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## SAFETY DATA SHEET

# SECTION 1. IDENTIFICATION

Product identifier used on the label

: EPOXYBOND® POOL PUTTY RESIN WHITE

Product Code(s) : Z530106, 530318

Recommended use of the chemical and restrictions on use

: Epoxy resin

Use pattern: Consumer use

Recommended restrictions None known.

Chemical family : Mixture

Name, address, and telephone number

Name, address, and telephone number of

of the supplier: the manufacturer:

Atlas Minerals and Chemicals Inc. Refer to supplier

1227 Valley Road Mertztown, PA, USA

19539

Supplier's Telephone # : 610-682-7171

24 Hr. Emergency Tel # : Chemtrec 1-800-424-9300 (Within Continental U.S.); Chemtrec 703-527-3887

(Outside U.S.).

## SECTION 2. HAZARDS IDENTIFICATION

#### Classification of the chemical

Solid, stiff putty Characteristic odor.

Most important hazards: This material is classified as hazardous under U.S. OSHA regulations (29CFR 1910.1200) (Hazcom 2012) and Canadian WHMIS regulations (Hazardous Products Regulations) (WHMIS 2015). Hazard classification:

Skin sensitization - Category 1 Carcinogenicity- Category 2 Germ Cell Mutangenicity - Category 2

### Label elements

Hazard pictogram(s)





Signal Word

WARNING!

Hazard statement(s)

May cause allergic skin reaction.
Suspected of causing cancer.
Suspected of causing genetic defects.

Precautionary statement(s)



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Obtain special instructions before use.

Do not handle until all safety precautions have been read and understood.

Avoid breathing mist or vapors.

Contaminated work clothing must not be allowed out of the workplace.

Wear protective gloves/clothing and eye/face protection.

IF exposed or concerned: Get medical attention/advice.

IF ON SKIN: Wash with plenty of soap and water.

Take off contaminated clothing and wash it before reuse.

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

Store locked up.

Dispose of contents/container in accordance with local regulation.

#### Other hazards

Other hazards which do not result in classification:

Burning produces obnoxious and toxic fumes. Ingestion may cause gastrointestinal irritation, nausea, vomiting and diarrhea. May cause respiratory tract irritation.

# SECTION 3. COMPOSITION/INFORMATION ON INGREDIENTS

#### Mixture

<u>Chemical name</u>	Common name and synonyms	CAS#	<u>Concentration</u>
Bisphenol A / epichlorohydrin resin	Epoxy resin	25068-38-6	15.0 - 20.0
Trimethylol propane triacrylate	TMPTA	15625-89-5	1.0 - 5.0
Amorphous Precipitated Silica	Synthetic Amorphous, Pyrogenic Silica	112945-52-5	1.0 - 5.0
Crystalline silica	Quartz, silica	14808-60-7	0.1 - 1.0
Present in white and gray product only			
Titanium dioxide	Anatase	13463-67-7	0.5 - 1.5
Present in white product only			
Zinc oxide	Zinc dioxide	1314-13-2	0.5 - 1.5

The exact concentrations of the above listed chemicals are being withheld as a trade secret.

## SECTION 4. FIRST-AID MEASURES

#### Description of first aid measures

Ingestion : Do NOT induce vomiting. Never give anything by mouth to an unconscious person.

Get medical attention.

Inhalation : IF INHALED: Remove person to fresh air and keep comfortable for breathing. If

breathing has stopped, give artificial respiration. If breathing is difficult, give oxygen by qualified medical personnel only. Call a POISON CENTER or doctor/physician if you

feel unwell.

Skin contact: IF ON SKIN: Wash with plenty of soap and water. If skin irritation occurs, get medical

advice/attention. Take off contaminated clothing and wash before re-use.

Eye contact : For eye contact, flush with running water for at least 15 minutes. If eye irritation

persists, get medical advice/attention.

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

: Causes skin irritation. Contact may cause redness, swelling and a painful sensation. May cause respiratory irritation. May cause coughing and breathing difficulties. May cause eye irritation. Symptoms may include tearing, redness and discomfort. Ingestion may cause gastrointestinal irritation, nausea, vomiting and diarrhea. May cause allergic skin reaction. Symptoms may include redness, itching and swelling. Suspected of causing cancer. Suspected of causing genetic defects.



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

: Treat symptomatically.

#### SECTION 5. FIRE-FIGHTING MEASURES

#### Extinguishing media

Suitable extinguishing media

: Carbon dioxide (CO2); Dry chemical; Alcohol-resistant foam; water fog .

Unsuitable extinguishing media

: Do not use a solid water stream as it may scatter and spread fire.

#### Special hazards arising from the substance or mixture / Conditions of flammability

: Not considered flammable.

Flammability classification (OSHA 29 CFR 1910.106)

: Not flammable.

Hazardous combustion products

: Carbon dioxide and carbon monoxide.

### Special protective equipment and precautions for firefighters

Protective equipment for fire-fighters

: Firefighters should wear proper protective equipment and self-contained breathing apparatus with full face piece operated in positive pressure mode.

Special fire-fighting procedures

: Move containers from fire area if safe to do so. Cool closed containers exposed to fire with water spray. Do not allow run-off from fire fighting to enter drains or water courses. Dike for water control.

#### SECTION 6. ACCIDENTAL RELEASE MEASURES

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

: All persons dealing with the clean-up should wear the appropriate chemically protective equipment. Keep people away from and upwind of spill/leak. Restrict access to area until completion of clean-up. Refer to protective measures listed in sections 7 and 8.

Environmental precautions

Do not allow material to contaminate ground water system. If necessary, dike well ahead of the spill to prevent runoff into drains, sewers, or any natural waterway or drinking supply.

#### Methods and material for containment and cleaning up

: Ventilate the area. Remove all sources of ignition. Prevent further leakage or spillage if safe to do so. Sweep up and shovel into suitable containers for disposal. Pick up and transfer to properly labelled containers. Contact the proper local authorities. Refer to Section 13 for disposal of contaminated material.

#### Special spill response procedures

 Contact appropriate local and provincial environmental authorities for assistance and/or reporting requirements.

