

Material Safety Data Sheet

CertainTeed

HEALTH	*	1
FLAMMABILITY		1
PHYSICAL HAZARD		0
PERSONAL PROTECTION		E

MSDS Number: CT 10103-2
DATE PREPARED: July 28, 2008

1. CHEMICAL PRODUCT AND COMPANY IDENTIFICATION

Product/Trade Name:
CertainTeed Fiber Cement Trim

Chemical Name: Mixture
CAS #: Not Applicable
Common Name: None
Product Use: Fiber cement trim product

MANUFACTURER INFORMATION:
CertainTeed Corporation
P.O. Box 860
Valley Forge, PA 19482-0101

TELEPHONE AND E-MAIL:
(610) 341-7000 9 AM – 5 PM
(Eastern Time – USA)
CertainTeed-EHS@saint-gobain.com

*EMERGENCY TELEPHONE: CHEMTREC (800) 424-9300
OUTSIDE OF THE U.S. CHEMTREC (703) 527-3887*

2. HAZARD IDENTIFICATION

Emergency Overview

Product is sold as a solid gray board. The information in this MSDS is provided for situations where this "article" may be deformed creating dust or fumes which may be potentially hazardous, Exposure to powder or dust may be irritating to the eyes, nose and throat. As with any dust, pre-existing upper respiratory and lung diseases or conditions may be aggravated.

Routes of Exposure: Inhalation, ingestion, eye, and skin contact.

Potential Health Effects: Eyes:
Dust or powder may irritate eye tissue. Rubbing may cause abrasion of cornea.

Potential Health Effects: Skin:
Dust or powder may irritate the skin. Mechanical rubbing may increase skin irritation.

Potential Health Effects: Ingestion:
Ingestion of this product is not likely to occur under normal conditions of use. If ingestion occurs, irritation of the gastrointestinal tract may occur.

Potential Health Effects: Inhalation

Acute Inhalation: Dust may cause temporary irritation of the nose, throat, and airways, resulting in coughing and sneezing. As with any dust, pre-existing upper respiratory and lung diseases or conditions may be aggravated. Actual lung injury from acute exposure is rare but possible. Symptoms of acute silicosis are similar to chronic silicosis (below) but may also include weight loss and fever.

Chronic Inhalation: Repeated or prolonged exposures to dust containing crystalline silica may result in chest pain, difficulty breathing, lung damage and silicosis. Silicosis is the permanent deposition of silica in lung tissue which results in lung damage. There may exist a relationship between silicosis and certain cancers. This product also contains titanium dioxide (13463-67-7) which is classified as group 2B carcinogen (possibly carcinogenic to humans) by IARC.

Medical Conditions Aggravated by Exposure:

As with any dust, pre-existing upper respiratory and lung diseases or conditions may be aggravated.

HMIS Ratings: Health: *2 Fire: 0 Physical Hazard: 0

Hazard Scale: 0 = Minimal 1 = Slight 2 = Moderate 3 = Serious 4 = Severe * = Chronic hazard

3. COMPOSITION / INFORMATION ON INGREDIENTS

CAS #	Component	Percent
Not Available	Hydrated tricalcium disilicate	25-40
1317-65-3	Limestone	10-40
1305-62-0	Calcium hydroxide	<20
Not Available	Hydrated tricalcium monosulfoaluminate	7-10
9004-34-6	Cellulose	8-10
Not Available	Moisture	6-10
Not Available	Hydrated hexacalcium aluminumferrite	6-10
12168-85-3	Calcium oxide silicate (Ca ₃ O(SiO ₄))	<5
Not Available	Hydrated tricalcium trisulfoaluminate	1-3
12042-78-3	Aluminate (AlO ₃ ³⁻), calcium (2:3)	0.1-1
10034-77-2	Silicic acid (H ₄ SiO ₄), calcium salt (1:2)	0.1-2
12068-35-8	Aluminium dicalcium iron pentaoxide	0.1-1
7778-18-9	Calcium sulfate	0.1-1
14808-60-7	Quartz	0.1-1
1305-78-8	Calcium oxide	0.1-0.5
Not Available	Acrylic polymer	0.1-0.5
37244-96-5	Nepheline syenite	0.1-0.2
14807-96-6	Talc	0.1-0.2
13463-67-7	Titanium dioxide	0.1-0.2

Component Related Regulatory Information

This product may be regulated, have exposure limits or other information identified as the following: Calcium Carbonates, Quartz (14808-60-7).

