Material Safety Data Sheet

Section 1. Chemical Product and Company Identification

<table>
<thead>
<tr>
<th>Common Name/Trade Name</th>
<th>Calcium sulfate, anhydrous</th>
</tr>
</thead>
<tbody>
<tr>
<td>Manufacturer</td>
<td>SPECTRUM LABORATORY PRODUCTS INC. 14422 S. SAN PEDRO STREET GARDENA, CA 90248</td>
</tr>
<tr>
<td>Commercial Name(s)</td>
<td>DRIERITE</td>
</tr>
<tr>
<td>Synonym</td>
<td>karstenite; muriacite; anhydrous sulfate of lime; anhydrous gypsum; Calcium Sulfate anhydrite; Natural Anhydrite; Sulfuric acid, calcium salt; Sulfuric acid, calcium salt (1:1); Anhydrous Calcium Sulfate; Crysalba; Thiolite</td>
</tr>
<tr>
<td>Chemical Name</td>
<td>Calcium Sulfate, Anhydrous</td>
</tr>
<tr>
<td>Chemical Family</td>
<td>Salt.</td>
</tr>
<tr>
<td>Chemical Formula</td>
<td>CaSO4</td>
</tr>
<tr>
<td>Supplier</td>
<td>SPECTRUM LABORATORY PRODUCTS INC. 14422 S. SAN PEDRO STREET GARDENA, CA 90248</td>
</tr>
</tbody>
</table>

| Catalog Number(s).     | CA171, C1157 |
| CAS#                   | 7778-18-9 |
| RTECS                  | WS6920000 |
| TSCA                   | TSCA 8(b) inventory: Calcium sulfate, anhydrous |
| CI#                    | Not applicable. |

Section 2. Composition and Information on Ingredients

<table>
<thead>
<tr>
<th>Name</th>
<th>CAS #</th>
<th>TWA (mg/m³)</th>
<th>STEL (mg/m³)</th>
<th>CEIL (mg/m³)</th>
<th>% by Weight</th>
</tr>
</thead>
<tbody>
<tr>
<td>1) Calcium sulfate, anhydrous</td>
<td>7778-18-9</td>
<td>10</td>
<td>20</td>
<td>100</td>
<td></td>
</tr>
</tbody>
</table>

Toxicological Data on Ingredients

- Calcium sulfate, anhydrous:
  - ORAL (LD50): Acute: >3000 mg/kg [Rat].

Section 3. Hazards Identification

Potential Acute Health Effects
- Slightly hazardous in case of skin contact (irritant), of eye contact (irritant), of ingestion, of inhalation.

Potential Chronic Health Effects
- CARCINOGENIC EFFECTS: Not available.
- MUTAGENIC EFFECTS: Not available.
- TERATOGENIC EFFECTS: Not available.
- DEVELOPMENTAL TOXICITY: Not available.
  - The substance may be toxic to lungs, upper respiratory tract.
  - Repeated or prolonged exposure to the substance can produce target organs damage.

Continued on Next Page
### Section 4. First Aid Measures

<table>
<thead>
<tr>
<th>Condition</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Eye Contact</strong></td>
<td>Check for and remove any contact lenses. In case of contact, immediately flush eyes with plenty of water for at least 15 minutes. Cold water may be used. WARM water MUST be used. Get medical attention if irritation occurs.</td>
</tr>
<tr>
<td><strong>Skin Contact</strong></td>
<td>Wash with soap and water. Cover the irritated skin with an emollient. Get medical attention if irritation develops.</td>
</tr>
<tr>
<td><strong>Serious Skin Contact</strong></td>
<td>Not available.</td>
</tr>
<tr>
<td><strong>Inhalation</strong></td>
<td>If inhaled, remove to fresh air. If not breathing, give artificial respiration. If breathing is difficult, give oxygen. Get medical attention.</td>
</tr>
<tr>
<td><strong>Serious Inhalation</strong></td>
<td>Not available.</td>
</tr>
<tr>
<td><strong>Ingestion</strong></td>
<td>Do NOT induce vomiting unless directed to do so by medical personnel. Never give anything by mouth to an unconscious person. If large quantities of this material are swallowed, call a physician immediately. Loosen tight clothing such as a collar, tie, belt or waistband.</td>
</tr>
<tr>
<td><strong>Serious Ingestion</strong></td>
<td>Not available.</td>
</tr>
</tbody>
</table>

