

FLINN SCIENTIFIC, INC.

Material Safety Data Sheet (MSDS)

MSDS #: 255.00

Revision Date: June 22, 2010

SECTION 1 — CHEMICAL PRODUCT AND COMPANY IDENTIFICATION

Cobalt Chloride

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

Cobalt chloride

Synonym: cobalt (II) chloride, cobaltous chloride, cobalt dichloride

CAS#: 7791-13-1

SECTION 3 — HAZARDS IDENTIFICATION

Damp, red crystal. Odorless.

Irritant to body tissues. Moderately toxic by ingestion.

Prolonged exposure may cease production of red blood cells.

Avoid ingestion, inhalation, and skin absorption.

Cobalt and cobalt compounds are possible carcinogens.

FLINN AT-A-GLANCE

Health-3

Flammability-0

Reactivity-0

Exposure-3

Storage-0

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

External: Wash continuously with fresh water for at least 15 minutes.

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

SECTION 5 — FIRE FIGHTING MEASURES

Nonflammable solid.

When heated to decomposition, emits toxic hydrogen chloride gas and cobalt fumes.

Fire Fighting Instructions: Use a triclass, dry chemical fire extinguisher. Firefighters should wear PPE and SCBA with full facepiece operated in positive pressure mode.

NFPA CODE

None

established

SECTION 6 — ACCIDENTAL RELEASE MEASURES

Restrict unprotected personnel from the area. Gather up material in a pile (do not sweep). Place in a suitable 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, sulfites, thiosulfates, and phosphates. Store in a cool, dry place. 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 a 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). Exposure guidelines: TWA 0.05 mg/m³ (NIOSH)

SECTION 9 — PHYSICAL AND CHEMICAL PROPERTIES

Damp, red crystal. Odorless.

Solubility: Water soluble.

Formula: $\text{CoCl}_2 \cdot 6\text{H}_2\text{O}$

Formula Weight: 237.95

Specific Gravity: 1.92

Melting Point: 230 °F

SECTION 10 — STABILITY AND REACTIVITY

Avoid contact with moisture, oxidizers, and alkali metals.

Shelf life: Indefinite.

SECTION 11 — TOXICOLOGICAL INFORMATION

Acute effects: Toxic, irritant, and possible sensitizer.

Chronic effects: Possible carcinogen, and mutagen.

Target organs: N.A.

ORL-RAT LD₅₀: 766 mg/KgIHL-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 consult with state and local regulations.

Flinn Suggested Disposal Method #27f 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 (231-589-4).

SECTION 16 — OTHER INFORMATION

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