ENNIS

Material Safety Data Sheet

Issuing Date 16-May-2011 Revision Date Revision Number 0

1. PRODUCT AND COMPANY IDENTIFICATION

Product Name HPS-2 White 2:1 Standard Set Epoxy

Product Code(s) 999231

Recommended Use Epoxy resin

Product Technology Epoxy

Supplier Address

Ennis Paint Inc.

5910 North Central Expressway

Suite 1050 Dallas TX 75206 T: 800.331.8118

800.331.8118 (For Technical Inquiries)

Chemical Emergency Phone Number Chemtrec 1-800-424-9300

2. HAZARDS IDENTIFICATION

WARNING!

Emergency Overview

Irritating to eyes and skin
May cause sensitization by skin contact

This product contains one or more substances which are classified by IARC as carcinogenic to humans (Group I), probably carcinogenic to humans (Group 2A) or possibly carcinogenic to humans (Group 2B)

Appearance White Physical State Viscous liquid. Odor Slight, Phenolic

Potential Health Effects

Acute Toxicity

Eyes Irritating to eyes.

Skin Irritating to skin. Repeated or prolonged skin contact may cause allergic reactions with

susceptible persons. May cause irritation.

InhalationMay cause irritation.IngestionMay cause irritation.

Chronic Effects Repeated contact may cause allergic reactions in very susceptible persons. This product

contains titanium dioxide in a non-respirable form. Inhalation of titanium dioxide is unlikely to occur from exposure to this product. Titanium dioxide has been classified by the International Agency for Research on Cancer (IARC) as possibly carcinogenic to humans (Group 2B) by

inhalation.

Aggravated Medical Conditions Skin disorders. Pre-existing eye disorders.

Environmental Hazard See Section 12 for additional Ecological Information.

3. COMPOSITION/INFORMATION ON INGREDIENTS

Chemical Name	CAS-No	Weight %
Bisphenol A - Epichlorohydrin polymer	25068-38-6	60-100
Titanium dioxide	13463-67-7	15-40

4. FIRST AID MEASURES

Eye Contact Rinse immediately with plenty of water, also under the eyelids, for at least 15 minutes. Call a

physician immediately.

Skin ContactWash off immediately with soap and plenty of water. Remove and wash contaminated clothing

before re-use. Consult a physician.

Inhalation Move to fresh air. If symptoms persist, call a physician.

Ingestion Clean mouth with water and afterwards drink plenty of water. Do NOT induce vomiting. Never

give anything by mouth to an unconscious person. Consult a physician.

Notes to Physician May cause sensitization of susceptible persons. Treat symptomatically.

5. FIRE-FIGHTING MEASURES

Flammable Properties Not flammable.

Flash Point 206.6°F / 97°C

Suitable Extinguishing Media Use extinguishing measures that are appropriate to local circumstances and the surrounding

environment.

Hazardous Combustion Products Carbon monoxide. Carbon dioxide (CO₂). Phenols.

Explosion Data

Sensitivity to Mechanical Impact None Sensitivity to Static Discharge None

Protective Equipment and

As in any fire, wear self-contained breathing apparatus pressure-demand, MSHA/NIOSH

As in any fire, wear self-contained breathing apparatus pressure-demand, MSHA/NIOSH

(approved or equivalent) and full protective gear

Precautions for Firefighters (approved or equivalent) and full protective gear.

NFPA Health Hazard 2 Flammability 1 Instability 0 Physical and Chemical

Hazards -

HMIS Health Hazard 2* Flammability 1 Physical Hazard 0 Personal Protection -

6. ACCIDENTAL RELEASE MEASURES

Personal Precautions Use personal protective equipment. Ensure adequate ventilation. Keep people away from and

upwind of spill/leak.

Environmental Precautions Prevent further leakage or spillage if safe to do so. Prevent product from entering drains. Do

not flush into surface water or sanitary sewer system.

Methods for Containment Prevent further leakage or spillage if safe to do so. Dike far ahead of liquid spill for later

disposal.

