



SAFETY DATA SHEET

1. Identification

Product identifier	USG® Glacier™ Basic Acoustical Ceiling Panels
Other means of identification	
SDS number	41281160001
Additional Products:	Arctic, Cheyenne™, Frost™ Basic, Frost™, Frost™ High LR, Frost™ Basic Foil-Back, "F" Fissured™ Basic, Frost™ High NRC/High CAC, Sandrift™, Renditions
Synonyms	Cast Mineral Fiber Ceiling Panels/Tiles
Recommended use	Interior use.
Recommended restrictions	None known.
Manufacturer/Importer/Supplier/Distributor information	
Company name	United States Gypsum Company
Address	550 West Adams Street Chicago, Illinois 60661-3637
Telephone	1-800-874-4968
Website	www.usg.com
Emergency phone number	1-800-507-8899

2. Hazard(s) identification

Physical hazards	Not classified.
Health hazards	Not classified.
OSHA defined hazards	Not classified.
Label elements	
Hazard symbol	None.
Signal word	None.
Hazard statement	None.
Precautionary statement	
Prevention	Observe good industrial hygiene practices.
Response	Get medical attention/advice if you feel unwell.
Storage	Store as indicated in Section 7.
Disposal	Dispose of in accordance with local, state, and federal regulations.
Hazard(s) not otherwise classified (HNOC)	None known.
Supplemental information	Not applicable.

3. Composition/information on ingredients

Mixtures

Chemical name	CAS number	%
Slag wool fiber	N/A	> 65
Calcium sulfate hemihydrate	26499-65-0	< 15
Limestone	1317-65-3	< 5
Kaolin	1332-58-7	< 2
Titanium dioxide	13463-67-7	< 0.25

Composition comments

All concentrations are in percent by weight.

Raw materials and/or coatings in this product contain small amounts of titanium dioxide, which has been classified as possibly carcinogenic to humans by the International Agency for Research on Cancer (IARC). However, per IARC "no significant exposure to primary particles of titanium dioxide is thought to occur during the use of products in which titanium dioxide is bound to other materials, such as in paints" (1). See Section 16 for further information.

4. First-aid measures

Inhalation

Dust irritates the respiratory system, and may cause coughing and difficulties in breathing. Move injured person into fresh air and keep person calm under observation. Get medical attention if symptoms persist.

Skin contact

Contact with dust: Rinse area with plenty of water. Get medical attention if irritation develops or persists.

Eye contact

Dust in the eyes: Do not rub eyes. Flush thoroughly with water. If irritation occurs, get medical assistance.

Ingestion

Rinse mouth. Get medical attention if symptoms occur.

Most important symptoms/effects, acute and delayed

Under normal conditions of intended use, this material does not pose a risk to health. Dust may irritate throat and respiratory system and cause coughing.

Indication of immediate medical attention and special treatment needed

Provide general supportive measures and treat symptomatically.

General information

Ensure that medical personnel are aware of the material(s) involved.

5. Fire-fighting measures

Suitable extinguishing media

Use fire-extinguishing media appropriate for surrounding materials.

Unsuitable extinguishing media

Not applicable.

Specific hazards arising from the chemical

Not a fire hazard.

Special protective equipment and precautions for firefighters

Selection of respiratory protection for firefighting: follow the general fire precautions indicated in the workplace. Self-contained breathing apparatus and full protective clothing must be worn in case of fire.

Fire fighting equipment/instructions

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

Specific methods

Cool material exposed to heat with water spray and remove it if no risk is involved.

General fire hazards

No unusual fire or explosion hazards noted.

6. Accidental release measures

Personal precautions, protective equipment and emergency procedures

See Section 8 of the SDS for Personal Protective Equipment.

Methods and materials for containment and cleaning up

No specific clean-up procedure noted. For waste disposal, see Section 13 of the SDS.

Environmental precautions

Avoid discharge to drains, sewers, and other water systems.

7. Handling and storage

Precautions for safe handling

Use work methods which minimize dust production. Avoid inhalation of dust and contact with skin and eyes. Wear appropriate personal protective equipment. Wash hands after handling. Observe good industrial hygiene practices.

Conditions for safe storage, including any incompatibilities

Store away from incompatible materials.