## SECTION 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. Wear protective gloves/clothing and eye/face protection. Use only in well-ventilated areas. Do not breathe mist or vapors. Avoid contact with skin, eyes and clothing. Keep container tightly closed. Do not eat, drink or smoke when using this product. Wash thoroughly after handling. Contaminated work clothing must not be allowed out of the workplace. Persons with recurrent skin eczema or sensitization problems should be excluded from working with this product. Once a person is sensitized, no further exposure to the material that caused the sensitization should be permitted.



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Conditions for safe storage

: Store locked up. Store in cool/well ventilated area. Storage area should be clearly identified, clear of obstruction and accessible only to trained and authorized personnel. Inspect periodically for damage or leaks. No smoking.

Incompatible materials

: Oxidizing agents, mineral acids Amines .

#### SECTION 8. EXPOSURE CONTROLS/PERSONAL PROTECTION

Chemical Name	ACGIH:	TLV	OSHA	OSHA PEL		
	TWA.	STEL.	PEL	STEL		
Bisphenol A / epichlorohydrin esin	N/Av	N/Av	N/Av	N/Av		
Trimethylol propane triacrylate	N/Av	N/Av	N/Av	N/Av		
Amorphous Precipitated Silica	N/Av	N/Av	N/Av	N/Av		
Titanium dioxide	10 mg/m³	N/Av	15 mg/m³ (total dust)	N/Av		
Crystalline silica	0.025 mg/m <sup>3</sup> (respirable)	N/Av	0.1 mg/m³ (respirable) (final rule limit)	N/Av		
Zinc oxide	2 mg/m³ (respirable fraction)	10 mg/m³ (respirable fraction)	5 mg/m³ (fume); 15 mg/m³ (total dust); 5 mg/m³ (respirable fraction)	N/Av		

#### **Exposure controls**

Ventilation and engineering measures

: Use only in well-ventilated areas. Apply technical measures to comply with the occupational exposure limits. Where reasonably practicable this should be achieved by the use of local exhaust ventilation and good general extraction. Use explosion-proof equipment. In case of insufficient ventilation wear suitable respiratory

equipment.

Respiratory protection : If airborne concentrations are above the permissible exposure limit or are not known,

use NIOSH-approved respirators. Respirators should be selected based on the form and concentration of contaminants in air, and in accordance with OSHA (29 CFR 1910.134) or CSA Z94.4-02. Advice should be sought from respiratory protection

specialists.

**Skin protection**: Wear protective gloves/clothing. Where extensive exposure to product is possible, use

resistant coveralls, apron and boots to prevent contact. he suitability for a specific workplace should be discussed with the producers of the protective gloves.

Eye / face protection : Wear eye

: Wear eye/face protection. Wear as appropriate: Tightly fitting safety goggles

Other protective equipment : Ensure that eyewash stations and safety showers are close to the workstation location.

Other equipment may be required depending on workplace standards.

General hygiene considerations

: Avoid breathing dust, mist or vapors. Avoid contact with skin, eyes and clothing. Do not eat, drink or smoke when using this product. Wash thoroughly after handling. Remove and wash contaminated clothing before re-use. Do not take contaminated clothing home. Handle in accordance with good industrial hygiene and safety practice.

#### SECTION 9. PHYSICAL AND CHEMICAL PROPERTIES

Appearance : Solid, stiff putty
Odor : Characteristic odor.
Odor threshold : No information available.



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pH : No information available.Melting/Freezing point : No information available.

Initial boiling point and boiling range

: >149°C (>300°F )

Flash point : >232°C (>450°F)
Flashpoint(Method) : Cleveland closed cup
Evaporation rate (BuAe = 1) : (butyl acetate = 1) <1
Flammability (solid, gas) : Not applicable.

Lower flammable limit (% by vol.)

Not applicable.

Upper flammable limit (% by vol.)

Not applicable.

Oxidizing properties: None known.Explosive properties: Not explosiveVapour pressure: Very lowVapour density: (Air = 1) > 1

Relative density / Specific gravity

: 1.8-2.2

Solubility in water : Insoluble.

Other solubility(ies) : No information available.

Partition coefficient: n-octanol/water or Coefficient of water/oil distribution

No information available.No information available.

**Decomposition temperature :** No information available.

Viscosity : Not available.

Volatiles (% by weight) :

Volatile organic Compounds (VOC's)

No information available.

Absolute pressure of container

Auto-ignition temperature

: Not applicable.

Flame projection length : Not applicable.

Other physical/chemical comments

: No additional information.

# SECTION 10. STABILITY AND REACTIVITY

**Reactivity**: Not normally reactive.

Chemical stability : Stable under normal conditions.

Possibility of hazardous reactions

Hazardous polymerization does not occur.

Conditions to avoid : Direct sources of heat. Do not use in areas without adequate ventilation. Avoid contact

with incompatible materials.

Incompatible materials : Oxidizing agents, mineral acids Amines

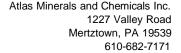
Hazardous decomposition products

: None known, refer to hazardous combustion products in Section 5.

# SECTION 11. TOXICOLOGICAL INFORMATION

## Information on likely routes of exposure:

Routes of entry inhalation : YES
Routes of entry skin & eye : YES





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Routes of entry Ingestion : YES

Routes of exposure skin absorption

: YES

**Potential Health Effects:** 

Signs and symptoms of short-term (acute) exposure

Sign and symptoms Inhalation

: May cause respiratory irritation. Symptoms may include coughing and sneezing.

Sign and symptoms ingestion

: Ingestion may cause severe irritation to the mouth, throat and stomach.

Sign and symptoms skin

: Direct skin contact may cause temporary redness.

Sign and symptoms eyes

Direct eye contact may cause irritation.

**Potential Chronic Health Effects** 

: Chronic skin contact with low concentrations may cause dermatitis.

Mutagenicity

This material is classified as hazardous under U.S. OSHA regulations (29CFR 1910.1200) (Hazcom 2012) and Canadian WHMIS regulations (Hazardous Products Regulations) (WHMIS 2015). Classification: Germ Cell Mutangenicity - Category 2 Suspected of causing genetic defects.

