

DATE: 04/25/91  
INDEX: N/A

ACCT: 888328-01  
CAT NO: C337500

PAGE: 1  
PO NBR: N/A

\*\*CHROMIC POTASSIUM SULFATE, DODECAHYDRATE\*\*  
\*\*CHROMIC POTASSIUM SULFATE, DODECAHYDRATE\*\*  
\*\*CHROMIC POTASSIUM SULFATE, DODECAHYDRATE\*\*

-----  
MATERIAL SAFETY DATA SHEET  
-----

FISHER SCIENTIFIC  
CHEMICAL DIVISION  
1 REAGENT LANE  
FAIR LAWN NJ 07410  
(201) 796-7100

EMERGENCY NUMBER: (201) 796-7100  
CHEMTREC ASSISTANCE: (800) 424-9300

THIS INFORMATION IS BELIEVED TO BE ACCURATE AND REPRESENTS THE BEST INFORMATION CURRENTLY AVAILABLE TO US. HOWEVER, WE MAKE NO WARRANTY OF MERCHANTABILITY OR ANY OTHER WARRANTY, EXPRESS OR IMPLIED, WITH RESPECT TO SUCH INFORMATION, AND WE ASSUME NO LIABILITY RESULTING FROM ITS USE. USERS SHOULD MAKE THEIR OWN INVESTIGATIONS TO DETERMINE THE SUITABILITY OF THE INFORMATION FOR THEIR PARTICULAR PURPOSES.

-----  
SUBSTANCE IDENTIFICATION  
-----

SUBSTANCE: \*\*CHROMIC POTASSIUM SULFATE, DODECAHYDRATE\*\* CAS-NUMBER 7788-99-0

TRADE NAMES/SYNONYMS:  
CHROMIC ALUM; POTASSIUM CHROMIUM ALUM;  
CHROMIUM(III) POTASSIUM SULFATE; DODECADRATE;  
SULFURIC ACID, CHROMIUM(3+) POTASSIUM SALT (2:1:1), DODECAHYDRATE; C-337;  
ACC19330

CHEMICAL FAMILY:  
INORGANIC SALT

MOLECULAR FORMULA: CR-K-08-S2 12H2O

MOLECULAR WEIGHT: 499.0

CERCLA RATINGS (SCALE 0-3): HEALTH=3 FIRE=0 REACTIVITY=0 PERSISTENCE=3  
NFPA RATINGS (SCALE 0-4): HEALTH=3 FIRE=0 REACTIVITY=0

-----  
COMPONENTS AND CONTAMINANTS  
-----

COMPONENT: CHROMIC POTASSIUM SULFATE CAS# 7788-99-0 PERCENT: 100

OTHER CONTAMINANTS: NONE

EXPOSURE LIMITS:  
0.5 MG(CR)/M3 OSHA TWA; 0.5 MG(CR)/M3 ACGIH TWA

-----  
PHYSICAL DATA  
-----

DESCRIPTION: LARGE VIOLET-RED TO BLACK OCTAHEDRAL, CUBIC CRYSTALS  
BOILING POINT: 752 F (400 C) SUBLIMES MELTING POINT: 192 F (89 C)

SPECIFIC GRAVITY: 1.8 SOLUBILITY IN WATER: 19.6%

SOLVENT SOLUBILITY: PRACTICALLY INSOLUBLE IN ALCOHOL

-----  
FIRE AND EXPLOSION DATA  
-----

FIRE AND EXPLOSION HAZARD:  
NEGLECTIBLE FIRE HAZARD WHEN EXPOSED TO HEAT OR FLAME.

FLASH POINT: NON-FLAMMABLE

FIREFIGHTING MEDIA:  
DRY CHEMICAL, CARBON DIOXIDE, WATER SPRAY OR REGULAR FOAM  
(1990 EMERGENCY RESPONSE GUIDEBOOK, DOT P 5800.5).

FOR LARGER FIRES, USE WATER SPRAY, FOG OR REGULAR FOAM  
(1990 EMERGENCY RESPONSE GUIDEBOOK, DOT P 5800.5).

FIREFIGHTING:  
MOVE CONTAINER FROM FIRE AREA IF YOU CAN DO IT WITHOUT RISK. DO NOT SCATTER  
SPILLED MATERIAL WITH HIGH-PRESSURE WATER STREAMS. DIKE FIRE-CONTROL WATER FOR  
LATER DISPOSAL (1990 EMERGENCY RESPONSE GUIDEBOOK, DOT P 5800.5, GUIDE  
PAGE 31).

USE AGENTS SUITABLE FOR TYPE OF SURROUNDING FIRE. AVOID BREATHING HAZARDOUS  
VAPORS, KEEP UPWIND.