8. Exposure controls/personal protection

Occupational exposure limits

U.S. - OSHA Components

	Type	Value	Form
Slag wool fiber	TWA	5 mg/m ³	Fiber, respirable (diameter ≤ 3.5 μm and length ≥ 10 μm)

U.S. - OSHA Components	Type	Value	Form
		15 mg/m ³	Fiber, total

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

Components	Type	Value	Form
Calcium sulfate hemihydrate (CAS 26499-65-0)	PEL	5 mg/m ³	Respirable fraction.
		15 mg/m ³	Total dust.
Kaolin (CAS 1332-58-7)	PEL	5 mg/m ³	Respirable fraction.
		15 mg/m ³	Total dust.
Limestone (CAS 1317-65-3)	PEL	5 mg/m ³	Respirable fraction.
		15 mg/m ³	Total dust.

US. OSHA Table Z-3 (29 CFR 1910.1000)

Components	Type	Value	Form
Kaolin (CAS 1332-58-7)	TWA	5 mg/m ³	Respirable fraction.
		15 mg/m ³	Total dust.
		50 mppcf	Total dust.
		15 mppcf	Respirable fraction.

US. ACGIH Threshold Limit Values

Components	Type	Value	Form
Calcium sulfate hemihydrate (CAS 26499-65-0)	TWA	10 mg/m ³	Inhalable fraction.
Kaolin (CAS 1332-58-7)	TWA	2 mg/m ³	Respirable fraction.
Slag wool fiber	TWA	1 fibers/cm ³	Fiber, respirable (length > 5 µm and aspect ratio ≥ 3:1)

US. NIOSH: Pocket Guide to Chemical Hazards

Components	Type	Value	Form
Calcium sulfate hemihydrate (CAS 26499-65-0)	TWA	5 mg/m ³	Respirable.
		10 mg/m ³	Total
Kaolin (CAS 1332-58-7)	TWA	5 mg/m ³	Respirable.
		10 mg/m ³	Total
Limestone (CAS 1317-65-3)	TWA	5 mg/m ³	Respirable.
		10 mg/m ³	Total
Slag wool fiber	TWA	3 fibers/cm ³	Fiber, respirable (diameter ≤ 3.5 µm and length ≥ 10 µm)
		3 fibers/cm ³	Fibrous dust.
		5 mg/m ³	Fiber, total

Biological limit values

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

Appropriate engineering controls

Provide sufficient ventilation for operations causing dust formation. Observe occupational exposure limits and minimize the risk of exposure.

Cut and trim with a utility knife or hand saw to minimize dust levels. If a router is used it must have a dust collection system. Operations such as power cutting, power kerfing or using compressed air to remove dust are not recommended (2). See Section 16 for further information.

Individual protection measures, such as personal protective equipment

Eye/face protection	Wear approved safety goggles.
Skin protection	
Hand protection	It is a good industrial hygiene practice to minimize skin contact. For prolonged or repeated skin contact use suitable protective gloves.
Skin protection	
Other	Normal work clothing (long sleeved shirts and long pants) is recommended.
Respiratory protection	If engineering controls do not maintain airborne concentrations below recommended exposure limits (where applicable) or to an acceptable level (in countries where exposure limits have not been established), an approved respirator must be worn. Use a NIOSH/MSHA approved air purifying respirator as needed to control exposure. Consult with respirator manufacturer to determine respirator selection, use, and limitations. Use positive pressure, air-supplied respirator for uncontrolled releases or when air purifying respirator limitations may be exceeded. Follow respirator protection program requirements (OSHA 1910.134 and ANSI Z88.2) for all respirator use.
Thermal hazards	None.
General hygiene considerations	Always observe good personal hygiene measures, such as washing after handling the material and before eating, drinking, and/or smoking. Routinely wash work clothing and protective equipment separately from regular wash. Observe any medical surveillance requirements.

9. Physical and chemical properties

Appearance

Physical state	Solid.
Form	Panel or tile.
Color	Various colors.
Odor	Low to no odor.
Odor threshold	Not applicable.
pH	9
Melting point/freezing point	2200 °F (1204.44 °C) (Slag wool)
Initial boiling point and boiling range	Not applicable.
Flash point	Not applicable.
Evaporation rate	Not applicable.
Flammability (solid, gas)	Not applicable.

Upper/lower flammability or explosive limits

Flammability limit - lower (%)	Not applicable.
Flammability limit - upper (%)	Not applicable.
Explosive limit - lower (%)	Not applicable.
Explosive limit - upper (%)	Not applicable.