Component Information/Information on Non-Hazardous Components

This material is considered an "article" under 29 CFR 1910.1200 (Hazard Communication) and Canadian Controlled Product Regulations. The information in this MSDS is provided for situations where this article may be deformed creating dusts or fumes which may be potentially hazardous.

4. FIRST AID MEASURES**First Aid: Eyes**

Do not rub or scratch your eyes. Dust particles may cause the eye to be scratched. Flush eyes with large amounts of water for 15 minutes. If irritation persists, contact a physician.

First Aid: Skin

Wash gently with soap and warm water to remove dust and fibers. Wash hands before eating or using the restroom. If irritation persists, get medical attention.

First Aid: Ingestion

Due to the physical nature of this material, ingestion is unlikely to occur. If ingestion of a large amount does occur, seek medical attention.

First Aid: Inhalation

If inhaled, remove the affected person to fresh air. If symptoms persist, get medical attention.

5. FIRE FIGHTING MEASURES**General Fire Hazards:**

See Section 9 for Flammability Properties.
This product is combustible at high temperatures.

Hazardous Combustion Products:

This product is not considered combustible.

Extinguishing Media:

Use methods suitable for the surrounding fire.

Fire Fighting Equipment/Instructions

Firefighters should wear full protective clothing including self contained breathing apparatus.

NFPA Ratings: Health: 2 Fire: 1 Reactivity: 0

Hazard Scale: 0 = Minimal 1 = Slight 2 = Moderate 3 = Serious 4 = Severe

6. ACCIDENTAL RELEASE MEASURES

Containment Procedures:

Pick up large pieces. Vacuum dusts. If sweeping is necessary, use a dust suppressant such as water. Do not dry sweep dust accumulation. These procedures will help to minimize potential exposures.

Clean-Up Procedures:

Avoid the generation of dusts during clean-up. Wear a dust mask if dust is generated above exposure limits. Wear appropriate protective equipment and clothing during clean-up. Pick up or scoop up material and put into a suitable container for disposal as a non-hazardous waste.

Evacuation Procedures: None expected.

Special Procedures:

When operating power tools to saw, cut, drill or sand this product, wear a NIOSH approved disposable dust mask or respirator equipped with an N, P, or R cartridge and follow the respirator manufacturer's instructions if dust is generated above exposure limits. Wear appropriate respiratory and other protective equipment and clothing during clean-up.

7. HANDLING AND STORAGE

Handling Procedures:

Avoid breathing dusts from this material. Customary personal hygiene measures, such as washing hands and clothing changes after working with these products, are recommended.

Storage Procedures:

Warehouse storage should be in accordance with package directions, if any.

8. EXPOSURE CONTROL / PERSONAL PROTECTION

A: Component Exposure Limits

Limestone (1317-65-3)

ACGIH: 0.025 mg/m³ TWA (respirable fraction) (related to Silica, crystalline, a-quartz)
OSHA: 15 mg/m³ TWA (total dust); 5 mg/m³ TWA (respirable fraction)
((250)/(%SiO₂ + 5) mppcf TWA (respirable)); ((10)/(%SiO₂ + 2) mg/m³ TWA (respirable));
((30)/(%SiO₂ + 2) mg/m³ TWA (total dust)) (related to Quartz)
NIOSH: 10 mg/m³ TWA (total dust); 5 mg/m³ TWA (respirable dust)

Calcium hydroxide (1305-62-0)

ACGIH: 5 mg/m³ TWA
OSHA: 15 mg/m³ TWA (total dust); 5 mg/m³ TWA (respirable fraction)
NIOSH: 5 mg/m³ TWA

Cellulose (9004-34-6)

ACGIH: 10 mg/m³ TWA
OSHA: 15 mg/m³ TWA (total dust); 5 mg/m³ TWA (respirable fraction)
NIOSH: 10 mg/m³ TWA (total dust); 5 mg/m³ TWA (respirable dust)

Calcium sulfate (7778-18-9)

ACGIH: 10 mg/m³ TWA (inhalable fraction)
OSHA: 15 mg/m³ TWA (total dust); 5 mg/m³ TWA (respirable fraction)
NIOSH: 10 mg/m³ TWA (total dust); 5 mg/m³ TWA (respirable dust)