Carcinogenicity

This material is classified as hazardous under U.S. OSHA regulations (29CFR 1910.1200) (Hazcom 2012) and Canadian WHMIS regulations (Hazardous Products Regulations) (WHMIS 2015). Classification Carcinogenicity- Category 2 Suspected of causing cancer. Contains Trimethylolpropane triacrylate.
Contains crystalline silica. Crystalline silica is classified as carcinogenic by IARC (Group 1), the ACGIH (Category A2) and the NTP (Group 1 - Known human carcinogen). However, Crystalline silica is listed as causing cancer only when it's particles are airborne and of a respirable size. Airborne respirable particles are not expected for this product, based on the intended use and form of the product as a whole. Contains Titanium dioxide. Titanium dioxide is classified as possibly carcinogenic by IARC (Group 2B). However, the Titanium dioxide used in this product is in a non-respirable form and under normal conditions of use, Titanium dioxide cannot become airborne. The carcinogenic effects of Titanium dioxide are therefore not applicable to this product.

## Reproductive effects & Teratogenicity

This product is not expected to cause reproductive or developmental effects.

Sensitization to material

This material is classified as hazardous under U.S. OSHA regulations (29CFR 1910.1200) (Hazcom 2012) and Canadian WHMIS regulations (Hazardous Products Regulations) (WHMIS 2015). Classification: Skin sensitization - Category 1 May cause an allergic skin reaction.

Not expected to be a respiratory sensitizer.

Specific target organ effects

The substance or mixture is not classified as specific target organ toxicant, single

exposure.

The substance or mixture is not classified as specific target organ toxicant, repeated exposure.

### Medical conditions aggravated by overexposure

: Pre-existing skin, eye, respiratory and central nervous system disorders.

Synergistic materials

No information available.

Toxicological data

: Contains no ingredients that are considered to have acute toxicity hazards.



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	LC50(4hr)	LD <sub>50</sub>			
Chemical name	inh, rat	(Oral, rat)	(Rabbit, dermal)		
Bisphenol A / epichlorohydrin resin	>791 mg/m³ (dust) (no deaths)	11400 mg/kg	>23500 mg/kg		
Trimethylol propane triacrylate	>0.55mg/L (no deaths)	>5000mg/kg	5170mg/kg		
Amorphous Precipitated Silica	>2.08mg/L (no deaths)	3160 mg/kg	>5000mg/kg		
Crystalline silica	N/Av	N/Av	N/Av		
Present in white and gray p	roduct only				
Titanium dioxide	> 6.82 mg/kg (dust) (No mortality)	> 25 000 mg/kg	> 10 000 mg/kg		
Present in white product on	ly				
Zinc oxide	>5700 mg/m³ (>5.7 mg/L)	> 5000 mg/kg	>2000 mg/kg		

## Other important toxicological hazards

: None reported by the manufacturer.

# SECTION 12. ECOLOGICAL INFORMATION

**Ecotoxicity** 

: Contains material that may be harmful in the environment.

Do not release, unmonitored, into the environment.

## Ecotoxicity data:

<u>Ingredients</u>					
	CAS No	LC50 / 96h	NOEC / 21 day	M Factor	
Bisphenol A / epichlorohydrin resin	25068-38-6	3.6 mg/L (Rainbow trout)	N/Av	None.	
Titanium dioxide	13463-67-7	> 100 mg/L (Japanese ricefish)	N/Av	None.	
Zinc oxide	1314-13-2	1.1 mg/L (Rainbow trout)	N/Av	None.	

<u>Ingredients</u>	CAS No	Toxicity to Daphnia			
		EC50 / 48h	NOEC / 21 day	M Factor	
Bisphenol A / epichlorohydrin resin	25068-38-6	1.1-2.8mg/L (Water flea)	0.3mg/L (Water flea)	None.	
Titanium dioxide	13463-67-7	> 100 mg/L (Daphnia magna)	N/Av	None.	
Zinc oxide	1314-13-2	0.098 mg/L (Water flea)	N/Av	10	



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## SAFETY DATA SHEET

<u>Ingredients</u>	CAS No	Toxicity to Algae				
		EC50 / 96h or 72h	NOEC / 96h or 72h	M Factor		
Bisphenol A / epichlorohydrin resin	25068-38-6	9.4mg/L (Green algae)	2.8mg/L (Green algae)	None.		
Titanium dioxide	13463-67-7	> 100 mg/L/72hr (Green algae)	N/Av	None.		
Zinc oxide	1314-13-2	0.044 mg/L/72hr (Green algae)	N/Av	10		

Persistence and degradability

: Not expected to be rapidly biodegradable.

Bioaccumulation potential : No data is available on the product itself.

Components	Partition coefficent n-octanol/ater (log Kow)	Bioconcentration factor (BCF)
Bisphenol A / epichlorohydrin resin (CAS 25068-38-6)	>2.915	31
Trimethylol propane triacrylate (CAS 15625-89-5)	N/Av	
Amorphous Precipitated Silica (CAS 112945-52-5)	0.53(calculated)	
Zinc oxide (CAS 1314-13-2)	1.53(estimated)	

Mobility in soil : The product itself has not been tested.

Other Adverse Environmental effects

: None known.

## SECTION 13. DISPOSAL CONSIDERATIONS

Handling for Disposal : Handle in accordance with good industrial hygiene and safety practice. Refer to

protective measures listed in sections 7 and 8.

Methods of Disposal : Dispose in accordance with all applicable federal, state, provincial and local

regulations.

RCRA : If this product, as supplied, becomes a waste in the United States, it may meet the

criteria of a hazardous waste as defined under RCRA, Title 40 CFR 261. It is the responsibility of the waste generator to determine the proper waste identification and disposal method. For disposal of unused or waste material, check with local, state and

federal environmental agencies.

Regulatory Information	UN Number	UN proper shipping name	Transport hazard class(es)	Packing Group	Label
49CFR/DOT	None.	Not regulated.	not regulated	none	$\otimes$
49CFR/DOT Additional information					
TDG	None.	Not regulated.	not regulated	none	$\otimes$



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TDG Additional information	None.		1		1
IMDG	None.	Not regulated.	not regulated	none	$\otimes$
IMDG Additional information	None.				
ICAO/IATA	None.	Not regulated.	not regulated	none	$\otimes$
ICAO/IATA Additional information	None.				