Vapor pressure	Not applicable.
Vapor density	Not applicable.
Relative density	0.39 - 0.49 (H ₂ O=1)

Solubility(ies)

Solubility (water)	Very low solubility in water.
Partition coefficient (n-octanol/water)	Not applicable.

Auto-ignition temperature	Not applicable.
Decomposition temperature	Not applicable.
Viscosity	Not applicable.

Other information

Bulk density	24 - 30 lb/ft ³
Explosive properties	Not explosive.
Oxidizing properties	Not oxidizing.

VOC 0 % (See section 16 for further detail)

10. Stability and reactivity

Reactivity	The product is stable and non-reactive under normal conditions of use, storage and transport.
Chemical stability	Material is stable under normal conditions.
Possibility of hazardous reactions	Hazardous polymerization does not occur.
Conditions to avoid	Contact with incompatible materials.
Incompatible materials	Acids. Strong oxidizing agents.
Hazardous decomposition products	No hazardous decomposition products are known.

11. Toxicological information

Information on likely routes of exposure

Inhalation	Inhalation of dusts may cause respiratory irritation.
Skin contact	May cause irritation through mechanical abrasion.
Eye contact	Direct contact with airborne particulates may cause temporary irritation.
Ingestion	Ingestion may cause irritation and stomach discomfort.

Symptoms related to the physical, chemical and toxicological characteristics Under normal conditions of intended use, this material does not pose a risk to health.

Information on toxicological effects

Acute toxicity Not expected to be a hazard under normal conditions of intended use.

Skin corrosion/irritation Prolonged skin contact may cause temporary irritation.

Serious eye damage/eye irritation Direct contact with eyes may cause temporary irritation.

Respiratory or skin sensitization

Respiratory sensitization	No data available, but none expected.
Skin sensitization	This product is not expected to cause skin sensitization.

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

Carcinogenicity Not expected to cause cancer.

IARC Monographs. Overall Evaluation of Carcinogenicity

Not listed.

NTP Report on Carcinogens

Not listed.

OSHA Specifically Regulated Substances (29 CFR 1910.1001-1053)

Not listed.

Reproductive toxicity No data available.

Specific target organ toxicity - single exposure No data available, but none expected.

Specific target organ toxicity - repeated exposure No data available, but none expected.

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

12. Ecological information

Ecotoxicity The product components are not classified as environmentally hazardous. However, this does not exclude the possibility that large or frequent releases can have a harmful or damaging effect on the environment.

Components	Species	Test Results
Calcium sulfate hemihydrate (CAS 26499-65-0)		
Aquatic		
Fish	LC50	Fathead minnow (<i>Pimephales promelas</i>) > 1970 mg/l, 96 hours

Components	Species	Test Results
Titanium dioxide (CAS 13463-67-7)		
Aquatic		
<i>Acute</i>		
Crustacea	EC50	Daphnia magna > 100 mg/l, 48 Hours
Fish	LL50	Oryzias latipes > 100 mg/l, 96 Hours

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

Bioaccumulative potential Bioaccumulation is not expected.

Mobility in soil No data available.

Other adverse effects None expected.

13. Disposal considerations

Disposal instructions Dispose in accordance with applicable federal, state, and local regulations. Recycle responsibly.

Local disposal regulations Dispose of in accordance with local regulations.

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

Waste from residues / unused products Dispose of in accordance with local regulations.

Contaminated packaging Dispose of in accordance with local regulations.

14. Transport information

DOT

Not regulated as dangerous goods.

IATA

Not regulated as dangerous goods.

IMDG

Not regulated as dangerous goods.

Transport in bulk according to Annex II of MARPOL 73/78 and the IBC Code Not applicable. This product is a solid. Therefore, bulk transport is governed by IMSBC code.

15. Regulatory information

US federal regulations This product is not known to be a "Hazardous Chemical" as defined by the OSHA Hazard Communication Standard, 29 CFR 1910.1200.

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

Not regulated.

CERCLA Hazardous Substance List (40 CFR 302.4)

Not listed.

SARA 304 Emergency release notification

Not regulated.

OSHA Specifically Regulated Substances (29 CFR 1910.1001-1053)

Not listed.

Toxic Substances Control Act (TSCA)

All components on the TSCA 8(b) inventory are designated "active" or are exempt from reporting under the Inventory Update Rule.

Superfund Amendments and Reauthorization Act of 1986 (SARA)

SARA 302 Extremely hazardous substance

Not listed.

