1. IDENTIFICATION

Product identifier
Product Name  SGS Mortar Colors

Other means of identification
Product Code  SGS MORTAR COLORS
Synonyms  SGS 10, 20, 22, 25, 30, 31, 32, 33, 35, 37, 40, 41, 44, 45, 70

Recommended use of the chemical and restrictions on use
Recommended Use  Coloring agent for Concrete.
Uses advised against  No information available

Details of the supplier of the safety data sheet
Supplier Address  Solomon Colors, Inc.
4050 Color Plant Road
Springfield, IL 62702
Manufacturer Address  Solomon Colors, Inc.
4050 Color Plant Road
Springfield, IL 62702

Company Phone Number  800-624-0261 (US & Canada); 217-522-3112 (Outside North America)
24 Hour Emergency Phone Number  800-373-7542

2. HAZARDS IDENTIFICATION

Classification
OSHA Regulatory Status  This chemical is considered hazardous by the 2012 OSHA Hazard Communication Standard (29 CFR 1910.1200)

<table>
<thead>
<tr>
<th>Carcinogenicity</th>
<th>Category 1A</th>
</tr>
</thead>
<tbody>
<tr>
<td>Specific target organ toxicity (repeated exposure)</td>
<td>Category 2</td>
</tr>
</tbody>
</table>

Label elements

Emergency Overview

Danger

Hazard statements
May cause cancer
May cause damage to organs through prolonged or repeated exposure
Precautionary Statements - Prevention
Obtain special instructions before use
Do not handle until all safety precautions have been read and understood
Use personal protective equipment as required
Do not breathe dust/fume/gas/mist/vapors/spray

Precautionary Statements - Response
IF exposed or concerned: Get medical advice/attention

Precautionary Statements - Storage
Store locked up

Precautionary Statements - Disposal
Dispose of contents/container to an approved waste disposal plant

Hazards not otherwise classified (HNOC)

Other Information
• May be harmful if swallowed
Unknown acute toxicity 61% of the mixture consists of ingredient(s) of unknown toxicity

3. COMPOSITION/INFORMATION ON INGREDIENTS

Synonyms  SGS 10, 20, 22, 25, 30, 31, 32, 33, 35, 37, 40, 41, 44, 45, 70.

<table>
<thead>
<tr>
<th>Chemical Name</th>
<th>CAS No.</th>
<th>Weight-%</th>
<th>Trade Secret</th>
</tr>
</thead>
<tbody>
<tr>
<td>Yellow Iron Oxide</td>
<td>51274-00-1</td>
<td>0-90</td>
<td>*</td>
</tr>
<tr>
<td>Red Iron Oxide</td>
<td>1309-37-1</td>
<td>0-90</td>
<td>*</td>
</tr>
<tr>
<td>Black Iron Oxide</td>
<td>1317-61-9</td>
<td>0-90</td>
<td>*</td>
</tr>
<tr>
<td>QUARTZ</td>
<td>14808-60-7</td>
<td>1-25</td>
<td>*</td>
</tr>
<tr>
<td>Mica</td>
<td>Proprietary</td>
<td>0-15</td>
<td>*</td>
</tr>
<tr>
<td>Aluminum Silicate</td>
<td>12199-37-0</td>
<td>1-5</td>
<td>*</td>
</tr>
<tr>
<td>Manganese dioxide</td>
<td>1313-13-9</td>
<td>0-10</td>
<td>*</td>
</tr>
</tbody>
</table>

*The exact percentage (concentration) of composition has been withheld as a trade secret.

4. FIRST AID MEASURES

Description of first aid measures

General advice  In case of accident or unwellness, seek medical advice immediately (show directions for use or safety data sheet if possible).
Eye contact
Immediately flush with plenty of water. After initial flushing, remove any contact lenses and continue flushing for at least 15 minutes. (Get medical attention immediately if irritation persists.).

Skin Contact
Wash off immediately with soap and plenty of water while removing all contaminated clothes and shoes. In the case of skin irritation or allergic reactions see a physician.

Inhalation
IF INHALED: Remove victim to fresh air and keep at rest in a position comfortable for breathing. If symptoms persist, call a physician.

Ingestion
Clean mouth with water. Remove from exposure, lie down. Do not induce vomiting without medical advice. Consult a physician if necessary.

Most important symptoms and effects, both acute and delayed

Symptoms
No information available.

Indication of any immediate medical attention and special treatment needed

Note to physicians
Treat symptomatically.

