Product ID:HYDROCHLORIC ACID

MSDS Date:06/05/1989

FSC:6810

NIIN:01-340-5178

MSDS Number: BMQQW === Responsible Party ===

Company Name: VAN WATERS AND ROGERS

Address:2256 JUNCTION AVE

City:SAN JOSE

State:CA ZIP:95131 Country:US

Info Phone Num:206-447-5911 OR 714-864-2310

Emergency Phone Num:408-435-8700 OR 714-864-2310

CAGE:0AN91

=== Contractor Identification ===

Co

mpany Name: CHEMICAL COMMODITIES AGENCY, INC.

Address:27447 PACIFIC STREET

Box:City:HIGHLAND

State:CA

ZIP:92346-2640 Country:US

Phone:909-864-2310

CAGE:60777

Company Name: VAN WATERS AND ROGERS

Address:2256 JUNCTION AVE

City:SAN JOSE

State:CA ZIP:95131 Country:US

Phone:408-435-8700/800-424-9300(CHEMTREC)

CAGE:0AN91

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

Ingred Name: HYDROGEN CHLORIDE (HYDROCHLORIC ACID) (SARA III) \*

CAS:7647-01-0

RTECS #:MW4025000 Fraction by Wt: 27.

9-35% OSHA PEL:C 5 PPM \* ACGIH TLV:C 5 PPM; 9192 \* EPA Rpt Qty:5000 LBS

Ingred Name:WATER

DOT Rpt Qty:5000 LBS

CAS:7732-18-5

RTECS #:ZC0110000 Fraction by Wt: BALANCE

Other REC Limits: NONE SPECIFIED

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

LD50 LC50 Mixture:LD50 (ORAL, RABBIT) 900 MG/KG Routes of Entry: Inhalation:YES Skin:YES Ingestion:YES Reports of Carcinogenicity:NTP:NO IARC:NO OSHA:NO

Health Hazards Acute and Chronic:ACUTE-EXTREMELY CORROSIVE.EYE:MAY

CAUSE INJURY & BLINDNESS.SKIN:WILL SEVERELY BURNS.INHALE:IRRITATES
NOSE,THROAT & MUCOUS MEMBRANES.COUGHING,CHEST PAIN & DIFFICULTY IN
BREATHING MAY OCCUR. HIGH CONCEN TRATION MAY CAUSE DEATH.ORAL:BURNS
TISSUE.CAUSES VOMITING, ABDOMINAL PAIN,NAUSEA &
COLLAPSE.CHRONIC-LUNG & SKIN DISEASES

Effects of Overexposure:EXTREMELY CORROSIVE. MAY CAUSE EYE INJURY & BLINDNESS. WILL SEVERELY BURNS SKIN. INHALATION IRRITATES NOSE, THROAT & MUCOUS MEMBRANES. COUGHING, CHEST PAIN & DIFFIC ULTY IN

BREATHING MAY OCCUR. HIGH CO NCENTRATION MAY CAUSE DEATH. ORALLY BURNS TISSUE. CAUSES VOMITING, ABDOMINAL PAIN, NAUSEA & COLLAPSE.

Medical Cond Aggravated by Exposure:PERSONS WITH PRE-EXISTING SKIN DISORDERS OR EYE PROBLEMS OR IMPAIRED 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:DO NOT INDUCE VOMITI NG.IF CONSCIOUS,DRINK 1-2 GLASSES OF WATER.CALL A PHYSICIAN IMMEDIATELY.

Flash Point:NONE

Extinguishing Media:WATER SPRAY, CO2, FOAM/DRY CHEMICAL. WATER SPRAY MAY BE USED TO KEEP FIRE EXPOSED CONTAINERS COOL & FLUSH SPILLS AWAY.