Methods for Cleaning Up Dam up. Soak up with inert absorbent material (e.g. sand, silica gel, acid binder, universal

binder, sawdust). Take up mechanically and collect in suitable container for disposal.

7. HANDLING AND STORAGE

Handling Avoid contact with skin, eyes and clothing. Remove and wash contaminated clothing before re-

use. Wash thoroughly after handling.

Keep containers tightly closed in a cool, well-ventilated place. **Storage**

8. EXPOSURE CONTROLS / PERSONAL PROTECTION

Exposure Guidelines

Chemical Name	ACGIH TLV	OSHA PEL	NIOSH IDLH
Titanium dioxide	TWA: 10 mg/m ³	TWA: 15 mg/m³total dust	IDLH: 5000 mg/m ³
13463-67-7	_	(vacated) TWA: 10 mg/m ³ total dust	-

OSHA PEL: Occupational Safety and Health Administration - Permissible Exposure Limits. ACGIH TLV: American Conference of Governmental Industrial Hygienists - Threshold Limit Value. NIOSH IDLH: Immediately Dangerous to Life or Health.

Other Exposure Guidelines Vacated limits revoked by the Court of Appeals decision in AFL-CIO v. OSHA, 965 F.2d 962

(11th Cir., 1992).

Engineering Measures Showers

> Eyewash stations Ventilation systems

Personal Protective Equipment

Eye/Face Protection Goggles.

Skin and Body Protection Wear protective gloves/clothing.

Respiratory Protection If exposure limits are exceeded or irritation is experienced, NIOSH/MSHA approved respiratory

protection should be worn. Positive-pressure supplied air respirators may be required for high airborne contaminant concentrations. Respiratory protection must be provided in accordance

No information available.

No information available

with current local regulations.

When using, do not eat, drink or smoke. Remove and wash contaminated clothing before re-**Hygiene Measures**

use. Provide regular cleaning of equipment, work area and clothing.

Autoignition Temperature

Boiling Point/Boiling Range

9. PHYSICAL AND CHEMICAL PROPERTIES

White. Slight, Phenolic. **Appearance** Odor **Odor Threshold** No information available **Physical State** Viscous liquid

Ha No information available.

206.6°F / 97°C **Flash Point**

Decomposition Temperature No information available.

No information available Melting Point/Range

No information available. No information available. Flammability Limits in Air **Explosion Limits**

No information available. No information available Solubility **Evaporation Rate**

Vapor Pressure No data available Vapor Density No data available

10. STABILITY AND REACTIVITY

Stability Stable under recommended storage conditions.

Incompatible Products Strong oxidizing agents. Acids. Bases. Amines.

Conditions to Avoid Excessive heat.

Hazardous Decomposition Products Carbon monoxide (CO). Carbon dioxide (CO₂). Hydrocarbons.

Hazardous Polymerization Hazardous polymerization does not occur.

11. TOXICOLOGICAL INFORMATION

Acute Toxicity

Product Information Irritating to eyes and skin.

Component Information

Chemical Name	LD50 Oral	LD50 Dermal	LC50 Inhalation
Titanium dioxide	> 10000 mg/kg (Rat)		> 6820 mg/m ³
Bisphenol A - Epichlorohydrin	11400 mg/kg (Rat)		
polymer			

Chronic Toxicity

Chronic Toxicity Repeated contact may cause allergic reactions in very susceptible persons. This product

contains titanium dioxide in a non-respirable form. Inhalation of titanium dioxide is unlikely to occur from exposure to this product. Titanium dioxide has been classified by the International Agency for Research on Cancer (IARC) as possibly carcinogenic to humans (Group 2B) by

inhalation.

Carcinogenicity The table below indicates whether each agency has listed any ingredient as a carcinogen.

Chemical Name	ACGIH	IARC	NTP	OSHA
Titanium dioxide		Group 2B		X

ACGIH: (American Conference of Governmental Industrial Hygienists)

A4 - Not Classifiable as a Human Carcinogen

IARC: (International Agency for Research on Cancer)

Group 2B - Possibly Carcinogenic to Humans

OSHA: (Occupational Safety & Health Administration)

X - Present

Target Organ Effects None known.

