

MATERIAL SAFETY DATA SHEET

Product: PFG and PFG Detail
Chemical Type: Coating containing ZnCdS:Ag

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INGREDIENTS

<u>MATERIAL</u>		<u>OSHA</u> <u>PEL</u>	<u>ACGIH</u> <u>TLV</u>	<u>% BY WT.</u>
*Cadmium Sulfide	CAS# 1306-23-6	OSHA Action Level OSHA PEL	0.0025 mg/m ³ 0.0050 mg/m ³	40.0%
*Zinc Sulfide	CAS# 1314-98-3	1 mg/m ³	1 mg/m ³	60.0%
*Silver	CAS# 7440-22-4	0.1 mg/m ³	0.1 mg/m ³	<0.1%

***NOTE: THIS MATERIAL IS SUBJECT TO THE REPORTING REQUIREMENTS OF SECTION 313 OF TITLE III OF THE SUPERFUND AMENDMENT AND REAUTHORIZATION ACT OF 1986 AND CFR 40 PART 372.**

PHYSICAL/CHEMICAL CHARACTERISTICS

Boiling Point:	N/A	Specific Gravity:	N/A
Vapor Pressure (mm Hg):	N/A	Melting Point:	N/A
Vapor Density (Air=1):	N/A	Evaporation Rate:	N/A
Solubility in Water:	Insoluble		
Appearance and Odor: Plastic sheet with yellow green coating, odorless			

FIRE AND EXPLOSION HAZARD DATA

Flash Point: N/A **Flammable Limits:** N/A **LEL:** N/A **UEL:** N/A
Extinguishing Media: Use extinguishing media suitable for the surrounding fire.
Special Fire Fighting Procedures: Wear self-contained breathing apparatus.
Unusual Fire and Explosion Hazards: When material is exposed to high temperatures it may produce oxides or sulfur and/or hydrogen sulfide as well as normal organic combustion products.

REACTIVITY DATA

Stability: Material is unstable at high temperatures in air.
Conditions to Avoid: High temperatures in air and contact with mineral acids.
Incompatibility (Materials to Avoid): Contact with mineral acids can produce hydrogen sulfide.
Hazardous Polymerization: Will not occur.

HEALTH AND SAFETY DATA

Routes of Entry: The material can be swallowed
Health Hazards: In general zinc sulfide is considered to be of low toxicity, there are no reports in the literature of adverse effects attributed to zinc sulfide. Cadmium compounds have a high oral toxicity, causing emetic and irritant effects on ingestion. Inhalation of cadmium dust can cause pulmonary edema and kidney injury.
Signs and Symptoms: Ingestion may cause nausea, vomiting, diarrhea and abdominal pains. Inhalation of dust may result in lung injury. Skin contact may cause a rash, redness or dermatitis.
Medical Conditions Generally Aggravated by Exposure: Persons suffering from lung dysfunction should avoid exposure to dust.
Emergency and First Aid Procedures:

Inhalation: Not a likely hazard unless the screen is cut or ground. If symptoms of pulmonary involvement develop (coughing, labored breathing, etc.) remove from exposure immediately and obtain medical attention.

Ingestion: Give person large quantities of water to drink, induce vomiting and obtain medical attention.

Skin Contact: Wash affected area with mild soap and water. If irritation occurs seek medical attention.

Eye Contact: Flush with large amounts of water for 15 minutes. If irritation occurs seek medical aid.

Carcinogenic Assessment: Cadmium compounds have been reported by NTP and IARC to be carcinogens.

PRECAUTIONS FOR SAFE HANDLING AND USE

Steps to be Taken in Case Material is Released or Spilled: If airborne dust is generated, use an appropriate NIOSH approved respirator. Clean up spills using methods that avoid dust generation such as vacuuming (with a vacuum that has an appropriate filter to prevent airborne dust levels that exceed the PEL or TLV). Wet dust mopping or wet clean up is preferred to reduce dusting.

Waste Disposal Method: Dispose of in accordance with appropriate government regulations.

Precautions to be Taken in Handling and Storage: Store away from mineral acids, strong oxidizers and flammable materials. Use an approved respirator if exposure to dust could occur. Gloves are recommended when skin contact is likely.

Other Precautions: Maintain good house keeping procedures to prevent accumulation of dust. Use clean-up methods that minimize dust generation such as vacuuming with an approved vacuum or wet clean up. If airborne dust is generated use an appropriate NIOSH approved respirator.

CONTROL MEASURES

Respiratory Protection: Cadmium is a carcinogen, use an approved NIOSH dust mask or equivalent if airborne dust concentrations exceed the PEL or TLV. All requirements set forth in 29 CFR 1910.134 should be followed.

Ventilation: Local exhaust to meet the TLV and PEL is recommended to minimize airborne dust exposure.

Protective Gloves: Gloves of a non-pervious type are recommended when skin contact is likely.

Eye Protection: Safety Glasses with side shields or goggles are recommended.

Other Protective Equipment: Protective clothing such as aprons, coveralls, etc. should be used and washed regularly. Do not shake to remove dust. Periodic medical examinations are recommended for individuals regularly exposed to dust.

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END OF MATERIAL SAFETY DATA SHEET