

MATERIAL SAFETY DATA SHEET

CHEMICAL PRODUCT AND COMPANY IDENTIFICATION
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Manufacturer's Name: Bow Solder Products Co. 1 Crossman Road Sayreville, NJ 08872	Emergency Telephone Number: 800-535-5053 Information Phone: 732-316-2100 Origination Date: May 10, 1999 Revision Date: September 20, 1999	Distributor Name: CooperTools 3535 Glenwood Avenue Raleigh, NC 27612 Information: 919-783-2126
COMMON NAME: Rosin Core Solder 1%Sn/99%Pb to 99% Sn/1%Pb	PRODUCT CAS NO.: Mixture	

1. PRODUCT INGREDIENTS

CHEMICAL NAME	CAS NUMBER	WEIGHT		PERMISSIBLE AIR		SARA TITLE III SECT.313 CHEM.
		%		CONCEN.(mg/cu.m.) OSHA	ACGIH	
TIN	7440-31-5	0-100		2.0	2.0	NO
LEAD	7439-92-1	0-100		0.05	0.15	YES
ANTIMONY	7440-36-0	<2	0.5	0.5	YES	
COPPER	7440-50-8	<2		.1	.1	NO
ROSIN	8050-09-7	1-3%		N/A	N/A	NO

No other hazardous material is present in concentration greater than 1% (0.1% for carcinogens).

2. PHYSICAL DATA

MATERIAL IS	APPEARANCE AND ODOR		
Solid	Silver-White Metal, Core Is A White Powder		
MELTING POINT	BOILING POINT	SPECIFY GRAVITY	VAPOR DENSITY
METAL-179-312 C	>1300 C	7.3-11.3	N/A
CORE – 250C	106C	1.1	
SOLUBILITY IN WATER	VAPOR PRESSURE	EVAPORATION RATE	PH
INSOLUBLE	N/A	N/A	N/A

3. FIRE AND EXPLOSION DATA

Cooper Hand Tools/Cheraw Plant MSDS for 60/40 Rosin Core Solder

FLASH POINT	FLAMMABLE LIMITS	AUTO IGNITION TEMP.
METAL	N/A	N/A
CORE – 300°F		
UNUSUAL FIRE AND EXPLOSION HAZARDS: Molten metals produce fume or vapor that may be toxic and/or respiratory irritants. Reacts violently with oxidizing agents.		
FIRE EXTINGUISHING AGENTS RECOMMENDED: Use CO2 or dry chemicals on surrounding fire.		
FIRE EXTINGUISHING AGENTS TO AVOID: Don't use water on fire where molten metal is present.		
SPECIAL FIRE FIGHTING PRECAUTIONS: Use NIOSH/MSHA approved self-contained breathing apparatus and full body protective clothing.		
NFPA RATING	0 1 0	HEALTH 1, FLAMMABILITY 0, REACTIVITY 0, SPECIAL 0

4. HEALTH HAZARD INFORMATION

PRIMARY ROUTES OF ENTRY

INGESTION

X INHALATION

ABSORPTION

CARCINOGENECITY: This product has not been listed as a suspect carcinogen by NTP, IARC or OSHA.

ACUTE OVEREXPOSURE (SYMPTOMS AND EFFECTS):

Severe short – term overexposure may lead to central nervous system disorders, characterized by drowsiness, seizures, coma + death. It should be recognized that exposures of this magnitude in an industrial environment are extremely unlikely.

CHRONIC OVEREXPOSURE (SYMPTOMS AND EFFECTS):

Prolonged overexposure to lead can result in systemic poisoning with symptoms of metallic taste, anemia, insomnia, weakness, constipation, abdominal pain, gastrointestinal disorders, joint and muscle pain, and muscular weakness, and may cause damage to the blood-forming organs, kidneys, nervous and reproductive systems. Damage may include reduced fertility in both men and women, damage to the fetus of exposed pregnant women, anemia, muscular weakness and kidney dysfunction.

MEDICAL CONDITIONS POSSIBLY AGGRAVATED BY EXPOSURE:

Diseases of the blood and blood forming organs, kidneys, nervous and possibly reproductive systems.

