

Flint

Safety Data Sheet

according to the federal final rule of hazard communication revised on 2012 (HazCom 2012)

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

1.1. Product identifier

Trade name : Flint, Abrasive Flint, True Grit, Chat; all grades

1.2. Relevant identified uses of the substance or mixture and uses advised against

Use of the substance/mixture : Construction material used in concrete, asphalt and epoxy

Use advised against : None identified

1.3. Details of the supplier of the safety data sheet

Flint Rock Products
3211 South Hwy 69
Picher, OK 74360

Tel: 1-918-673-1737

1.4. Emergency telephone number

Emergency number : 1-918-325-0200

1-918-325-1890

SECTION 2: Hazards identification

2.1. Classification of the substance or mixture

GHS-US classification

Carc. 1A H350

Full text of H-statements: see section 16

2.2. Label elements

GHS-US labelling

Hazard pictograms (GHS-US) :



GHS08

Signal word (GHS-US) : Danger

Hazard statements (GHS-US) : H350 - May cause cancer (lungs)

Precautionary statements (GHS-US) : P201 - Obtain special instructions before use
P202 - Do not handle until all safety precautions have been read and understood
P280 - Wear protective gloves/protective clothing/eye protection/face protection
P308+P313 - If exposed or concerned: Get medical advice/attention
P405 - Store locked up
P501 - Dispose of contents/container to hazardous or special waste collection point, in accordance with local, regional, national and/or international regulation

2.3. Other hazards

No additional information available

2.4. Unknown acute toxicity (GHS US)

Not applicable

SECTION 3: Composition/information on ingredients

3.1. Substance

Not applicable

3.2. Mixture

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Name	Product identifier	%	GHS-US classification
Quartz	(CAS No) 14808-60-7	> 90	Carc. 1A, H350
Dolomite	(CAS No) 16389-88-1	8.4	Not classified
Carbonic acid, calcium salt (1:1)	(CAS No) 471-34-1	1.1	Not classified
Zinc sulfide	(CAS No) 1314-98-3	0.3	Not classified
Zinc oxide	(CAS No) 1314-13-2	0.1	Not classified
Lead	(CAS No) 7439-92-1	< 0.04	

Full text of H-statements: see section 16

SECTION 4: First aid measures

4.1. Description of first aid measures

- First-aid measures general : Never give anything by mouth to an unconscious person. If you feel unwell, seek medical advice (show the label where possible).
- First-aid measures after inhalation : Allow breathing of fresh air. Allow the victim to rest.
- First-aid measures after skin contact : Remove affected clothing and wash all exposed skin area with mild soap and water, followed by warm water rinse.
- First-aid measures after eye contact : Rinse immediately with plenty of water. Obtain medical attention if pain, blinking or redness persists.
- First-aid measures after ingestion : Rinse mouth. Do NOT induce vomiting. Give one or two glasses of water. If discomfort persists, obtain emergency medical attention.

4.2. Most important symptoms and effects, both acute and delayed

- Symptoms/injuries after inhalation : Shortness of breath, coughing, and reduced pulmonary function. Prolonged inhalation of respirable silica will result in permanent lung damage, Silicosis. May cause cancer by inhalation.
- Symptoms/injuries after skin contact : Prolonged contact may cause dermatitis.
- Symptoms/injuries after eye contact : Contact with small particles may cause physical irritation.
- Symptoms/injuries after ingestion : May cause gastrointestinal discomfort.

4.3. Indication of any immediate medical attention and special treatment needed

Treat symptomatically

SECTION 5: Firefighting measures

5.1. Extinguishing media

- Suitable extinguishing media : Use fire-extinguishing media appropriate for surrounding materials. Foam. Dry powder. Carbon dioxide. Water spray.
- Unsuitable extinguishing media : None

5.2. Special hazards arising from the substance or mixture

No additional information available

5.3. Advice for firefighters

- Firefighting instructions : Exercise caution when fighting any chemical fire.
- Protective equipment for firefighters : Do not enter fire area without proper protective equipment, including respiratory protection.

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

6.1.1. For non-emergency personnel

- Emergency procedures : Evacuate unnecessary personnel.

6.1.2. For emergency responders

- Protective equipment : Equip cleanup crew with proper protection.
- Emergency procedures : Ventilate area.

6.2. Environmental precautions

Prevent entry to sewers and public water.

6.3. Methods and material for containment and cleaning up

- Methods for cleaning up : Contain for re-use. Store away from other materials. Clean up using approved, dustless methods (water or vacuum) to minimize generation of respirable silica particles.