### Section 5. Fire and Explosion Data

<table>
<thead>
<tr>
<th>Property</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Flammability of the Product</td>
<td>Non-flammable.</td>
</tr>
<tr>
<td>Auto-Ignition Temperature</td>
<td>Not applicable.</td>
</tr>
<tr>
<td>Flash Points</td>
<td>Not applicable.</td>
</tr>
<tr>
<td>Flammable Limits</td>
<td>Not applicable.</td>
</tr>
<tr>
<td>Products of Combustion</td>
<td>Not available.</td>
</tr>
<tr>
<td>Fire Hazards in Presence of Various Substances</td>
<td>Not applicable.</td>
</tr>
<tr>
<td>Fire Fighting Media and Instructions</td>
<td>Not applicable.</td>
</tr>
<tr>
<td>Special Remarks on Fire Hazards</td>
<td>Calcium Sulfate mixed with phosphorus will ignite at high temperatures. When primed at high temperature with potassium nitrate-calcium silicide mixture, calcium sulfate mixed with excess red phosphorus will burn.</td>
</tr>
<tr>
<td>Special Remarks on Explosion Hazards</td>
<td>Contact with diazomethane causes an exothermic reaction which may lead to detonation. Many metal oxo-compounds (nitrates, oxides, and particulary sulfates) and sulfides are reduced violently or explosively (undergo a thermite reaction) on heating an intimate mixture with aluminum powder to a suitably high temperature to initiate the reaction. A violent or explosive reaction can occur upon heating when calcium sulfate is mixed with aluminum powder. Containers may explode when heated.</td>
</tr>
</tbody>
</table>

### Section 6. Accidental Release Measures

<table>
<thead>
<tr>
<th>Scenario</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Small Spill</strong></td>
<td>Use appropriate tools to put the spilled solid in a convenient waste disposal container. Finish cleaning by spreading water on the contaminated surface and dispose of according to local and regional authority requirements.</td>
</tr>
<tr>
<td><strong>Large Spill</strong></td>
<td>Use a shovel to put the material into a convenient waste disposal container. Finish cleaning by spreading water on the contaminated surface and allow to evacuate through the sanitary system. Be careful that the product is not present at a concentration level above TLV. Check TLV on the MSDS and with local authorities.</td>
</tr>
</tbody>
</table>
Calcium sulfate, anhydrous

Section 7. Handling and Storage

Precautions
Do not ingest. Do not breathe dust. If ingested, seek medical advice immediately and show the container or the label. Keep away from incompatibles such as oxidizing agents, acids.

Storage
Keep container tightly closed. Keep container in a cool, well-ventilated area.

Section 8. Exposure Controls/Personal Protection

Engineering Controls
Use process enclosures, local exhaust ventilation, or other engineering controls to keep airborne levels below recommended exposure limits. If user operations generate dust, fume or mist, use ventilation to keep exposure to airborne contaminants below the exposure limit.

Personal Protection
Safety glasses. Lab coat. Dust respirator. Be sure to use an approved/certified respirator or equivalent. Gloves.

Personal Protection in Case of a Large Spill
Splash goggles. Full suit. Dust respirator. Boots. Gloves. A self contained breathing apparatus should be used to avoid inhalation of the product. Suggested protective clothing might not be sufficient; consult a specialist BEFORE handling this product.

Exposure Limits
TWA: 15 (mg/m\(^3\)) from OSHA (PEL) [United States] Inhalation Total.
TWA: 5 (mg/m\(^3\)) from OSHA (PEL) [United States] Inhalation
TWA: 10 (mg/m\(^3\)) from NIOSH [United States] Inhalation Total.
TWA: 5 (mg/m\(^3\)) from NIOSH [United States] Inhalation Respirable.
TWA: 10 (mg/m\(^3\)) from ACGIH (TLV) [United States] Inhalation Total.
TWA: 5 (mg/m\(^3\)) [United Kingdom (UK)] Inhalation Respirable.
TWA: 10 (mg/m\(^3\)) [United Kingdom (UK)] Inhalation Total.
TWA: 10 STEL: 20 (mg/m\(^3\)) [Canada] Inhalation Total.

Consult local authorities for acceptable exposure limits.

Section 9. Physical and Chemical Properties

Physical state and appearance
Solid. (Crystals solid. Powdered solid.)

Molecular Weight
136.14 g/mole

pH (1% soln/water)
Not available.

Odor
Odorless.

Taste
Not available.

Color
White or white with varied colored (blue, gray or reddish) tinge

Boiling Point
Not available.

Melting Point
1450°C (2642°F)

Critical Temperature
Not available.

Specific Gravity
2.96 (Water = 1)

Vapor Pressure
Not applicable.

Vapor Density
Not available.

Volatility
Not available.

Odor Threshold
Not available.

Water/Oil Dist. Coeff.
Not available.

Ionicity (in Water)
Not available.

Dispersion Properties
Not available.

Solubility
Very slightly soluble in cold water.

Continued on Next Page
Calcium sulfate, anhydrous

Section 10. Stability and Reactivity Data

<table>
<thead>
<tr>
<th>Stability</th>
<th>The product is stable.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Instability Temperature</td>
<td>Not available.</td>
</tr>
<tr>
<td>Conditions of Instability</td>
<td>Moisture, incompatible materials</td>
</tr>
<tr>
<td>Incompatibility with various substances</td>
<td>Reactive with oxidizing agents, acids.</td>
</tr>
<tr>
<td>Corrosivity</td>
<td>Non-corrosive in presence of glass.</td>
</tr>
</tbody>
</table>

Special Remarks on Reactivity

Incompatible with Diazomethane, aluminum, magnesium, phosphorous. The anhydrous form cannot set with water. Hygroscopic; keep container tightly closed.

Special Remarks on Corrosivity

Not available.

Polymerization

Will not occur.

Section 11. Toxicological Information

Routes of Entry

Inhalation. Ingestion.

