SAFETY DATA SHEET

1. Identification

Product identifier: USG Sheetrock® Brand EcoSmart Panels Mold Tough® Firecode® X

Other means of identification:
- SDS number: 54000006005
- Synonyms: Gypsum Panels, Drywall, Plasterboard, Wallboard

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.

Environmental hazards: Hazardous to the aquatic environment, Category 3 long-term hazard

OSHA defined hazards: Not classified.

Label elements:
- Hazard symbol: None.
- Signal word: None.
- Hazard statement: Harmful to aquatic life.

Precautionary statement:
- Prevention: Avoid release to the environment.
- 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: None.

3. Composition/information on ingredients

Mixtures

<table>
<thead>
<tr>
<th>Chemical name</th>
<th>CAS number</th>
<th>%</th>
</tr>
</thead>
<tbody>
<tr>
<td>Calcium sulfate dihydrate</td>
<td>13397-24-5</td>
<td>≥ 85</td>
</tr>
<tr>
<td>(alternative CAS 10101-41-4)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Cellulose</td>
<td>9004-34-6</td>
<td>&lt; 5</td>
</tr>
<tr>
<td>Sodium pyrithione</td>
<td>3811-73-2</td>
<td>&lt; 0.25</td>
</tr>
</tbody>
</table>

...
Composition comments

All concentrations are in percent by weight unless ingredient is a gas.

The gypsum used to manufacture these panels contains respirable crystalline silica ranging up to 0.56 percent by weight, depending on source, as indicated by bulk sampling methods. Industrial hygiene testing using both personal and area sampling measured no detectable respirable crystalline silica when cutting the product by “score and snap,” rotary saw, or circular saw. Good work practices which minimize the extent of dust generation should be followed, and actual employee exposure must be determined by workplace industrial hygiene testing.

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.

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. When moving board with a forklift or similar equipment, it is essential that the equipment be rated capable of handling the loads. The forks should always be long enough to extend completely through the width of the load. Fork spacing between supports should be one half the length of the panels or base being handled so that a maximum of 4’ extends beyond the supports on either end.

Follow traditional building practices; such as management of water away from the interior of the structure to avoid the growth of mold, mildew and fungus. Remove any building products suspected of being exposed to sustained moisture and considered conducive to mold growth from the job site. Gypsum panels are very heavy, awkward loads posing the risk of severe back injury. Use proper lifting techniques.
Conditions for safe storage, including any incompatibilities

Store in a cool, dry, well-ventilated place. Store away from incompatible materials. Protect product from physical damage. Protect from weather and prevent exposure to sustained moisture. Gypsum Association literature (GA-801-07) recommends storing board flat to avoid damaging edges, warping the board and the potential safety hazards of the board falling over. However, in other situations, storing the board flat may cause a tripping hazard or exceed floor limit loads. If stacking board vertically, leave at least 4 inches from the wall to decrease the risk of falling board and no more than 6 inches to avoid too much lateral weight against the wall.

8. Exposure controls/personal protection

Occupational exposure limits

<table>
<thead>
<tr>
<th>US. OSHA Table Z-1 Limits for Air Contaminants (29 CFR 1910.1000)</th>
<th>Components</th>
<th>Type</th>
<th>Value</th>
<th>Form</th>
</tr>
</thead>
<tbody>
<tr>
<td>Calcium sulfate dihydrate</td>
<td>PEL</td>
<td>5 mg/m³</td>
<td>Respirable fraction.</td>
<td></td>
</tr>
<tr>
<td>(alternative CAS 10101-41-4) (CAS 13397-24-5)</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Cellulose (CAS 9004-34-6)</td>
<td>PEL</td>
<td>15 mg/m³</td>
<td>Total dust.</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>5 mg/m³</td>
<td>Respirable fraction.</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>15 mg/m³</td>
<td>Total dust.</td>
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</table>

US. ACGIH Threshold Limit Values

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<th>Components</th>
<th>Type</th>
<th>Value</th>
<th>Form</th>
</tr>
</thead>
<tbody>
<tr>
<td>Calcium sulfate dihydrate (alternative CAS 10101-41-4) (CAS 13397-24-5)</td>
<td>TWA</td>
<td>10 mg/m³</td>
<td>Inhalable fraction.</td>
</tr>
<tr>
<td>Cellulose (CAS 9004-34-6)</td>
<td>TWA</td>
<td>10 mg/m³</td>
<td></td>
</tr>
</tbody>
</table>

US. NIOSH: Pocket Guide to Chemical Hazards

<table>
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<td>TWA</td>
<td>5 mg/m³</td>
<td>Respirable.</td>
</tr>
<tr>
<td>Cellulose (CAS 9004-34-6)</td>
<td>TWA</td>
<td>10 mg/m³</td>
<td>Total</td>
</tr>
<tr>
<td></td>
<td>5 mg/m³</td>
<td>Respirable.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>10 mg/m³</td>
<td>Total</td>
<td></td>
</tr>
</tbody>
</table>

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.

