

=====

MSDS Safety Information

=====

FSC: 9150
 MSDS Date: 01/25/1993
 MSDS Num: CHGQZ
 LIIN: 00N087390
 Product ID: DRAKEOL 7
 MFN: 01
 Kit Part: Y
 Responsible Party
 Cage: PENRE
 Name: PENRECO
 Address: 138 PETROLIA STREET
 City: KARNS CITY PA 16041-9799
 Info Phone Number: 800-546-6227
 Emergency Phone Number: 800-546-6040
 Preparer's Name: UNKNOWN
 Review Ind: Y
 Published: Y

=====

Contractor Summary

=====

Cage: 58614
 Name: COMMUNICATIONS INSTRUMENTS INC
 Address: HWY 74 EAST
 Box: 520
 City: FAIRVIEW NC 28730
 Phone: 704-628-1711
 Cage: PENRE
 Name: PENRECO
 Address: 4401 PARK AVENUE
 City: DICKINSON TX 77539
 Phone: 713-236-6070
 Cage: 86459
 Name: PENRECO, DIV OF PENNZOIL CO
 Address: 700 MILIAM ST
 Box: 2967
 City: HOUSTON TX 77252
 Phone: 800-245-3952

=====

Ingredients

=====

Cas: 8042-47-5
 RTECS #: PY8047000
 Name: MINERAL OIL, WHITE; (WHITE MINERAL OIL)
 % Wt: 100
 OSHA PEL: N/K (FP N)
 ACGIH TLV: N/K (FP N)

 Name: SUPDAT: INCRD RESP RATE, INCRD HEART RATE & BLUISH DISCOLORATION OF
 SKIN. COUGH, CHOKING & GAGGING ARE

 Name: ING 2: OFTEN NOTED AT TIME OF ASPIR. GI DISCOMFORT MAY DEVELOP FOLLOWED
 BY VOMIT W/FURTHER RISK OF ASPIR. PROD

 Name: ING 3: HAS LAXATIVE PROPERTIES & MAY RSLT IN ABDOM CRAMPS & DIARR.
 HLTH DATA: EXPOS TO LG SINGLE DOSE/RPTD SM DOSES

 Name: ING 4: OF MINERAL OIL BY INHAL, ASPIR OR INGEST LEADING TO ASPIR CAN LEAD

=====

TO LIPID PNEUM OR LIPID GRANULOMA. THESE

Name: ING 5: ARE LOW-GRADE, CHRONIC LOCALIZED TISS RXNS WHICH ARE NOT FATAL.
SHORTNESS OF BRTH & COUGH MOST COMMON

Name: ING 6: SYMPS. IARC CONCLUDED THAT HIGHLY REFINED MINERAL OILS ARE GROUP 3
SUBSTANCES, "NOT CLASSIFIABLE AS TO

Name: ING 7: THEIR CARCIN TO HUMANS" BASED ON INADEQ HUMAN & INADEQ ANIMAL
EVID. IARC CONCLUDED THERE IS NO EVID FOR

Name: ING 8: CARCIN TO EXPERIMENTAL ANIMALS OF WHITE OILS WHEN ADMIN BY ROUTES
OTHER THAN INTRAPERITONEAL INJECTION.

Name: ING 9: THIS SUBSTANCE IS NOT CARCIN ACCORDING TO OSHA HAZ COMMUNICATION
STANDARD.

Name: FIRST AID PROC: LAXATIVE. DO NOT INDUCE VOMIT DUE TO ASPIR HAZ. IF VOMIT
OCCURS LOWER HEAD BELOW KNEES TO AVOID

Name: ING 11: ASPIR. SEEK IMMED MED ATTN.

Name: SPILL PROC: CLAY, ETC. LARGE SPILLS MAY BE PICKED UP USING VACUUM PUMPS,
SHOVELS, BUCKETS OR OTHER MEANS &

Name: ING 13: PLACED IN DRUMS OR OTHER SUITABLE CONTAINERS.

Name: WASTE DISP METH: DEPARTMENT OF TRANSPORTATION REGS MAY APPLY FOR
TRANSPORTING MATL WHEN SPILLED. WASTE MATL MAY

Name: ING 15: BE LANDFILLED OR INCINERATED AT APPROVED FACILITY. MATLS SHOULD
BE RECYCLED IF POSSIBLE.

Name: VENT: MAINTAIN CONCENTRATIONS BELOW SPECIFIED EXPOSURE OR FLAMMABLE
LIMITS.

Name: OTHER PROT EQUIP: ETC) OVER PARTS OF BODY SUBJECT TO EXPOSURE. IF HNDLG
HOT MATL, USE INSULATED PROT CLTHG

Name: ING 18: (BOOTS, GLOVES, APRONS, ETC).

Name: HYGIENE PRACT: HANDS & FACE WITH SOAP & WATER BEFORE EATING,
DRINKING OR SMOKING.

