



**MAGNOLIA
METAL
CORPORATION**

MATERIAL SAFETY DATA SHEET

NO. 1 REV. NO. 8

Date Prepared April 27, 2010

I. PRODUCT IDENTIFICATION

This MSDS supplied for:

UNS Alloy <u>Designation</u> C93600	<u>Trade Name</u> Magnolia Modified SAE 64 or Magnolia Regular	UNS Alloy <u>Designation</u> C92200	<u>Trade Name</u> Magnolia Navy "M"
C93700	Magnolia Certified SAE 64	C92700	Magnolia SAE 63
C93200	Magnolia SAE 660	C92800	Magnolia Alloy 928
C94100	Magnolia "120" High Lead	C83600	Magnolia SAE 40
C94500	Magnolia CDA 94500	C94300	Magnolia HRD-8

Manufacturer: Magnolia Metal Corporation
R.R. 2 Box 13M Magnolia Park
Auburn, Nebraska 68305

Telephone: (402) 274-3152

FIRE HAZARD CLASS: HEALTH : 0 FIRE : 0 REACTIVITY : 0

THE 4TH DIAMOND:

ANSI: WARNING! FUMES OR DUST FROM THIS CASTING MAY CAUSE RESPIRATORY OR SKIN IRRITATION, LEAD INTOXICATION, ANEMIA, OR METAL FUME FEVER. NICKEL COMPOUNDS HAVE BEEN FOUND TO BE CARCINOGENS IN LABORATORY ANIMALS. ANTIMONY AND ITS COMPOUNDS HAVE BEEN IDENTIFIED AS POTENTIAL CANCER CAUSING AGENTS.

II. PRODUCT INGREDIENTS

<u>Ingredient</u>	<u>CAS No.</u>	<u>Percent</u>	<u>TLV</u>	<u>PEL</u>
Antimony*	7440-36-0	0.0-0.95	0.5 mg/cu.m	0.5 mg/cu.m
Copper*	7440-50-8	65.0-94.0	0.2 mg.m as fume 1.0 mg.m as dust	0.1 mg.m as fume 1.0 mg.m as dust
Lead*	7439-92-1	0.2-25.0	0.15 mg/cu.m	0.05 mg/cu.m
Nickel*	7440-02-0	0.0-0.75	1.0 mg/cu.m	1.0 mg/cu.m
Tin*	7440-31-5	2.0-17.0	2.0 mg/cu.m	2.0 mg/cu.m
Zinc**	7440-66-6	<0.25-12.0	5.0 mg/cu.m as oxide fume	5.0 mg/cu.m as oxide fume

N/E : none established

N/A : not applicable

N/D : no data available

* This constituent, a toxic chemical, makes this product subject to the reporting requirements of section 313 of Title III of the Superfund Amendments and Reauthorization Act of 1986 and 40 CFR Part 372. Quantity threshold for these chemicals, below which reporting of releases is not required is 25,000 pounds. Chemicals marked "*" are reportable only if in the form of dust or fume.

Antimony and its compounds have been identified as potential cancer causing agents.

Nickel and Cobalt, in combination, make up 0.0-0.75% of the casting. Nickel has been shown to cause cancer in laboratory animals. However, its potential to cause cancer in humans has not been determined.

Elements having a listed percentage greater than zero will be present in all grades. Those having a value of "0" may not be present in certain grades. "<" means that the casting may contain less than a given percentage.

OVERVIEW

There are no chemical hazards from these castings in solid form.

Machining, grinding, flame cutting or welding on the casting will put contaminants, primarily copper, tin and lead, in the air.

Fumes and dusts from the casting irritate the nose and throat. If too much fume is inhaled, it will cause a sweet or metallic taste in the mouth. High concentrations of the fumes can also cause metal fume fever, which resembles the flu.

Breathing or swallowing lead dust or fume from the casting can result in lead poisoning. The early effects are similar to minor illnesses. The effects are fatigue, headache, loss of appetite, aching bones and muscular weakness. Overexposure for a long time can cause kidney damage, nervous system damage and reproductive effects.

