

Product ID:DICHLOROMETHANE MSDS Date:11/27/1989 FSC:6810 NIIN:00-244-0290 MSDS Number: BDMYX === Responsible Party === Company Name: MALLINCKRODT INC. SCIENCE PRODUCTS DIVISION Address: PARIS BYPASS Box:M City:PARIS State:KY ZIP:40361 Country:US Info Phone Num:800-354-2050(PRESS 3)/ 314-982-5000 Emergency Phone Num:800-354-2050/314-539-1600 Preparer's Name:NOT KNOWN CAGE:62910 === Contractor Identification === Company Name: MALLINCKRODT SPECIALTY CHEMICALS CO Address:222 RED SCHOOL LANE Box:City:PHILLIPSBURG State:NJ ZIP:08865 Country:US Phone:908-859-2151 CAGE:62910

Ingred Name:METHYLENE CHLORIDE (SARA III) CAS:75-09-2 RTECS #:PA8050000 Fraction by Wt: 100% Other REC Limits:NONE RECOMMENDED OSHA PEL:500 PPM/C,1000; Z2 ACGIH TLV:50 PPM, A2; 9293 EPA Rpt Qty:1000 LBS DOT Rpt Qty:1000 LBS

LD50 LC50 Mixture:LD50 (ORAL, RAT) IS 2524 MG/KG. Routes of Entry: Inhalation:YES Skin:YES Ingestion:NO Reports of Carcinogenicity:NTP:YES IARC:YES OSHA:NO Health Hazards Acute and Chronic: ACUTE- INHALATION MAY CAUSE LIVER INJURY, BLOOD DISORDERS, NARCOSIS, MENTAL CONFUSION, CNS DEPRESSION, UNCONSCIOUSNESS & DEATH. CAN BE ABSORB ED & CAUSE SYMPTOMS SIMILAR TO INHALATION, IF INGESTED. MAY BE ABSORBED THROUGH SKIN. CONTACT WITHEYES MAY CAUSE PAIN & INFLAMMATION. CHRONIC- CAUSES DERMATITIS & CNS DEPRESSION. Explanation of Carcinogenicity: THE AGENT IS POSSIBLY CARCINOGENIC TO HUMAN. Effects of Overexposure: EYES, SKIN AND RESPIRATORY TRACT IRRITATION, NAUSEA, VOMITING, HEADACHES, EYE AND SKIN REDNESS AND PAIN Medical Cond Aggravated by Exposure: PERSONS WITH PRE-EXISTING SKIN **DISORDERS OR EYE PROBLEMS** OR IMPAIRED LIVER, KIDNEY, CARDIOVASCULAR OR RESPIRATORY FUNCTION MAY BE MORE SUSCEPTIBLE TO THE EFFECTS OF THE SUBSTANCE.

First Aid:GET MEDICAL ATTENTION IMMEDIATELY. EYE/SKIN:IMMEDIATELY FLUSH WITH WATER FOR AT LEAST 15 MINUTES. HOLD EYELIDS OPEN. INHALED:REMOVE TO FRESH AIR & PROVIDE OXYGEN/CPR IF NEEDED. ORAL:IF CONSCIOUS, INDU CE VOMITING BY DRINKING TWO GLASSES OF WATER AND STICKING FINGER DOWN THROAT. CALL A PHYSICIAN IMMEDIATELY. NEVER

GIVE ANYTHING BY MOUTH TO AN UNCONSCIOUS PERSON.

Flash Point:NONE Autoignition Temp:Autoignition Temp Text:>1033F Lower Limits:12 IN OXYGEN Upper Limits:19 IN OXYGEN Extinguishing Media:CARBON DIOXIDE, FOAM OR DRY CHEMICAL. WATER SPRAY MAY BE USED TO KEEP FIRE EXPOSED CONTAINERS COOL & FLUSH SPILLS

AWAY.