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6.4. Reference to other sections

See Heading 8. Exposure controls and personal protection.

SECTION 7: Handling and storage

7.1. Precautions for safe handling

Precautions for safe handling : Provide good ventilation in process area to prevent formation of vapour. Obtain special instructions before use. Do not handle until all safety precautions have been read and understood. Avoid generation of dust. Handle in well ventilated area.

Hygiene measures : Do not eat, drink or smoke when using this product. Always wash hands after handling the product.

7.2. Conditions for safe storage, including any incompatibilities

Storage conditions : No special storage requirements.

Incompatible materials : Strong bases. Strong acids.

7.3. Specific end use(s)

No additional information available

SECTION 8: Exposure controls/personal protection

8.1. Control parameters

Quartz (14808-60-7)		
ACGIH	ACGIH TWA (mg/m ³)	0.025 mg/m ³ (respirable fraction)
OSHA	Remark (OSHA)	(3) See Table Z-3.

Zinc oxide (1314-13-2)		
ACGIH	ACGIH TWA (mg/m ³)	2 mg/m ³
ACGIH	ACGIH STEL (mg/m ³)	10 mg/m ³
ACGIH	ACGIH Ceiling (mg/m ³)	10 mg/m ³ respirable fraction
ACGIH	Remark (ACGIH)	Metal fume fever
OSHA	OSHA PEL (TWA) (mg/m ³)	5 mg/m ³ (respirable)

8.2. Exposure controls

Appropriate engineering controls : Ensure good ventilation of the work station. Local mechanical to reduce respirable silica to below safe levels. Respiratory Protection (Type): Use NIOSH approved equipment. Positive pressure supplied air-type Recommended. Emergency eye wash fountains should be available in the immediate vicinity of any potential exposure.

Personal protective equipment : Protective goggles. Gloves. Insufficient ventilation: wear respiratory protection.



Hand protection : In case of prolonged contact wear protective gloves.

Eye protection : Chemical goggles or safety glasses.

Respiratory protection : Insufficient ventilation: Wear appropriate mask.

SECTION 9: Physical and chemical properties

9.1. Information on basic physical and chemical properties

Physical state : Solid

Colour : White to Tan

Odour : Odourless

Odour threshold : No data available

pH : Not applicable

Relative evaporation rate (butyl acetate=1) : Not applicable

Melting point : 3180 °F (1750 °C)

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Freezing point	: Not applicable
Boiling point	: 4046 °F (2230 °C)
Flash point	: Not applicable
Auto-ignition temperature	: Not applicable
Decomposition temperature	: No data available
Flammability (solid, gas)	: No data available
Vapour pressure	: Not applicable
Relative vapour density at 20 °C	: Not applicable
Relative density	: 2.51 (water=1)
Solubility	: Water: Solubility in water of component(s) of the mixture : • Dolomite (CaMg(CO ₃) ₂): 0.32 g/l (at 18 °C) • Carbonic acid, calcium salt (1:1): 14.0 - 15.3 mg/l (at 25 °C) • Zinc sulfide: < 10 mg/l
Log Pow	: No data available
Log Kow	: No data available
Viscosity, kinematic	: Not applicable
Viscosity, dynamic	: Not applicable
Explosive properties	: Not applicable
Oxidising properties	: Not applicable
Explosive limits	: Not applicable

9.2. Other information

No additional information available

SECTION 10: Stability and reactivity

10.1. Reactivity

No additional information available

10.2. Chemical stability

The product is stable at normal handling and storage condition

10.3. Possibility of hazardous reactions

Hazardous polymerization will not occur.

10.4. Conditions to avoid

None

10.5. Incompatible materials

ClF₃, MnF₃, OF₂

10.6. Hazardous decomposition products

None

SECTION 11: Toxicological information

11.1. Information on toxicological effects

Acute toxicity : Not classified

Carbonic acid, calcium salt (1:1) (471-34-1)	
LD50 oral rat	6450 mg/kg
ATE US (oral)	6450.000 mg/kg bodyweight
Zinc sulfide (1314-98-3)	
LD50 oral rat	> 2 g/kg
LC50 inhalation rat (mg/l)	> 5040 mg/m ³ (Exposure time: 4 h)
Zinc oxide (1314-13-2)	
LD50 oral rat	> 5000 mg/kg

Skin corrosion/irritation	: Not classified
Serious eye damage/irritation	: Not classified
Respiratory or skin sensitisation	: Not classified

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Germ cell mutagenicity : Not classified
Carcinogenicity : May cause cancer (lungs).

