

MONSANTO CO -- COOLANOL 45R;DIELECTRIC HEAT TRANSFER FLUID -- 9160-00-237-4777

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Product Identification
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Product ID:COOLANOL 45R;DIELECTRIC HEAT TRANSFER FLUID

MSDS Date:05/22/1989

FSC:9160

NIIN:00-237-4777

MSDS Number: BDLZT

=== Responsible Party ===

Company Name:MONSANTO CO

Address:800 N LINDBERGH BLVD

City:ST LOUIS

State:MO

ZIP:63141

Country:US

Info Phone Num:314-694-1000

Emergency Ph

one Num:314-694-1000 (COLLECT)

CAGE:76541

=== Contractor Identification ===

Company Name:MONSANTO COMPANY

Address:800 N LINDBERGH BLVD

Box:City:SAINT LOUIS

State:MO

ZIP:63167

Country:US

Phone:314-694-6661 OR 800-332-3111

CAGE:76541

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Composition/Information on Ingredients
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Ingred Name:ORGANOSILICATE ESTER (PRODUCT OF REACTING SILICON TETRA
CHLORIDE WITH ANHYDROUS ALCOHOL)

Ingred Name:2,6-DI-TERT-BUTYL-P-CRESOL

CAS:128-37-0

RTECS #:GO7875000

Fraction by Wt: 0.5%

OSHA PEL:10 MG/M3
ACGIH TLV:10 MG/M3; 9192

Ingred Name:MINERAL OIL (EXPOSURE REGULATED AS 'OIL MIST')
CAS:8012-95-1
RTECS #:PY8030000
Fraction by Wt: 2%
OSHA PEL:5 MG/M3
ACGIH TLV:5 MG/M3/10 STEL;9192

Ingred Name:2-ETHYL-1-BUTANOL (PRESENT AS A PRODUCT OF HYDROLYSIS. SEE
CASE HISTORY 85098H)
CAS:97-95-0
RTECS #:EL3850000

===== Hazards Identification =====

LD50 LC50 Mixture:ORAL RAT LD50=>10,000 MG/KG.
Routes of Entry: Inhalation:NO Skin:YES Ingestion:YE
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Reports of Carcinogenicity:NTP:NO IARC:NO OSHA:NO
Health Hazards Acute and Chronic:PRODUCT IS PRACTICALLY NON-TOXIC.
DERMAL CONTACT IS SLIGHTLY IRRITATING. 6 HR INHALATION STUDIES HAVE
SHOWN NO EFFECTS DUE TO THE LOW VOLITILITY OF THE PRODUCT AND THUS
LOW EXPOSURE LEVELS. SEE SUPP D ATA.
Effects of Overexposure:OTHER THAN SLIGHT IRRITATION, NONE WERE
REPORTED.
Medical Cond Aggravated by Exposure:NONE REPORTED.

===== First Aid Measures =====

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First Aid:MFR MADE NO COMMENT ON FIRST AID PROCEDURES. FOLLOWING FROM
HMIS: EYES:FLUSH WITH WATER 15 MIN. SKIN:REMOVE CONTAMINATED
CLOTHING. LAUNDRER BEFORE RE-USE. WASH PRODUCT FROM SKIN WITH SOAP
AND WATER FLU SH. INHALED:REMOVE TO FRESH AIR. INGESTED:GET
IMMEDIATE MEDICAL ATTENTION. IF IRRITATION FROM ANY CONTACT IS
SEVERE OR PERSISTS,GET MEDICAL ATTENTION.

===== Fire Fighting Measures =====

Flash Point Method:COC
Flash Point:=187.8

C, 370.F

370F/188C

Autoignition Temp:=287.8C, 550.F

Autoignition Temp Text:505F

Extinguishing Media:WATER SPRAY,FOAM,DRY CHEMICAL,CARBON DIOXIDE,OR
OTHER MEDIA FOR CLASS B FIRES.

Fire Fighting Procedures:WEAR FULL PROTECTIVE CLOTHING AND
SELF-CONTAINED BREATHING APPARATUS. DECONTAMINATE EQUIPMENT AFTER
USE.

Unusual Fire/Explosion Hazard:MAY EMIT HAZARDOUS FUME IN FIRE
CONDITIONS.

===== Accidental Release Measures =====

Spill Release Procedures:CONTAIN AND RECOVER LIQUID IF POSSIBLE. ABSORB
ON CLAY,SAWDUST,ETC. IF NOT.

Neutralizing Agent:NONE

===== Handling and Storage =====

Handling and Storage Precautions:STORE TIGHTLY CLOSED IN AN AREA FREE
FROM IGNITION SOURCES. PROTECT FROM MOISTURE. PRODUCT WILL
HYDROLYZE. SEE SUPP DATA.

Other Precautions:DO NOT EXPOSE TO MOISTURE AND HIGH TEMP ENVIRONMENTS
WHICH MAY DETERIORATE PROD.;WATER AT HIGH TEMP CAUSED
HYDROLYSIS;AVOID BREATHG VAP;WASH THOROUGHLY AFTER HANDLING.AVOID
FIRE/IGN CONDITION

===== Exposure Controls/Personal Protection =====

Respiratory Protection:NOT NORMALLY NEEDED. USE NIOSH RESPIRATOR OR
SUPPLIED AIR RESPIRATOR IF EXPOSED OVER TLV.

Ventilation:NORMAL ROOM VENTILATION IS USUALLY SUFFICIENT. USE
ADDITIONAL LOCAL EXHAUST AS NEEDED TO MAINTAIN EXPOSURE BELOW TLV.

Protective Gloves:RUBBER,PLASTIC.

Eye Protection:SAFETY GLASSES OR SPRAY GOGGLES.

Other Protective Equipment:IF USE INVOLVS SP
LASHING,ETC. USE

APRONS,BOOTS,ETC. TO PREVENT PROLONGED OR REPEATED CONTACT.

Work Hygienic Practices:USE GOOD CHEMICAL HYGIENE PRACTICE. AVOID ANY
UNNECESSARY EXPOSURE.

Supplemental Safety and Health

SEE DGSC-SLM CASE HISTORY 85098H. DESCRIBES EXPOSURE CASE HISTORY
WITHIN DOD.

===== Physical/Chemical Properties =====

HCC:V6

Boiling Pt:=340.C, 644.F

B.P. Text:644F,340C

Vapor Pres: