



Material Safety Data Sheet

Hot n'Dry

Date Prepared: 12/10/04

Supersedes Date: 2/27/03

1. PRODUCT AND COMPANY DESCRIPTION

United Suppliers, Inc.
Box 538
Eldora, IA 50627
800-782-5123

Emergency Phone Numbers:

FOR EMERGENCIES INVOLVING EXPOSURE CONTACT: CHEMTREC 800-424-9300

Chemical Name or Synonym:

FOAM MARKER CONCENTRATE

2. COMPOSITION/INFORMATION ON INGREDIENTS

Component	CAS Reg Number	WHMIS Hazard	Percentage
SURFACTANT BLEND	*****	N	> 85
2-BUTOXYETHANOL	111-76-2	Y	12.5
ETHANOL	64-17-5	Y	< 2.5
DIOXANE	123-91-1	Y	< 0.0128
ETHYLENE OXIDE	75-21-8	Y	< 0.0008

3. HAZARDS IDENTIFICATION

A. EMERGENCY OVERVIEW:

Physical Appearance and Odor:

clear viscous liquid, odorless.

Warning Statements:

WARNING!! HARMFUL IF INHALED, SWALLOWED OR ABSORBED THROUGH SKIN.
SEVERE EYE IRRITANT. SKIN AND RESPIRATORY TRACT IRRITANT.

B. POTENTIAL HEALTH EFFECTS:

Acute Eye:

Severe irritant. Can cause redness, irritation, tissue destruction.

Acute Skin:

Harmful if absorbed through skin. Irritant. Can cause redness, inflammation, irritation.

Acute Inhalation:

Harmful if inhaled. Can cause headache, dizziness, upper respiratory tract irritation.

Acute Ingestion:

Harmful if ingested. Can cause nausea, diarrhea, abdominal cramps.

Chronic Effects:

This product does not contain any ingredient designated by IARC, NTP, ACGIH or OSHA as probable or suspected human carcinogens.

4. FIRST AID MEASURES

FIRST AID MEASURES FOR ACCIDENTAL:**Eye Exposure:**

Hold eyelids open and flush with a steady, gentle stream of water for at least 15 minutes. Seek medical attention.

Skin Exposure:

In case of contact, immediately wash with plenty of soap and water for at least 5 minutes. Seek medical attention. Remove contaminated clothing and shoes. Clean contaminated clothing and shoes before re-use.

Inhalation:

Inhalation is not an expected route of exposure. If respiratory irritation or distress occurs remove victim to fresh air. Seek medical attention if respiratory irritation or distress continues.

Ingestion:

If victim is conscious and alert, give 1-2 glasses of water to drink. Do not give anything by mouth to an unconscious person. Seek medical attention. Do not leave victim unattended.

MEDICAL CONDITIONS POSSIBLY AGGRAVATED BY EXPOSURE:

Skin contact may aggravate existing skin disease.

NOTES TO PHYSICIAN:

All treatments should be based on observed signs and symptoms of distress in the patient. Consideration should be given to the possibility that overexposure to materials other than this product may have occurred.

Treat symptomatically. No specific antidote available.

5. FIRE FIGHTING MEASURES

FIRE HAZARD DATA:

Flash Point:

> 93 C (200 F). Flammability Class: WILL BURN.

Method Used:

Closed cup

Flammability Limits (vol/vol%):	Lower:	Upper:
	1.1	19

Extinguishing Media:

Recommended (small fires): dry chemical, carbon dioxide, Recommended (large fire): alcohol foam, universal foam, water spray, Not recommended: water jet (frothing possible).

Special Fire Fighting Procedures:

Firefighters should wear NIOSH/MSHA approved self-contained breathing apparatus and full protective clothing.

Unusual Fire and Explosion Hazards:

Product will burn under fire conditions.

Hazardous Decomposition Materials (Under Fire Conditions):

oxides of nitrogen

oxides of sulfur

oxides of carbon

6. ACCIDENTAL RELEASE MEASURES

Evacuation Procedures and Safety:

Wear appropriate protective gear for the situation. See Personal Protection information in Section 8.

Containment of Spill:

Follow procedure described below under Cleanup and Disposal of Spill.

Cleanup and Disposal of Spill:

Absorb with an inert absorbent. Sweep up and place in an appropriate closed container (see Section 7: Handling and Storage). Clean up residual material by washing area with water. Collect washings for disposal.