SARA 311/312 Hazardous chemical No

SARA 313 (TRI reporting)

Not regulated.

Other federal regulations

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

Not regulated.

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

Not regulated.

Safe Drinking Water Act (SDWA) Not regulated.

US state regulations

US. Massachusetts RTK - Substance List

Calcium sulfate hemihydrate (CAS 26499-65-0)

Kaolin (CAS 1332-58-7)

Limestone (CAS 1317-65-3)

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

Calcium sulfate hemihydrate (CAS 26499-65-0)

Kaolin (CAS 1332-58-7)

Limestone (CAS 1317-65-3)

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

Calcium sulfate hemihydrate (CAS 26499-65-0)

Kaolin (CAS 1332-58-7)

Limestone (CAS 1317-65-3)

US. Rhode Island RTK

Kaolin (CAS 1332-58-7)

Limestone (CAS 1317-65-3)

Slag wool fiber (CAS N/A)

California Proposition 65

California Safe Drinking Water and Toxic Enforcement Act of 1986 (Proposition 65): This material is not known to contain any chemicals currently listed as carcinogens or reproductive toxins. For more information go to www.P65Warnings.ca.gov.

International Inventories

Country(s) or region	Inventory name	On inventory (yes/no)*
Canada	Domestic Substances List (DSL)	Yes
Canada	Non-Domestic Substances List (NDSL)	No
United States & Puerto Rico	Toxic Substances Control Act (TSCA) Inventory	Yes

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

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

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

Issue date	26-November-2014
Revision date	01-November-2019
Version #	03

Further information

Slag Wool Fiber: Large morbidity and mortality studies of both European and North American mineral wool manufacturing workers have been conducted. These studies have found no significant association of non-malignant (i.e. fibrosis) or malignant (i.e., lung cancer or mesothelioma) lung disease and exposures to slag wool fibers and have not established a causal relationship between exposure and non-malignant or malignant diseases.

In 2001, the International Agency for Research on Cancer (IARC) assigned slag wool fiber to the Group 3 category ["not classifiable as to carcinogenicity to humans"]. The synthetic mineral fiber used in this product is exonerated from classification as a carcinogen in accordance with Note Q in the EU Commission Directive 97/69/EC.

Titanium dioxide: Raw materials and/or coatings in this product contain small amounts of titanium dioxide. The International Agency for Research on Cancer (IARC) has determined that titanium dioxide is possibly carcinogenic to humans (Group 2B) based on inadequate evidence in humans and sufficient evidence in experimental animals. This conclusion relates to long-term inhalation exposure to high concentrations of pigmentary (powdered) or ultrafine titanium dioxide. However, no significant exposure to primary particles of titanium dioxide is thought to occur during the use of products in which titanium dioxide is bound to other materials, such as in paints. The available human studies do not suggest an association between occupational exposure to titanium dioxide and risk for cancer. The American Conference of Governmental Industrial Hygienists (ACGIH) has designated this chemical as not classifiable as a human carcinogen (A4). The US National Toxicology Program (NTP) has not listed this chemical in its report on carcinogens.

VOC Emissions: USG certifies the products listed in Section 1 of this SDS as Low-Emitting, defined as below the emissions of the concentration for each individual volatile organic chemical of concern (VOC) as specified in the Standard Method for the Testing and Evaluation of Volatile Organic Chemical Emissions from Indoor Sources using Small-Scale Environmental Chambers Version 1.1 [CDPH/EHLB/Standard Method V1.1 (February 2010); aka, chamber testing portion of CA Section 01350] and ASTM Guide D5116-06.

NFPA Ratings:

Health: 1

Flammability: 0

Physical hazard: 0

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

NFPA ratings



References

- 1.) International Agency for Research on Cancer (IARC). Volume 93: Carbon Black, Titanium Dioxide, and Talc; (5. Summary of data reported). IARC, 2010. Available at: <<http://monographs.iarc.fr/ENG/Monographs/vol93/mono93.pdf>>
- 2.) North American Insulation Manufacturer's Association (NAIMA). Working Smart with Fiber Glass, Rock Wool and Slag Wool Products. NAIMA, 2007. Available at: <<http://insulationinstitute.org/wp-content/uploads/2016/02/N059.pdf>>

Disclaimer

This information is provided without warranty. The information is believed to be correct. This information should be used to make an independent determination of the methods to safeguard workers and the environment.