5. FIRE-FIGHTING MEASURES

Suitable extinguishing media
Use extinguishing measures that are appropriate to local circumstances and the surrounding environment.

Unsuitable extinguishing media
Caution: Use of water spray when fighting fire may be inefficient.

Specific hazards arising from the chemical
No information available.

Explosion data
- Sensitivity to Mechanical Impact: None.
- Sensitivity to Static Discharge: None.

Protective equipment and precautions for firefighters
As in any fire, wear self-contained breathing apparatus pressure-demand, MSHA/NIOSH (approved or equivalent) and full protective gear.

6. ACCIDENTAL RELEASE MEASURES

Personal precautions, protective equipment and emergency procedures

Personal precautions
Avoid contact with skin, eyes or clothing. Use personal protective equipment as required. Avoid creating dust. Evacuate personnel to safe areas.

Environmental precautions
See Section 12 for additional ecological information.

Methods and material for containment and cleaning up

Methods for containment
Vacuum or sweep up material and place in a designated labeled waste container. Prevent further leakage or spillage if safe to do so. Prevent dust cloud.

Methods for cleaning up
With clean shovel place material into clean, dry container and cover loosely; move containers from spill area. Take up with sand, earth or other non-combustible absorbent material. Use personal protective equipment as required.

Prevention of secondary hazards
Clean contaminated objects and areas thoroughly observing environmental regulations.

7. HANDLING AND STORAGE
Precautions for safe handling

Advice on safe handling
Handle in accordance with good industrial hygiene and safety practice.

Conditions for safe storage, including any incompatibilities

Storage Conditions
Keep containers tightly closed in a dry, cool and well-ventilated place.

Incompatible materials
Strong oxidizing agents. Strong acids.

8. EXPOSURE CONTROLS/PERSONAL PROTECTION

Control parameters

Exposure Guidelines

<table>
<thead>
<tr>
<th>Chemical Name</th>
<th>ACGIH TLV</th>
<th>OSHA PEL</th>
<th>NIOSH IDLH</th>
</tr>
</thead>
<tbody>
<tr>
<td>Red Iron Oxide</td>
<td>TWA: 5 mg/m³ respirable fraction</td>
<td>TWA: 10 mg/m³ fume, TWA: 15 mg/m³ total dust, TWA: 5 mg/m³ respirable fraction (vacated), TWA: 10 mg/m³ fume and total dust iron oxide (vacated), TWA: 5 mg/m³ respirable fraction regulated under Rouge</td>
<td>IDLH: 2500 mg/m³ Fe dust and fume, TWA: 5 mg/m³ Fe dust and fume</td>
</tr>
<tr>
<td>QUARTZ</td>
<td>TWA: 0.025 mg/m³ respirable fraction</td>
<td>(vacated) TWA: 0.1 mg/m³ respirable dust, : (30)/(%SiO₂ + 2) mg/m³ TWA total dust, : (250)/(%SiO₂ + 5) mppcf TWA respirable fraction, : (10)/(%SiO₂ + 2) mg/m³ TWA respirable fraction</td>
<td>IDLH: 50 mg/m³ respirable dust TWA: 0.05 mg/m³ respirable dust</td>
</tr>
<tr>
<td>Mica</td>
<td>TWA: 3 mg/m³ respirable fraction</td>
<td>(vacated) TWA: 3 mg/m³ respirable dust, &lt;1% Crystalline silica, TWA: 20 mppcf &lt;1% Crystalline silica</td>
<td>IDLH: 1500 mg/m³ TWA: 3 mg/m³ containing &lt;1% Quartz respirable dust</td>
</tr>
<tr>
<td>Manganese dioxide</td>
<td>TWA: 0.02 mg/m³ Mn, TWA: 0.1 mg/m³ Mn</td>
<td>(vacated) Ceiling: 5 mg/m³, Ceiling: 5 mg/m³ Mn</td>
<td>IDLH: 500 mg/m³ Mn, TWA: 1 mg/m³ Mn, STEL: 3 mg/m³ Mn</td>
</tr>
</tbody>
</table>

NIOSH IDLH  Immediately Dangerous to Life or Health

Other Information
Vacated limits revoked by the Court of Appeals decision in AFL-CIO v. OSHA, 965 F.2d 962 (11th Cir., 1992).

Appropriate engineering controls

Engineering Controls
Showers
Eyewash stations
Ventilation systems.