Environmental and Regulatory Reporting:

Do not flush to drain.

7. HANDLING AND STORAGE

Minimum/Maximum Storage Temperatures:

> 4 C (39 F)

Handling:

Avoid breathing vapors and mists. Avoid direct or prolonged contact with skin and eyes.

Ethylene oxide may collect in container head space. Although concentrations are expected to remain below established exposure limits, provide adequate ventilation when accessing or working with open containers and tanks.

Storage:

Store in tightly closed containers. Store in an area that is dry, well-ventilated, away from ignition sources, away from incompatible materials (see Section 10. Stability and Reactivity).

8. EXPOSURE CONTROLS/PERSONAL PROTECTION

Introductory Remarks:

These recommendations provide general guidance for handling this product. Because specific work environments and material handling practices vary, safety procedures should be developed for each intended application. While developing safe handling procedures, do not overlook the need to clean equipment and piping systems for maintenance and repairs. Waste resulting from these procedures should be handled in accordance with Section 13: Disposal Considerations.

Assistance with selection, use and maintenance of worker protection equipment is generally available from equipment manufacturers.

Exposure Guidelines:

Exposure limits represent regulated or recommended worker breathing zone concentrations measured by validated sampling and analytical methods, meeting the regulatory requirements. The following limits apply to this material, where, if indicated, S=skin and C=ceiling limit:

2-BUTOXYETHANOL

	Notes	TWA	STEL
ACGIH		20 ppm	

ETHANOL

	Notes	TWA	STEL
ACGIH		1000 ppm	

Engineering Controls:

Where engineering controls are indicated by use conditions or a potential for excessive exposure exists, the following traditional exposure control techniques may be used to effectively minimize employee exposures: general area dilution/exhaust ventilation.

Respiratory Protection:

When respirators are required, select NIOSH/MSHA approved equipment based on actual or

potential airborne concentrations and in accordance with the appropriate regulatory standards and/or industrial recommendations.

For reasonably foreseeable industrial end uses of this material, respiratory protection should not be necessary.

Eye/Face Protection:

Eye and face protection requirements will vary dependent upon work environment conditions and material handling practices. Appropriate ANSI Z87 approved equipment should be selected for the particular use intended for this material.

Eye contact should be prevented through use of chemical safety glasses with side shields or splash proof goggles. An emergency eye wash must be readily accessible to the work area.

Skin Protection:

Skin contact should be minimized through use of gloves and suitable long-sleeved clothing (i.e., shirts and pants). Consideration must be given both to durability as well as permeation resistance.

Work Practice Controls:

Personal hygiene is an important work practice exposure control measure and the following general measures should be taken when working with or handling this material:

- (1) Do not store, use, and/or consume foods, beverages, tobacco products, or cosmetics in areas where this material is stored.
- (2) Wash hands and face carefully before eating, drinking, using tobacco, applying cosmetics, or using the toilet.
- (3) Wash exposed skin promptly to remove accidental splashes or contact with this material.

9. PHYSICAL AND CHEMICAL PROPERTIES

Physical and Chemical properties here represent typical properties of this product. Contact the business area using the Product Information phone number in Section 1 for its exact specifications.

Physical Appearance:

clear viscous liquid.

Odor:

odorless.

pH:

7 to 8 at 1 wt/wt%.

Specific Gravity:

Not Available

Density:

1 to 1.03 g/ml at 25 C (77 F).

Water Solubility:

soluble

Melting Point Range:

Not Available

Freezing Point Range:

< -1 C (30 F)

Boiling Point Range:

> 100 C (212 F) at 760 mmHg

Vapor Pressure:

< 23.5 mmHg at 25 C (77 F)

Vapor Density:

Not Available

Percent Volatiles by Volume:

< 61

Viscosity:

viscosity (centipoises) : 50 cps at 25 C (77 F).

10. STABILITY AND REACTIVITY

Chemical Stability:

This material is stable under normal handling and storage conditions described in Section 7.

Conditions To Be Avoided:

heat
open flame
spark

Materials/Chemicals To Be Avoided:

strong oxidizing agents
strong reducing agents

The Following Hazardous Decomposition Products Might Be Expected:**Decomposition Type: thermal**

oxides of nitrogen
oxides of sulfur
oxides of carbon

Hazardous Polymerization Will Not Occur.**Avoid The Following To Inhibit Hazardous Polymerization:**

not applicable

11. TOXICOLOGICAL INFORMATION

Acute Eye Irritation:

The following data are for the specified ingredients.

