MSDS



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Lead Dioxide

Section I. Chemical Product and Company Identification

Supplier:

Hummel Croton Inc. 10 Harmich Road South Plainfield, NJ 07080 (908)-754-1800

Chemical Name: Lead Dioxide

Synonym: Lead Oxide Brown, Lead Peroxide, Lead Superoxide

CAS Number: 1309-60-0 Chemical Formula: PbO₂

Health 2 Flammability 1 Reactivity 0

Personal Protection

Section II. Composition and Information on Ingredients

Material	CAS#	%	OSHA	ACGIH
Lead Dioxide	1309-60-0	90-97%	0.05mg/m³	0.15mg/m³
Lead Monoxide	1317-36-8	3-10%	0.05mg/m³	0.15mg/m³

Section III Hazards Identification:

Accute Health Effects: Irritating to the skin and eyes on contact. Inhalation will cause irritation to the lungs and mucus membrane. Irritation to the eyes will cause watering and redness. Reddening, scaling, and itching are characteristics of skin inflammation. Follow safe industrial hygiene practices and always wear protective equipment when handling this compound.

Chronic Health Effects: Lead salts have been reported to cross the placenta and to induce embryo- and feto- mortality. They also have teratogenic effect in some animal species. No teratogenic effects have been reported with exposure to organometallic lead compounds. Adverse effects of lead on human reproduction, embryonic and fetal development and postnatal (e.g., mental) development have been reported. Excessive exposure can affect blood, nervous and digestive systems. The synthesis of hemoglobin is inhibited and results in anemia. If left untreated, neuromuscular dysfunction, possible paralysis and encephalopathy can result. Additional symptoms of overexposure include: joint and muscle pain, weakness of the extensor muscles (frequently the hand and wrist), headache, dizziness, abdominal pain, diarrhea, constipation, nausea, vomiting, blue line on the gums, insomnia and metallic taste. High body levels produce increased cerebrospinal pressure, brain damage, stupor leading to coma and often death.

Accute Health Effects: This product is listed by EPA(EPA-B2 Sufficient evidence from animal studies; inadequate evidence or no data from epidemiological studies.) and IARC(IARC-2B possibly carcinogenic to humans: limited evidence in humans in the absence of sufficient evidence in experimental animals) as a suspected carcinogen

Section IV. First Aid Measures

First Aid For Eye: In case of contact, immediately flush eyes with plenty of water for at least 15 minutes. Call a physician.

First Aid For Skin: In case of contact, flush skin with water. Wash clothing before reuse. Call a physician if irritation occurs.

First Aid For Inhalation: If inhaled, remove to fresh air. If not breathing, give artificial respiration. If breathing is difficult, give oxygen.

Call a physician.

First Aid For Ingestion: If swallowed, call a physician immediately.

Section V. Fire and Explosion Data

Flammability: Non-Flamable
Flash Points: Not Applicable
Auto-Ignition: Not Applicable
Flammable Limits: Not Applicable
Extinguishing Media: Water Spray

Fire Fighting Procedure: Wear self-contained breathing apparatus and protective clothing to prevent contact with skin and eyes.

Strong Oxidizer.

Fire/Explosion Hazards: Contact with other material may cause fire. Emits toxic fumes under fire conditions.

Section VI. Accidental Release Measures

Spill Or Leak Procedures: Utilize recommended protective clothing and equipment. Clean spills in a manner that does not disperse dust into the air. Spill area can be washed with water. Collect wash water for approved disposal. Keep from entering water or ground water

Section VII. Handling and Storage

Storage Temperatures: Store at ambient temperature Shelf Life: Unlimited in tightly closed container.

Special Sensitivity: None

Handling/Storage Precautions: Avoid breathing dust. Avoid getting in eyes or on skin. Wash thoroughly after handling. Store in a dry place away from direct sunlight, heat and incompatible materials (see Section X). Reseal containers immediately after use. Store away from food and beverages.

Section VIII. Exposure Controls/Personal Protection

Eye Protection: Safety glasses or goggles.

Skin Protection: PVC gloves with impervious boots, apron or coveralls. Employees should wash their hands and face before eating,

drinking or using tobacco products.

Respirator: Work ambient concentrations should be monitored and if the recommended exposure limit is exceeded, a NIOSH/MSHA

approved dust respirator must be worn.

Ventilation: Use local ventilation if dusting is a problem, to maintain air levels below the recommended exposure limit.

Additional Protective Measures: Emergency showers and eye wash stations should be available. Educate and train employees in the safe use and handling of hazardous chemicals.

Section IX. Physical and Chemical Properties

Physical Form: Fine Powder Color: Brown to Black

Odor: Odorless

Molecular Weight: 239.20

Boiling Point: Decomposes 290°C

Melting/Freezing Point: Decomposes 290°C

Solubility In Water: Insoluble

Specific Gravity: 9.3

Section X. Stability And Reactivity

Stability: Stable

Hazardous Polymerization: Will Not occur

Incompatibilities: Strong reducing agents & finely powdered metals *Instable Conditions:* Excessive temperatures (see Incompatibilities).

Decomposition Temperature: Decomposes 290°C Decomposition products: Oxides of Lead

Section XI. Toxicological Infomation

RTECS Number: OG0700000

Routes of Exposure: Eye contact. Ingestion. Inhalation. Skin contact.

Toxicity Data: IPR-GPG LD50:220 MG/KG Chronic Toxic Effects: See Section II

Acute Toxic Effects: Irritating to the skin and eyes on contact. Inhalation will cause irritation to the lungs and mucus membrane. Irritation to the eyes will cause watering and redness. Reddening, scaling, and itching are characteristics of skin inflammation.

Follow safe industrial hygiene practices and always wear protective equipment when handling this compound.

Section XII. Ecological Information

Ecotoxicity: Not available at this time.

Section XIII. Disposal Considerations

Waste Disposal Method: Waste disposal should be in accordance with existing federal, state and local environmental regulations.

Section XIV. Transportation Information

Proper Shipping Name: Lead Dioxide

UN Number: 1872 Class: 5.1 P.G.: ||| DOT Code: 5.1

Section XV. Regulatory Information

OSHA Status: This product is hazardous under the criteria of the Federal OSHA Hazard Communication Standard 29 CFR 1910.1200.

TSCA Chemical Inventory: This compound is on the EPA Toxic Substance Control Act (TSCA) inventory List

California Proposition 65: This product contains levels of listed substances, which the state of California has found to cause cancer, birth defects or other reproductive effects.

SARA 313 Title III:

Section 302 ExtremelyHazardous Substances: None Section 311/312 Hazardous Categories: None

Section 313 Toxic Chemicals: Yes, Lead Dioxide contains 86.62% lead.

Section XVI. Other Information

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