

Material Safety Data Sheet

Product/Material

Orange Oxide

Distributed by:

Saffire Blue Inc.

1444 Bell Mill Road, Tillsonburg, ON N4G4G9 Canada

Section I – Product Information

Trade Name	Orange Oxide
Chemical Name	Iron oxide
Chemical Formula	Fe ₂ O ₃ and Fe ₃ O ₄ and Fe ₂ O ₃ *H ₂ O
CAS Number	1332-37-2
EINECS Number	2151682
HMIS Rating	Health 0
	Flammability 0
	Reactivity 0

Section II – Composition

	CAS Number	Exposure Limits
Iron Oxide Red	1309-37-1;	
	1332-37-2	5 mg/m ³ 10 ppm
Iron Oxide Black	1317-61-9	5 mg/m ³ 10 ppm
Iron Oxide Yellow	51274-00-1	5 mg/m ³ 10 ppm

Section III – Fire and Explosion Hazard Data

Flammable Properties	Non Flammable
Hazardous Combustion Products	None
Extinguishing Media	Use agent applicable to surrounding fire Fire Fighters should wear NIOSH approved, positive pressure self-contained breathing apparatus and full protective clothing when appropriate.
Emergency Overview: inhalation.	No unusual fire or spill hazard. Low health risk by
Potential Health Effects	Eyes – may cause mechanical irritation Skin - none Inhalation - low health risk, treat as nuisance dust Oral ld ₅₀ greater than 10 g/kg (RAT)
Effects of Overexposure	Acute – causes mechanical skin and eye irritation Chronic - prolonged inhalation of iron oxide dust is known

to produce a condition known as siderosis. On x-rays it appears to be a benign pneumoconiosis and is not associated with pulmonary fibrosis or disability unless there is concurrent exposure to other fibrosis producing materials such as silica. The TLV is set to protect against siderosis.

Carcinogenicity:
suspected carcinogen.

Not listed with NTP, IARC, or OSHA as a known or

Section IV - First Aid Measures

Emergency First Aid Procedure

Eyes

Immediately flush eyes with plenty of water. Call a

physician

Skin

Immediately wash skin with soap and water. Wash

contaminated clothing before reuse.

Ingestion

If swallowed, dilute with large amounts of water to induce

vomiting. Consult a physician

Inhalation

Immediately remove to fresh air. If not breathing give

artificial respiration. If breathing is difficult, give oxygen. Please note: Symptoms may be delayed; prompt medical attention may be required. Call a physician.

Section V – Precautions for Safe Handling and Use

Steps to be taken in case the material is released or spilled: Soak up with sawdust, sand, oil dry or other absorbent material.

Waste disposal method: As in accordance with EPA and local regulations.

Section VI – Special Precautions

Precautions to be taken in handling and storage: store in a well-ventilated place at temperatures below 120 F. Keep container tightly closed. Keep from freezing.

Good industrial hygiene practice requires that employee exposure be maintained below TLV. This is preferably achieved through the provision of adequate ventilation where necessary. Where dust cannot be controlled in this way, personal respiratory protection should be employed.

Section VII - Control Measures and Toxicity

Ventilation

Local Exhaust

Eye Protection

Safety Glasses

Protective gloves	Rubber or plastic
Protective clothing	Rubber apron
Other Equipment	NIOSH approved respirator as needed, eyewash equipment
Other Precautions	Wash hands after use

There are no known dangerous acute or chronic effects associated with the use of this material. The acute oral toxicity LD50 Oral (Rat) for Fe₂O₃ is greater than 10 g/kg (Rat).

This product is not considered to be a known or suspected carcinogen by NTP, IARC or OSHA

Section VIII - Physical and Chemical Properties

Appearance:	Brown powder
Boiling Point	n/a
Vapor Pressure	n/a
Vapor Density	n/a
Solubility in water	insoluble
Specific gravity	4.8 - 5.2
pH	not determined
Odor	none
Odor Threshold	n/a

Iron Oxides are not compatible with hydrazine, calcium hypochlorite, performic acid and bromine pentafluoride.

Section IX - Disposal and Transportation

Collect in containers, bags or covered dumpster boxes. If reuse or recycling is not possible, material may be disposed of at a chemically secure landfill.

RCRA Hazardous Waste Number: Not regulated.

US DOT:	Not regulated.
Canadian TDG	Not regulated
Harmonized tariff code	2821.10.00

California Prop 65: There are extremely small, but detectable amounts of substances regulated under California's safe drinking water and toxic enforcement act:

Arsenic	Less than 2 ppm
Beryllium	Less than 2 ppm
Cadmium	Less than 2 ppm
Chromium VI	Less than 0.1 ppm
Lead	Less than 10 ppm

These levels are "typical" quantities and may change slightly with different lots. The term "Less Than" indicates that the substance was detected but the amount was less than the quantifiable limit.

Date Prepared

06/05/07

Section X – Comments

The statements contained herein are offered for informational purposes only and are based on technical data that there believed to be accurate. It is intended for use only by persons having the necessary technical skill, and at their own discretion and risk. Since conditions and manner of use are outside of our control, we make no warranty, expressed or implied of merchantability, fitness or otherwise.