**Special precautions for user** : Appropriate advice on safety must accompany the package.

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Environmental hazards : Contains material that may be harmful in the environment. See ECOLOGICAL

INFORMATION, Section 12.

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

: This information is not available.

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## SECTION 15 - REGULATORY INFORMATION

# US Federal Information:

Components listed below are present on the following U.S. Federal chemical lists:

<u>Ingredients</u>		TSCA	CERCLA Reportable	SARA TITLE III: Sec. 302, Extremely	SARA TITLE III: S 372, Specific To	•
	CAS#	Inventory	Quantity(RQ) (40 CFR 117.302):	Hazardous Substance, 40 CFR 355:	Toxic Chemical	de minimus Concentration
Bisphenol A / epichlorohydrin resin	25068-38-6	Yes	N/Ap	N/Av	No	N/Ap
Trimethylol propane triacrylate	15625-89-5	Yes	N/Ap	N/Av	No	N/Ap
Amorphous Precipitated Silica	112945-52-5	NL	N/Ap	N/Av	No	N/Ap
Titanium dioxide	13463-67-7	Yes	N/Ap	N/Av	No	N/Ap
Crystalline silica	14808-60-7	Yes	None.	None.	No	N/Ap
Zinc oxide	1314-13-2	Yes	N/Ap	N/Ap	No	N/Ap

### **US State Right to Know Laws:**

The following chemicals are specifically listed by individual States:



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Ingredients	CAS#	Califor		State "Right to Know" Lists					
ingredients	CAS#	Listed	Type of Toxicity	CA	MA	MN	NJ	PA	RI
Bisphenol A / epichlorohydrin resin	25068-38-6	No	N/Ap	No	No	No	No	No	No
Trimethylol propane triacrylate	15625-89-5	No	N/Ap	No	No	Yes	No	No	No
Amorphous Precipitated Silica	112945-52-5	No	N/Ap	No	No	No	No	No	No
Titanium dioxide	13463-67-7	Yes	, unbound particles	No	Yes	Yes	Yes	Yes	Yes
Crystalline silica	14808-60-7	Yes	orne particles of res	No	Yes	Yes	Yes	Yes	Yes
Zinc oxide	1314-13-2	No	N/Ap	Yes	Yes	Yes	Yes	Yes	Yes

# **Canadian Information:**

Canadian Environmental Protection Act (CEPA): . All ingredients are present on the DSL.

WHMIS information: Refer to Section 2 for a WHMIS Classification for this product.

This product has been classified in accordance with the hazard criteria of the Controlled Products Regulations (CPR) and this Safety Data Sheet contains all the information required by the CPR.

#### **International Information:**

Components listed below are present on the following International Inventory list:

<u>Ingredients</u>	CAS#	European EINECs	Australia AICS	Philippines PICCS	Japan ENCS	Korea KECI/KECL	China IECSC	NewZealand IOC
Bisphenol A / epichlorohydrin resin	25068-38-6	N/Av	Present	Present	(7)-1283	KE-24000	Present	HSR003180
Trimethylol propane triacrylate	15625-89-5	239-701-3	Present	Present	(2)-1010	KE-29547	Present	HSR003398
Amorphous Precipitated Silica	112945-52-5	231-545-4 (as Silicon dioxide)	Present	Present	(1)-548	KE-30953	Present	No information available.
Titanium dioxide	13463-67-7	236-675-5	Present	Present	(5)-5225; (1)-558	KE-33900	Present	May be used as a single component chemical under an appropriate group standard
Crystalline silica	14808-60-7	238-878-4	Present	Present	(1)-548	KE-29983	Present	HSR003125
Zinc oxide	1314-13-2	215-222-5	Present	Present	(1)-561	KE-35565	Present	HSR003104

## **SECTION 16. OTHER INFORMATION**

Legend

: ACGIH: American Conference of Governmental Industrial Hygienists

AICS: Australian Inventory of Chemical Substances

ATE: Acute Toxicity Estimate

CA: California

CAS: Chemical Abstract Services

CERCLA: Comprehensive Environmental Response, Compensation, and Liability Act

of 1980

CFR: Code of Federal Regulations CSA: Canadian Standards Association DOT: Department of Transportation



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ECHA: European Chemicals Agency

ECOTOX: U.S. EPA Ecotoxicology Database

EINECS: European Inventory of Existing Commercial chemical Substances

ENCS: Existing and New Chemical Substances EPA: Environmental Protection Agency HSDB: Hazardous Substances Data Bank

IARC: International Agency for Research on Cancer

IBC: Intermediate Bulk Container

IECSC: Inventory of Existing Chemical Substances IMDG: International Maritime Dangerous Goods

IOC: Inventory of Chemicals

IUCLID: International Uniform Chemical Information Database

KECI: Korean Existing Chemicals Inventory KECL: Korean Existing Chemicals List

LC: Lethal Concentration

LD: Lethal Dose MA: Massachusetts MN: Minnesota N/Ap: Not Applicable N/Av: Not Available

NIOSH: National Institute of Occupational Safety and Health

NJ: New Jersey

NOEC: No observable effect concentration NTP: National Toxicology Program

OECD: Organisation for Economic Co-operation and Development

OSHA: Occupational Safety and Health Administration

PA: Pennsylvania

PEL: Permissible exposure limit

PICCS: Philippine Inventory of Chemicals and Chemical Substances

RCRA: Resource Conservation and Recovery Act

RI: Rhode Island

RTECS: Registry of Toxic Effects of Chemical Substances SARA: Superfund Amendments and Reauthorization Act SDS: Safety Data Sheet / Material Safety Data Sheet

STEL: Short Term Exposure Limit

TDG: Canadian Transportation of Dangerous Goods Act & Regulations

TLV: Threshold Limit Values TSCA: Toxic Substance Control Act TWA: Time Weighted Average

WHMIS: Workplace Hazardous Materials Identification System

ACGIH, Threshold Limit Values for Chemical Substances and Physical Agents &

Biological Exposure Indices for 2014.

2. International Agency for Research on Cancer Monographs, searched 2015.

3. Canadian Centre for Occupational Health and Safety, CCInfoWeb databases, 2015

(Chempendium, HSDB and RTECs).

