

MALLINCKRODT INC. SCIENCE PRODUCTS DIVISION -- NITRIC ACID, 70% -- 6810-00-130-1912

===== Product Identification =====

Product ID:NITRIC ACID, 70%

MSDS Date:04/06/1989

FSC:6810

NIIN:00-130-1912

MSDS Number: CDQKY

=== 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

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

Company Name:WARDS NATURAL SCIENCE ESTABLISHMENT INC

Address:5100 W HENRIETTA RD

Box:92912

City:ROCHESTER

State:NY

ZIP:14692-9012

Country:US

Phone:(716) 359-2502

CAGE:63759

===== Composition/Information on Ingredients =====

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Ingred Name:NITRIC ACID (SARA 302/313) (CERCLA)

CAS:7697-37-2

RTECS #:QU5775000

Fraction by Wt: 70%

Other REC Limits:NONE RECOMMENDED

OSHA PEL:2 PPM

ACGIH TLV:2 PPM/4 STEL; 9596

EPA Rpt Qty:1000 LBS

DOT Rpt Qty:1000 LBS

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

LD50 LC50 Mixture:INHALATION (RAT) LC50: 244 PPM

Routes of Entry: Inhalation:YES Skin:YES Ingestion:YES

Reports of Carcinogenicity:NTP:NO IARC:NO OSHA:NO

Health Hazards Acute and Chronic:ACUTE: I

NHALATION OF VAPORS MAY CAUSE

BREATHING DIFFICULTIES, PNEUMONIA, PULMONARY EDEMA. INGESTION MAY CAUSE BURNS TO MOUTH/THROAT/ESOPHAGUS/STOMACH/GI TRACT. CONTACT MAY CAUSE BURNS TO SKIN & EYES. CHRONIC: PROLONGED/REPEATED EXPOSURE MAY CAUSE EROSION OF TEETH.

Explanation of Carcinogenicity:NO INGREDIENT OF A CONCENTRATION OF 0.1% OR GREATER IS LISTED AS A CARCINOGEN OR SUSPECTED CARCINOGEN.

Effects of Overexposure:INHALED-COUGHING, CHOKING, IRRITATION OF NOSE/THROAT/RESPIRAT

ORY TRACT. EYES-PAIN, BURNS, PERMANENT EYE

DAMAGE. SKIN-REDNESS, PAIN, SEVERE SKIN BURNS, DEEP ULCERS, YELLOW TO YELLOW-BROWN STAIN TO SKIN . INGESTED-PAIN, BURNS TO MOUTH/THROAT/ESOPHAGUS/STOMACH/GI TRACT.

Medical Cond Aggravated by Exposure:PRE-EXISTING SKIN DISORDERS OR EYE DISEASE MAY BE MORE SUSCEPTIBLE TO THE EFFECTS OF THIS SUBSTANCE.

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

First Aid:IN ALL CASES GET IMMEDIATE MEDICAL ATTENTION. EYES-FLUSH WITH

WATER FOR 15 MINUTES, LIFT LIDS. SKIN-REMOVE CONTAMINATED CLOTHES. WASH WITH MILD SOAP & WATER. INHALED-REMOVE TO FRESH AIR. GIVE OXYGEN OR ARTIFICIAL RESPIRATION AS NEEDED. INGESTED-DO NOT INDUCE VOMITING! IF CONSCIOUS, GIVE LOTS OF WATER.

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

Flash Point:NON-COMBUSTIBLE

Extinguishing Media:WATER SPRAY.

Fire Fighting Procedures:WEAR SELF-CONTAINED BREATHING APPARATUS AND FULL FIRE FIGHTER'S PROTECTIVE GEA

R.
Unusual Fire/Explosion Hazard:OXIDIZER! REACTS EXPLOSIVELY WITH
COMBUSTIBLE, ORGANIC OR READILY OXIDIZABLE MATEIRALS. HEAT OF
REACTION MAY CAUSE IGNITION. CAN REACT W/METALS TO RELEASE H2.

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

Spill Release Procedures:ISOLATE SPILL AREA. WEAR PROPER PERSONAL
PROTECTIVE GEAR/EQUIPMENT. FLUSH WITH WATER & NEUTRALIZE WITH
ALKALINE MATEWRIAL (SODA ASH, LIME, ETC.). PICK UP WITH ABSORBENT
AND DISPOSE OF AT A RCRA
-PERMIT TED SITE. CERCLA RQ=1000 LBS.
Neutralizing Agent:SODA ASH, LIME, ALKALINE MATERIALS.

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

Handling and Storage Precautions:STORE IN A COOL, DRY, WELL-VENTILATED
PLACE AWAY FROM INCOMPATIBLE MATERIALS. KEEP CONTAINER TIGHTLY
CLOSED. PROTECT CONTAINER FROM PHYSICAL DAMAGE.
Other Precautions:PROTECT FROM MOISTURE. KEEP OUT OF DIRECT SUNLIGHT.

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

Respira
tory Protection:IF ENGINEERING CONTROLS FAIL OR NON-ROUTINE USE
OR AN EMERGENCY OCCURS; WEAR AN MSHA/NIOSH APPROVED AIR-SUPPLIED
RESPIRATOR OR SCBA, AS REQUIRED. USE IAW 29 CFR 1910.134.
Ventilation:USE ADEQUATE MECHANICAL VENTILATION OR LOCAL EXHAUST TO
MAINTAIN EXPOSURE BELOW TLV(S).
Protective Gloves:IMPERVIOUS: NEOPRENE, PVC.
Eye Protection:CHEMICAL SPLASH GOGGLES + FACESHIELD.
Other Protective Equipment:EYE WASH STATION & SAFETY SHOWER. LAB COAT,
BOOTS, APRON OR COVERALLS TO
PREVENT SKIN CONTACT.
Work Hygienic Practices:WASH HANDS AFTER HANDLING AND BEFORE EATING,
DRINKING, OR SMOKING. LAUNDRER CONTAMINATED CLOTHES BEFORE REUSE.
Supplemental Safety and Health
MSDS PRESENTED BY CAGE 63759 FOR CONTRACT NUMBER MDA414-97-D4522.

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

HCC:C1
Boiling Pt.=122.2C, 252.F
Melt/Freeze Pt.=-33.9C, -29.F
Vapor Pres:62
Vapor Density:2-3
Spec Gravity:1.41
Evaporation Rate & Reference:NO INFORMATION FOUND
Solu

bility in Water:COMPLETE

Appearance and Odor:CLEAR, COLORLESS TO LIGHT YELLOW LIQUID;
SUFFOCATING ACRID ODOR.

===== Stability and Reactivity Data =====

Stability Indicator/Materials to Avoid:YES

STRONG ALKALIS, METALLIC POWDERS, CARBIDES, HYDROGEN SULFIDE,
TURPENTINE, COMBUSTIBLE ORGANICS.

Stability Condition to Avoid:CONTAINERS MAY BURST WHEN HEATED.

Hazardous Decomposition Products:TOXIC NITROGEN OXIDES FUMES & HYDROGEN
NITRATE FUMES. REACTION W/WATER OR
STEAM PRODUCES HEAT &
TOXIC/CORROSIVE FUMES.

Conditions to Avoid Polymerization:WILL NOT OCCUR.

===== Disposal Considerations =====

Waste Disposal Methods:DISPOSE OF IN ACCORDANCE WITH LOCAL, STATE AND
FEDERAL ENVIRONMENTAL REGULATIONS. SARA EHS (302)-RQ/TPQ, 1000 LB;
SARA 313-YES; CERCLA 103-RQ 1000 LBS. RCRA SEC 261.33.

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