

MATERIAL SAFETY 3M
DATA SHEET 3M Center
St. Paul, Minnesota
55144-1000
1-800-364-3577 or (651) 737-6501 (24 hours)

Copyright, 2001, Minnesota Mining and Manufacturing Company.
All rights reserved. Copying and/or downloading of this
information for the purpose of properly utilizing 3M products
is allowed provided that:

- 1) the information is copied in full with no changes unless
prior agreement is obtained from 3M, and
- 2) neither the copy nor the original is resold or otherwise
distributed with the intention of earning a profit thereon.

DIVISION: COMMERCIAL CARE DIVISION

TRADE NAME:

3M BRAND INDUSTRIAL DEGREASER CONCENTRATE

ID NUMBER/U.P.C.:

70-0709-9253-5 - - -

ISSUED: December 07, 2001

SUPERSEDES: INITIAL ISSUE

DOCUMENT: 16-6277-4

1. INGREDIENT	C.A.S. NO.	PERCENT
POLYETHOXYLATED ALCOHOL - NJTSN		
#027586004-8002.....	TradeSecret	15 - 40
2-AMINOISOBUTANOL.....	124-68-5	15 - 40
WATER.....	7732-18-5	10 - 30
2-(2-ETHYLHEXYLOXY)ETHANOL.....	1559-35-9	5 - 10
TRIMETHYL OCTADECYL AMMONIUM CHLORIDE...	112-03-8	3 - 7
ISOPROPYL ALCOHOL.....	67-63-0	3 - 7
DIETHYLENE GLYCOL MONO(2-ETHYLHEXYL)		
ETHER.....	1559-36-0	1 - 5

This product contains the following toxic chemical or chemicals subject to
the reporting requirements of Section 313 of Title III of the Emergency
Planning and Community Right-To-Know Act of 1986 and 40 CFR Part 372:

2-(2-ETHYLHEXYLOXY)ETHANOL
TRIMETHYL OCTADECYL AMMONIUM CHLORIDE
DIETHYLENE GLYCOL MONO(2-ETHYLHEXYL)
ETHER

2. PHYSICAL DATA

BOILING POINT:..... > 200 F
VAPOR PRESSURE:..... < 27 Air=1
VAPOR DENSITY:..... N/D
EVAPORATION RATE:..... N/D
SOLUBILITY IN WATER:..... complete
SPECIFIC GRAVITY:..... ca. 0.97 Water=1
PERCENT VOLATILE:..... < 5 %

Abbreviations: N/D - Not Determined N/A - Not Applicable CA - Approximately

2. PHYSICAL DATA (continued)

pH:..... ca. 11
VISCOSITY:..... < 100 centipoise ACS
MELTING POINT:..... N/D

APPEARANCE AND ODOR:

Liquid, Clear, red concentrate with slight clean and fresh odor

3. FIRE AND EXPLOSION HAZARD DATA

FLASH POINT:..... > 150 F CC
FLAMMABLE LIMITS - LEL:..... N/D
FLAMMABLE LIMITS - UEL:..... N/D
AUTOIGNITION TEMPERATURE:..... N/D

EXTINGUISHING MEDIA:

Water spray, Carbon dioxide, Dry chemical

SPECIAL FIRE FIGHTING PROCEDURES:

Wear full protective clothing, including helmet, self-contained, positive pressure or pressure demand breathing apparatus, bunker coat and pants, bands around arms, waist and legs, face mask, and protective covering for exposed areas of the head. Water may not effectively extinguish fire; however, it should be used to keep fire-exposed containers and surfaces cool and prevent explosive rupture.

UNUSUAL FIRE AND EXPLOSION HAZARDS:

Closed containers exposed to heat from fire may build pressure and explode. Vapors may travel long distances along the ground or floor to an ignition source and flash back.

NFPA HAZARD CODES: HEALTH: 2 FIRE: 2 REACTIVITY: 0
UNUSUAL REACTION HAZARD: none

OSHA FIRE HAZARD CLASS: Class IIIA Combustible Liquid

4. REACTIVITY DATA

STABILITY: Stable

INCOMPATIBILITY - MATERIALS/CONDITIONS TO AVOID:

Strong Acids, Strong Oxidizing Agents, Reducing Agents.