4. Material Safety Data Sheets from manufacturer.

5. US EPA Title III List of Lists - October 2012 version.

6. California Proposition 65 List - December 26, 2014 version

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# Other special considerations for handling

: Provide adequate information, instruction and training for operators.



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## **SAFETY DATA SHEET**

## Prepared for:

Atlas Minerals and Chemicals Inc. 1227 Valley Road Mertztown, PA 19539 610-682-7171



#### Prepared by:

ICC The Compliance Center Inc.
Telephone: (888) 442-9628 (U.S.): (888) 977-4834 (Canada) http://www.thecompliancecenter.com



#### **DISCLAIMER**

This Safety Data Sheet was prepared by ICC The Compliance Center Inc. using information provided by Atlas Minerals and Chemicals Inc. and CCOHS' Web Information Service. The information in the Safety Data Sheet is offered for your consideration and guidance when exposed to this product. ICC The Compliance Center Inc and Atlas Minerals and Chemicals Inc.

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#### END OF DOCUMENT



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## **SAFETY DATA SHEET**

## SECTION 1. IDENTIFICATION

Product identifier used on the label

: EPOXYBOND® POOL PUTTY HARDENER

Product Code(s) : Z530105, 530317, 530318

Recommended use of the chemical and restrictions on use

: Epoxy putty hardener Use pattern: Consumer use

Recommended restrictions None known.

Chemical family : Mixture

Name, address, and telephone number

Name, address, and telephone number

of the supplier: of the manufacturer:

Atlas Minerals and Chemicals Inc. Refer to supplier

1227 Valley Road Mertztown, PA, USA

19539

Supplier's Telephone # : 610-682-7171

**24 Hr. Emergency Tel #** : Chemtrec 1-800-424-9300 (Within Continental U.S.); Chemtrec 703-527-3887

(Outside U.S.).

#### SECTION 2. HAZARDS IDENTIFICATION

#### Classification of the chemical

Solid, stiff putty. Ammonia odor.

Most important hazards: This material is classified as hazardous under U.S. OSHA regulations (29CFR 1910.1200) (Hazcom 2012) and Canadian WHMIS regulations (Hazardous Products Regulations) (WHMIS 2015). Hazard classification

Acute Toxicity, inhalation - Category 4 (mist) Eye Damage/Irritation - Category 2A Skin sensitization - Category 1 Reproductive Toxicity - Category 2

## Label elements

Hazard pictogram(s)





Signal Word WARNING!

Hazard statement(s)



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Harmful if inhaled.
Causes serious eye irritation.
May cause an allergic skin reaction.
Suspected of damaging fertility.

#### Precautionary statement(s)

Obtain special instructions before use.

Do not handle until all safety precautions have been read and understood.

Avoid breathing dust and fume.

Use only outdoors or in a well-ventilated area.

Wash hands thoroughly after handling.

Contaminated work clothing must not be allowed out of the workplace.

Wear protective gloves/clothing and eye/face protection.

IF exposed or concerned: Get medical attention/advice.

IF ON SKIN (or hair): Take off immediately all contaminated clothing. Rinse skin with water/shower.

Wash contaminated clothing before reuse.

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

IF INHALED: Remove person to fresh air and keep comfortable for breathing.

Call a POISON CENTER or doctor/physician if you feel unwell.

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.

Store locked up.

Dispose of contents/container in accordance with local regulation.

#### Other hazards

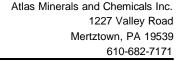
Other hazards which do not result in classification:

Burning produces obnoxious and toxic fumes. Ingestion may cause gastrointestinal irritation, nausea, vomiting and diarrhea. May cause respiratory tract irritation.

## SECTION 3. COMPOSITION/INFORMATION ON INGREDIENTS

#### Mixture

Chemical name	Common name and synonyms	CAS#	Concentration
Talc	Hydrous magnesium silicate; Non-asbestiform talc	14807-96-6	15.0 - 20.0
Silica	Crystalline quartz	14808-60-7	1.0 - 5.0
Diethylenetriamine	DETA	111-40-0	1.0 - 5.0
Bisphenol A	Epoxy Resin	80-05-7	1.0 - 5.0





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#### SECTION 4. FIRST-AID MEASURES

#### Description of first aid measures

Ingestion : Do NOT induce vomiting. Never give anything by mouth to an unconscious person.

Get medical attention.

Inhalation : IF INHALED: Remove person to fresh air and keep comfortable for breathing. If

breathing has stopped, give artificial respiration. If breathing is difficult, give oxygen by qualified medical personnel only. Call a POISON CENTER or doctor/physician if you

feel unwell.

Skin contact : IF ON SKIN: Wash with plenty of soap and water. If skin irritation occurs, get medical

advice/attention. Take off contaminated clothing and wash before re-use.

: For eye contact, flush with running water for at least 15 minutes. If eye irritation

persists, get medical advice/attention.

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

: May cause eye irritation. Symptoms may include stinging, tearing, redness, swelling, and blurred vision. Harmful if inhaled. Symptoms may include coughing, choking and wheezing. Inhalation could result in pulmonary edema (fluid accumulation). Symptoms of pulmonary edema (chest pain, shortness of breath) may be delayed. May cause an allergic skin reaction. May cause an allergic respiratory reaction (e.g. asthma) in some hypersensitive individuals. Suspected of damaging fertility.

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

: Treat symptomatically.

## SECTION 5. FIRE-FIGHTING MEASURES

### Extinguishing media

Eye contact

Suitable extinguishing media

: Carbon dioxide (CO2); Dry chemical; Alcohol-resistant foam; water fog .

Unsuitable extinguishing medi

: Do not use a solid water stream as it may scatter and spread fire.

## Special hazards arising from the substance or mixture / Conditions of flammability

: Not considered flammable.

#### Flammability classification (OSHA 29 CFR 1910.106)

: Not flammable.

## Hazardous combustion products

Carbon dioxide and carbon monoxide.

#### Special protective equipment and precautions for firefighters

Protective equipment for fire-fighters

: Firefighters should wear proper protective equipment and self-contained breathing apparatus with full face piece operated in positive pressure mode.

Special fire-fighting procedures

: Move containers from fire area if safe to do so. Cool closed containers exposed to fire with water spray. Do not allow run-off from fire fighting to enter drains or water courses. Dike for water control.

