



Revision Number: 003.0

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**1. PRODUCT AND COMPANY IDENTIFICATION**

<b>Product name:</b> 63S4MP218ACP89V 650G SEMCO	<b>IDH number:</b> 1051208
<b>Product type:</b> Solder Paste	<b>Item number:</b> M00706
<b>Restriction of Use:</b> None identified	<b>Region:</b> United States
<b>Company address:</b> Henkel Corporation One Henkel Way Rocky Hill, Connecticut 06067	<b>Contact information:</b> Telephone: (860) 571-5100 MEDICAL EMERGENCY Phone: Poison Control Center 1-877-671-4608 (toll free) or 1-303-592-1711 TRANSPORT EMERGENCY Phone: CHEMTREC 1-800-424-9300 (toll free) or 1-703-527-3887 Internet: www.henkelna.com

**2. HAZARDS IDENTIFICATION**

**EMERGENCY OVERVIEW**

**DANGER:** CAUSES SKIN IRRITATION.  
MAY CAUSE AN ALLERGIC SKIN REACTION.  
CAUSES SERIOUS EYE IRRITATION.  
MAY CAUSE ALLERGY OR ASTHMA SYMPTOMS OR BREATHING DIFFICULTIES IF INHALED.  
MAY CAUSE DROWSINESS OR DIZZINESS.  
SUSPECTED OF CAUSING CANCER.  
MAY DAMAGE FERTILITY OR THE UNBORN CHILD.  
CAUSES DAMAGE TO ORGANS THROUGH PROLONGED OR REPEATED EXPOSURE.

HAZARD CLASS	HAZARD CATEGORY
SKIN IRRITATION	2
EYE IRRITATION	2A
RESPIRATORY SENSITIZATION	1
SKIN SENSITIZATION	1
CARCINOGENICITY	2
REPRODUCTIVE TOXICITY	1B
SPECIFIC TARGET ORGAN TOXICITY - SINGLE EXPOSURE	3
SPECIFIC TARGET ORGAN TOXICITY - REPEATED EXPOSURE	1

**PICTOGRAM(S)**



**Precautionary Statements**

**Prevention:** Obtain special instructions before use. Do not handle until all safety precautions have been read and understood. Do not breathe dust or fumes. Wash thoroughly after handling. Do not eat, drink or smoke when using this product. Use only outdoors or in a well-ventilated area. Contaminated work clothing should not be allowed out of the workplace. Wear eye and face protection. Wear protective gloves. Use personal protective equipment as required. In case of inadequate ventilation wear respiratory protection.

**Response:** IF ON SKIN: Wash with plenty of soap and water. IF INHALED: Remove person to fresh air and

keep comfortable for breathing.

IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to remove. Continue rinsing. IF exposed or concerned: Get medical attention. If skin irritation or rash occurs: Get medical attention. If eye irritation persists: Get medical attention. Take off contaminated clothing.

**Storage:**  
**Disposal:**

Store in a well-ventilated place. Keep container tightly closed. Store locked up.  
Dispose of contents and/or container according to Federal, State/Provincial and local governmental regulations.

Classification complies with OSHA Hazard Communication Standard (29 CFR 1910.1200) and is consistent with the provisions of the United Nations Globally Harmonized System of Classification and Labeling of Chemicals (GHS).

See Section 11 for additional toxicological information.

### 3. COMPOSITION / INFORMATION ON INGREDIENTS

Hazardous Component(s)	CAS Number	Percentage*
Tin	7440-31-5	30 - 60
Lead	7439-92-1	30 - 60
Rosin	8050-09-7	1 - 5
Polyethylene glycol dibutyl ether	31885-97-9	1 - 5
Bis(2-butoxyethyl)ether	112-73-2	1 - 5
Triethanolamine	Proprietary	0.1 - 1
Silver	7440-22-4	0.1 - 1

\* Exact percentage is a trade secret. Concentration range is provided to assist users in providing appropriate protections.

### 4. FIRST AID MEASURES

<b>Inhalation:</b>	Move to fresh air. If breathing is difficult, give oxygen. If not breathing, give artificial respiration. Get immediate medical attention.
<b>Skin contact:</b>	Remove contaminated clothing and footwear. Immediately flush skin with plenty of water (using soap, if available). If symptoms develop and persist, get medical attention. Wash clothing before reuse.
<b>Eye contact:</b>	Rinse immediately with plenty of water, also under the eyelids, for at least 15 minutes. Get medical attention.
<b>Ingestion:</b>	DO NOT induce vomiting unless directed to do so by medical personnel. Never give anything by mouth to an unconscious person. If symptoms develop and persist, get medical attention.
<b>Symptoms:</b>	See Section 11.