Calcium oxide (1305-78-8)

ACGIH: 2 mg/m³ TWA
OSHA: 5 mg/m³ TWA
NIOSH: 2 mg/m³ TWA

Talc (14807-96-6)

ACGIH: 2 mg/m³ TWA (respirable fraction, particulate matter containing no asbestos and <1% crystalline silica)
OSHA: 20 mppcf TWA (if 1% quartz or more, use quartz limit)
NIOSH: 2 mg/m³ TWA (respirable dust, containing no asbestos and less than 1% quartz)

Titanium dioxide (13463-67-7)

ACGIH: 10 mg/m³ TWA
OSHA: 15 mg/m³ TWA (total dust)

Quartz (14808-60-7)

ACGIH: 0.025 mg/m³ TWA (respirable fraction)
OSHA: ((250)/(100-%SiO₂ + 5) mppcf TWA (respirable)); ((10)/(100-%SiO₂ + 2) mg/m³ TWA (respirable)); ((30)/(100-%SiO₂ + 2) mg/m³ TWA (total dust))
NIOSH: 0.05 mg/m³ TWA (respirable dust)

Engineering Controls:

Keep exposures to dust generated from cutting, drilling, routing, sawing or crushing, as low as possible. Whenever possible, perform machining of trim product in a well-ventilated area (outside) and use local exhaust ventilation to keep exposures below the recommended exposure limits. Whenever possible, use wet saws or saw blades designed for fiber cement. The "score and snap" method or the use of pneumatic/electric shears are work practices which minimize dusts. Vacuum attached equipment may also be useful in controlling dust, however wet methods are preferred.

PERSONAL PROTECTIVE EQUIPMENT**Personal Protective Equipment: Eyes/Face**

Safety glasses with side shields are recommended to keep dust and fibers out of the eyes and to reduce the risk of eye injury as a result of construction activities.

Personal Protective Equipment: Skin

Wear leather or other appropriate work gloves, if necessary for type of operation to prevent mechanical skin contact and irritation.

Personal Protective Equipment: Respiratory

Wear NIOSH-approved disposable respirator (dust mask) or air-purifying cartridge respirator fitted with N, P, or R series filters.

Personal Protective Equipment: General

Keep formation of airborne dusts to a minimum. Use good personal hygiene practices when handling this product.

9. PHYSICAL AND CHEMICAL PROPERTIES

<p>Appearance: Solid gray boards with varying dimensions according to product specifications. Some may be coated with an acrylic primer.</p> <p>Physical State: solid</p> <p>Vapor Pressure: not applicable</p> <p>Boiling Point: not applicable</p> <p>Solubility (H2O): less than 0.1 g/L</p> <p>Flash Point: not applicable</p> <p>Lower Flammability Limit: not applicable</p> <p>Auto Ignition Temp.: not applicable</p>	<p>Odor: none</p> <p>pH: not applicable</p> <p>Vapor Density: not applicable</p> <p>Melting Point: not applicable</p> <p>Specific Gravity: 1.0-1.1 at 25°C</p> <p>Flash Point Method: not applicable</p> <p>Upper Flammability Limit: not applicable</p> <p>Burning Rate: not applicable</p>
---	--

10. CHEMICAL STABILITY AND REACTIVITY INFORMATION

Chemical Stability: This is a stable material.

Conditions to Avoid: Avoid dispersion of dust in air.

Incompatibility: None identified

Hazardous Decomposition: None identified.

Possibility of Hazardous Reactions: Will not occur.

11. TOXICOLOGICAL INFORMATION

Acute Dose Effects

A: General Product Information:

This product is not toxic in its intact form. The dusts and fibers from this product are mechanical irritants and may cause transitory irritation to exposed areas such as eyes, skin, and upper respiratory passages.

Carcinogenicity

A: General Product Information:

No carcinogenicity data available for this product. Components of the product have been identified as carcinogens by IARC, NIOSH, and ACGIH.