## SECTION 6. ACCIDENTAL RELEASE MEASURES

### Personal precautions, protective equipment and emergency procedures

: All persons dealing with the clean-up should wear the appropriate chemically protective equipment. Keep people away from and upwind of spill/leak. Restrict access to area until completion of clean-up. Refer to protective measures listed in sections 7 and 8.



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**Environmental precautions** 

: Do not allow material to contaminate ground water system. If necessary, dike well ahead of the spill to prevent runoff into drains, sewers, or any natural waterway or drinking supply.

#### Methods and material for containment and cleaning up

: Ventilate the area. Remove all sources of ignition. Prevent further leakage or spillage if safe to do so. Sweep up and shovel into suitable containers for disposal. Pick up and transfer to properly labelled containers. Contact the proper local authorities. Refer to Section 13 for disposal of contaminated material.

#### Special spill response procedures

 Contact appropriate local and provincial environmental authorities for assistance and/or reporting requirements.

### SECTION 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. Wear suitable protective equipment during handling. Wear protective gloves/clothing and eye/face protection. Use only in well-ventilated areas. Avoid breathing dust and fume. Avoid contact with skin, eyes and clothing. Keep container tightly closed. Do not eat, drink or smoke when using this product. Wash thoroughly after handling. Persons with recurrent skin eczema or sensitization problems should be excluded from working with this product. Once a person is sensitized, no further exposure to the material that caused the sensitization should be permitted. Contaminated work clothing must not be allowed out of the workplace.

## Conditions for safe storage

Store in cool/well ventilated area. Store locked up. Storage area should be clearly identified, clear of obstruction and accessible only to trained and authorized personnel. Inspect periodically for damage or leaks. No smoking.

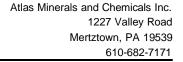
## Incompatible materials

: Oxidizing agents, mineral acids .

### SECTION 8. EXPOSURE CONTROLS / PERSONAL PROTECTION

Chemical Name	ACGIH	TLV_	OSHA	<u> </u>
	TWA.	STEL	<u>PEL</u>	STEL
Talc	2 mg/m³ (particulate matter containing no asbestos and <1% crystalline silica, respirable fraction)	N/Av	N/Av	N/Av
Silica	0.025 mg/m³ (respirable fraction)	N/Av	0.1 mg/m³ (final rule limit)	N/Av
Diethylenetriamine	1 ppm	N/Av	N/Av	N/Av
Bisphenol A	N/Av	N/Av	N/Av	N/Av

## **Exposure controls**





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: Use only in well-ventilated areas. Apply technical measures to comply with the occupational exposure limits. Where reasonably practicable this should be achieved by the use of local exhaust ventilation and good general extraction. Use explosion-proof equipment. In case of insufficient ventilation wear suitable respiratory

explosion-proof equipment. In case of insumolent ventiliation wear suitable respiratory

equipment.

Respiratory protection : If airborne concentrations are above the permissible exposure limit or are not

known, use NIOSH-approved respirators. Respirators should be selected based on the form and concentration of contaminants in air, and in accordance with OSHA (29 CFR 1910.134) or CSA Z94.4-02. Advice should be sought from respiratory protection

specialists.

**Skin protection**: Wear protective gloves/clothing. Where extensive exposure to product is possible,

use resistant coveralls, apron and boots to prevent contact. The suitability for a specific workplace should be discussed with the producers of the protective gloves.

Eye / face protection : Wear eye/face protection. Wear as appropriate: Tightly fitting safety goggles

Other protective equipment : Ensure that eyewash stations and safety showers are close to the workstation

location. Other equipment may be required depending on workplace standards.

General hygiene considerations

: Avoid breathing dust and fume. Avoid contact with skin, eyes and clothing. Do not eat, drink or smoke when using this product. Wash thoroughly after handling. Remove and wash contaminated clothing before re-use. Do not take contaminated clothing home. Handle in accordance with good industrial hygiene and safety practice.

#### SECTION 9. PHYSICAL AND CHEMICAL PROPERTIES

Appearance : Solid, stiff putty
Odor : Ammonia odor.

Odor threshold: No information available.pH: No information available.Melting/Freezing point: No information available.

Initial boiling point and boiling range

232°C (450°F )

Flash point : 254°C (490°F)
Flashpoint(Method) : Cleveland closed cup
Evaporation rate (BuAe = 1) : No information available.

Flammability (solid, gas) : Not applicable.

Lower flammable limit (% by vol.)

Not applicable.

Upper flammable limit (% by vol.)

Not applicable.

Relative density / Specific gravity

: 2.0

Solubility in water : Slightly soluble.

Other solubility(ies) : No information available.

Partition coefficient: n-octanol/water or Coefficient of water/oil distribution

No information available.

Auto-ignition temperature : No information available.

Decomposition temperature : No information available.

Viscosity : No information available.

Volatiles (% by weight) : none



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#### **EPOXYBOND® POOL PUTTY HARDENER**

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Volatile organic Compounds (VOC's)

: No information available.

Absolute pressure of container

: Not applicable.

Flame projection length : Not applicable.

Other physical/chemical comments

No additional information.

#### SECTION 10. STABILITY AND REACTIVITY

Reactivity: Not normally reactive.

Chemical stability : Stable under normal conditions.

Possibility of hazardous reactions

Hazardous polymerization does not occur.

Conditions to avoid : Direct sources of heat. Do not use in areas without adequate ventilation. Avoid

contact with incompatible materials.

Incompatible materials : Oxidizing agents, mineral acids

Hazardous decomposition products

: None known, refer to hazardous combustion products in Section 5.

## SECTION 11. TOXICOLOGICAL INFORMATION

## Information on likely routes of exposure:

Routes of entry inhalation : YES
Routes of entry skin & eye : YES
Routes of entry Ingestion : YES

Routes of exposure skin absorption

: YES

### **Potential Health Effects:**

## Signs and symptoms of short-term (acute) exposure

Sign and symptoms Inhalation

: May cause respiratory irritation. Symptoms may include coughing and sneezing.

Sign and symptoms ingestion

Ingestion may cause severe irritation to the mouth, throat and stomach.

