

SARGENT WELCH SCIENTIFIC CO.
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SKOKIE, IL 60077
(708) 677-0600

MATERIAL SAFETY DATA SHEET
PRODUCT NO. 09501, 09508
C13880-500GM,
4/11/88

SECTION I IDENTIFICATION

CHEMTREC 800-424-9300
24 HOUR EMERGENCY ASSISTANCE
DAY (312) 468-3700

PRODUCT OXALIC ACID, DIHYDRATE
TRADE/CHEMICAL SYNONYMS ETHANDIOLIC ACID
FORMULA (COOH)₂·2H₂O
RTECS# R02450000
C.A.S. # 6153-56-6

HEALTH 3
FLAMMABILITY 1
REACTIVITY 0
HAZARD RATING
LEAST SLIGHT MODERATE HIGH EXTREME
0 1 2 3 4

SECTION II MIXTURE COMPONENTS

COMPONENT	CAS NUMBER	%	TLV
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NA=NOT APPLICABLE
NE=NONE ESTABLISHED

SECTION III PHYSICAL CHARACTERISTICS INFORMATION

MELTING POINT C 101C SPECIFIC GRAVITY(H₂O=1) 1.65
BOILING POINT C 149-160C (SUBLIMES)
PERCENT VOLATILE BY VOLUME (%) NA
VAPOR PRESSURE MM HG/C NA
EVAPORATION RATE (=1) NA
VAPOR DENSITY (AIR=1) NA
SOLUBILITY IN WATER SOLUBLE
APPEARANCE AND ODDR WHITE CRYSTALS, NO ODOR.

SECTION IV FIRE/EXPLOSION HAZARD INFORMATION

FLASH POINT C NA (METHOD)
FLAMMABLE LIMITS IN AIR % BY VOLUME LOWER: 0.0 UPPER: 0.0

FIRE EXTINGUISHER TYPE: USE ANY MEDIUM SUITABLE FOR EXTINGUISHING SUPPORTING FIRE.

FIRE FIGHTING PROCEDURES (CALL FIRE DEPT. IMMEDIATELY): IN THE EVENT OF A FIRE WEAR FULL PROTECTIVE CLOTHING AND NIOSH-APPROVED SELF-CONTAINED BREATHING APPARATUS WITH FULL FACEPIECE OPERATED IN THE PRESSURE DEMAND OR OTHER POSITIVE PRESSURE MODE.

FIRE/EXPLOSION HAZARDS: COMBUSTIBLE SOLID BELOW 101C. CAN REACT EXPLOSIVELY WITH INCOMPATIBILITIES.

NFPA HAZARD RATING 1
 1 0

D.O.T. CORROSIVE MATERIAL N.O.S. UN1759
D.O.T. REGULATIONS MAY CHANGE FROM TIME TO TIME. PLEASE CONSULT THE MOST RECENT D.O.T. REGULATIONS. ESSENTIALLY SIMILAR TO FORM OSHA-174.

SECTION V HEALTH HAZARD INFORMATION

THRESHOLD LIMIT VALUE (TLV) 1 MG/M3 TWA

OVEREXPOSURE SYMPTOMS (WHEN IN DOUBT, CALL A PHYSICIAN OR LOCAL POISON CONTROL CENTER) TOXIC! CORROSIVE EFFECTS! ACUTE: SEVERE IRRITATION TO SKIN, EYES, LUNGS, MUCOUS MEMBRANES, AND GI TRACT. NAUSEA, SHOCK, KIDNEY DAMAGE. CHRONIC: ULCERS, CYANOSIS OF FINGERS, KIDNEY DAMAGE, RESPIRATORY INFLAMMATION.

EMERGENCY AND FIRST AID PROCEDURES: SKIN: IN CASE OF CONTACT, IMMEDIATELY FLUSH SKIN WITH PLENTY OF WATER FOR AT LEAST 15 MINUTES WHILE REMOVING CONTAMINATED CLOTHING AND SHOES. WASH CLOTHING BEFORE REUSE. THOROUGHLY CLEAN SHOES BEFORE REUSE. GET MEDICAL ATTENTION IMMEDIATELY. EYES: WASH EYES WITH PLENTY OF WATER FOR AT LEAST 15 MINUTES, LIFTING LOWER AND UPPER EYELIDS OCCASIONALLY. GET MEDICAL ATTENTION IMMEDIATELY. INHALATION: REMOVE TO FRESH AIR. IF NOT BREATHING, GIVE ARTIFICIAL RESPIRATION. IF BREATHING IS DIFFICULT GIVE OXYGEN. CALL A PHYSICIAN.
INGESTION: GIVE SEVERAL GLASSES OF WATER OR MILK, IF AVAILABLE, TO DRINK. VOMITING MAY OCCUR SPONTANEOUSLY, BUT DO NOT INDUCE! NEVER GIVE ANYTHING BY MOUTH TO AN UNCONSCIOUS PERSON. GET MEDICAL ATTENTION IMMEDIATELY.

SECTION VI REACTIVITY INFORMATION

STABILITY: STABLE

CONDITIONS TO AVOID: HEAT

INCOMPATIBILITIES (MATERIALS TO AVOID): STRONG OXIDIZING AGENTS, SILVER SALTS, ALKALIES, CHLORITES, HYPOCHLORITES.

HAZARDOUS DECOMPOSITION PRODUCTS: CARBON OXIDES, FORMIC ACID FUMES.

HAZARDOUS POLYMERIZATION: WILL NOT OCCUR

CONDITIONS TO AVOID: NONE

SECTION VII SPILL CLEANUP/DISPOSAL INFORMATION

CLEANUP METHODS(S) CLEANUP/DISPOSAL METHODS ARE RECOMMENDATIONS ONLY. CHECK YOU LOCAL, STATE, FEDERAL REGULATIONS. REMOVE ALL SOURCES OF IGNITION. VENTILATE AREA OF LEAK OR SPILL. CLEAN-UP PERSONNEL MAY REQUIRE PROTECTION FROM INHALATION OF DUST. SPILLS: CLEAN UP IN A MANNER THAT DOES NOT DISPERSE DUST INTO THE AIR. USE NON-SPARKING TOOLS. PICK UP FOR RECOVERY OR DISPOSAL AND PLACE IN A CLOSED CONTAINER. WASH SPILL AREA THOROUGHLY.

DISPOSAL METHOD(S)

DISPOSAL: WHATEVER CANNOT BE SAVED FOR RECLAMATION MAY BE DISPOSED IN A RCRA-APPROVED WASTE FACILITY. DO NOT FLUSH TO THE SEWER.

SECTION VIII PERSONAL PROTECTION RECOMMENDATIONS

RESPIRATORY PROTECTION (SPECIFY TYPE): TOXIC DUST

VENTILATION LOCAL EXHAUST X
MECHANICAL (GENERAL) X

PROTECTIVE GLOVES: VINYL OR RUBBER EYE PROTECTION: GOGGLES
OTHER PROTECTIVE EQUIPMENT: LAB COAT

SECTION IX ADDITIONAL INFORMATION

STORE IN A COOL DRY LOCATION.

CONDITIONS AGGRAVATED /TARGET ORGANS: PERSONS WITH PREEXISTING SKIN, EYE, RESPIRATORY, OR KIDNEY DISORDERS MAY BE MORE SUSCEPTIBLE. KIDNEY.

REV. NO. 2 DATE 4/11/88 APPROVED: K.KUCHEL SAFETY DIR. RMC
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