HAZARDOUS POLYMERIZATION: Hazardous polymerization will not occur.

Abbreviations: N/D - Not Determined N/A - Not Applicable CA - Approximately

4. REACTIVITY DATA (continued)

HAZARDOUS DECOMPOSITION PRODUCTS:
Carbon Monoxide and Carbon Dioxide.

5. ENVIRONMENTAL INFORMATION

SPILL RESPONSE:

Refer to other sections of this MSDS for information regarding physical and health hazards, respiratory protection, ventilation, and personal protective equipment. Ventilate area. Extinguish all ignition sources. Contain spill. Cover with inorganic absorbent material. Dilute in a large excess of water. Carefully, and with stirring, add appropriate dilute acid such as sulfamic acid or vinegar. Confirm neutrality. Collect spilled material. Collect using non-sparking tools. Clean up residue. Place in a U.S. DOT-approved container.

RECOMMENDED DISPOSAL:

Incinerate in a permitted hazardous waste incinerator. Dispose of completely absorbed waste product in a facility permitted to accept chemical wastes. Disposal alternative: Dispose of waste product in a hazardous waste facility.

ENVIRONMENTAL DATA:

Not determined.

REGULATORY INFORMATION:

Volatile Organic Compounds: < 30 gms/liter calculated per CARB title 2 section 94507.
VOC Less H2O & Exempt Solvents: < 40 gms/liter calculated per CARB title 2 section 94507.

Since regulations vary, consult applicable regulations or authorities before disposal. In the event of an uncontrolled release of this material, the user should determine if the release qualifies as a reportable quantity. U.S. EPA Hazardous Waste Number = D001 (Ignitable) D002 (Corrosive)

EPCRA HAZARD CLASS:

FIRE HAZARD: Yes PRESSURE: No REACTIVITY: No ACUTE: Yes CHRONIC: Yes

6. SUGGESTED FIRST AID

EYE CONTACT:

Immediately flush eyes with large amounts of water for at least 15 minutes. Get immediate medical attention.

Abbreviations: N/D - Not Determined N/A - Not Applicable CA - Approximately

6. SUGGESTED FIRST AID (continued)

SKIN CONTACT:

Immediately flush skin with large amounts of water for at least 15 minutes in a chemical safety shower while removing contaminated clothing and shoes. Get immediate medical attention. Wash contaminated clothing before reuse. Destroy or properly dispose of contaminated shoes.

INHALATION:

Remove person to fresh air. If not breathing, give artificial respiration. If breathing is difficult, get immediate medical attention.

IF SWALLOWED:

If swallowed, do NOT induce vomiting. Give victim two glasses of water. Call a physician immediately. Never give anything by mouth to an unconscious person.

7. PRECAUTIONARY INFORMATION

EYE PROTECTION:

Avoid eye contact. Wear unvented goggles during operations in which exposure is likely.

SKIN PROTECTION:

Avoid skin contact. Wear appropriate gloves when handling this material. A pair of gloves made from the following material(s) are recommended: butyl rubber. Use one or more of the following personal protection items as necessary to prevent skin contact: apron.

RECOMMENDED VENTILATION:

Use with adequate dilution ventilation.

RESPIRATORY PROTECTION:

Avoid breathing of vapors.

PREVENTION OF ACCIDENTAL INGESTION:

Do not eat, drink or smoke when using this product. Wash exposed areas thoroughly with soap and water. Wash hands after handling and before eating. Not an expected route of exposure.

RECOMMENDED STORAGE:

Store in a cool place. Store away from acids. Store away from heat. Store out of direct sunlight. Keep away from aluminum and zinc. Keep container dry. Keep container closed when not in use. Keep container in well-ventilated area. Keep out of the reach of children.

Abbreviations: N/D - Not Determined N/A - Not Applicable CA - Approximately

7. PRECAUTIONARY INFORMATION (continued)

FIRE AND EXPLOSION AVOIDANCE:

Keep container tightly closed. Keep away from heat, sparks, open flame, and other sources of ignition. Prevent all sources of ignition. Combustible liquid and vapor. No smoking while handling this material.

OTHER PRECAUTIONARY INFORMATION:

This product is not intended to be used without prior dilution as specified on the product label.

