MATERIAL SAFETY DATA SHEET

WALL COLMONOY CORPORATION
30261 Stephenson Hwy.
Madison Heights, Michigan 48071-1650
Phone: 248-585-6400 FAX: 248-585-7960

Section I. Identity:

Product Name: COLMONOY No. 4, 5, 6 and 56 Sprayweld Powder
MSDS Date: January 8, 2002

Section II. Ingredients/Identity Information:

COMPONENT	CAS No.	OSHA PEL	ACGIH TLV	Percent
Chromium	7440-47-3	1 mg/m^3	0.5 mg/m^3	10-15
Nickel	7440-02-0	1 mg/m^3	1.5 mg/m^3	bal.
Boron	7440-42-8	None	None	2-3
Silicon	7440-21-3	10 mg/m^3	10 mg/m^3	2-5
Iron	7439-89-6	10 mg/m^3	10 mg/m^3	2-5

Section III. Physical/Chemical Characteristics

Boiling Point: Not applicable
Vapor Pressure: Not applicable
Vapor Density: Not applicable
Solubility: Negligible.
Specific Gravity (H_20=1): No. 4=8.39, No. 5=8.24, No. 6=8.10, No. 56=8.18.
Melting Point: No.4=1105C, No. 5=1065C, No.6=1040C, No. 56=1050C
Appearance and Odor: Silver/grey metallic powder, no distinct odor.

Section IV: Fire and Explosion Data

Flash Point and Method Used: None
Extinguishing Media: Do not use water on metal fires, use dry chemical, dry sand or CO_2 to smother fire.
Special Fire-Fighting Procedures: Do not breathe fumes. For large fires involving this material, fire fighters should wear self contained breathing apparatus.

Unusual Fire and Explosion Hazards: Fires or explosions may be initiated by exposing any concentrated dust suspension in an enclosed area to a spark or flame. Do not allow dust to accumulate fromspraying, grinding, or similar operations.

Section V. Reactivity Data

Stability: This product is stable.
Conditions to Avoid: Under special conditions, Nickel can react with carbon monoxide in reducing atmospheres to form Ni $(CO)_4$.
Incompatibility: Acids, strong oxidizing agents.
Hazardous Decomposition or Byproducts: During melting or spraying, iron-, nickel-, or chromium-oxide fumes can be formed, in the order given.
Hazardous Polymerization: Will not occur.

Section VI. Health Hazard Data

Expected Route of Entry: Inhalation of fumes (if heated) would be main route of exposure.
Health Hazards (Acute and Chronic): Effects associated with over exposure to metal dusts may include respiratory irritation, conjunctivitis, or pneumoconiosis. Repeated handling can cause skin rash (dermatitis) in people sensitive to nickel or chromium.
Carcinogens: The National Toxicology Program (NTP) lists chromium as a known carcinogen. NTP indicates that nickel and certain nickel compounds may reasonably be anticipated to be carcinogens. IARC lists chromium as carcinogenic to humans and nickel as possibly carcinogenic to humans.
Signs and Symptoms of Exposure: Sneezing, coughing, irritation of nose, throat or eyes. Skin rash or itching.
Medical Conditions that May be Aggravated: Allergies or respiratory ailments.
Emergency and First Aid Procedures: Inhalation: Remove to fresh air. Skin contact: wash thoroughly with mild soap and water. Eyes: flush with water until clear of particles. Ingestion: If large amount, induce vomiting. If symptoms persist after any route of exposure, seek medical attention.

Section VII. Precautions for Safe Handling and Use

Procedure in Case of Spill: Take up by wet sweeping or vacuum. If vacuum exhausts to workplace, HEPA filers would be required. Do not create airborne dust. Place in labeled, covered, containers. Save for re-use or disposal.
Waste Disposal Method: Normally reclaimed for scrap metal values. If disposal is necessary, follow rules for regulated waste of this nature.
Precautions for Handling or Storing: Keep away from strong oxidizing agents. Avoid repeated handling with bare skin. Do not eat or smoke in areas of use.

Section VIII. Control Measures

Respiratory Protection: If exposure limits are exceeded wear NIOSH approved respirator giving protection from dust/mists. See OSHA “Respiratory Protection Program, 29 CFR 1910.134.
Recommended ventilation: Good local exhaust needed for spraying.
Gloves: If handling material is unavoidable, skin guard cream or work gloves are recommended.
Eye Protection: Shaded protective lenses for process being performed.

General Health and Safety Warning: THE FOLLOWING IS A PRECAUTIONARY STATEMENT THAT APPLIES TO ALL WELDING/BRAZING PRODUCTS; keep your head out of the fumes. Use enough ventilation, exhaust at work, or both, to keep fumes and gases from your breathing zone. See American National Standard Z49.1, "Safety in Welding & Cutting" published by the American Welding Society, 550 N.W. LeJeune Road, Miami, FL 33126 and OSHA 29 CFR 1910 available from the Superintendent of Documents, U.S. Government Printing Office, P.O. Box 371954, Pittsburgh, PA 15250-7954.

DOT Shipping Information: This product is not regulated for shipping.

HMIS Numbers:

Health: 1 **Flammability: 0** **Reactivity: 1**

SARA Title III and Canadian Ingredient Disclosure List Information:
The following materials are subject to the reporting requirements of Section 313 of Title III of the Superfund Amendments & reauthorization Act of 1986 and 40 CFR Part 372. They also appear on the Canadian Ingredient Disclosure List:
Nickel and Chromium.

State Warning Information:

California: This product contains a chemical known to the state of California to cause cancer.

New Jersey: This product contains the following materials listed on the New Jersey Right-To-Know Hazardous Substances List:
Substance 0432, chromium, CAS 7440-47-3, DOT No. None
Substance 1341, nickel, CAS 7440-02-0, DOT No. None

Toxic Substances Control Act Certification:

This product complies with all applicable rules or orders under TSCA.

This sheet has been designed to meet the requirements of OSHA Hazard Communication Standard 29 CFR 1910.1200 and OSHA Form 174.