Sign and symptoms skin

: May cause skin irritation. Symptoms may include redness, itching and swelling.

Sign and symptoms eyes

This material is classified as hazardous under U.S. OSHA regulations (29CFR 1910.1200) (Hazcom 2012) and Canadian WHMIS regulations (Hazardous Products Regulations) (WHMIS 2015). Classification: Eye Damage/Irritation - Category 2A

Causes serious eye irritation.

**Potential Chronic Health Effects** 

May cause damage to the lungs through prolonged or repeated exposure if inhaled.

Mutagenicity : Not expected to be mutagenic in humans.



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#### Carcinogenicity

: This material is not classified as hazardous under U.S. OSHA regulations (29CFR 1910.1200) (Hazcom 2012) and Canadian WHMIS regulations (Hazardous Products Regulations) (WHMIS 2015). Contains crystalline silica. Crystalline silica is classified as carcinogenic by IARC (Group 1), the ACGIH (Category A2) and the NTP (Group 1 - Known human carcinogen). However, Crystalline silica is listed as causing cancer only when it's particles are airborne and of a respirable size. Airborne respirable particles are not expected for this product, based on the intended use and form of the product as a whole.

#### Reproductive effects & Teratogenicity

: This material is classified as hazardous under U.S. OSHA regulations (29CFR 1910.1200) (Hazcom 2012) and Canadian WHMIS regulations (Hazardous Products Regulations) (WHMIS 2015). Classification: Reproductive Toxicity - Category 2 Suspected of damaging fertility.

#### Sensitization to material

This material is classified as hazardous under U.S. OSHA regulations (29CFR 1910.1200) (Hazcom 2012) and Canadian WHMIS regulations (Hazardous Products Regulations) (WHMIS 2015). Classification: Skin sensitization - Category 1 May cause allergic skin reaction.

May cause an allergic respiratory reaction (e.g. asthma) in some hypersensitive individuals.

#### Specific target organ effects

The substance or mixture is not classified as specific target organ toxicant, single

exposure.

The substance or mixture is not classified as specific target organ toxicant, repeated exposure.

# Medical conditions aggravated by overexposure

: Pre-existing skin, eye, respiratory and central nervous system disorders.

### Synergistic materials

No information available.

### Toxicological data

: The calculated ATE values for this mixture are:

ATE dermal = 27949.24

ATE inhalation (dust/mist) = 3.18

ATE oral =18516.21

Acute Toxicity, inhalation - Category 4 (mist)

See the following table for individual ingredient acute toxicity data.

	LC50(4hr)	LDs	0
Chemical name	inh, rat	(Oral, rat)	(Rabbit, dermal)
Talc	N/Av	N/Av	N/Av
Silica	N/Av	N/Av	N/Av
Diethylenetriamine	0.07mg/L	1080 mg/kg	678mg/kg
Bisphenol A	>0.113mg/L (no deaths)	3300 mg/kg	3600mg/kg

## Other important toxicological hazards

: None reported by the manufacturer.

## SECTION 12. ECOLOGICAL INFORMATION

**Ecotoxicity** 

: Contains material that may be harmful in the environment. Do not release, unmonitored, into the environment.



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# Ecotoxicity data:

<u>Ingredients</u>		Toxicity to Fish				
	CAS No	LC50 / 96h	NOEC / 21 day	M Factor		
Talc	14807-96-6	>100mg/L (Zebra fish)	N/Av	None.		
Silica	14808-60-7	N/Av	N/Av	N/Av		
Diethylenetriamine	111-40-0	0.43mg/L (Guppy)	>10mg/L (Three-spined stickleback)	None.		
Bisphenol A	80-05-7	4.6mg/L (Fathead minnow)	N/Av	None.		

<u>Ingredients</u>	CAS No	Toxicity to Daphnia				
		EC50 / 48h	NOEC / 21 day	M Factor		
Talc	14807-96-6	N/Av	N/Av	None.		
Silica	14808-60-7	N/Av	N/Av	N/Av		
Diethylenetriamine	111-40-0	2mg/L (Water flea)	5.6mg/L (Water flea)	None.		
Bisphenol A	80-05-7	10.2mg/L (Water flea)	a) >3.146mg/L (Water flea)			

<u>Ingredients</u>	CAS No	Toxicity to Algae				
		EC50 / 96h or 72h	NOEC / 96h or 72h	M Factor		
Talc	14807-96-6	N/Av	N/Av	None.		
Silica	14808-60-7	N/Av	N/Av	N/Av		
Diethylenetriamine	111-40-0	187mg/L (Green algae)	10mg/L (Green algae)	None.		
Bisphenol A	80-05-7	2.73mg/L (Green algae)	N/Av	None.		

## Persistence and degradability

: No data is available on the product itself.

**Bioaccumulation potential**: No data is available on the product itself.

Components	Partition coefficent n-octanol/ater (log Kow)	Bioconcentration factor (BCF)
Talc (CAS 14807-96-6)		no known bioaccumulation
Diethylenetriamine (CAS 111-40-0)	-1.58	> 2.8 <= 6.3
Bisphenol A (CAS 80-05-7)	3.4	5.1-13.3

Mobility in soil : The product itself has not been tested.

Other Adverse Environmental effects

: None known.



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Handling for Disposal : Handle in accordance with good industrial hygiene and safety practice. Refer to

protective measures listed in sections 7 and 8.

Methods of Disposal : Dispose in accordance with all applicable federal, state, provincial and local

regulations.

RCRA : If this product, as supplied, becomes a waste in the United States, it may meet the

criteria of a hazardous waste as defined under RCRA, Title 40 CFR 261. It is the responsibility of the waste generator to determine the proper waste identification and disposal method. For disposal of unused or waste material, check with local, state

and federal environmental agencies.

Regulatory Information	UN Number	UN proper shipping name	Transport hazard class(es)	Packing Group	Label
49CFR/DOT	None.	Not regulated.	not regulated	none	
49CFR/DOT Additional information					
TDG	None.	Not regulated.	not regulated	none	$\otimes$
TDG Additional information					
IMDG	None.	Not regulated.	not regulated	none	$\otimes$
IMDG Additional information					
ICAO/IATA	None.	Not regulated.	not regulated	none	
ICAO/IATA Additional information					

**Special precautions for user** : Appropriate advice on safety must accompany the package.

Environmental hazards : See ECOLOGICAL INFORMATION, Section 12.