### 5. FIRE FIGHTING MEASURES

<b>Extinguishing media:</b>	Water spray (fog), foam, dry chemical or carbon dioxide.
<b>Special firefighting procedures:</b>	Wear a self-contained breathing apparatus with a full face piece operated in pressure-demand or other positive pressure mode.
<b>Unusual fire or explosion hazards:</b>	None

**Hazardous combustion products:**

Oxides of carbon. Oxides of silicon. Oxides of Metals in Section 2. Irritating vapors. Formaldehyde.

**6. ACCIDENTAL RELEASE MEASURES**

Use personal protection recommended in Section 8, isolate the hazard area and deny entry to unnecessary and unprotected personnel.

**Environmental precautions:**

Do not allow product to enter sewer or waterways.

**Clean-up methods:**

Ensure adequate ventilation. Wear suitable protective clothing, gloves and eye/face protection. Scrape up spilled material and place in a closed container for disposal.

**7. HANDLING AND STORAGE****Handling:**

Use only with adequate ventilation. Wear suitable protective clothing, gloves and eye/face protection. Avoid skin contact with molten resins. Avoid contact with eyes, skin and clothing. Do not wear contact lenses. Wash thoroughly after handling.

**Storage:**

Store in original container until ready to use.

For information on product shelf life, please review labels on container or check the Technical Data Sheet.

**8. EXPOSURE CONTROLS / PERSONAL PROTECTION**

Employers should complete an assessment of all workplaces to determine the need for, and selection of, proper exposure controls and protective equipment for each task performed.

Hazardous Component(s)	ACGIH TLV	OSHA PEL	AIHA WEEL	OTHER
Tin	2 mg/m3 TWA	2 mg/m3 PEL (as Sn)	None	None
Lead	0.05 mg/m3 TWA (as Pb)	0.05 mg/m3 TWA 0.03 mg/m3 OSHA_ACT	None	None
Rosin	Exposure by all routes should be carefully controlled to levels as low as possible. Included in the regulation but with no data values. See regulation for further details	None	None	None
Polyethylene glycol dibutyl ether	None	None	None	None
Bis(2-butoxyethyl)ether	None	None	None	None
Triethanolamine	5 mg/m3 TWA	None	None	None
Silver	0.1 mg/m3 TWA Dust and fume.	0.01 mg/m3 PEL (as Ag)	None	None

**Engineering controls:**

Use only with adequate ventilation. Use local ventilation if general ventilation is insufficient to maintain vapor concentration below established exposure limits.

**Respiratory protection:**

Use NIOSH approved respirator if there is potential to exceed exposure limit(s).

**Eye/face protection:**

Safety goggles or safety glasses with side shields.

**Skin protection:**

Use impermeable gloves and protective clothing as necessary to prevent skin contact.

**9. PHYSICAL AND CHEMICAL PROPERTIES**

<b>Physical state:</b>	Solid, Paste
<b>Color:</b>	Gray
<b>Odor:</b>	Mild
<b>Odor threshold:</b>	Not available.
<b>pH:</b>	Not applicable
<b>Vapor pressure:</b>	Not determined
<b>Boiling point/range:</b>	> 200 °C (> 392°F) (solvent)
<b>Melting point/ range:</b>	179 °C (354.2 °F) (solder alloy)
<b>Specific gravity:</b>	4.66
<b>Vapor density:</b>	Heavier than air.
<b>Flash point:</b>	117 °C (242.6 °F)
<b>Flammable/Explosive limits - lower:</b>	Not applicable
<b>Flammable/Explosive limits - upper:</b>	Not applicable
<b>Autoignition temperature:</b>	Not determined
<b>Evaporation rate:</b>	Not available.
<b>Solubility in water:</b>	Not miscible
<b>Partition coefficient (n-octanol/water):</b>	Not determined
<b>VOC content:</b>	0 %; 0 g/l
<b>Viscosity:</b>	Not available.
<b>Decomposition temperature:</b>	Not available.

**10. STABILITY AND REACTIVITY**

<b>Stability:</b>	Stable under recommended storage conditions.
<b>Hazardous reactions:</b>	Will not occur.
<b>Hazardous decomposition products:</b>	Thermal decomposition can lead to release of irritating gases and vapors.
<b>Incompatible materials:</b>	Incompatible with oxidising agents. Strong acids and strong bases.
<b>Reactivity:</b>	Not available.
<b>Conditions to avoid:</b>	Solder alloy will react with concentrated nitric acid to produce toxic fumes of nitrogen oxides.

**11. TOXICOLOGICAL INFORMATION**

**Relevant routes of exposure:** Skin, Inhalation, Eyes

**Potential Health Effects/Symptoms**

**Inhalation:** May cause allergic respiratory reaction. Vapor overexposure may cause drowsiness. Dizziness. Lead is a cumulative poison and continuous exposure to small amounts over time can raise the body's content to toxic levels.

