

PRODUCT NAME: CONCRETE PRODUCTS
1. PRODUCT & COMPANY IDENTIFICATION

Supplier: Brampton Brick Ltd.
Address: 225 Wanless Drive
 Brampton, ON
 Canada L7A 1E9
Telephone: 1-800-462-7425

Product Identifier: Pavers, Interlocking Paving Stones, Retaining Wall Units, Garden Wall Units, Precast Pavers, Precast Slabs, Erosion Control Slabs, Pool Coping, Masonry Units, Window Sills, Keystones

Note: This MSDS covers many products. Individual composition of hazardous constituents will vary.

WHMIS Classification: D2A, E

2. INFORMATION ON COMPONENTS

<u>Component Name</u>	<u>%</u>	<u>CAS No.</u>
Amorphous Silica, Hydrated	30 - 60	7631-86-9
Aluminum Oxide	10 - 30	1344-28-1
Iron Oxide	5 - 30	1309-37-1
Calcium Oxide	1 - 25	1305-78-8
Carbon	0 - 10	7440-44-0
Crystalline Silica	0-10	14808-60-7
Magnesium Oxide	0 - 5	1309-48-4
Titanium Oxide	0 - 2	13463-67-7
Vanadium Compounds	0 - 0.1	Various
Arsenic Compounds	0 - 0.1	Various
Cadmium Compounds	0 - 0.1	Various
Lead Compounds	0 - 0.1	Various

EXPOSURE LIMITS

<u>Component Name</u>	<u>OSHA PEL TWA</u>	<u>ACGIH TLV TWA</u>
Crystalline Silica Quartz	10 mg/m ³ /(%SiO ₂ +2)	
Quartz (Respirable)	30 mg/m ³ /(%SiO ₂ +2)	0.05 mg/m ³
Quartz (Total Dust)		
*Amorphous Silica, Hydrated (Respirable Particulate)	80 mg/m ³ /%SiO ₂	3 mg/m ³
(Inhalable Particulate)		10 mg/m ³
Calcium Carbonate (Respirable Dust)	5 mg/m ³	
(Total Dust)	15 mg/m ³	10 mg/m ³
Magnesium Carbonate		10 mg/m ³
Mica (Respirable Dust)	20 mppcf	3 mg/m ³
Aluminum Silicates, Feldspar	2 mg (AL)/m ³	
Iron Oxide	10 mg/m ³	5 mg(Fe)/m ³
*Portland Cement (CAS 65997-15-1) (Respirable Dust)	5 mg/m ³	
(Total Dust)	15 mg/m ³	10 mg/m ³
Calcium Sulfate (Respirable Dust)	5 mg/m ³	
(Total Dust)	15 mg/m ³	10 mg/m ³
Magnesium Oxide	15 mg/m ³	10 mg/m ³
Aluminum Oxide (Respirable Fraction)	5 mg/m ³	
(Total Dust)	15 mg/m ³	10 mg/m ³
Calcium Oxide	5 mg/m ³	2 mg/m ³
Chromates	0.1 mg(CrO ₃)/m ³	0.05 mg(Cr)/m ³
Nuisance Dust (Respirable)	5 mg/m ³	3 mg/m ³
(Total /Inhalable)	15 mg/m ³	10 mg/m ³

* This value is for particulate matter containing no asbestos and <1% crystalline silica.

3. HAZARD IDENTIFICATION

Emergency Overview

Solid; grey powder; odorless.

Potential Health Effects

INHALATION (acute): Breathing dust may cause nose, throat or lung irritation and choking. The described effect depends on the degree of exposure.

INHALATION (chronic): Prolonged or repeated exposure may cause lung injury including silicosis. This product may contain crystalline silica. Crystalline silica has been classified by IARC as a known human carcinogen. Some human studies indicate potential for lung cancer from crystalline silica exposure. Risk of injury depends on duration and level of exposure. Long term exposures that result in silicosis may result in additional health effects.

EYE CONTACT (acute/chronic): May cause eye irritation and damage to cornea.

SKIN CONTACT (acute/chronic): May cause dry skin, redness, discomfort, and irritation. May produce allergic reaction potentially associated with hexavalent chromium. Thickening of the skin (scleroderma) may be associated with exposure to high levels of crystalline silica.

INGESTION (acute/chronic): Ingestion of large amounts may cause intestinal distress.

4. FIRST AID MEASURES

INHALATION: Move person to fresh air. Seek medical attention for discomfort.

EYE CONTACT: Rinse thoroughly with water. Seek medical attention for abrasions.

SKIN CONTACT: Wash with soap and water. Use moisturizing creams for irritated skin.

INGESTION: Do not induce vomiting, but drink plenty of water. Seek medical attention for discomfort.

5. FIREFIGHTING MEASURES

Flashpoint and Method: None.

Flammable Limits: Not combustible.