Fire Fighting Procedures: WEAR FULL PROTECTIVE CLOTHING A

ND NIOSH-APPROVED SELF-CONTAINED BREATHING APPARATUS WITH FULL FACEPIECE OPERATED IN THE POSITIVE PRESSURE MODE. Unusual Fire/Explosion Hazard: EXTINGUISH ALL NEARBY SOURCES OF IGNITION SINCE FLAMMABLE HYDROGEN GAS WILL BE LIBERATED FROM CONTACT WITH SOME METALS. ======== Accidental Release Measures ============ Spill Release Procedures: WEAR PROPER PROTECTIVE EQUIPMENT. VENTILATE AREA. DO NOT RELEASE INTO SOIL, SEWER, STREAM. STOP LEAK IF POSSIBLE, NEU TRALIZE WITH SODA ASH OR LIME. WITH CLEAN SHOVEL, PLACE MATERIAL INTO CLEAN CONTAIN ER FOR DISPOSAL. FLUSH SPILL AREA WITH WATER. Neutralizing Agent:SODA-ASH ============ Handling and Storage =========================== Handling and Storage Precautions: STORAGE-STORE IN COOL, WELL VENTILATED AREA AWAY FROM INCOMPATIBLE MATERIALS. Other Precautions: KEEP CONTAINER TIGHTLY CLOSED. DO NOT USE PRESSURE TO EMPTY CONTAINER.WASH THOROUGHLY AFTER HANDLING.DO NOT GET IN EYES, ON SK IN OR ON CLOTHING. DO NOT BREATHE MISTS OR VAPORS. DO NOT CUT, GRIND, WELD O R DRILL ON OR NEAR THIS CONTAINER. ====== Exposure Controls/Personal Protection ======== Respiratory Protection: WEAR NIOSH-APPROVED SELF-CONTAINED BREATHING APPARATUS OPERATED IN POSITIVE PRESSURE MODE OR SUPPLIED-AIR RESPIRATOR WITH FULL FACEPIECE AND OPERATED IN PRESSURE-DEMAND OR OTHER POSITIVE PRESSURE MODE. Ventilation:LOCAL EXHAUST & MECHANICAL (GENERAL) FUME HOOD VENTILATION. Prot ective Gloves: RUBBER GLOVES Eye Protection: SAFETY GOGGLES/FACE SHIELD Other Protective Equipment: EYE WASH STATION, QUICK DRENCH SHOWER AND IMPERVIOUS CLOTHING

Work Hygienic Practices:OBSERVE GOOD PERSONAL HYGIENE PRACTICES AND RECOMMENDED PROCEDURES. DO NOT WEAR CONTAMINATED CLOTHING OR FOOTWEAR.

Supplemental Safety and Health

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

HCC:C1

Boiling Pt:B.P. Text:150F,66C

Vapor Pres:30 @ 77F Spec Gravity:1.16 Solubility in Water:COMPLETE
Appearance and Odor:COLORLESS TO PALE YELLOW LIQUID WITH A PUNGENT,
IRRITATING ODOR.

Percent Volatiles by Volume:100

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

Stability Indicator/Materials to Avoid:YES
ALKALIES, OXIDIZERS, REDUCING AGENTS, CYANIDES, SULFIDES, COMBUSTIBLE
MATERIALS, FORMALDEHYDE, AMINES, METAL OXIDES
Stability Condition to Avoid:EXCESSIVE HEAT, FLAME
Hazardous Decomposition Products:HYDROGEN CHLORIDE FUMES.

Trazardodo Dodomposition i roddoto. Tr Divocery on Ecivide i omeo

================

Disposal Considerations =========

Waste Disposal Methods:DISPOSE OF IN ACCORDANCE WITH ALL LOCAL, STATE AND FEDERAL REGULATIONS. EMPTY CONTAINERS CAN HAVE RESIDUES, GASES AND MISTS AND ARE SUBJECT TO PROPER WASTE DISPOSAL, AS ABOVE.

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 t his information to be accurate and disclaims all liability for its use. Any person utilizing this document should seek competent professional advice to verify and assume responsibility for the suitability of this information to their particular situation.