

MATERIAL SAFETY DATA SHEET**NFPA RATING:** Health = 1 Flammability = 0 Reactivity = 0**HMIS RATING:** Health = 1 Flammability = 0 Reactivity = 0**SECTION I – IDENTITY AND MANUFACTURER'S INFORMATION (1212B)****Manufacturer's Name:** HILLYARD INDUSTRIES**Product Name:** TIP-OFF**Address:** 302 North Fourth Street
St. Joseph, MO 64501**Date Prepared:** November 25, 2008 (Version 3)**Prepared by:** Regulatory Affairs Department**Emergency Telephone No.:** (800) 424-9300 (Only in the event of chemical emergency involving a spill, leak, fire, exposure or accident involving chemicals.)**Other information calls:** (816) 233-1321 (Ext. 8285)<http://www.hillyard.com>**SECTION II – INGREDIENTS/IDENTITY INFORMATION****Components****(Specific Chemical Identity:**

Common Name(s)	CAS #	OSHA PEL	ACGIH TLV	OTHER LIMITS RECOMMENDED	%
Dipropylene Glycol n-Butyl Ether	29911-28-2	not established	not established	N.A.	1-3
Water	7732-18-5	none	none	N.A.	---
Acrylic Polymer Emulsion	unknown to Hillyard	not established	not established	N.A.	---
Diethylene Glycol Monoethyl Ether**	111-90-0	not established	not established	N.A.	3-7
Polyethylene emulsion	9010-77-9	not established	not established	N.A.	---
Tributoxyethyl Phosphate**	78-51-3	not established	not established	N/A	1-3

(1) Regulated by OSHA and the following states: CT, FL, IL, LA, MA, NJ, NY, PA, RI.

** This product contains the following chemicals subject to reporting requirements of SARA Title III, Section 313: Diethylene Glycol Monoethyl Ether and Tributoxyethyl Phosphate.

Volatile Organic Compounds = Less than 250 grams per liter

Volatile Organic Substances = Less than 2.29 pounds per gallon

SECTION III – PHYSICAL / CHEMICAL CHARACTERISTICS

Boiling Point: 208°F	Specific Gravity (H₂O = 1): 25°C = 1.039
Vapor Pressure (mm Hg.): 17.29	Percent Volatile by Volume (%): 67.8
Vapor Density (AIR = 1): 1.49	Evaporation Rate (ethyl ether = 1): slower than 1
Solubility in Water: Complete	Appearance and Odor: white liquid; polymer odor
pH 8-9	

SECTION IV – FIRE AND EXPLOSION HAZARD DATA**Flash point:** None (T.C.C.) **Flammable Limits:** LEL = N.A. UEL = N/A**Extinguishing Media:** Foam, carbon dioxide, dry chemical, water fog**Special Fire Fighting Procedures:** Self-contained breathing apparatus with full facepiece operated in pressure demand or other pressure mode**Unusual Fire and Explosion Hazards:** May form carbon dioxide and carbon monoxide**SECTION V – PHYSICAL HAZARDS****Stability:** Stable **Conditions to Avoid:** Elevated temperatures**Incompatibility (Materials to Avoid):** Avoid contact with strong acids and strong oxidizing agents.**Hazardous Decomposition Products or Byproducts:** When exposed to fire, produces smoke, soot, carbon monoxide and carbon dioxide.**Hazardous Polymerization:** Will not occur **Conditions to Avoid:** None known to Hillyard**SECTION VI – HEALTH HAZARD DATA****Routes of entry:** Inhalation? Yes Skin? Yes Ingestion? Yes**HEALTH HAZARDS (1. Acute and 2. Chronic)**

1. According to Federal Hazardous Substance Act test the product was not a skin or eye irritant. Prolonged exposure may cause skin irritation. Excessive exposure to vapors or spray mist can cause irritation of the eyes, nose and throat. Not expected to be acutely toxic when administered orally at a dose level of 5.0 g/kg. 2. None known to Hillyard.

Chemical listed as Carcinogen or Potential Carcinogen:**National Toxicology Program =** No **I.A.R.C. Monographs =** No **OSHA =** No

This product has no carcinogens listed by IARC, NTP, NIOSH, or ACGIH as of this date, greater than or equal to 0.1%.