B: Component Carcinogenicity:

Limestone (1317-65-3)

- ACGIH: A2 - Suspected Human Carcinogen (related to Silica, crystalline, quartz)
- NIOSH: potential occupational carcinogen (related to Silica, crystalline)
- NTP: Known Carcinogen (related to Silica, crystalline (respirable size)) (Select Carcinogen)
- IARC: Monograph 68 [1997] (listed under Crystalline silica inhaled in the form of quartz or cristobalite from occupational sources) (related to Silica, quartz) (Group 1 (carcinogenic to humans))

Talc (14807-96-6)

- ACGIH: A4 - Not Classifiable as a Human Carcinogen (containing no asbestos fibers); A1 - Confirmed Human Carcinogen (containing asbestos fibers)
- IARC: Monograph 93 posted (inhaled), Supplement 7 [1987], Monograph 42 [1987] (Group 3 (not classifiable))

Titanium dioxide (13463-67-7)

- ACGIH: A4 - Not Classifiable as a Human Carcinogen
- NIOSH: potential occupational carcinogen
- IARC: Monograph 93 posted, Monograph 47 [1989] (Group 2B (possibly carcinogenic to humans))

Quartz (14808-60-7)

- ACGIH: A2 - Suspected Human Carcinogen
- NIOSH: potential occupational carcinogen
- NTP: Known Carcinogen (Select Carcinogen)
- IARC: Monograph 68 [1997] (listed under Crystalline silica inhaled in the form of quartz or cristobalite from occupational sources) (Group 1 (carcinogenic to humans))

Mutagenicity: No information available for the product.

Teratogenicity: No information available for the product.

Developmental Effects: No information available for the product.

12. ECOLOGICAL INFORMATION

Ecotoxicity

A: General Product Information:

No information available for the product. The product is not biodegradable.

B: Component Analysis - Ecotoxicity - Aquatic Toxicity:

Calcium hydroxide (1305-62-0)

Test & Species		Conditions
96 Hr LC50 <i>Gambusia affinis</i>	160 mg/L	Static

Calcium sulfate (7778-18-9)

Test & Species		Conditions
96 Hr LC50 <i>Lepomis macrochirus</i>	2980 mg/L	Static
120 Hr EC50 <i>Nitscheria linearis</i>	3200 mg/L	

Calcium oxide (1305-78-8)

Test & Species		Conditions
96 Hr LC50 <i>Cyprinus carpio</i>	1070 mg/L	Static

Talc (14807-96-6)

Test & Species		Conditions

96 Hr LC50 Brachydanio rerio >100 g/L Semi-static

Environmental Fate: No information available for the product.

13. WASTE DISPOSAL CONSIDERATIONS

US EPA Waste Number & Descriptions

A: General Product Information:

This product, as supplied, is not regulated as a hazardous waste by the U.S. Environmental Protection Agency (EPA) under Resource Conservation and Recovery Act (RCRA) regulations. Comply with state and local regulations for disposal. If you are unsure of the regulations, contact your local Public Health Department, or the local office of the EPA.

B: Component Waste Numbers:

No EPA-listed Waste Numbers are being shown for this product's components.

Disposal Instructions:

Waste must be handled in accordance with all federal, state, provincial, and local regulations. See Section 7 for Handling Procedures. See Section 8 for Personal Protective Equipment recommendations.

14. TRANSPORTATION INFORMATION

US DOT Information:

Shipping Name: This product is not classified as a hazardous material for transport.

TDG Information

Shipping Name: This material is not classified as a dangerous good for transportation.

15. REGULATORY INFORMATION

US Federal Regulations

A: General Product Information:

Components of this product have been checked against the non-confidential TSCA inventory by CAS Registry Number. Components not identified on this non-confidential inventory are either exempt from listing (i.e. polymers, hydrates) or are listed on the confidential inventory as declared by the supplier.

B: CERCLA :

None of the components of this product are listed under CERCLA (40 CFR 302.4) and present in the material at an amount exceeding the Reportable Quantity (RQ).

State Regulations

A: General Product Information:

Other state regulations may apply. Check individual state requirements.

B: Component Analysis – State:

The following components appear on one or more of the following state hazardous substances lists:

Component	CAS #	CA	MA	MN	NJ	PA	RI
Limestone (related to Silica, Quartz)	1317-65-3	No	Yes	Yes	Yes ¹	Yes	Yes
Calcium hydroxide	1305-62-0	Yes	Yes	Yes	Yes	Yes	Yes
Cellulose	9004-34-6	No	Yes	Yes	No	Yes	Yes
Calcium sulfate	7778-18-9	No	Yes	Yes	No	Yes	No
Calcium oxide	1305-78-8	Yes	Yes	Yes	Yes	Yes	Yes
Talc	14807-96-6	Yes	Yes	Yes	Yes	Yes	Yes
Titanium dioxide	13463-67-7	No	Yes	Yes	Yes	Yes	Yes
Quartz	14808-60-7	No	Yes	Yes	Yes	Yes	Yes

C: California Safe Drinking Water and Toxics Enforcement Act (Proposition 65):

The following statement(s) are provided under the California Safe Drinking Water and Toxic Enforcement Act of 1986 (Proposition 65):

WARNING! This product contains a chemical known to the state of California to cause cancer.