Antimony and its compounds are irritating to the skin and mucous membranes and are systemic poisons. Symptoms include metallic taste in mouth, vomiting, colic, loss of appetite and weight and diarrhea. Dermatitis may result from repeated skin contact with antimony compounds. Chronic inhalation of antimony trioxide is reported to produce a reduction in white blood cells and damage to the liver.

N/E : none established

N/A : not applicable

N/D : no data available

OVERVIEW (continued)

Inhaling excessive amounts of dust from castings over a long period of time can cause anemia. The dust from this casting may also cause skin and eye irritation after short exposures.

Grinding on castings that have not been cleaned may generate significant amounts of dust containing free silica, which can cause silicosis.

Because of this potential hazard from metal dust and fumes, machining, grinding, welding operations, etc., should be done under local exhaust ventilation. If ventilation is not adequate, wear a NIOSH approved dust and fume respirator. In addition, good hygiene practices should be followed. Smoking should not be allowed in lead handling areas. Wash hands thoroughly before eating. Keep work area clean.

Other toxic metals in the alloy are present in small amounts that will not represent a hazard if copper and lead dust and fume are adequately controlled.

SECTION III - PHYSICAL DATA

Physical Description : Solid metal, yellow to red in color, no odor

Boiling Point : 4703 F (for copper)

Vapor Pressure : N/A

Vapor Density :N/A

Solubility In Water : not soluble

Specific Gravity : 8.94 (for copper)

Percent Volatile By Volume : None

Evaporation Rate : N/A

SECTION IV - FIRE AND EXPLOSION DATA

Castings will not burn or explode.

SECTION V - HEALTH HAZARD DATA

Eyes : Metal particles in eyes may cause irritation if not removed.

Skin : May cause skin irritation

Breathing : Breathing dust or fumes may cause nose and throat irritation. High levels of the fumes can result in a sweet or metallic taste in the mouth. Very high levels can cause metal fume fever, which resembles the flu. Breathing the dust over a long period of time can also result in anemia, kidney damage, nervous system damage and reproductive effects. Breathing excessive amounts of silica dust for a long time can cause silicosis. Silicosis causes shortness of breath, reduced capacity to do work and weakens defenses against other lung diseases.

Swallowing : N/A

Noise : Grinding castings is noisy. The OSHA limit for noise averaged over 8 hours is 90 decibels (dBA), hearing conservation program required if exposure is over 85 dBA, If noise is at or above 90 dBA you should wear ear muffs or ear plugs.

FIRST AID

If In Eyes : Metal particles should be removed by trained individuals such as a nurse or physician.

If On Skin : Use a mild hand cream if irritation develops.

If Breathed : (Fumes from welding) Move to fresh air.

If Swallowed : N/A

SECTION VI - REACTIVITY DATA

Hazardous Polymerization : Will not occur.

Stability : Stable.

Incompatibility: Fine castings dust and finely divided bromates, chlorates or iodates form an explosive mixture. Acetylene or ethylene oxide can react with heated casting to form explosive acetylides. Also not compatible with halogens, strong acids or strong oxidizers.

SECTION VII - SPILL OR LEAK PROCEDURES

Steps to be taken in case material is released or spilled:

If damaged, return castings to vendor or send to scrap reclaimer.

Collected dust from machining, welding, etc. may be classed as a "hazardous waste" depending on circumstances. Consult local authorities regarding disposal.

SECTION VIII - PROTECTIVE EQUIPMENT TO BE USED

Respiratory Protection : Wear a NIOSH approved respirator for dusts or fume if concentrations exceed the TLV or PEL.

Ventilation : Provide general ventilation and/or local exhaust if necessary to maintain concentrations below the TLVs.

Protective Gloves : Work gloves advisable for handling castings.

Eye Protection : Safety glasses with side shields and/or face shields for particles (grinding). Welding goggles or helmet for welding.

Other Protective Equipment : Wear a protective apron and gauntlets if arc-air gouging or cutting or welding on castings. If noise is at or above 90 dBA you should wear ear muffs or ear plugs.

SECTION IX - SPECIAL PRECAUTIONS OR OTHER COMMENTS

Storage : No special precautions.

Information presented herein has been compiled from sources considered to be reliable and is accurate and reliable to the best of our knowledge and belief but is not guaranteed to be so.

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