**Skin contact:** Causes skin irritation. May cause allergic skin reaction. Argyria (a non-toxic, cosmetic blue-gray discoloration of the skin and mucous membranes that is irreversible).

**Eye contact:** Causes serious eye irritation.

**Ingestion:** Lead is a cumulative poison and continuous exposure to small amounts over time can raise the body's content to toxic levels.

Hazardous Component(s)	LD50s and LC50s	Immediate and Delayed Health Effects
Tin	None	Gastrointestinal, Irritant, Kidney, Liver, Lung, Nervous System
Lead	None	Behavioral, Blood, Developmental, Eyes, Gastrointestinal, Kidney, Liver, Muscle, Nervous System, Reproductive, Skin, Some evidence of carcinogenicity, Thyroid
Rosin	None	Allergen, Irritant, Respiratory
Polyethylene glycol dibutyl ether	None	No Records
Bis(2-butoxyethyl)ether	None	Irritant, Reproductive
Triethanolamine	Oral LD50 (RAT) = 8.0 g/kg Dermal LD50 (RABBIT) = > 20,000 mg/kg	Irritant, Allergen
Silver	Oral LD50 (RAT) = > 5,000 mg/kg Dermal LD50 (RAT) = > 2,000 mg/kg	Allergen, Eyes, Irritant, Respiratory, Skin

Hazardous Component(s)	NTP Carcinogen	IARC Carcinogen	OSHA Carcinogen (Specifically Regulated)
Tin	No	No	No
Lead	Reasonably Anticipated to be a Human Carcinogen.	Group 2B	No
Rosin	No	No	No
Polyethylene glycol dibutyl ether	No	No	No
Bis(2-butoxyethyl)ether	No	No	No
Triethanolamine	No	No	No
Silver	No	No	No

**12. ECOLOGICAL INFORMATION**

**Ecological information:**

No specific studies have been conducted by Henkel on the ecotoxicity or environmental fate of this material; however, commonly available data on the material indicate that uncontrolled releases to soil, ground water, or surface waters could entail acute and/or chronic ecological effects, depending on the quantity and concentration of such releases. Releases of volatile components to the atmosphere are not believed to entail significant ecological consequences provided such releases are within the exposure levels set forth in this document. Accordingly, all appropriate measures should be taken to avoid uncontrolled releases to the environment, and any spills or other uncontrolled releases which may occur should be contained and cleaned up immediately in accordance with Section 6.

### 13. DISPOSAL CONSIDERATIONS

Information provided is for unused product only.

**Recommended method of disposal:** Follow all local, state, federal and provincial regulations for disposal. Do not dispose of in an uncontrolled manner.

**Hazardous waste number:** D008: Lead D011. Silver.

### 14. TRANSPORT INFORMATION

The transport information provided in this section only applies to the material/formulation itself, and is not specific to any package/configuration.

#### U.S. Department of Transportation Ground (49 CFR)

**Proper shipping name:** Not regulated  
**Hazard class or division:** None  
**Identification number:** None  
**Packing group:** None

#### International Air Transportation (ICAO/IATA)

**Proper shipping name:** Not regulated  
**Hazard class or division:** None  
**Identification number:** None  
**Packing group:** None

#### Water Transportation (IMO/IMDG)

**Proper shipping name:** Not regulated  
**Hazard class or division:** None  
**Identification number:** None  
**Packing group:** None

### 15. REGULATORY INFORMATION

#### United States Regulatory Information

**TSCA 8 (b) Inventory Status:** All components are listed or are exempt from listing on the Toxic Substances Control Act Inventory.

**TSCA 12 (b) Export Notification:** Glycol Ether (CAS# 112-73-2). Glycol Ether (CAS# 31885-97-9).

**CERCLA/SARA Section 302 EHS:** None above reporting de minimis

**CERCLA/SARA Section 311/312:** Immediate Health, Delayed Health

**CERCLA/SARA Section 313:** This product contains the following toxic chemicals subject to the reporting requirements of section 313 of the Emergency Planning and Community Right-To-Know Act of 1986 (40 CFR 372). Lead (CAS# 7439-92-1). Bis(2-butoxyethyl)ether (CAS# 112-73-2).

**CERCLA Reportable quantity:** Lead (CAS# 7439-92-1) 10 lbs. (4.54 kg)

**California Proposition 65:** This product contains a chemical known in the State of California to cause cancer. This product contains a chemical known to the State of California to cause birth defects or other reproductive harm.

#### Canada Regulatory Information

**CEPA DSL/NDSL Status:** One or more components are not listed on, and are not exempt from listing on either the Domestic Substances List or the Non-Domestic Substances List.

### 16. OTHER INFORMATION

This safety data sheet contains changes from the previous version in sections: New Safety Data Sheet format.

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