Individual protection measures, such as personal protective equipment

Eye/face protection
Avoid contact with eyes. Wear safety glasses with side shields (or goggles).

Skin and body protection
Wear protective gloves and protective clothing. Protective shoes or boots.

Respiratory protection
In case of inadequate ventilation wear respiratory protection.

General Hygiene Considerations
Handle in accordance with good industrial hygiene and safety practice. Regular cleaning of equipment, work area and clothing is recommended. Wash face, hands and any exposed skin thoroughly after handling. Do not eat, drink or smoke when using this product.

9. PHYSICAL AND CHEMICAL PROPERTIES

Information on basic physical and chemical properties
Physical state: Powder  
Appearance: Powder  
Color: Light Amber to Dark Brown  
Odor: Odorless  
Odor threshold: Not applicable

<table>
<thead>
<tr>
<th>Property</th>
<th>Values</th>
<th>Remarks • Method</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>pH</strong></td>
<td>3.0-8.0</td>
<td></td>
</tr>
<tr>
<td>Melting point / freezing point</td>
<td>&gt;1000°C (1832°F)</td>
<td></td>
</tr>
<tr>
<td>Boiling point / boiling range</td>
<td>No information available</td>
<td></td>
</tr>
<tr>
<td>Flash point</td>
<td>No information available</td>
<td></td>
</tr>
<tr>
<td>Evaporation rate</td>
<td>No information available</td>
<td></td>
</tr>
<tr>
<td>Flammability (solid, gas)</td>
<td>No information available</td>
<td></td>
</tr>
<tr>
<td>Flammability Limit in Air</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Upper flammability limit:</td>
<td>No information available</td>
<td></td>
</tr>
<tr>
<td>Lower flammability limit:</td>
<td>No information available</td>
<td></td>
</tr>
<tr>
<td>Vapor pressure</td>
<td>No information available</td>
<td></td>
</tr>
<tr>
<td>Vapor density</td>
<td>No information available</td>
<td></td>
</tr>
<tr>
<td>Specific Gravity</td>
<td>4.0 - 5.0</td>
<td></td>
</tr>
<tr>
<td>Water solubility</td>
<td>Insoluble</td>
<td></td>
</tr>
<tr>
<td>Solubility in other solvents</td>
<td>No information available</td>
<td></td>
</tr>
<tr>
<td>Partition coefficient</td>
<td>No information available</td>
<td></td>
</tr>
<tr>
<td>Autoignition temperature</td>
<td>No information available</td>
<td></td>
</tr>
<tr>
<td>Decomposition temperature</td>
<td>No information available</td>
<td></td>
</tr>
<tr>
<td>Kinematic viscosity</td>
<td>No information available</td>
<td></td>
</tr>
<tr>
<td>Dynamic viscosity</td>
<td>No information available</td>
<td></td>
</tr>
<tr>
<td>Explosive properties</td>
<td>No information available</td>
<td></td>
</tr>
<tr>
<td>Oxidizing properties</td>
<td>No information available</td>
<td></td>
</tr>
<tr>
<td>Other Information</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Softening point</td>
<td>No information available</td>
<td></td>
</tr>
<tr>
<td>Molecular weight</td>
<td>No information available</td>
<td></td>
</tr>
<tr>
<td>VOC Content (%)</td>
<td>No information available</td>
<td></td>
</tr>
<tr>
<td>Density</td>
<td>No information available</td>
<td></td>
</tr>
<tr>
<td>Bulk density</td>
<td>No information available</td>
<td></td>
</tr>
</tbody>
</table>

10. STABILITY AND REACTIVITY

Reactivity
No data available

Chemical stability
Stable under normal conditions.

Possibility of Hazardous Reactions
None under normal processing.

  Hazardous polymerization: None under normal processing.

Conditions to avoid
Extremes of temperature and direct sunlight.

Incompatible materials
Strong oxidizing agents. Strong acids.

Hazardous Decomposition Products
None known based on information supplied.
11. TOXICOLOGICAL INFORMATION

Information on likely routes of exposure

Product Information  Harmful by inhalation, in contact with skin and if swallowed

Inhalation  May cause irritation of respiratory tract.

Eye contact  May cause mechanical irritation (abrasion).

Skin Contact  May cause mechanical irritation (abrasion).

Ingestion  No known effect based on information supplied.

