FLINN SCIENTIFIC, INC. Material Safety Data Sheet (MSDS)

MSDS #: 285.10

Revision Date: July 13, 2011

SECTION 1 — CHEMICAL PRODUCT AND COMPANY IDENTIFICATION

Copper(II) Sulfate, Anhydrous

Flinn Scientific, Inc. P.O. Box 219 Batavia, IL 60510 (800) 452-1261

CHEMTREC Emergency Phone Number: (800) 424-9300

SECTION 2 — COMPOSITION, INFORMATION ON INGREDIENTS

Copper(II) sulfate, anhydrous Synonym: cupric sulfate, anhydrous

CAS#: 7758-98-7

SECTION 3 — HAZARDS IDENTIFICATION

Off-white powder. Odorless.

Skin and respiratory irritant; moderately toxic by ingestion and inhalation.

Sulfur trioxide can be produced at temperatures above 653 °C.

FLINN AT-A-GLANCE

Health-2 Flammability-0 Reactivity-0

Exposure-1 Storage-1

0 is low hazard, 3 is high hazard

SECTION 4 — FIRST AID MEASURES

Call a physician and seek medical attention for further treatment, observation, and support after first aid.

Inhalation: Remove to fresh air at once. If breathing has stopped, give artificial respiration immediately.

Eye or External: Immediately flush with fresh water for at least 15 minutes.

Internal: Rinse mouth. Give large quantities of water for dilution. Call a physician or poison control at once.

SECTION 5 — FIRE FIGHTING MEASURES

Nonflammable, noncombustible solid.

However, sulfur trioxide can be produced at temperatures above 653 °C.

Fire Fighting Instructions: Use a triclass, dry chemical fire extinguisher. Firefighters should wear PPE and SCRA with full foreging a projected in projection projects.

SCBA with full facepiece operated in positive pressure mode.

NFPA CODE

None established

SECTION 6 — ACCIDENTAL RELEASE MEASURES

Restrict unprotected personnel from the area. Sweep up the spill, place in a sealed bag or container, and dispose. Ventilate area and wash spill site after material pickup is complete. See Sections 8 and 13 for further information.

SECTION 7 — HANDLING AND STORAGE

Flinn Suggested Chemical Storage Pattern: Inorganic #2. Store with acetates, halides, sulfates, sulfates, thiosulfates, and phosphates. Deliquescent; store in Flinn Chem-Saf Bag. Use and dispense in a hood.

SECTION 8 — EXPOSURE CONTROLS, PERSONAL PROTECTION

Avoid contact with eyes, skin, and clothing. Wear chemical splash goggles, chemical-resistant gloves, and chemical-resistant apron. Use ventilation to keep airborne concentrations below exposure limits. Always wear a NIOSH-approved respirator with proper cartridges or a positive pressure, air-supplied respirator when handling this material in emergency situations (spill or fire).

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SECTION 9 — PHYSICAL AND CHEMICAL PROPERTIES

Off-white powder. Odorless.

Specific gravity: 3.6

Solubility: Soluble in water; practically insoluble in alcohol.

Formula: CuSO₄ Formula weight: 159.61

SECTION 10 — STABILITY AND REACTIVITY

Avoid contact with moisture and finely powdered metals. Will corrode steel.

Shelf life: Poor, deliquescent.

SECTION 11 — TOXICOLOGICAL INFORMATION

Acute effects: Toxic, severe eye irritant, and gastrointestinal

disturbances.

Chronic effects: Possible mutagen.

Target organs: Liver, kidneys, and blood.

ORL-RAT LD₅₀: 300 mg/kg

IHL-RAT LC₅₀: N.A.

SKN-RBT LD₅₀: N.A.

N.A. = Not available, not all health aspects of this substance have been fully investigated.

SECTION 12 — ECOLOGICAL INFORMATION

Data not yet available.

SECTION 13 — DISPOSAL CONSIDERATIONS

Please review all federal, state and local regulations that may apply, before proceeding.

Flinn Suggested Disposal Method #26a is one option.

SECTION 14 — TRANSPORT INFORMATION

Shipping name: Not regulated

Hazard class: N/A UN number: N/A N/A = Not applicable

SECTION 15 — REGULATORY INFORMATION

TSCA-listed, EINECS-listed (231-847-6).

SECTION 16 — OTHER INFORMATION

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Consult your copy of the Flinn Science Catalog/Reference Manual for additional information about laboratory chemicals.