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. Observe any medical surveillance requirements.

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 to remove contaminants. Observe any medical surveillance requirements.

9. Physical and chemical properties

Appearance

Paper faced with gypsum core.
Physical state | Solid.
---|---
Form | Panel.
Color | Gray to off-white.
Odor | Low to no odor.
Odor threshold | Not applicable.
pH | 6 - 8
Melting point/freezing point | Not applicable.
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 | Not applicable.
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 | 2.32 (Gypsum) (H2O=1)
Solubility(ies) | Not applicable.
Solubility (water) | 0.26 g/100 g (H2O)
Partition coefficient (n-octanol/water) | Not applicable.
Auto-ignition temperature | Not applicable.
Decomposition temperature | 2642 °F (1450 °C)
Viscosity | Not applicable.
Other information | Bulk density
| 36 lb/ft³
| Particle size | Varies.
| VOC | 0 %

10. Stability and reactivity
Reactivity | The product is stable and non reactive under normal conditions of 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 | Strong oxidizing agents. Strong acids.
Hazardous decomposition products | Calcium oxides, carbon dioxide, and carbon monoxide.

11. Toxicological information
Information on likely routes of exposure
Inhalation | Mechanical processing may generate dust. Gypsum dust has an irritant action on mucous membranes of the upper respiratory tract and eyes (1).
Skin contact | Under normal conditions of intended use, this material does not pose a skin hazard. Gypsum was not found to be a skin irritant (2).
Eye contact | Mechanical processing may generate dust. Direct contact with eyes may cause temporary irritation (1).
Ingestion | Not likely, due to the form of the product.
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
Low hazard.

Skin corrosion/irritation
Gypsum was not found to be a skin irritant.

Serious eye damage/eye irritation
Gypsum does not cause serious eye damage or irritation.

Respiratory or skin sensitization

Respiratory sensitization
No data available, but based on results from the skin sensitization study, calcium sulfate is not expected to be a respiratory sensitizer.

Skin sensitization
Not a skin sensitizer (2).

Germ cell mutagenicity
No evidence of mutagenic potential exists (3,4,5).

Carcinogenicity
No evidence of carcinogenic potential exists (6).

12. Ecological information

Ecotoxicity
Harmful to aquatic life.

<table>
<thead>
<tr>
<th>Components</th>
<th>Species</th>
<th>Test Results</th>
</tr>
</thead>
<tbody>
<tr>
<td>Calcium sulfate dihydrate (alternative CAS 10101-41-4) (CAS 13397-24-5)</td>
<td>LC50</td>
<td>Fathead minnow (Pimephales promelas) &gt; 1970 mg/l, 96 hours</td>
</tr>
<tr>
<td>Aquatic Fish</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Persistence and degradability
Not applicable for the salt of inorganic compounds. Calcium sulfate dissolves in water without undergoing chemical degradation.

Bioaccumulative potential
Bioaccumulation is not expected.

Mobility in soil
Calcium sulfate has a low potential for adsorption to soil. If water is applied, gypsum dissolves and the calcium and sulfate ions are mobile and penetrate the subsoil (7).

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
Not regulated.

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 hazardous according to OSHA 29CFR 1910.1200.

TSCA Section 12(b) Export Notification (40 CFR 707, Subpt. D)
Not regulated.

OSHA Specifically Regulated Substances (29 CFR 1910.1001-1050)
Not regulated.

CERCLA Hazardous Substance List (40 CFR 302.4)
Not listed.

Superfund Amendments and Reauthorization Act of 1986 (SARA)
Hazard categories
Immediate Hazard - No
Delayed Hazard - No
Fire Hazard - No
Pressure Hazard - No
Reactivity Hazard - No

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
This product does not contain a chemical known to the State of California to cause cancer, birth defects or other reproductive harm.

US. Massachusetts RTK - Substance List
Calcium sulfate dihydrate (alternative CAS 10101-41-4) (CAS 13397-24-5)
Cellulose (CAS 9004-34-6)

US. New Jersey Worker and Community Right-to-Know Act
Calcium sulfate dihydrate (alternative CAS 10101-41-4) (CAS 13397-24-5)
Cellulose (CAS 9004-34-6)

US. Pennsylvania Worker and Community Right-to-Know Law
Calcium sulfate dihydrate (alternative CAS 10101-41-4) (CAS 13397-24-5)
Cellulose (CAS 9004-34-6)

US. Rhode Island RTK
Calcium sulfate dihydrate (alternative CAS 10101-41-4) (CAS 13397-24-5)
Cellulose (CAS 9004-34-6)

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

Issue date 19-July-2017
Revision date -
Version # 01
Further information

NFPA Ratings:
- Health: 1
- Flammability: 0
- Physical hazard: 0
Hazard Scale: 0 = Minimal  1 = Slight  2 = Moderate  3 = Serious  4 = Severe

NFPA ratings

List of abbreviations


References

2. Tested by LG Life Science/Toxicology Center, Korea (2002). National Institute of Environmental Research (NIER).

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.