<table>
<thead>
<tr>
<th>Chemical Name</th>
<th>Oral LD50</th>
<th>Dermal LD50</th>
<th>Inhalation LC50</th>
</tr>
</thead>
<tbody>
<tr>
<td>Red Iron Oxide (1309-37-1)</td>
<td>&gt; 10000 mg/kg (Rat)</td>
<td>-</td>
<td>-</td>
</tr>
<tr>
<td>Black Iron Oxide (1317-61-9)</td>
<td>&gt; 10000 mg/kg (Rat)</td>
<td>-</td>
<td>-</td>
</tr>
<tr>
<td>QUARTZ (14808-60-7)</td>
<td>= 500 mg/kg (Rat)</td>
<td>-</td>
<td>-</td>
</tr>
<tr>
<td>Manganese dioxide (1313-13-9)</td>
<td>= 9000 mg/kg (Rat)</td>
<td>-</td>
<td>-</td>
</tr>
</tbody>
</table>

Information on toxicological effects

Symptoms  No information available.

Delayed and immediate effects as well as chronic effects from short and long-term exposure

Sensitization  No information available.

Germ cell mutagenicity  No information available.

Carcinogenicity  No information available.

<table>
<thead>
<tr>
<th>Chemical Name</th>
<th>ACGIH</th>
<th>IARC</th>
<th>NTP</th>
<th>OSHA</th>
</tr>
</thead>
<tbody>
<tr>
<td>Red Iron Oxide (1309-37-1)</td>
<td></td>
<td>Group 3</td>
<td></td>
<td></td>
</tr>
<tr>
<td>QUARTZ (14808-60-7)</td>
<td>A2</td>
<td>Group 1</td>
<td>Known</td>
<td>X</td>
</tr>
</tbody>
</table>

ACGIH (American Conference of Governmental Industrial Hygienists)

A2 - Suspected Human Carcinogen

IARC (International Agency for Research on Cancer)

Group 1 - Carcinogenic to Humans

Not classifiable as a human carcinogen

NTP (National Toxicology Program)

Known - Known Carcinogen

OSHA (Occupational Safety and Health Administration of the US Department of Labor)

X - Present

Reproductive toxicity  No information available.

STOT - single exposure  No information available.

STOT - repeated exposure  No information available.

Chronic toxicity  May cause adverse effects on the bone marrow and blood-forming system.

Target Organ Effects  blood, Central nervous system, Eyes, kidney, lungs, Respiratory system, Skin.

Aspiration hazard  No information available.

Numerical measures of toxicity - Product Information

The following values are calculated based on chapter 3.1 of the GHS document.

ATEmix (oral)  4085 mg/kg

ATEmix (inhalation-dust/mist)  23.4 mg/l
12. ECOLOGICAL INFORMATION

Ecotoxicity

Persistence and degradability
No information available.

Bioaccumulation
No information available.

<table>
<thead>
<tr>
<th>Chemical Name</th>
<th>Partition coefficient</th>
</tr>
</thead>
<tbody>
<tr>
<td>Manganese dioxide</td>
<td>&lt;0</td>
</tr>
<tr>
<td>1313-13-9</td>
<td></td>
</tr>
</tbody>
</table>

Other adverse effects
No known significant effects or critical hazards.

13. DISPOSAL CONSIDERATIONS

Waste treatment methods

Disposal of wastes
This material, as supplied, is not a hazardous waste according to state and federal regulations (40 CFR 261). Disposal should be in accordance with applicable regional, national and local laws and regulations.

Contaminated packaging
Do not reuse container.

14. TRANSPORT INFORMATION

DOT
Not regulated

TDG
Not regulated

MEX
Not regulated

ICAO (air)
Not regulated

IATA
Not regulated

IMDG
Not regulated

RID
Not regulated

ADR
Not regulated

ADN
Not regulated
15. REGULATORY INFORMATION

**International Inventories**

<table>
<thead>
<tr>
<th>Inventory</th>
<th>Compliance</th>
</tr>
</thead>
<tbody>
<tr>
<td>TSCA</td>
<td>Complies</td>
</tr>
<tr>
<td>DSL/NDSL</td>
<td>Complies</td>
</tr>
<tr>
<td>EINECS/ELINCS</td>
<td>Does not comply</td>
</tr>
<tr>
<td>ENCS</td>
<td>Does not comply</td>
</tr>
<tr>
<td>IECSC</td>
<td>Complies</td>
</tr>
<tr>
<td>KECL</td>
<td>Complies</td>
</tr>
<tr>
<td>PICCS</td>
<td>Complies</td>
</tr>
<tr>
<td>AICS</td>
<td>Complies</td>
</tr>
</tbody>
</table>