-----  
TOXICITY  
-----

DATE: 04/25/91  
INDEX: N/A

ACCT: 888328-01  
CAT NO: C337500

PAGE: 2  
PO NBR: N/A

CHROMIC POTASSIUM SULFATE, DODECAHYDRATE:  
112 MG/KG INTRAVENOUS-RAT LD50; TUMORIGENIC DATA (RTECS).  
CARCINOGEN STATUS: HUMAN INADEQUATE EVIDENCE, ANIMAL INADEQUATE EVIDENCE  
(IARC GROUP-3 FOR TRIVALENT CHROMIUM COMPOUNDS).  
CHROMIC POTASSIUM SULFATE, DODECAHYDRATE IS A SOLUBLE CHROMIUM COMPOUND  
WHICH EXHIBITS NO SIGNIFICANT SYSTEMIC TOXICITY. NO SPECIFIC EFFECTS ARE KNOWN  
TO RESULT FROM INHALATION OR INGESTION. SENSITIZATION DERMATITIS MAY OCCUR IN  
PREVIOUSLY EXPOSED INDIVIDUALS.

-----  
HEALTH EFFECTS AND FIRST AID

INHALATION:  
CHROMIC POTASSIUM SULFATE, DODECAHYDRATE:  
IRRITANT. 250 MG(CR)/M3 IMMEDIATELY DANGEROUS TO LIFE OR HEALTH.  
ACUTE EXPOSURE- THE DUST IS IRRITATING TO THE NOSE AND THROAT AND MAY CAUSE  
COUGHING OR DIFFICULTY IN BREATHING IN LARGE CONCENTRATIONS.

CHRONIC EXPOSURE- NO EFFECTS KNOWN IN HUMANS.

FIRST AID- REMOVE FROM EXPOSURE AREA TO FRESH AIR IMMEDIATELY. IF BREATHING  
HAS STOPPED, PERFORM ARTIFICIAL RESPIRATION. KEEP PERSON WARM AND AT REST.  
TREAT SYMPTOMATICALLY AND SUPPORTIVELY. GET MEDICAL ATTENTION IMMEDIATELY.

SKIN CONTACT:  
CHROMIC POTASSIUM SULFATE, DODECAHYDRATE:  
IRRITANT/SENSITIZER.  
ACUTE EXPOSURE- CONTACT MAY RESULT IN IRRITATION AND REDNESS. SENSITIZATION  
DERMATITIS MAY OCCUR IN PREVIOUSLY EXPOSED INDIVIDUALS.

CHRONIC EXPOSURE- REPEATED OR PROLONGED CONTACT MAY CAUSE DERMATITIS.

FIRST AID- REMOVE CONTAMINATED CLOTHING AND SHOES IMMEDIATELY. WASH AFFECTED  
AREA WITH SOAP OR MILD DETERGENT AND LARGE AMOUNTS OF WATER UNTIL NO  
EVIDENCE OF CHEMICAL REMAINS (APPROXIMATELY 15-20 MINUTES). GET MEDICAL  
ATTENTION IMMEDIATELY.

EYE CONTACT:  
CHROMIC POTASSIUM SULFATE, DODECAHYDRATE:  
IRRITANT.  
ACUTE EXPOSURE- PARTICULATES IN THE EYE MAY CAUSE LACRIMATION AND  
IRRITATION.

CHRONIC EXPOSURE- NO EFFECTS KNOWN IN HUMANS.

FIRST AID- WASH EYES IMMEDIATELY WITH LARGE AMOUNTS OF WATER OR NORMAL SALINE,  
OCCASIONALLY LIFTING UPPER AND LOWER LIDS, UNTIL NO EVIDENCE OF CHEMICAL  
REMAINS (APPROXIMATELY 15-20 MINUTES). GET MEDICAL ATTENTION IMMEDIATELY.

INGESTION:  
CHROMIC POTASSIUM SULFATE, DODECAHYDRATE:  
ACUTE EXPOSURE- WHEN TAKEN BY MOUTH, THIS TRIVALENT CHROMIUM COMPOUND  
NORMALLY DOES NOT GIVE RISE TO LOCAL OR SYSTEMIC EFFECTS AND IS POORLY  
ABSORBED INTO THE BODY.  
CHRONIC EXPOSURE- NOT REPORTED IN HUMANS.

FIRST AID- IF PERSON IS CONSCIOUS, GIVE LARGE AMOUNTS OF WATER. TREAT  
SYMPTOMATICALLY AND SUPPORTIVELY. GET MEDICAL ATTENTION.

ANTIDOTE:  
NO SPECIFIC ANTIDOTE. TREAT SYMPTOMATICALLY AND SUPPORTIVELY.