Quartz (14808-60-7)	
IARC group	1 - Carcinogenic to humans
National Toxicology Program (NTP) Status	2 - Known Human Carcinogens

Reproductive toxicity : Not classified
Specific target organ toxicity (single exposure) : Not classified

Specific target organ toxicity (repeated exposure) : Not classified

Aspiration hazard : Not classified
Potential Adverse human health effects and symptoms : Based on available data, the classification criteria are not met.
Symptoms/injuries after inhalation : May cause cancer by inhalation. Shortness of breath, coughing, and reduced pulmonary function. Prolonged inhalation of respirable silica will result in permanent lung damage, Silicosis

SECTION 12: Ecological information

12.1. Toxicity

No additional information available

12.2. Persistence and degradability

Not established.

12.3. Bioaccumulative potential

Not established.

Dolomite (CaMg(CO ₃) ₂) (16389-88-1)	
BCF fish 1	(no known bioaccumulation)

Carbonic acid, calcium salt (1:1) (471-34-1)	
BCF fish 1	(no bioaccumulation)

12.4. Mobility in soil

Not established.

Quartz (14808-60-7)	
Ecology - soil	Low mobility (soil).

12.5. Other adverse effects

Effect on ozone layer : No additional information available
Effect on the global warming : No additional information available

SECTION 13: Disposal considerations

13.1. Waste treatment methods

Waste disposal recommendations : Dispose in a safe manner in accordance with local/national regulations.
Ecology - waste materials : Avoid release to the environment.

SECTION 14: Transport information

In accordance with DOT
Not regulated for transport

Additional information

Other information : No supplementary information available.

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ADR

No additional information available

Transport by sea

No additional information available

Air transport

No additional information available

SECTION 15: Regulatory information

15.1. US Federal regulations

All components of this product are listed, or excluded from listing, on the United States Environmental Protection Agency Toxic Substances Control Act (TSCA) inventory

This product or mixture does not contain a toxic chemical or chemicals in excess of the applicable concentration as specified in 40 CFR §372.38(a) 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.

15.2. International regulations

CANADA

Quartz (14808-60-7)	
Listed on the Canadian DSL (Domestic Substances List)	
WHMIS Classification	Class D Division 2 Subdivision A - Very toxic material causing other toxic effects
Dolomite (CaMg(CO₃)₂) (16389-88-1)	
Listed on the Canadian NDSL (Non-Domestic Substances List)	
WHMIS Classification	Uncontrolled product according to WHMIS classification criteria
Carbonic acid, calcium salt (1:1) (471-34-1)	
Listed on the Canadian DSL (Domestic Substances List)	
WHMIS Classification	Uncontrolled product according to WHMIS classification criteria
Zinc sulfide (1314-98-3)	
Listed on the Canadian DSL (Domestic Substances List)	
WHMIS Classification	Uncontrolled product according to WHMIS classification criteria
Zinc oxide, dust (1314-13-2)	
Listed on the Canadian DSL (Domestic Substances List)	
WHMIS Classification	Uncontrolled product according to WHMIS classification criteria

EU-Regulations

Quartz (14808-60-7)	
Listed on the EEC inventory EINECS (European Inventory of Existing Commercial Chemical Substances)	
Dolomite (CaMg(CO₃)₂) (16389-88-1)	
Listed on the EEC inventory EINECS (European Inventory of Existing Commercial Chemical Substances)	
Carbonic acid, calcium salt (1:1) (471-34-1)	
Listed on the EEC inventory EINECS (European Inventory of Existing Commercial Chemical Substances)	
Zinc sulfide (1314-98-3)	
Listed on the EEC inventory EINECS (European Inventory of Existing Commercial Chemical Substances)	
Zinc oxide, dust (1314-13-2)	
Listed on the EEC inventory EINECS (European Inventory of Existing Commercial Chemical Substances)	

Classification according to Regulation (EC) No. 1272/2008 [CLP]

Not classified

Classification according to Directive 67/548/EEC [DSD] or 1999/45/EC [DPD]

15.2.2. National regulations

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Quartz (14808-60-7)
Listed on IARC (International Agency for Research on Cancer) Listed on the AICS (Australian Inventory of Chemical Substances) Listed on IECSC (Inventory of Existing Chemical Substances Produced or Imported in China) Listed on the Japanese ENCS (Existing & New Chemical Substances) inventory Listed on the Korean ECL (Existing Chemicals List) Listed on NZIoC (New Zealand Inventory of Chemicals) Listed on PICCS (Philippines Inventory of Chemicals and Chemical Substances) Listed as carcinogen on NTP (National Toxicology Program) Listed on the Canadian IDL (Ingredient Disclosure List) Listed on INSQ (Mexican national Inventory of Chemical Substances) Listed on CICR (Turkish Inventory and Control of Chemicals)