Toxicity to Animals

Acute oral toxicity (LD50): >3000 mg/kg [Rat].

Chronic Effects on Humans

May cause damage to the following organs: lungs, upper respiratory tract.

Other Toxic Effects on Humans

Slightly hazardous in case of skin contact (irritant), of ingestion, of inhalation.

Special Remarks on Toxicity to Animals

Not available.

Special Remarks on Chronic Effects on Humans

Not available.

Special Remarks on other Toxic Effects on Humans

Acute Potential Health Effects:

Skin: Causes skin irritation.

Eyes: Causes eye irritation with out any adverse effects. May cause conjunctivitis.

Inhalation: Causes respiratory tract and mucous membrane irritation. Symptoms may include coughing, rhinitis, laryngitis, pharyngitis, reactions of tracheal and bronchial membranes, sneezing, pneumonia, impaired of sense of smell and taste, bleeding from the nose, and labored breathing after excessive inhalation.

Ingestion: May cause digestive tract irritation. Because it hardens quickly after absorbing moisture, its ingestion may result in obstruction, particularly of the pylorus.

Chronic Potential Health Effects:

Inhalation: Prolonged or repeated inhalation may produce unspecified effects on the lungs.

Medical Conditions Generally Aggravated by Exposure: Pre-existing upper respiratory and lung diseases such as, but not limited to Bronchitis, Emphysema, and Asthma.

Section 12. Ecological Information

Ecotoxicity

Ecotoxicity in water (LC50): 2980 mg/l 96 hours [Fish (Lepomis macrochirus)]. >1970 mg/l 96 hours [Fish (Pimplales promelas)].

BOD5 and COD

Not available.

Products of Biodegradation

Possibly hazardous short term degradation products are not likely. However, long term degradation products may arise.

Toxicity of the Products of Biodegradation

The product itself and its products of degradation are not toxic.

Special Remarks on the Products of Biodegradation

Not available.

Continued on Next Page
Section 13. Disposal Considerations

Waste Disposal

Waste must be disposed of in accordance with federal, state and local environmental control regulations.

Section 14. Transport Information

DOT Classification

Not a DOT controlled material (United States).

Identification

Not applicable.

Special Provisions for Transport

Not applicable.

DOT (Pictograms)

Section 15. Other Regulatory Information and Pictograms

Federal and State Regulations

Pennsylvania RTK: Calcium sulfate, anhydrous
Minnesota: Calcium sulfate, anhydrous
Massachusetts RTK: Calcium sulfate, anhydrous
New Jersey: Calcium sulfate, anhydrous
TSCA 8(b) inventory: Calcium sulfate, anhydrous

California Proposition 65

Warnings

California prop. 65: This product contains the following ingredients for which the State of California has found to cause cancer which would require a warning under the statute: No products were found.
California prop. 65: This product contains the following ingredients for which the State of California has found to cause birth defects which would require a warning under the statute: No products were found.

Other Regulations

EINECS: This product is on the European Inventory of Existing Commercial Chemical Substances (EINECS No. 231-900-3).
Canada: Listed on Canadian Domestic Substance List (DSL).
China: Listed on National Inventory.
Japan: Listed on National Inventory (ENCS).
Korea: Listed on National Inventory (KECI).
Philippines: Listed on National Inventory (PICCS).
Australia: Listed on AICS.

Other Classifications

WHMIS (Canada) Not controlled under WHMIS (Canada).

DSCL (EEC) This product is not classified according to the EU regulations.

HMIS (U.S.A.)

<table>
<thead>
<tr>
<th></th>
<th>Health Hazard</th>
<th>Fire Hazard</th>
<th>Reactivity</th>
<th>Personal Protection</th>
</tr>
</thead>
<tbody>
<tr>
<td>Health</td>
<td>1</td>
<td>0</td>
<td>0</td>
<td>E</td>
</tr>
</tbody>
</table>

National Fire Protection Association (U.S.A.)

Health

0

Reactivity

Specific hazard

WHMIS (Canada)

(Pictograms)

DSCL (Europe)

(Pictograms)

Continued on Next Page
**Protective Equipment**

- Gloves (impervious).
- Lab coat.
- Dust respirator. Be sure to use an approved/certified respirator or equivalent.
- Safety glasses.

### Section 16. Other Information

<table>
<thead>
<tr>
<th>MSDS Code</th>
<th>C3490</th>
</tr>
</thead>
<tbody>
<tr>
<td>References</td>
<td>Not available</td>
</tr>
<tr>
<td>Other Special Considerations</td>
<td>Not available</td>
</tr>
</tbody>
</table>

**Notice to Reader**

All chemicals may pose unknown hazards and should be used with caution. *This Material Safety Data Sheet (MSDS) applies only to the material as packaged. If this product is combined with other materials, deteriorates, or becomes contaminated, it may pose hazards not mentioned in this MSDS. It shall be the user's responsibility to develop proper methods of handling and personal protection based on the actual conditions of use. While this MSDS is based on technical data judged to be reliable, Spectrum Quality Products, Inc. assumes no responsibility for the completeness or accuracy of the information contained herein.*