

Safety Data Sheet

Better Chemistry. Better Business

DOWTHERM PREMIX 50% BLEND

4/25/23

Revised:

1 IDENTIFICATION

Product Name: DOWTHERM PREMIX 50% BLEND

Product Code: 4621003

Recommended use of the chemical and restrictions on use:Industrial applications

Hubbard-Hall Inc.

563 South Leonard Street Waterbury, CT 06708 **Telephone**: 203-756-5521 **Fax number:** 203-756-9017

Emergency Phone Number **CHEMTREC:** 1 (800) 424-9300 **International:** 1 (703) 527-3887

2 HAZARDS IDENTIFICATION





Signal Word: WARNING

Hazard Category: Acute Toxicity-Oral Hazard Category 4

Specific Target Organ Toxicity (Repeated Exposure) Hazard Category 2

Hazard Statements: Harmful if swallowed.

Causes damage to kidney through prolonged or repeated exposure if swallowed.

Prevention: Wash skin thoroughly after handling.

Do not eat, drink or smoke when using this product.

Do not breathe dust, fumes, gas, mist, vapors or spray.

Response: If swallowed: Call poison center/doctor if you feel unwell.

Get medical advice/attention if you feel unwell.

Disposal: Dispose of contents/container in accordance with local, regional, national, or

international regulations.

Components with Unknown Dermal = 35%

Acute Toxicity

Oral = \sim 2% Dermal = \sim 2%

COMPOSITION INFORMATION

Chemical Name	Common Name And Synonyms	CAS No. and other Unique identifiers	Concentration %
Ethylene Glycol	-	107-21-1	50-56%
Dipotassium Hydrogen phosphate	-	7758-11-4	<2%

4 FIRST AID

After Skin Contact:

If on skin(on hair): Take off immediately all contaminated clothing. Rinse with water/safety shower. Call doctor if irritation persists.

After Eye Contact:

If in eyes: Rinse cautiously for several minutes. Remove contact lenses if present and easy to do. Continue rinsing. If irritated, call doctor.

After Ingestion:

Do not induce vomiting. Seek medical attention immediately. If person is fully conscious give 1 cup or 8 ounces (240 ml) water. If medical advice is delayed and if an adult has swallowed several ounces of chemical, then give 3-4 ounces (1/3-1/2 cuo)(90-120 ml) of hard liquor such as 80 proof whiskey. For children, give proportionally less liquor at a dose of 0.3 ounce (1.5 tsp)(8 ml) liquor for each 10 pounds of body weight, or 2 ml per kg of body weight [eg, 1.2 ounce (2.3 tbsp) for a 40 pound child or 36 ml for an 18 kg child]

Most Important Symptoms/Effects

Inhalation:

May cause irritation and inflammation in nose, throat and lungs.

Eye:

Irritation of eyes and skin.

Skin:

This product can cause mild, transient skin irritation. The severity of irritation will depend on the amount of material that is applied to the skin and the speed and thoroughness that it is removed. Symptons include redness, itching, and burning of the skin. Repeated or prolonged skin contact can produce moderate irritation(dermatitis).

Ingestion:

Oral toxicity is expected to be moderated in humans due to ethylene glycol even though tests in animals show a lower degree of toxicity. Small amounts swallowed incidentally as a result of normal handling operations are not likely to cause injury; however, swallowing larger amounts may cause serious injury, even death. May cause nausea and vomiting. May cause abdominal discomfort or diarrhea. Excessive exposure may cause central nrevous effects, cardiopulmonary effects (metabolic acidosis), and kidney failure.

Indication of immediate medical attention:

Provide general supportive measures and treat symptomatically. Symptons may be delayed. Keep victim under observation.

Note to Physicians:

If several ounces (60-100 ml) of ethylene glycol have been ingested, early administration of ethanol may counter the toxic effects (metabolic acidosis, renal damage). Consider hemodialysis or peritoneal dialysis & thiamine 100 mg plus pyridoxine 50 mg intravenously every 6 hours. If ethanol is used, a therapeutically effective blood concentration in the range of 100-150 mg/dl may be achieved by rapid loading dose followed by continuous intravenous infusion. Consult standard literature for details of treatment. 4-methyl pyrazole (Antizole™) is an effective blocker of alcohol dehydrogenase and should be used in treatment of ethylene glycol (EG) ,di- or triethylene glycol (DEG,TEG)ethylene glycol butyl ether (EGBE), or methanol intoxication if available.Fomepizole protocol (Brent, J et al, New England Journal of Medicine, Feb 8, 2001, 344:6, p 424-9): loading dose 15 mg/kg intravenously, followed by bolus dose of 10 mg/kg every 12 hours,

Note to Physicians:

after 48 hours, increase bolus dose to 15 mg/kg every 12 hours. Continue fomezipole until serum methanol, EG, DEG, TEG, or EGBE are undetectable. THe signs and symptons of poisoning include anion gap acidosis, CNS depression, renal tubular injury, and possible late stage cranial nerve involvement. Respiratory symptons, including pulmonary edema, may be delayed. Persons receiving significant exposure should be observed for 24-48 hours for signs of respiratory distress. In severe poisoning, respiratory support with mechanical ventilation and positive end expiratory pressure may be required. Maintain adequate ventilation and oxygenation of the patient. If lavage is performed, suggest endotracheal and/or esophgeal control.