Auto ignition Temperature: None.

General Hazard: Avoid breathing dust.

Firefighting Instructions: None.

Firefighting Equipment: This product is not a fire hazard. Self-contained breathing apparatus is recommended to limit exposures to smoke from any combustion source.

Hazardous Combustion Products: None.

6. ACCIDENTAL RELEASE MEASURES

General: Wind blown dust may cause the hazards identified in Sec. 3.

Land Spill: Clean up spilled material.

Water Spill: Clean up spilled material.

7. HANDLING AND STORAGE

General: Avoid accidental release.

Storage Temperature: Unlimited.

Storage Pressure: Unlimited.

Empty Containers: Dispose of containers in an approved landfill or incinerator.

8. EXPOSURE CONTROL & PERSONAL PROTECTION

Engineering Controls

Use exhaust ventilation to maintain dust levels below exposure limits in workplaces with poor ventilation and dusty conditions.

Personal Protection

RESPIRATORY PROTECTION: Under ordinary conditions no respiratory protection is required. Wear a NIOSH approved respirator when exposed to dust above exposure limits.

EYE PROTECTION: Wear glasses or safety goggles to prevent contact with eyes. Wearing contact lenses when using this product under dusty conditions is not recommended.

SKIN PROTECTION: Wear gloves, shoes and protective clothing to prevent skin contact when handling pavers.

9. PHYSICAL AND CHEMICAL PROPERTIES

Vapor Pressure:	N/A
Vapor Density:	N/A
Specific Gravity:	2.6
Solubility in Water:	N/A
Evaporation Rate:	N/A
pH (in water):	N/A
Boiling Point:	N/A
Freezing Point:	None, solid
Viscosity:	None, solid

10. STABILITY AND REACTIVITY

General: Product is stable.

Incompatible Materials and Conditions to Avoid: None known.

Hazardous Decomposition: None, powdered solid.

11. MSDS PREPARATION AND TOXICOLOGICAL INFORMATION

For detailed toxicological information contact:

Brampton Brick Limited
225 Wanless Drive
Brampton, ON
Canada L7A 1E9
Telephone: 1-800-462-7425

12. ECOLOGICAL INFORMATION

For detailed ecological information: See Section 11 above.

13. DISPOSAL CONSIDERATIONS

Dispose in landfill in accordance with all applicable regulations. Any disposal practice must be in compliance with local, provincial, state and federal laws and regulations. Contact local environmental agency for specific rules.

14. REQUIRED TRANSPORT INFORMATION

Not a hazardous material for DOT or TDG shipping.

15. REGULATORY INFORMATION

This product has been classified in accordance with the hazard criteria of the Controlled Products Regulations and the MSDS contains all the information required by the Controlled Products Regulations.

OSHA Hazard Communication Rule, 29 CFR 1910.1200:

Some constituents identified in this product are considered by OSHA to be hazardous and should be included in the employer's hazard communication program.

CERCLA/SUPERFUND, 40 CFR 117,302: Not listed.

SARA TITLE III, Sections 311-312 Hazard Category:

This product has been reviewed according to the EPA Hazard Categories promulgated under Sections 311 and 312 of the Superfund Amendment and Reauthorization Act of 1986 and is considered a hazardous chemical and a delayed health hazard.

SARA Section 313 Information:

This product contains NONE of the substances subject to the reporting requirements of Section 313 of Title III of the Superfund Amendments and Reauthorization Act of 1986 and 40 CFR Part 372.

Toxic Substance Control Act (TSCA): Some constituents identified in this product are listed on the TSCA Inventory.

California Proposition 65:

CRYSTALLINE SILICA (CAS - 14808-60-7) is considered to be a carcinogen by the state of California.

WHMIS Information

This product contains substances considered to be hazardous by Health Canada and is a controlled product. Consult local authorities for acceptable exposure limits.

WHMIS Information – <http://www.hcsc.gc.ca/whmis>

16. OTHER INFORMATION

Abbreviations:

CAS No Chemical Abstract Service number
OSHA Occupational Safety and Health Administration
PEL Permissible Exposure Limit
ACGIH American Conference of Governmental Industrial Hygienists
TL Threshold Limit Value
TWA Time Weighted Average (8 hour)
CL Ceiling Limit
mg/m³ milligrams per cubic meter
IARC International Agency for Research on Cancer
NIOSH National Institute for Occupational Safety and Health
PH negative log of hydrogen ion
> greater than
DOT U.S. Department of Transportation
TDG Transportation of Dangerous Goods
CFR Code for Federal Regulations
CERCLA Comprehensive Environmental Response, Compensation and Liability Act
SARA Superfund Amendments and Reauthorization Act
WHMIS Workplace Hazardous Materials Information System

Information in this MSDS is believed to be current and accurate at the time provided. It is the user's obligation to determine the conditions of safe use of this product.