SECTION VI – HEALTH HAZARD DATA continued

Signs and Symptoms of Exposure: Prolonged skin contact may cause irritation. Excess inhalation may irritate nose and throat. Ingestion may cause gastrointestinal irritation.

Medical Conditions Generally Aggravated by Exposure: Pre-existing eye and skin disorders.

Emergency and First Aid Procedures: In case of skin contact immediately flush skin with plenty of water for 15 minutes. If irritation persists, get medical attention. If exposed to high concentrations of vapor, remove to fresh air; if breathing difficulty persists, call a physician. In case of eye contact flush immediately with large amounts of water for at least 15 minutes. If swallowed, consult a physician.

SECTION VII – PRECAUTIONS FOR SAFE HANDLING AND USE

Steps To Be Taken In Case Material Is Released Or Spilled: Absorb spill with floor dry or similar inert material. Sweep or scrape up and put in appropriate container. Do not let spilled or leaking material enter watercourse.

Waste Disposal Method: Dispose of in accordance with state and federal regulations.

Precautions To Be Taken In Handling And Storing: Keep container closed when not in use. Store in cool, well-ventilated area away from heat and out of direct sunlight. Protect from freezing. **Notice:** Saw dust from freshly sanded floors or dust from wood floors that have been abraded between coats will spontaneously catch fire if improperly discarded. Immediately after abrading or sanding wood floors, place dust waste in a sealed, water-filled metal container and immediately remove from building. **Notice:** Rags or applicators soaked in a combustible liquid will spontaneously catch fire if improperly discarded. Immediately after using rags or applicators soaked in a combustible liquid, place waste in a sealed, water-filled metal container and immediately remove from building

Other Precautions: USE WITH ADEQUATE VENTILATION. Avoid breathing vapors or spray mist. Open windows and doors, use exhaust fans or other means to insure fresh air entry during application and drying. Avoid prolonged or repeated contact with skin. Refer to OSHA Standard 29 CFR 1910.94 for technical guidelines on keeping air contamination below acceptable exposure limits.

SECTION VIII – CONTROL MEASURES

Respiratory Protection (Specify Type): None normally required when used according to label directions. When airborne exposure guidelines and/or comfort levels may be exceeded, use approved air-purifying respirator. Avoid breathing spray mist. If sprayed, wear mechanical filter respirator to remove solid particles of overspray.

Ventilation:

Local Exhaust = Recommended **Mechanical (General) =** Recommended **Special =** N/A **Other =** N/A

Protective Gloves: Rubber gloves if unable to avoid skin contact **Eye Protection:** Not necessary

Other Protective Clothing or Equipment: None normally required. If unable to avoid prolonged or repeated contact with skin, wear impervious clothing.

Work / Hygienic Practices: Wash thoroughly after handling. Upon contact remove contaminated clothing and shoes; wash before reuse (including shoes).

SECTION IX – TRANSPORTATION INFORMATION

Applicable regulations: 49 CFR = No; IMCO = No; IATA = No.

Proper shipping name: Varnish

UN No.: Not applicable; **Limited Qty.:** Not applicable; **Hazard Class:** Not applicable.

Labels required: Not required **DOT Exception:** Not applicable

EPA Hazardous waste number / code: Not listed

Hazardous waste characteristics:

Ignitability = Not applicable; **Corrosivity =** Not applicable; **Reactivity =** Not applicable.

DISCLAIMER OF WARRANTIES

NO REPRESENTATIONS OR WARRANTIES, EITHER EXPRESS OR IMPLIED, OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE, OR OF ANY NATURE ARE MADE WITH RESPECT TO THE PRODUCT(S) OR INFORMATION CONTAINED IN THIS MATERIAL SAFETY DATA SHEET.

The information and recommendations contained in this Material Safety Data Sheet are supplied pursuant to 29 CFR 1910.1200 of the Occupational Safety and Health Standards Hazard Communication Rule. All information contained herein is presented in good faith and is believed to be appropriate and accurate.

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