Toxicological Information and Interpretation:

eye - eye irritation, rabbit. Severely irritating. Data for ethylene glycol monobutyl ether.

eye - eye irritation, rabbit. Severely irritating. Data for surfactant blend.

Acute Skin Irritation:

The following data is for the specified ingredient.

Toxicological Information and Interpretation:

skin - skin irritation, rabbit. Moderately irritating. Data for surfactant blend.

Acute Dermal Toxicity:

The following data is for the specified ingredients.

Toxicological Information and Interpretation:

LD50 - lethal dose 50% of test species, 220 mg/kg, mouse. Data for ethylene glycol monobutyl ether.

Acute Respiratory Irritation:

No test data found for product.

Acute Inhalation Toxicity:

The following data is for the specified ingredients.

Toxicological Information and Interpretation:

LC50 - lethal concentration 50% of test species, 450 ppm/4 hr, rat. Data for ethylene glycol monobutyl ether.

Acute Oral Toxicity:

The following data is for the specified ingredients.

Toxicological Information and Interpretation:

LD50 - lethal dose 50% of test species, 470 mg/kg, rat. Data for ethylene glycol monobutyl ether.

LD50 - lethal dose 50% of test species, 6560, rat. Data for surfactant blend.

Chronic Toxicity:

This product does not contain any substances that are considered by OSHA, NTP, IARC or ACGIH to be "probable" or "suspected" human carcinogens.

No additional test data found for product.

12. ECOLOGICAL INFORMATION

Ecotoxicological Information:

No data found for product.

Chemical Fate Information:

Inherently biodegradable.

13. DISPOSAL CONSIDERATIONS

Waste Disposal Method:

Waste Management options should first consider possible re-use or recycling opportunities. Some provinces have active "Waste Exchange" networks for re-use and recycling of wastes. Contact your local waste management companies to explore available options. All waste management activities must obey local, provincial and federal regulations. Possible disposal methods include the following:

Solidify this material with compatible binders. Then place in a secure landfill.

Alternatively, incinerate directly or in combination with a flammable solvent.

Container Handling and Disposal:

Any containers or equipment used should be decontaminated immediately after use.

14. TRANSPORTATION INFORMATION

Transportation Status: IMPORTANT! Statements below provide additional data on listed DOT classification.

The listed Transportation Classification does not address regulatory variations due to changes in package size, mode of shipment or other regulatory descriptors.

TDG Status:

Shipping Name: NON DANGEROUS

IMO Status:

Shipping Name: NOT REGULATED

IATA Status:

Shipping Name: NOT REGULATED

15. REGULATORY INFORMATION

Inventory Status

Inventory	Status
UNITED STATES (TSCA)	Y
CANADA (DSL)	Y

Y = All ingredients are on the inventory.

E = All ingredients are on the inventory or exempt from listing.

P = One or more ingredients fall under the polymer exemption or are on the no longer polymer

list. All other ingredients are on the inventory or exempt from listing.

N = Not determined or one or more ingredients are not on the inventory and are not exempt from listing.

WHMIS Classification:

D-2B : TOXIC MATERIAL

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

16. OTHER INFORMATION

National Fire Protection Association Hazard Ratings--NFPA(R):

- 2 Health Hazard Rating--Moderate
- 1 Flammability Rating--Slight
- 0 Instability Rating--Minimal

National Paint & Coating Hazardous Materials Identification System--HMIS(R):

- 2 Health Hazard Rating--Moderate
- 1 Flammability Rating--Slight
- 0 Reactivity Rating--Minimal

Reason for Revisions:

Change and/or addition made to Section 2, Section 8, Exposure Limits in Section 8, Section 12, HMIS Ratings in Section 16, NFPA Ratings in Section 16, Regulatory Review and Update. Section 11.

Key Legend Information:

ACGIH - American Conference of Governmental Industrial Hygienists
OSHA - Occupational Safety and Health Administration
TLV - Threshold Limit Value
PEL - Permissible Exposure Limit
TWA - Time Weighted Average
STEL - Short Term Exposure Limit
NTP - National Toxicology Program
IARC - International Agency for Research on Cancer
ND - Not determined

Disclaimer:

The information herein is given in good faith but no warranty, expressed or implied, is made.

**** End of MSDS Document ****