-----  
REACTIVITY

REACTIVITY:  
STABLE UNDER NORMAL TEMPERATURES AND PRESSURES.

DECOMPOSITION:  
THERMAL DECOMPOSITION MAY RELEASE TOXIC OXIDES OF SULFUR.

POLYMERIZATION:  
HAZARDOUS POLYMERIZATION HAS NOT BEEN REPORTED TO OCCUR UNDER NORMAL  
TEMPERATURES AND PRESSURES.

-----  
STORAGE AND DISPOSAL

OBSERVE ALL FEDERAL, STATE AND LOCAL REGULATIONS WHEN STORING OR DISPOSING  
OF THIS SUBSTANCE. FOR ASSISTANCE, CONTACT THE DISTRICT DIRECTOR OF THE  
ENVIRONMENTAL PROTECTION AGENCY.

\*\*\*\*\*  
SPILL AND LEAK PROCEDURES

SOIL SPILL:  
DIG HOLDING AREA SUCH AS LAGOON, POND OR PIT FOR CONTAINMENT.

USE PROTECTIVE COVER SUCH AS A PLASTIC SHEET TO PREVENT MATERIAL FROM

DATE: 04/25/91  
INDEX: N/A

ACCT: 888328-01  
CAT NO: C337500

PAGE: 3

PO NBR: N/A

DISSOLVING IN FIRE EXTINGUISHING WATER OR RAIN.

WATER SPILL:

USE ACTIVATED CARBON TO ABSORB SPILLED SUBSTANCE THAT IS DISSOLVED.

USE SUCTION HOSES TO REMOVE TRAPPED SPILL MATERIAL.

USE MECHANICAL DREDGES OR LIFTS TO EXTRACT IMMOBILIZED MASSES OF POLLUTION AND PRECIPITATES.

OCCUPATIONAL SPILL:

NO SPECIAL PRECAUTIONS INDICATED.

-----  
PROTECTIVE EQUIPMENT

VENTILATION:

PROVIDE LOCAL EXHAUST VENTILATION AND/OR GENERAL DILUTION VENTILATION TO MEET PUBLISHED EXPOSURE LIMITS.

RESPIRATOR:

CHROMIUM:

5 MG(CR)/M3- DUST AND MIST RESPIRATOR.

10 MG(CR)/M3- DUST AND MIST RESPIRATOR (EXCEPT SINGLE-USE AND QUARTER-MASK RESPIRATORS).

FUME OR HIGH-EFFICIENCY PARTICULATE RESPIRATOR.  
SUPPLIED-AIR RESPIRATOR.  
SELF-CONTAINED BREATHING APPARATUS.

50 MG(CR)/M3- HIGH-EFFICIENCY PARTICULATE RESPIRATOR WITH A FULL FACEPIECE.  
SUPPLIED-AIR RESPIRATOR WITH A FULL FACEPIECE, HELMET OR HOOD.  
SELF-CONTAINED BREATHING APPARATUS WITH A FULL FACEPIECE.

ESCAPE- POWERED-AIR PURIFYING RESPIRATOR WITH A HIGH-EFFICIENCY PARTICULATE FILTER.  
TYPE 'C' SUPPLIED-AIR RESPIRATOR.  
SUPPLIED-AIR RESPIRATOR OPERATED IN PRESSURE-DEMAND, POSITIVE PRESSURE, OR CONTINUOUS-FLOW MODE.

CLOTHING:

PROTECTIVE CLOTHING NOT REQUIRED. AVOID REPEATED OR PROLONGED CONTACT WITH THIS SUBSTANCE.

GLOVES:

PROTECTIVE GLOVES ARE NOT REQUIRED BUT RECOMMENDED.

EYE PROTECTION:

EYE PROTECTION NOT REQUIRED, BUT ADVISABLE.

AUTHORIZED - FISHER SCIENTIFIC, INC.  
CREATION DATE: 12/04/84 REVISION DATE: 10/09/90

-ADDITIONAL INFORMATION-  
THIS INFORMATION IS BELIEVED TO BE ACCURATE AND REPRESENTS THE BEST INFORMATION CURRENTLY AVAILABLE TO US. HOWEVER, WE MAKE NO WARRANTY OF MERCHANTABILITY OR ANY OTHER WARRANTY, EXPRESS OR IMPLIED, WITH RESPECT TO SUCH INFORMATION, AND WE ASSUME NO LIABILITY RESULTING FROM ITS USE. USERS SHOULD MAKE THEIR OWN INVESTIGATIONS TO DETERMINE THE SUITABILITY OF THE INFORMATION FOR THEIR PARTICULAR PURPOSES.