Canadian WHMIS Information

A: General Product Information: WHMIS Classification:

This product is not a Controlled Product according to the Canadian Hazardous Products Act.

B: Component Analysis - WHMIS IDL:

The following components are identified under the Canadian Hazardous Products Act Ingredient Disclosure List:

Component	CAS #	Minimum Concentration
Limestone	1317-65-3	1 % (related to Silica-crystalline, quartz)
Calcium hydroxide	1305-62-0	1 %
Quartz	14808-61-7	0.1 %

Additional Regulatory Information

A: General Product Information: No additional information available.

B: Component Analysis – Inventory:

Component	CAS #	TSCA	DSL	EINECS
Limestone	1317-65-3	Yes	No	Yes
Calcium hydroxide	1305-62-0	Yes	Yes	Yes
Cellulose	9004-34-6	Yes	Yes	Yes
Calcium oxide silicate (Ca ₃ O(SiO ₄))	12168-85-3	Yes	Yes	Yes
Aluminate (AlO ₃ ³⁻), calcium (2:3)	12042-78-3	Yes	Yes	Yes
Silicic acid (H ₄ SiO ₄), calcium salt (1:2)	10034-77-2	Yes	Yes	Yes
Aluminium dicalcium iron pentaoxide	12068-35-8	Yes	No	Yes
Calcium sulfate	7778-18-9	Yes	Yes	Yes
Calcium oxide	1305-78-8	Yes	Yes	Yes
Nepheline syenite	37244-96-5	No	Yes	No
Talc	14807-96-6	Yes	Yes	Yes
Titanium dioxide	13463-67-7	Yes	Yes	Yes
Quartz	14808-60-7	Yes	Yes	Yes

16. ADDITIONAL COMMENTS

Other Information

Disclaimer: Supplier gives no warranty of merchantability or of fitness for a particular purpose. Any product purchased is sold on the assumption the purchaser will make his own tests to determine the quality and suitability of the product. Supplier expressly disclaims any and all liability for incidental and/or consequential property damage arising out of the use of this product. No information provided shall be deemed to be a recommendation to use any product in conflict with any existing patent rights. Read the Material Safety Data Sheet before handling product.

Acronyms/definitions used in this MSDS:

- ACGIH American Conference of Governmental Industrial Hygienists;
- CAS # Chemical Abstracts Services Number;
- CERCLA Comprehensive Environmental Response, Compensation and Liability Act;
- CFR Code of Federal Regulations;
- DSL Domestic Substance List;
- EINECS European Inventory of Existing Chemical Substances;
- EPA Environmental Protection Agency;
- HMIS Hazardous Material Identification System;
- IARC International Agency for Research on Cancer;
- LFL Lower Flammable Limit;
- mg/m³ Milligrams per cubic meter;
- NFPA National Fire Protection Association;
- NIOSH National Institute for Occupational Safety and Health;
- NTP National Toxicology Program;
- OSHA Occupational Safety and Health Administration;
- ppm Parts per million;
- PEL Permissible Exposure Limit;
- REL Recommended Exposure Limit;
- SARA Superfund Amendments and Reauthorization Act;

RCRA Title III	Resource Conservation and Recovery Act; Emergency Planning and Community Right to Know Act; Section 302- Extremely Hazardous Substances; Section 313- Toxic Chemicals;
TLV	Threshold Limit Value;
TSCA	Toxic Substance Control Act;
TWA	Time Weighted Average;
UFL	Upper Flammable Limit.

MSDS History

MSDS Revision Summary:

<u>Date</u>	<u>MSDS No.</u>	<u>Comments</u>
10/17/07	CT 10103-1	New MSDS
11/05/07	CT 10103-1	Additional product information
07/28/08	CT 10103-2	Clarification of Quartz concentration

This is the end of MSDS # CT 10103-2