Note to Physicians:

Danger from lung aspiration must be weighed against toxicity when considering emptying the stomach. If burn is present, treat as any thermal burn, after decontamination. Treatment of exposure should be directed at the control of symptons and the clinial condition of patient.

FIRE FIGHTING MEASURES

Suitable and Unsuitable extinguishing media:

Avoid contact with water. Use foam, dry chemical or carbon dioxide.

Specific hazards arising from

Carbon oxides may be produced.

the chemical:

Spills produce extremely slippery surfaces

Special protective equipment and precautions for firefighter

Wear chemical resistant protective equipment and self contained breathing apparatus

(SCBA).

5 ACCIDENTAL RELEASE MEASURES

Methods and Materials for containment & cleaning up:

Stop spill at source.

Caution: Spilled material may be slippery.

If trained in accordance 29 CFR 1910.120, leaks should be stopped. Spills should be contained and cleaned immediately. Persons performing clean up work should wear adequate personal protective equipment and clothing. Spills and releases should be reported, if required, to the appropriate local, state and federal regulatory agencies.

Absorb the chemical onto sand, vermiculite, or any other non-combustible absorbent, and collect into containers for later disposal.

HANDLING AND STORAGE

Precautions for safe handling: Wash hands thoroughly after handling.

Wear rubber gloves, goggles and chemical protective clothing.

Eating, drinking and smoking in the work area is prohibited.

Conditions for safe storage, inc any incompatibilities:

Store locked up

8 EXPOSURE CONTROLS / PERSONAL PROTECTION

Name	Std.	TWA-8hrs	STEL - 15 min.
Ethylene Glycol	ACGIH	50 ppm (vapor)	
Dipotassium hydrogen phosphate	Not established		

ACGIH - American Control of Governmental Hygenists OSHA - Occupational Safety and Health Administration

Protective Gloves: Rubber gloves, chemical goggles or protective eyewear, boots, aprons & hard hat if in contact

Eye Protection: Wear chemical safety goggles & full face shield

PHYSICAL AND CHEMICAL PROPERTIES

Clear pink liquid Appearance: Odor: characteristic

N/A **Odor Threshold:** PH: 9.5 -35 °F **Melting Point/Freezing Point: Initial Boiling Point and Boiling** NA

Range:

N/A Flash Point: NA **Evaporation Rate:** Flammability (solid, gas): N/A

Upper/Lower flammability or

non-flammable

explosive limits:

NA Vapor Pressure: Vapor Density: NA **Relative Density:** 1.075 100% Solubility (ies): NA **Partition Coefficient;**

n-octanol/water:

801 °F **Auto-ignition Temperature: Decomposition Temperature:** NA Viscosity: NA

10 STABILITY AND REACTIVITY

Hazardous Polymerization will not occur. Reactivity:

Stable under normal conditions **Chemical Stability:**

Possibility of Hazardous

Reactions:

Hazardous polymerization does not occur.

Avoid contact with strong oxidizers and strong acids. **Incompatible Materials:**

11 TOXICOLOGICAL INFORMATION

Oral Administration: Ethylene Glycol-LD50(Rat)-6000-13000 mg/kg

Not established for this product **Dermal administration:** Immediate effects: Irritation/ burns of skin and eyes.

Repeated excessive exposure may cause irritation of the upper respiratory tract. In humans, Long term exposure:

effects have been reported on the follwing organs: Central nervouis system. Observations in humans include: Nystagmus (involuntary eye movement). In animals, effects have been

reported on the follwing organs: Kidney, liver.

Not listed by IARC, NTP, OSHA, ACGIH **Cancer Hazard:**

Routes of Exposure Eyes, Skin, Inhalation, Ingestion

Based on animal studies, ingestion of very large amounts of ethylene glycol appears to be the Mutagenicity

> major and possibly only route of exposure to produce birth defects. Exposures by inhalation or skin contact, the primary routes of occupational exposure, had minimal effect on the fetus, in

animal studies.

12 ECOLOGICAL INFORMATION

Daphnia Magna, EC50 (Static Test)->100 mg/L 48 h

Persistence and Will biodegrade readily

Degradability:

Biotic degradability: No data available

Bioaccumulation potential: Unlikely

Water result: Disperses in water.

Soil/Sediment Result: No data available

13 DISPOSAL CONSIDERATION

Dispose of in accordance with local, state and federal regulations.

14 TRANSPORT INFORMATION

UN Proper Shipping Name: NOT D.O.T. REGULATED

15 REGULATORY INFORMATION

HMIS: Health: 1 Flammability: 0 Reactivity: 0

Sara Hazard Ethylene Glycol-SARA 313 listed

Classification

Proposition 65 WARNING! This product contains a chemical known in the State of California to cause birth defects

or other reproductive harm-Ethylene Glycol (Ingested)

TSCA Inventory All components of this product are on the TSCA inventory or are exempt from TSCA inventory requirements .

Status

16 OTHER INFORMATION

Disclaimer: The information is based on our knowledge to date but does not constitute an assurance of product

properties and does not imply a legal contractual relationship.