**Legend:**

- TSCA - United States Toxic Substances Control Act Section 8(b) Inventory
- DSL/NDSL - Canadian Domestic Substances List/Non-Domestic Substances List
- EINECS/ELINCS - European Inventory of Existing Chemical Substances/European List of Notified Chemical Substances
- ENCS - Japan Existing and New Chemical Substances
- IECSC - China Inventory of Existing Chemical Substances
- KECL - Korean Existing and Evaluated Chemical Substances
- PICCS - Philippines Inventory of Chemicals and Chemical Substances
- AICS - Australian Inventory of Chemical Substances

**US Federal Regulations**

**SARA 313**

Section 313 of Title III of the Superfund Amendments and Reauthorization Act of 1986 (SARA). This product contains a chemical or chemicals which are subject to the reporting requirements of the Act and Title 40 of the Code of Federal Regulations, Part 372

**Chemical Name**  | **SARA 313 - Threshold Values %**
--- | ---
Manganese dioxide - 1313-13-9 | 1.0

**SARA 311/312 Hazard Categories**

- Acute health hazard: No
- Chronic Health Hazard: No
- Fire hazard: No
- Sudden release of pressure hazard: No
- Reactive Hazard: No

**CWA (Clean Water Act)**

This product does not contain any substances regulated as pollutants pursuant to the Clean Water Act (40 CFR 122.21 and 40 CFR 122.42)

**CERCLA**

This material, as supplied, does not contain any substances regulated as hazardous substances under the Comprehensive Environmental Response Compensation and Liability Act (CERCLA) (40 CFR 302) or the Superfund Amendments and Reauthorization Act (SARA) (40 CFR 355). There may be specific reporting requirements at the local, regional, or state level pertaining to releases of this material

**US State Regulations**

**California Proposition 65**

This product contains the following Proposition 65 chemicals

<table>
<thead>
<tr>
<th>Chemical Name</th>
<th>California Proposition 65</th>
</tr>
</thead>
<tbody>
<tr>
<td>QUARTZ - 14808-60-7</td>
<td>Carcinogen</td>
</tr>
</tbody>
</table>

**U.S. State Right-to-Know Regulations**

<table>
<thead>
<tr>
<th>Chemical Name</th>
<th>New Jersey</th>
<th>Massachusetts</th>
<th>Pennsylvania</th>
</tr>
</thead>
<tbody>
<tr>
<td>Red Iron Oxide</td>
<td>X</td>
<td>X</td>
<td>X</td>
</tr>
<tr>
<td>1309-37-1</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>QUARTZ</td>
<td>X</td>
<td>X</td>
<td>X</td>
</tr>
<tr>
<td>14808-60-7</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Mica</td>
<td>X</td>
<td>X</td>
<td>X</td>
</tr>
<tr>
<td>Manganese dioxide</td>
<td>X</td>
<td>-</td>
<td>X</td>
</tr>
<tr>
<td>1313-13-9</td>
<td></td>
<td></td>
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</tr>
</tbody>
</table>

SGS MORTAR COLORS
16. OTHER INFORMATION, INCLUDING DATE OF PREPARATION OF THE LAST REVISION

<table>
<thead>
<tr>
<th>NFPA</th>
<th>Reactivity</th>
<th>0</th>
</tr>
</thead>
<tbody>
<tr>
<td>Flammability</td>
<td>0</td>
<td></td>
</tr>
<tr>
<td>Physical and Chemical Properties</td>
<td>-</td>
<td></td>
</tr>
<tr>
<td>HMIS</td>
<td>Health hazards</td>
<td>1</td>
</tr>
<tr>
<td>Physical hazards</td>
<td>0</td>
<td></td>
</tr>
<tr>
<td>Personal protection</td>
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<td></td>
</tr>
</tbody>
</table>

Issue Date: 19-May-2015
Revision Date: 19-May-2015
Revision Note: No information available

The information provided in this Safety Data Sheet is correct to the best of our knowledge, information and belief at the date of its publication. The information given is designed only as a guidance for safe handling, use, processing, storage, transportation, disposal and release and is not to be considered a warranty or quality specification. The information relates only to the specific material designated and may not be valid for such material used in combination with any other materials or in any process, unless specified in the text.

End of Safety Data Sheet