EXPOSURE LIMITS

INGREDIENT	VALUE	UNIT	TYPE	AUTH	SKIN*

POLYETHOXYLATED ALCOHOL - NJTSN					
#027586004-8002.....	NONE	NONE	NONE	NONE	
2-AMINOISOBUTANOL.....	NONE	NONE	NONE	NONE	
WATER.....	NONE	NONE	NONE	NONE	
2-(2-ETHYLHEXYLOXY)ETHANOL.....	NONE	NONE	NONE	NONE	
TRIMETHYL OCTADECYL AMMONIUM					
CHLORIDE.....	NONE	NONE	NONE	NONE	
ISOPROPYL ALCOHOL.....	400	PPM	TWA	ACGIH	
ISOPROPYL ALCOHOL.....	500	PPM	STEL	ACGIH	
ISOPROPYL ALCOHOL.....	400	PPM	TWA	OSHA	
ISOPROPYL ALCOHOL.....	500	PPM	STEL	OSHA	
DIETHYLENE GLYCOL MONO(2-					
ETHYLHEXYL) ETHER.....	NONE	NONE	NONE	NONE	

* SKIN NOTATION: Listed substances indicated with 'Y' under SKIN refer to the potential contribution to the overall exposure by the cutaneous route including mucous membrane and eye, either by airborne or, more particularly, by direct contact with the substance. Vehicles can alter skin absorption.

SOURCE OF EXPOSURE LIMIT DATA:

- ACGIH: American Conference of Governmental Industrial Hygienists
- OSHA: Occupational Safety and Health Administration
- NONE: None Established

8. HEALTH HAZARD DATA

EYE CONTACT:

Chemical Related Eye Burns (chemical corrosivity): signs/symptoms can include cloudy appearance of the cornea, chemical burns, pain, tearing, ulcers, impaired vision or loss of vision.

Abbreviations: N/D - Not Determined N/A - Not Applicable CA - Approximately

8. HEALTH HAZARD DATA (continued)

SKIN CONTACT:

Severe Skin Irritation: signs/symptoms can include redness, swelling, itching, dryness, cracking, blistering, and pain.

May be absorbed through the skin and produce effects similiar to those caused by inhalation and/or ingestion.

INHALATION:

Single overexposure, above recommended guidelines, may cause:

Central Nervous System Depression: signs/symptoms can include headache, dizziness, drowsiness, incoordination, slowed reaction time, slurred speech, giddiness and unconsciousness.

Irritation (upper respiratory): signs/symptoms can include soreness of the nose and throat, coughing and sneezing.

Prolonged or repeated overexposure, above recommended guidelines, may cause:

Chemical Pneumonitis: signs/symptoms include coughing, shortness of breath and wheezing.

Pulmonary Edema: signs/symptoms can include coughing, congestion, difficulty breathing, which can result in respiratory failure and death.

IF SWALLOWED:

Damage to Gastrointestinal Tissues: signs/symptoms can include pain, vomiting, nausea, abdominal tenderness, burns of mouth, difficulty swallowing, blood in vomitus, blood in feces, and ulceration.

Central Nervous System Depression: signs/symptoms can include headache, dizziness, drowsiness, muscular weakness, incoordination, slowed reaction time, fatigue, blurred vision, slurred speech, giddiness, tremors and convulsions.

Aspiration Pneumonitis: signs/symptoms can include coughing, difficulty breathing, wheezing, coughing up blood and pneumonia, which can be fatal.

The information in this Material Safety Data Sheet (MSDS) is believed to be correct as of the date issued. 3M MAKES NO WARRANTIES, EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, ANY IMPLIED WARRANTY OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE OR COURSE OF PERFORMANCE OR USAGE OF TRADE. User is responsible for determining whether the 3M product is fit for a particular purpose and suitable for user's method of use or application. Given the variety of factors that can affect the use and application of a 3M product, some of which are uniquely within the user's knowledge and control, it is essential that the user evaluate the 3M product to determine whether it is fit for a particular purpose and suitable for user's method of use or application.

3M provides information in electronic form as a service to its customers. Due to the remote possibility that electronic transfer may have resulted in errors, omissions or alterations in this information, 3M makes no representations as to its completeness or accuracy. In addition, information obtained from a database may not be as current as the information in the MSDS available directly from 3M.