=====

Health Hazards Data

=====

LD50 LC50 Mixture: NONE SPECIFIED BY MANUFACTURER.

Route Of Entry Inds - Inhalation: YES

Skin: YES

Ingestion: YES

Carcinogenicity Inds - NTP: NO

IARC: NO

OSHA: NO

Effects of Exposure: EYE CNTCT: MINIMALLY IRRIT TO EYES UPON DIRECT CNTCT.

BASED ON TESTING OF SIMILAR PRODS &/OR COMPONENTS. SKIN CNTCT: PROD NOT
EXPECTED TO CAUSE ANY SKIN IRRIT UPON DIRECT SINGLE/RPTD & PRLNGD CNTCT;
H OWEVER, SIMILAR CHEM COMPOSITION PRODS APPLIED TO SKIN OF LAB ANIMALS RSLT
IN MINIMAL TO SLIGHT DERMAL (EFTS OF OVEREXP)

Explanation Of Carcinogenicity: NOT RELEVANT

Signs And Symptoms Of Overexposure: HLTH HAZ: IRRIT. INHAL:PROD HAS LOW VP

& IS NOT EXPECTED TO PRESENT INHAL HAZ AT AMBIENT CNDTNS. CAUTION SHOULD BE TAKEN TO PVNT AEROSOLIZATION OR MISTING OF PROD. PEL & TLV FOR PROD AS OIL MIST IS 5M G/M3. EXPOS BELOW 5MG/M3 APPEAR TO BE W/OUT SIGNIFICANT HLTH RISK. SHORT-TERM EXPOS LIM FOR PROD AS OIL MIST IS (SUPDAT)

Medical Cond Aggravated By Exposure: NONE SPECIFIED BY MANUFACTURER.

First Aid: INHAL: REMOVE TO FRESH AIR. SUPPORT BRTHG (GIVE OXYGEN/ARTF RESP) (FP N). EYES: IMMED FLUSH EYES W/LG AMTS OF WATER & CONTINUE FLUSHING FOR AT LEAST 15 MIN OR UNTIL IRRIT SUBSIDES. IF MATL IS HOT, TRE AT FOR THERMAL BURNS & TAKE TO HOSPITALIMMED. SKIN: REMOVE CONTAM CLTHG. IF MATL IS HOT, SUBMERGE INJURED AREA IN COLD WATER. IF SEVERELY BURNED, REMOVE TO HOSPITAL IMMED. INGEST: MAY ACT AS

Handling and Disposal

Spill Release Procedures: CONSULT SECTIONS ON HLTH EFTS, PERSONAL PROT, FIRE PROT & REACTIVITY. NOTIFY APPROP AUTHS OF SPILL. CNTN SPILL IMMED. DO NOT ALLOW SPILL TO ENTER SEWERS OR WATERCOURSES. REMOVE ALL SOURCES OF IGNIT. A BOSRB W/APPROP INERT MATL SUCH AS SAND,

Neutralizing Agent: NONE SPECIFIED BY MANUFACTURER.

Waste Disposal Methods: ALL DISPOSALS MUST COMPLY WITH FEDERAL, STATE & LOCAL REGS. MATL, IF SPILLED OR DISCARDED, MAY BE REGULATED WASTE. REFER TO STATE & LOCAL REGS. CAUTION! IF REGULATED SOLVS ARE USED TO CLEAN UP SPILLED MATL, RSLTG WASTE MIX MAY BE REGULATED.

Handling And Storage Precautions: DO NOT TRANSFER TO UNMARKED CONTAINERS. STORE IN CLOSED CONTAINERS AWAY FROM HEAT, SPARKS, OPEN FLAME OR OXIDIZING MATERIALS.

Other Precautions: THIS PRODUCT IS NOT CLASSIFIED AS HAZARDOUS UNDER DOT REGULATIONS. FIRE EXTINGUISHERS SHOULD BE KEPT READILY AVAILABLE. SEE NFPA 30 AND OSHA 1910.106 - FLAMMABLE AND COMBUSTIBLE LIQUIDS.

Fire and Explosion Hazard Information

Flash Point Method: COC

Flash Point Text: 335F,168C

Extinguishing Media: USE DRY CHEMICAL, FOAM OR CARBON DIOXIDE.

Fire Fighting Procedures: NIOSH APPRVD SCBA & FULL PROT EQUIP (FP N). WATER MAY BE INEFTIVE BUT CAN BE USED TO COOL CNTNRS EXPOS TO HEAT/FLAME. CAUTION SHOULD BE EXERCISED WHEN (SUPDAT)

Unusual Fire/Explosion Hazard: DENSE SMOKE MAY BE GENERATED WHILE BURNING. CARBON MONOXIDE, CARBON DIOXIDE AND OTHER OXIDES MAY BE GENERATED AS PRODUCTS OF COMBUSTION.