12. ECOLOGICAL INFORMATION

Ecotoxicity

The environmental impact of this product has not been fully investigated.

13. DISPOSAL CONSIDERATIONS

Waste Disposal Methods

This material, as supplied, is not a hazardous waste according to Federal regulations (40 CFR

261). This material could become a hazardous waste if it is mixed with or otherwise comes in contact with a hazardous waste, if chemical additions are made to this material, or if the material is processed or otherwise altered. Consult 40 CFR 261 to determine whether the altered material is a hazardous waste. Consult the appropriate state, regional, or local

regulations for additional requirements.

Contaminated Packaging Do not re-use empty containers.

14. TRANSPORT INFORMATION

DOT Not regulated

TDG Not regulated

MEX Not regulated

ICAO Not regulated

IATA Not regulated

IMDG/IMO Not regulated

15. REGULATORY INFORMATION

International Inventories

TSCA All components are listed on the TSCA Inventory.

All components are listed either on the DSL or NDSL.

Legend

TSCA - United States Toxic Substances Control Act Section 8(b) Inventory
DSL/NDSL - Canadian Domestic Substances List/Non-Domestic Substances List

U.S. Federal Regulations

Section 313 of Title III of the Superfund Amendments and Reauthorization Act of 1986 (SARA). This product does not contain any chemicals which are subject to the reporting requirements of the Act and Title 40 of the Code of Federal Regulations, Part 372.

SARA 311/312 Hazard Categories

Acute Health Hazard Yes
Chronic Health Hazard Yes
Fire Hazard No
Sudden Release of Pressure Hazard No
Reactive Hazard No

Clean Water Act

This product does not contain any substances regulated as pollutants pursuant to the Clean Water Act (40 CFR 122.21 and 40 CFR 122.42).

CERCLA

This material, as supplied, does not contain any substances regulated as hazardous substances under the Comprehensive Environmental Response Compensation and Liability Act (CERCLA) (40 CFR 302) or the Superfund Amendments and Reauthorization Act (SARA) (40 CFR 355). There may be specific reporting requirements at the local, regional, or state level pertaining to releases of this material.

U.S. State Regulations

California Proposition 65

This product does not contain any Proposition 65 chemicals.

U.S. State Right-to-Know Regulations

Chemical Name	New Jersey	Massachusetts	Pennsylvania	Illinois	Rhode Island
Titanium dioxide	X	X	X	-	X

International Regulations

Chemical Name	Carcinogen Status	Exposure Limits
Titanium dioxide		Mexico: TWA= 10 mg/m ³
		Mexico: STEL= 20 mg/m ³

Canada

This product has been classified in accordance with the hazard criteria of the Controlled Products Regulations (CPR) and the MSDS contains all the information required by the CPR.

WHMIS Hazard Class

D2A Very toxic materials D2B Toxic materials



16. OTHER INFORMATION

Product Stewardship **Prepared By**

23 British American Blvd. Latham, NY 12110 1-800-572-6501

Issuing Date Revision Date 16-May-2011

Revision Note

Initial Release.

General Disclaimer

The information provided on this MSDS is correct to the best of our knowledge, information and belief at the date of its publication and it does not purport to be all inclusive and shall be used only as a guide. We urge each customer or recipient of this MSDS to study it carefully to become aware of and understand the potential hazards associated with the product. The information given is designed only as a guide for safe handling, use, processing, storage, transportation, disposal and release and is not to be considered a warranty or quality specification. The information relates only to the specific material designated and may not be valid for such material used in combination with any other material or in any process, unless specified in the text. Any use of the product not in conformance with this MSDS or in combination with any other product or process is the responsibility of the user. Customary precautionary measures for handling chemicals should be followed. Keep away from foodstuffs, beverages and feed. Wash hands before breaks and at the end of work. Remove all soiled and contaminated clothing immediately.

End of Safety Data Sheet