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

: This information is not available.

# SECTION 15 - REGULATORY INFORMATION

### **US Federal Information:**

Components listed below are present on the following U.S. Federal chemical lists:



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	TSCA		CERCLA	SARA TITLE III: Sec. 302, Extremely	SARA TITLE III: Sec. 313, 40 CFR 372, Specific Toxic Chemical		
<u>Ingredients</u>	CAS#	Inventory	Inventory Reportable Hazardous Substance, 40 CFR 117.302): CFR 355:	Toxic Chemical	de minimus Concentration		
Talc	14807-96-6	Yes	N/Ap	N/Av	No	N/Ap	
Silica	14808-60-7	Yes	N/Ap	N/Av	No	N/Ap	
Diethylenetriamine	111-40-0	Yes	N/Ap	N/Av	No	N/Ap	
Bisphenol A	80-05-7	Yes	N/Ap	N/Av	Yes	1%	

SARA TITLE III: Sec. 311 and 312, MSDS Requirements, 40 CFR 370 Hazard Classes: Immediate (Acute) health hazard; Chronic Health Hazard. Under SARA Sections 311 and 312, the EPA has established threshold quantities for the reporting of hazardous chemicals. The current thresholds are 500 pounds for the threshold planning quantity (TPQ), whichever is lower, for extremely hazardous substances and 10,000 pounds for all other hazardous chemicals.

### **US State Right to Know Laws:**

The following chemicals are specifically listed by individual States:

<u>Ingredients</u>	CAS#	Californi	nia Proposition 65		State "Right to Know" Lists				
	OAO#	Listed	Type of Toxicity	CA	MA	MN	NJ	PA	RI
Talc	14807-96-6	No	N/Ap	Yes	Yes	Yes	Yes	Yes	Yes
Silica	14808-60-7	Yes	airborne particles of	No	Yes	Yes	Yes	Yes	Yes
Diethylenetriamine	111-40-0	No	N/Ap	Yes	Yes	Yes	Yes	Yes	Yes
Bisphenol A	80-05-7	No	N/Ap	No	Yes	No	Yes	Yes	No

## Canadian Information:

Canadian Environmental Protection Act (CEPA): . All ingredients are present on the DSL.

WHMIS information: Refer to Section 2 for a WHMIS Classification for this product.

### **International Information:**

Components listed below are present on the following International Inventory list:

<u>Ingredients</u>	CAS#	European EINECs	Australia AICS	Philippines PICCS	Japan ENCS	Korea KECI/KECL	China IECSC	NewZealand IOC
Talc	14807-96-6	238-877-9	Present	Present	(1)-468; (1)-468	KE-32773	Present	No information available.
Silica	14808-60-7	238-878-4	Present	Present	(1)-548	KE-29983	Present	HSR003125
Diethylenetriamine	111-40-0	203-865-4	Present	Present	(2)-159	KE-10470	Present	HSR002966
Bisphenol A	80-05-7	201-245-8	Present	Present	(4)-123	KE-23982	Present	HSR003399

### SECTION 16. OTHER INFORMATION

: ACGIH: American Conference of Governmental Industrial Hygienists

AICS: Australian Inventory of Chemical Substances

ATE: Acute Toxicity Estimate



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CA: California

CAS: Chemical Abstract Services

CERCLA: Comprehensive Environmental Response, Compensation, and Liability

Act of 1980

CFR: Code of Federal Regulations CSA: Canadian Standards Association DOT: Department of Transportation ECHA: European Chemicals Agency

ECOTOX: U.S. EPA Ecotoxicology Database

EINECS: European Inventory of Existing Commercial chemical Substances

ENCS: Existing and New Chemical Substances EPA: Environmental Protection Agency HSDB: Hazardous Substances Data Bank

IARC: International Agency for Research on Cancer

IBC: Intermediate Bulk Container

IECSC: Inventory of Existing Chemical Substances IMDG: International Maritime Dangerous Goods

IOC: Inventory of Chemicals

IUCLID: International Uniform Chemical Information Database

KECI: Korean Existing Chemicals Inventory KECL: Korean Existing Chemicals List

LC: Lethal Concentration

LD: Lethal Dose
MA: Massachusetts
MN: Minnesota
N/Ap: Not Applicable
N/Av: Not Available

NIOSH: National Institute of Occupational Safety and Health

NJ: New Jersey

NOEC: No observable effect concentration NTP: National Toxicology Program

OECD: Organisation for Economic Co-operation and Development

OSHA: Occupational Safety and Health Administration

PA: Pennsylvania

PEL: Permissible exposure limit

PICCS: Philippine Inventory of Chemicals and Chemical Substances

RCRA: Resource Conservation and Recovery Act

RI: Rhode Island

RTECS: Registry of Toxic Effects of Chemical Substances SARA: Superfund Amendments and Reauthorization Act SDS: Safety Data Sheet / Material Safety Data Sheet

STEL: Short Term Exposure Limit

TDG: Canadian Transportation of Dangerous Goods Act & Regulations

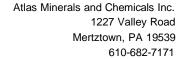
TLV: Threshold Limit Values
TSCA: Toxic Substance Control Act
TWA: Time Weighted Average

WHMIS: Workplace Hazardous Materials Identification System

1. ACGIH, Threshold Limit Values for Chemical Substances and Physical Agents & Biological Exposure Indices for 2014.

- 2. International Agency for Research on Cancer Monographs, searched 2015.
- 3. Canadian Centre for Occupational Health and Safety, CCInfoWeb databases, 2015 (Chempendium, HSDB and RTECs).
- 4. Material Safety Data Sheets from manufacturer.
- 5. US EPA Title III List of Lists October 2012 version.
- 6. California Proposition 65 List December 26, 2014 version

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Other special considerations for handling

: Provide adequate information, instruction and training for operators.

#### Prepared for:

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## Prepared by:

ICC The Compliance Center Inc.

Telephone: (888) 442-9628 (U.S.): (888) 977-4834 (Canada)

http://www.thecompliancecenter.com



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