Control Measures

Respiratory Protection: RESP PROT IS NOT REQD UNDER CNDTNS OF NORM USE. IF VAP/MIST IS GENERATED WHEN MATL HEATED/HANDLED, USE NIOSH APPRVD ORG VAP RESP W/DUST & MIST FILTER. ALL RESPS MUST BE NIOSH CERTIFIED. DO NOT USE COM PRESSED OXYG IN HYDROCARBON ATMOSPHERES.

Ventilation: IF VAP/MIST GENERATED WHEN MATL HEATED/HANDLED, ADEQ VENT I/A/W GOOD ENGINEERING PRACTICE MUST BE PROVIDED TO

Protective Gloves: IMPERVIOUS GLOVES.

Eye Protection: ANSI APPRVD CHEM WORKERS GOGGLES (FP N).

Other Protective Equipment: ANSI APPRVD EYE WASH & DELUGE SHOWER (FP N). FOR PRLNGD/RPTD EXPOS, USE IMPERVIOUS CLTHG (BOOTS, GLOVES, APRONS,

Work Hygienic Practices: CONSUMPTION OF FOOD & BEVERAGES SHOULD BE AVOIDED IN WORK AREAS WHERE HYDROCARBONS ARE PRESENT. ALWAYS WASH

Supplemental Safety and Health: % VOLAT: NIL @ AMBIENT TEMP. FIRE FIGHT PROC: USING WATER/FOAM AS FROTHING MAY OCCUR, ESP IF SPRAYED INTO CNTNRS OF HOT, BURNING LIQ. HLTH HAZ: 10 MG/M3. INGEST: RELATIVELY NON-TOX UNLESS ASPIR OCCURS . ASPIR MAY LEAD TO CHEM PNEUMIT; CHARACT BY PULM EDEMA & HEMORR

=====

& MAY BE FATAL. SIGNS OF LUNG INVOLVEMENT INCL

=====

Physical/Chemical Properties

=====

B.P. Text: >580F,>304C

Vapor Pres: <1

Spec Gravity: APPROX 0.94

Appearance and Odor: CLEAR LIQUID; ODORLESS.

Percent Volatiles by Volume: SUPDAT

=====

Reactivity Data

=====

Stability Indicator: YES

Stability Condition To Avoid: NONE.

Materials To Avoid: MAY REACT WITH STRONG OXIDIZING AGENTS.

Hazardous Decomposition Products: NONE.

Hazardous Polymerization Indicator: NO

Conditions To Avoid Polymerization: NOT RELEVANT

=====

Toxicological Information

=====

Ecological Information

=====

MSDS Transport Information

=====

Regulatory Information

=====

Other Information

=====

HAZCOM Label

=====

Product ID: DRAKEOL 7

Cage: D0735

Assigned IND: Y

Company Name: VAN WATERS & ROGERS SUBSIDIARY OF UNIVAR

Street: 6100 CARILLON POINT

City: KIRKLAND WA

Zipcode: 98033

Health Emergency Phone: 206-889-3712

Label Required IND: Y

Date Of Label Review: 06/18/1998

Status Code: C

Label Date: 06/18/1998

Origination

Chronic Hazard IND: Y

Eye Protection IND: YES

Skin Protection IND: YES

Signal Word: WARNING

Respiratory Protection IND: YES

Health Hazard: Moderate

Contact Hazard: Moderate

Fire Hazard: Slight

Reactivity Hazard: None

Hazard And Precautions: ACUTE: EYES: IRRITATION. INGESTION: ASPIRATION MAY LEAD
TO CHEMICAL PNEUMONITIS CHARACTERIZED BY PULMONARY EDEMA AND HEMORRHAGE AND

MAY BE FATAL. SIGNS OF LUNG INVOLVEMENT INCLUDE INCREASED RESPIRATORY RATE, INCREASED HEART RATE AND BLUISH DISCOLORATION OF SKIN. COUGHING, CHOKING AND GAGGING OFTEN NOTED AT TIME OF ASPIRATION. GI DISCOMFORT MAY DEVELOP FOLLOWED BY VOMITING WITH FURTHER RISK OF ASPIRATION. PRODUCT HAS LAXATIVE PROPERTIES AND MAY RESULT IN ABDOMINAL CRAMPS AND DIARRHEA. CHRONIC: ASPIRATION OR INGESTION MAY LEAD TO LIPID PNEUMONIA OR LIPID GRANULOMA WITH SHORTNESS OF BREATH AND COUGH.

Disclaimer (provided with this information by the compiling agencies): This information is formulated for use by elements of the Department of Defense. The United States of America in no manner whatsoever expressly or implied warrants, states, or intends said information to have any application, use or viability by or to any person or persons outside the Department of Defense nor any person or persons contracting with any instrumentality of the United States of America and disclaims all liability for such use. Any person utilizing this instruction who is not a military or civilian employee of the United States of America should seek competent professional advice to verify and assume responsibility for the suitability of this information to their particular situation regardless of similarity to a corresponding Department of Defense or other government situation.