

MATERIAL SAFETY DATA SHEET

HADDON EQUIPMENT & SUPPLIES
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Valid: Nov. 2011 - Nov. 2013

PRODUCT NAME: LIQUID RUST REMOVING SOUR **CODE: L539**
OTHER NAME: LIQ RUST REMOV SOUR
DISTRIBUTED BY:

WHMIS CLASSIFICATION: E; D1A
TDG CLASSIFICATION: CORROSIVE LIQUID, TOXIC, N.O.S.(HYDROFLUORIC ACID, HYDROGENDIFLUORIDE); Class 8 (6.1); UN 2922; PG II

HAZARDOUS INGREDIENT	%WT/WT	CAS NO.	TOXICITY DATA (LD₅₀ & LC₅₀)
Hydrofluoric Acid (70%)	3-7	7664-39-3	ACG1H TLV - 3 ppm LC ₅₀ Inhalation (rat) 1276 ppm/1 hr LC _{LO} Human = 50 ppm/30 min
Ammonium Bifluoride	7-13	1341-49-7	LD Human for Fluoride 2.5-5.9 gm

PHYSICAL DATA FOR PRODUCT

Physical State: Liquid Sp. Gravity: 1.0577 pH: Strong Acid
Boiling Point: Not Avail. Vapour Pressure: Not Avail.
Vapour Density: Not Avail. Evaporation Rate: Not Avail.
Freezing Point: Not Avail.
Solubility in Water: 100%
Appearance & Odour: Clear, liquid with pungent odour.

FIRE AND EXPLOSION DATA FOR PRODUCT

Flash Point (Test Method): N/A
Flammable Limits in Air, % by vol. Non-flammable Lower: N/A Upper: N/A
Fire Extinguishing Substances: () Water Fog () Foam () CO₂ () Dry Chem
(X) Other: Use extinguishing media appropriate for surrounding fire. Do not use direct water stream.

Hazardous Combustion Products: Carbon monoxide, carbon dioxide.
Special Firefighting Procedures: Use full protective clothing.

REACTIVITY DATA FOR PRODUCT

Incompatibility: () Water (X) Oxidizing Material () Acid (X) Base (X) Other: Contact with reactive metals.
Hazardous Decomposition Products: Hydrogen gas will be liberated from contact with some metals. May liberate Hydrogen Fluoride.
Chemical Stability: Stable. Avoid excessive heat and contamination.

*N/A - Not applicable.

Product Name: **LIQUID RUST REMOVING SOUR(LIQ RUST REMOV SOUR)**

HEALTH HAZARD INFORMATION FOR PRODUCT

EMERGENCY and FIRST AID PROCEDURES

****IN ALL CASES REFER TO HYDROFLUORIC ACID TREATMENT PROCEDURES****

Inhalation: Remove from exposure. Get immediate medical attention.

Ingestion: Do not induce vomiting. Give large quantities of water or milk. Get immediate medical attention. Do not give anything by mouth to an unconscious or convulsing person.

Eyes: Immediately flush eyes with running water for at least 30 minutes lifting the upper and lower eyelids occasionally. Get immediate medical attention.

Skin: Wash off with cold water for at least 15 minutes while removing contaminated clothing and shoes.

***Always get immediate medical attention no matter how minor burns may appear.**

EFFECTS OF OVEREXPOSURE (Acute and Chronic)

Inhalation: Severe irritation of respiratory tract, pulmonary inflammation, congestion. May also cause coughing, chest pain and difficulty in breathing. In severe cases, bronchitis, pulmonary edema and chemical pneumonitis may occur.

Ingestion: Swallowing will burn tissues causing severe abdominal pain, nausea, vomiting and collapse. Swallowing large quantities can cause death.

Eyes: Vapours will be irritating to eyes. Prolonged contact of liquid or mist may cause permanent eye damage which may be followed by blindness.

Skin: Vapours will irritate the skin and liquid and mist will burn. Prolonged liquid contact will burn or destroy surrounding tissue.

PREVENTIVE MEASURES

Steps to be taken upon release or spillage (including neutralizing):

Dyke and salvage or neutralize. Carefully neutralize with soda ash or lime.

Waste disposal method: If material cannot be salvaged, it should be neutralized and discharged into a treatment system in accordance with all local, state and federal regulations.

Handling and Storage Requirements:

Store in cool, dry, well ventilated area in closed container away from heat sources, metals and oxidizers.

Ventilation Requirements (Local or General): Use in well ventilated area.

Respiratory Protection: In severe exposure, use self-contained breathing apparatus.

Eye Protection: Chemical Workers goggles or face shield.

Other Protection: Rubber gloves and coveralls should be worn.

Prepared by: Technical Services Department, Ostrem Chemical Co. Ltd., Ph (780) 440-1911