Fire Fighting Procedures:WEAR FULL PROTECTIVE CLOTHING AND NIOS

H-APPROVED SELF-CONTAINED BREATHING APPARATUS WITH FULL FACEPIECE OPERATED IN THE POSITIVE PRESSURE MODE. Unusual Fire/Explosion Hazard: FORMS EXPLOSIVE MIXTURES IN HIGH OXYGEN CONTENT ATMOSPHERE, IN LIQUID OXYGEN, NITROGEN DIOXIDE. VAPORS>AIR CAN TRAVEL TO DISTANCE IGNITION SOURCE AND FLASH BACK Spill Release Procedures: EVACUATE PERSONNEL. WEAR PROPER PROTECTIVE CLOTHING AND EQUIPMENTS. VENTILATE AREA. STOP LEA K IF POSSIBLE. CONTAIN SPILL. ABSORB WITH VERMICULITE, DRY SAND OR SIMILAR MATERIAL AND PLACE IN APPROPRIATE DISPOSAL CONTAINER. DO NOT FLUSH TO SEWER. Neutralizing Agent:NOT RELEVANT Handling and Storage Precautions: STORE IN COOL, DRY, WELL VENTILATED PLACE AWAY FROM INCOMPATIBLE MATERIALS. KEEP CONTAINERS CLOSED WHEN NOT IN USE. Other Precautions: UNDER NORMAL CONDITIONS, STORE IN GALVANIZED IRON, BLA CK IRON OR STEEL. ALUMINUM IS NOT RECOMMENDED. OUTSIDE/DETACHED GARAGE IS RECOMMENDED. ISOLATE FROM SOURCE OF HEAT OR IGNITION. SHOWER, CHANGE TO CLEAN GARMENTS AT THE END OF THE DAY. Respiratory Protection: IF THE TLV IS EXCEEDED, WEAR A NIOSH-APPROVED SUPPLIED AIR, FULL-FACEPIECE RESPIRATOR, AIRLINE HOOD OR SELF-CONTAINED BREATHING APPARATUS. Ventilation:LOCAL EXHAUST AND/OR MECHANICAL (GENERAL) VENTILATION A S REQUIRED TO KEEP CONCENTRATIONS BELOW OSHA PEL. Protective Gloves: PVA. Eye Protection: CHEMICAL SPLASH GOGGLES. Other Protective Equipment: PROTECTIVE CLOTHING AS NEEDED TO PREVENT PROLONGED/REPEATED SKIN CONTACT, EYE WASH STATION AND SAFETY SHOWER. Work Hygienic Practices: AVOID CONTACT WITH EYES, SKIN OR CLOTHING. DO NOT BREATHE VAPORS. DO NOT WEAR CONTACT LENSES WHILE WORKING WITH MATERIAL Supplemental Safety and Health ================== Physical/Chemical Properties ===

HCC:T4 Boiling Pt:B.P. Text:104F,40C Melt/Freeze Pt:M.P/F.P Text:-142F,-97C Vapor Pres:350 @ 68 F Vapor Density:2.9 Spec Gravity:1.3 Viscosity:NOT KNOWN Evaporation Rate & amp; Reference:27.5 (N-BUTYL ACETATE=1) Solubility in Water:1.32 G% @ 68 F Appearance and Odor:CLEAR, COLORLESS LIQUID WITH A CHLOROFORM-LIKE ODOR Percent Volatiles by Volume:100

Stability Indicator/Materials to Avoid:YES STRONG OXIDIZERS AND CAUSTICS. CHEMICALLY ACTIVE METALS SUCH AS ALUMINUM & MAGNESIUM POWDERS, SODIUM, POTASSIUM, LITHIUM Stability Condition to Avoid:STABLE UNDER ORDINARY CONDITIONS OF USE AND STORAGE. AVOID CONTACT WITH OPEN FLAMES AND ELECTRICAL ARCS. Hazardous Decomposition Products:EMITS HIGHLY TOXIC GAS OF PHOSGEN WHEN HEATED TO DECOMPOSITION. CONTACT WITH HOT SURFACE/FLAME MAY FORM PHOSGENE AND HCL

Waste Disposal Methods:CO

LLECT AS HAZARDOUS WASTE AND ATOMIZE IN A SUITABLE RCRA APPROVED COMBUSTION CHAMBER. DISPOSE OF IN FULL COMPLIANCE WITH ALL APPLICABLE FEDERAL, STATE AND LOCAL REGULATIONS.

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