FIRST AID PROCEDURE:

INHALATION: Remove from exposure and call a physician.

SKIN CONTACT: Wash affected areas with soap and water. If burns should occur from molten metal treat for burn and get immediate medical assistance.

EYE CONTACT: flush eyes with water for 15 minutes, call a physician.

INGESTION: Ingest large quantities of water, call a physician.

WARNING: THIS PRODUCT CONTAINS OR PRODUCES A CHEMICAL KNOWN TO THE STATE OF CALIFORNIA TO CAUSE CANCER AND BIRTH DEFECTS OR OTHER REPRODUCTIVE HARM.

5. PRECAUTIONS/PROCEDURES

OVERHEATING OF ALLOY CAN PRODUCE METAL FUMES AND OXIDES. Machining operations such as grinding, sawing or buffing can generate airborne particulates in the work area. Exposure levels indicated in section 1 are relevant to these and other operations.

NORMAL HANDLING:

Use of approved respirators is required for applications where adequate ventilation cannot be provided. Activities which generate dust or fume should be avoided. When melted, the temperature should be kept as low as possible.

SPILL OR LEAK:

Any method that keeps dust to a minimum is acceptable. Vacuuming is preferred. Use of approved respiratory protection where possibility of dust/fume exposure exists. Do not use compressed air for cleaning

PERSONAL HYGIENE:

Avoid inhalation or ingestion. Practice good housekeeping and personal hygiene procedures. A shower is recommended if significant dust exposure occurs.

ENGINEERING CONTROLS:

Local exhaust ventilation is recommended for dust and/or fume generation operations where airborne exposures may exceed permissible air concentrations.

STORAGE: General storage procedures acceptable.

SPECIAL PRECAUTIONS, PROCEDURES, LABEL INSTRUCTION:

Special attention is drawn to the requirements of the OSHA Lead Standard (1910.1025) and Respirator Standard (1910.134) should airborne exposures exceed the OSHA action level or PEL.

6. PERSONAL PROTECTIVE EQUIPMENT

RESPIRATORY PROTECTION:

Where airborne exposures may exceed OSHA/ACGIH permissible air concentrations, the minimum respiratory protection recommended is a negative pressure air purifying respirator with cartridges that are NIOSH/MSHA approved against dust, fumes and mists having a TWA not less than 0/05 mg/cu m.

EYES AND FACE:

Safety glasses recommended where the possibility of getting dust particles in eyes exists, or when handling molten metal.

OTHER CLOTHING AND EQUIPMENT:

Gloves and other protective clothing recommended if skin contact is appreciable.

7. REACTIVITY DATA

STABILITY: Stable **CONDITIONS TO AVOID:** Not Available

Cooper Hand Tools/Cheraw Plant MSDS for 60/40 Rosin Core Solder

INCOMPATIBILITY: Strong oxidizers may cause violent reaction.

HAZARDOUS DECOMPOSITION PRODUCTS:

At temperatures above the melting point, toxic fumes or vapors may be emitted.

8. ENVIRONMENTAL

REGULATED BY DOT? No

WASTE DISPOSAL METHOD: (Disposer must comply with federal, state, and local disposal or discharge laws)

IF HAZARDOUS UNDER 40 CFR 261, SUBPARTS B AND C, MATERIAL MUST BE TREATED OR DISPOSED IN A FACILITY MEETING THE REQUIREMENTS OF 40 CFR 254 OR 265. IF NON-HAZARDOUS, MATERIAL SHOULD BE DISPOSED IN A FACILITY MEETING THE REQUIREMENTS OF 40 CFR 257.

RCRA STATUS OF UNUSED MATERIAL:

If discarded in unaltered form, material should be tested to determine if it must be classified as a hazardous waste for disposal purposes. Under specific circumstances, application can be made to the EPA administrator to have a particular waste designated non-hazardous.

9. ADDITIONAL INFORMATION

PRECAUTIONS TO BE TAKEN IN HANDLING AND STORING: None

OTHER PRECAUTIONS: None

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