Dolomite (CaMg(CO3)2) (16389-88-1)
Listed on the AICS (Australian Inventory of Chemical Substances) Listed on IECSC (Inventory of Existing Chemical Substances Produced or Imported in China) Listed on the Korean ECL (Existing Chemicals List) Listed on NZIoC (New Zealand Inventory of Chemicals) Listed on PICCS (Philippines Inventory of Chemicals and Chemical Substances) Listed on INSQ (Mexican national Inventory of Chemical Substances) Listed on CICR (Turkish Inventory and Control of Chemicals)

Carbonic acid, calcium salt (1:1) (471-34-1)
Listed on the AICS (Australian Inventory of Chemical Substances) Listed on IECSC (Inventory of Existing Chemical Substances Produced or Imported in China) Listed on the Japanese ENCS (Existing & New Chemical Substances) inventory Listed on the Korean ECL (Existing Chemicals List) Listed on NZIoC (New Zealand Inventory of Chemicals) Listed on PICCS (Philippines Inventory of Chemicals and Chemical Substances) Listed on INSQ (Mexican national Inventory of Chemical Substances) Listed on CICR (Turkish Inventory and Control of Chemicals)

Zinc sulfide (1314-98-3)
Listed on the AICS (Australian Inventory of Chemical Substances) Listed on IECSC (Inventory of Existing Chemical Substances Produced or Imported in China) Listed on the Japanese ENCS (Existing & New Chemical Substances) inventory Listed on the Korean ECL (Existing Chemicals List) Listed on NZIoC (New Zealand Inventory of Chemicals) Listed on PICCS (Philippines Inventory of Chemicals and Chemical Substances) Japanese Poisonous and Deleterious Substances Control Law Listed on INSQ (Mexican national Inventory of Chemical Substances) Listed on CICR (Turkish Inventory and Control of Chemicals)

Zinc oxide, dust (1314-13-2)
Listed on the AICS (Australian Inventory of Chemical Substances) Listed on IECSC (Inventory of Existing Chemical Substances Produced or Imported in China) Listed on the Japanese ENCS (Existing & New Chemical Substances) inventory Listed on the Korean ECL (Existing Chemicals List) Listed on NZIoC (New Zealand Inventory of Chemicals) Listed on PICCS (Philippines Inventory of Chemicals and Chemical Substances) Listed on the Canadian IDL (Ingredient Disclosure List) Listed on INSQ (Mexican national Inventory of Chemical Substances) Listed on CICR (Turkish Inventory and Control of Chemicals)

15.3. US State regulations

California Proposition 65 - This product contains, or may contain, trace quantities of a substance(s) known to the state of California to cause cancer, developmental and/or reproductive harm

Quartz (14808-60-7)				
U.S. - California - Proposition 65 - Carcinogens List	U.S. - California - Proposition 65 - Developmental Toxicity	U.S. - California - Proposition 65 - Reproductive Toxicity - Female	U.S. - California - Proposition 65 - Reproductive Toxicity - Male	Non-significant risk level (NSRL)
Yes	No	No	No	

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SECTION 16: Other information

Abbreviations and acronyms : International Agency for Research on Cancer. European Agreement concerning the International Carriage of Dangerous Goods by Road. Acute Toxicity Estimate. Derived Minimal Effect level. International Maritime Dangerous Goods. International Air Transport Association. Median lethal concentration. Median lethal dose. Safety Data Sheet. TLV- Threshold Limit Value. TSCA - Toxic Substance Control. TWA- Time Weighted Average. SDS - Safety Data Sheet . STEL- Short-Term Exposure Limit . OSHA - Occupational Safety and Health Administration. PEL- Permissible Exposure Level. NIOSH (National Institute for Occupational Safety and Health). IARC (International Agency for Research on Cancer). GHS - Globally Harmonised System. CAS - Chemical Abstracts Service. ATE - acute toxicity estimate. ACGIH (American Conference of Government Industrial Hygienists).

Other information : None.

Full text of H-statements:

-----	Carc. 1A	Carcinogenicity, Category 1A
-----	H350	May cause cancer

The information on this sheet is not a specification and does not guarantee specific properties. The information is intended to provide general knowledge as to health and safety based upon our knowledge of the handling, storage and use of the product. It is not applicable to unusual or non-standard uses of the product or where instruction or recommendations are not followed.