Inweld
Welding Alloys and Supplies

Safety Data Sheet

Section 1: Identification

Product Identifier:
Hi-Alloy 455

Recommended Use:
Filler metal for welding and brazing applications.

Manufacturer:
Inweld Corporation
3962 Portland St
Coplay, PA 18037
UNITED STATES

Emergency Phone Number:
(800) 424-9300 (CHEMTREC)

Inweld Phone Number:
(800) 346-5368

Section 2: Hazard(s) Identification

Classification (GHS):

- Skin corrosion/irritation: Category 2
- Serious eye damage/eye irritation: Category 2A
- Respiratory sensitization: Category 1
- Carcinogenicity: Category 1A
- Specific target organ toxicity - repeated exposure: Category 1

Signal Word:
Danger

Hazard Statements:

- Causes skin irritation.

- Causes serious eye irritation.
- May cause allergy or asthma symptoms or breathing difficulties if inhaled.
- May cause cancer.
- Causes damage to organs through prolonged or repeated exposure.

Precautionary Statements:

- Avoid breathing dust/fume/gas/mist/vapors/spray.
- Use only outdoors or in a well-ventilated area.
- Wear protective gloves/protective clothing/eye protection/face protection.
- If exposed or concerned: Get medical advice/attention.
- IF ON SKIN: Wash with plenty of water.
- IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses if present and easy to do – continue rinsing.

GHS Hazard Pictograms:

Section 3: Composition/Information on Ingredients

Chemical Name	CAS Number	Concentration (%)
Nickel	7440-02-0	40 - 60
Chromium	7440-47-3	20 - 35
Iron	7439-89-6	10 - 25
Other Alloying Elements	-	Balance

Section 4: First-Aid Measures

Inhalation:
Remove person to fresh air and keep comfortable for breathing. Seek medical attention if symptoms persist.

Skin Contact:
Wash with plenty of soap and water. Remove contaminated clothing and shoes. If irritation develops, seek medical attention.

Eye Contact:
Rinse cautiously with water for several minutes. Remove contact lenses if present and easy to do. Continue rinsing. If irritation persists, seek medical attention.

Ingestion:
Rinse mouth. Do NOT induce vomiting. Seek medical attention immediately.

Section 5: Fire-Fighting Measures

Suitable Extinguishing Media:
Use dry chemical, CO2, water spray (fog), or foam.

Specific Hazards Arising from the Chemical:
Dust or fumes may ignite or explode in confined areas.

Protective Equipment for Firefighters:
Wear self-contained breathing apparatus and full protective gear.

Section 6: Accidental Release Measures

Personal Precautions:
Avoid dust formation. Use personal protective equipment.

Methods for Cleanup:
Sweep or vacuum spills carefully to avoid dust dispersal. Dispose of in accordance with local regulations.

Section 7: Handling and Storage

Handling:
Use adequate ventilation. Avoid breathing dust/fume. Wear protective gloves and eye protection.

Storage:
Store in a cool, dry place away from incompatible materials.

Section 8: Exposure Controls/Personal Protection

Exposure Limits:
Refer to OSHA PELs for individual components such as Nickel, Chromium, etc.

Engineering Controls:
Use local exhaust ventilation to control fumes and dust.

Personal Protective Equipment:

- Eye/Face Protection: Safety glasses or goggles
- Skin Protection: Chemical-resistant gloves
- Respiratory Protection: NIOSH-approved respirator if ventilation is inadequate

Section 9: Physical and Chemical Properties

Property	Value
Appearance	Solid wire/rod
Color	Silver-gray
Odor	Odorless
Melting Point	Approx. 1400-1500 °C
Solubility in Water	Negligible

Section 10: Stability and Reactivity

Reactivity:
Stable under recommended storage conditions.

Conditions to Avoid:
Excessive heat, moisture, incompatible materials.

Incompatible Materials:
Strong acids, strong oxidizers.

Section 11: Toxicological Information

Routes of Exposure:
Inhalation, skin and eye contact.

Symptoms:
Irritation, sensitization, possible carcinogenic effects.

Section 12: Ecological Information

Not expected to be harmful to the environment under normal use.

Section 13: Disposal Considerations

Dispose of waste material in accordance with federal, state, and local regulations.

Section 14: Transport Information

Not regulated under DOT for shipment in solid form.

Section 15: Regulatory Information

Refer to applicable OSHA, EPA, and state regulations.

Section 16: Other Information

Prepared by: Inweld Corporation
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