicity -

repeated exposure

May cause damage to organs (Lung) through prolonged or repeated exposure.

Aspiration hazardDue to the physical form of the product it is not an aspiration hazard.

Chronic effects Crystalline silica: Overexposure to the respirable dust of crystalline silica (quartz or cristobalite,

less than or equal to 5 microns in size) may lead to silicosis in humans, which is a progressive and

irreversible lung disease.

Further information No other specific acute or chronic health impact noted.

12. Ecological information

Ecotoxicity Not expected to be harmful to aquatic organisms.

Persistence and degradability The product contains inorganic compounds which are not biodegradable.

Bioaccumulative potential The product is not expected to bioaccumulate.

Mobility in soil The product is not mobile in soil.

Other adverse effects No other adverse environmental effects (e.g. ozone depletion, photochemical ozone creation

potential, endocrine disruption, global warming potential) are expected from this component.

13. Disposal considerations

Disposal instructionsDispose of contents/container in accordance with local/regional/national/international regulations.

Hazardous waste code The waste code should be assigned in discussion between the user, the producer and the waste

disposal company.

Waste from residues / unused

products

Dispose of in accordance with local regulations. Empty containers or liners may retain some product residues. This material and its container must be disposed of in a safe manner (see:

Disposal instructions).

Contaminated packaging Empty containers should be taken to an approved waste handling site for recycling or disposal.

Since emptied containers may retain product residue, follow label warnings even after container is

emptied.

14. Transport information

DOT

Not regulated as dangerous goods.

IATA

Not regulated as dangerous goods.

IMDG

Not regulated as dangerous goods.

Transport in bulk according to Annex II of MARPOL 73/78 and

Not applicable.

the IBC Code

REDIPOXY Adhesive Part C SDS US

917137 Version #: 01 Revision date: - Issue date: 10-March-2014

15. Regulatory information

US federal regulations This product is a "Hazardous Chemical" as defined by the OSHA Hazard Communication

Standard, 29 CFR 1910.1200.

TSCA Section 12(b) Export Notification (40 CFR 707, Subpt. D)

Not regulated

US. OSHA Specifically Regulated Substances (29 CFR 1910.1001-1050)

Not listed.

CERCLA Hazardous Substance List (40 CFR 302.4)

Not listed.

Superfund Amendments and Reauthorization Act of 1986 (SARA)

Hazard categories Immediate Hazard - Yes

Delayed Hazard - Yes Fire Hazard - No Pressure Hazard - No Reactivity Hazard - No

SARA 302 Extremely hazardous substance

Not listed.

SARA 311/312 Hazardous

chemical

SARA 313 (TRI reporting)

Not regulated.

Other federal regulations

Clean Air Act (CAA) Section 112 Hazardous Air Pollutants (HAPs) List

Yes

Not regulated.

Clean Air Act (CAA) Section 112(r) Accidental Release Prevention (40 CFR 68.130)

Not regulated.

Safe Drinking Water Act

Not regulated.

(SDWA)

US state regulations WARNING: This product contains chemicals known to the State of California to cause cancer.

US. Massachusetts RTK - Substance List

Calcium carbonate (CAS 471-34-1) Silica sand (CAS 14808-60-7) Titanium dioxide (CAS 13463-67-7)

US. New Jersey Worker and Community Right-to-Know Act

Calcium carbonate (CAS 471-34-1) Silica sand (CAS 14808-60-7) Titanium dioxide (CAS 13463-67-7)

US. Pennsylvania Worker and Community Right-to-Know Law

Calcium carbonate (CAS 471-34-1) Silica sand (CAS 14808-60-7) Titanium dioxide (CAS 13463-67-7)

US. Rhode Island RTK

Not regulated.

US. California Proposition 65

WARNING: This product contains a chemical known to the State of California to cause cancer.

US - California Proposition 65 - Carcinogens & Reproductive Toxicity (CRT): Listed substance

Silica sand (CAS 14808-60-7) Titanium dioxide (CAS 13463-67-7)

International Inventories

Country(s) or region	Inventory name	On inventory (yes/no)*
Australia	Australian Inventory of Chemical Substances (AICS)	Yes
Canada	Domestic Substances List (DSL)	No
Canada	Non-Domestic Substances List (NDSL)	Yes
China	Inventory of Existing Chemical Substances in China (IECSC)	Yes
Europe	European Inventory of Existing Commercial Chemical Substances (EINECS)	Yes
Europe	European List of Notified Chemical Substances (ELINCS)	No
Japan	Inventory of Existing and New Chemical Substances (ENCS)	No
Korea	Existing Chemicals List (ECL)	Yes

Country(s) or region Inventory name On inventory (yes/no)*

New Zealand New Zealand Inventory Yes Yes

Philippines Philippine Inventory of Chemicals and Chemical Substances

(PICCS)

United States & Puerto Rico Toxic Substances Control Act (TSCA) Inventory

*A "Yes" indicates this product complies with the inventory requirements administered by the governing country(s).

A "No" indicates that one or more components of the product are not listed or exempt from listing on the inventory administered by the governing country(s).

16. Other information, including date of preparation or last revision

10-March-2014 Issue date

Revision date Version # 01

NFPA Ratings



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Registry of Toxic Effects of Chemical Substances (RTECS)

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warranty express or implied.

REDIPOXY Adhesive Part C SDS US

Yes