

# Enviro-Clean

*Combining the high cleaning performance of acids with the safety of comparable household cleaners*

## **New Revolutionary Breakthrough Formula!**

**Enviro-Clean** is a safer, multifunctional cleaning agent that provides an unprecedented level of safety in the workplace for both operators and surfaces.

**Enviro-Clean** is a powerful scale, calcium, lime and rust remover suitable for use on most materials and reduces the health and safety concerns associated with most other mineral acid based products.

**Enviro-Clean** safely cleans: ceramic, stainless steel, aluminum (*Note: If using Enviro-Clean on aluminum, rinse within 10-15 minutes*), copper, brass. Removes burn marks, oxidized metals, salt stains, calcium, lime, and rust deposits.

**Enviro-Clean** is high performance: cleans with the power of an acid, ideal choice to replace hydrochloric and phosphoric acids in most applications.

**Enviro-Clean** is cost effective: easy to use, fast and labor-saving, special clinging action allows for longer dwell time.

**Enviro-Clean** is environmentally friendly, non fuming, rapidly biodegradable (100%) and non ozone depleting, reduces environmental impact, and helps create a socially-responsible company image.

**USAGE: Enviro-Clean** can be used full strength or diluted 4:1 with water.

## ***Gets the job done safer!***

**MC Machinery Systems, Inc.**

1500 Michael Drive • Wood Dale, IL 60191  
Phone: 1.888.297.9895 • Fax: 1.630.616.2954

**1 U.S.  
Gallon**

# Enviro-Clean

## Material Safety Data Sheet

**Manufactured for:** MC Machinery Systems, Inc., 1500 Michael Drive, Wood Dale, IL 60191, Phone: 1.888.297.9895, Fax: 1.630.616.2954, E-mail: CPG@MCMachinery.com by Acretech LLC., 79 Manson Dr., Chesterfield, MO 63017. Chemical Emergency number: Infotrac 800.535.5053.

**Section I – Identification:** Trade Name – Enviro-Clean; Chemical Family – Concentrated Calcium, Rust and Lime Remover; Formula – Trade Secret; DOT Shipping Info – Not Regulated; CASNo. – Not Applicable (mixture); Hazard Rating – Health 1 (slight), Flammability 0 (none), Reactivity 1 (slight); Specific – B.

**Section II – Hazardous Ingredients:** Material – Organic Acid Salt; Percentage by Weight – 20–30%; CAS No. – 506-89-8; Exposure Limits – n/a; Toxicity (mg/kg) – LD<sub>50</sub>, Oral – Rat: 1121 mg/kg (as per OSHA Hazard Communication Standard, CFR 29 1910.1200 and Canadian WHMIS Regulations); Carcinogenicity Status – NTP-No, OSHA-No.

**Section III – Physical Data:** Appearance – Clear Liquid; Percent Solids – 20–30%; Boiling Point – 100°C / 212°F; Solubility in Water – 100%; Freezing Point – n/a; Specific Gravity – 1.09; Odor – Mild; Vapor Density – n/a; pH – <1.0; Vapor Pressure – n/a; Viscosity – n/a.

**Section IV – Fire and Explosion Data:** Flash Point – Does Not Ignite; Auto Ignition Temperature – n/a; Flammability Limits in Air – n/a; Extinguishing Media – Water Spray, Dry Chemical (sodium bicarbonate) or CO<sub>2</sub>; Special Fire Fighting Procedures – None; Unusual Fire Fighting & Explosion Hazard – At temperatures above 60°C/140°F acid action on metals may release hydrogen, a highly flammable and explosive gas; Special Fire Fighting Instructions – Evacuate personnel to a safe area. Keep containers cool with water spray. Avoid breathing decomposition products. Wear a self-contained breathing apparatus and full body protection.

**Section V – Toxicological Properties:** Effects of Acute Exposure – INHALATION – Not a likely route of exposure due to physical properties. Product has low vapor pressure at room temperature and is not expected to present a significant inhalation hazard under ambient conditions. Product can be irritating to the respiratory tract if inhaled as a mist or if the material is vaporized. SKIN – Acute exposure is irritating, non-corrosive to skin (as defined and tested in accordance with the U.S. OSHA's Hazard Communication Standard, DOT Hazardous Material Regulations, Classified and as a mild skin irritant as per the 1992 OECD Guidelines for Testing of Chemicals, No. 404 "Acute Dermal Irritation/Corrosion.") EYE – Acute eye irritation/corrosion test: This product was found to be corrosive to the eyes when tested using the Modified Draize Method. (OECD Guidelines for Testing of Chemicals, Sect. 4-5, 1992.) INGESTION – This product may be harmful or fatal if ingested. CARCINOGENICITY – Not listed on NTP, IARC, ACHIH. MUTAGENICITY – This product was found not to be mutagenic when tested by the Ames Assay. (OECD Guidelines for Testing of Chemicals, Sect. 471)

**Section VI – Reactivity Data:** Stability – Stable up to 110°C/230°F; Conditions to Avoid – Heating above 110°C results in an exothermic

decomposition with rapid release of CO<sub>2</sub> gas. Incompatible Materials – Avoid contact with oxidizers. This material may be extremely hazardous in contact with chlorates or nitrates. This material is acidic. Contact with hypochlorites (e.g., chlorine bleach, sulfides or cyanides) will liberate toxic gases. Contact with alkaline materials (e.g., aqua ammonia) will generate heat. Hazardous Decomposition Products – Thermal decomposition may yield oxides of carbon, nitrogen and chlorine. Hydrogen gas may be released upon contact with certain metals. Hazardous Polymerization – will not occur.

**Section VII – Preventative Measures:** Gloves – Use Impervious (rubber, nitrile) gloves. Eye Protection – Use chemical goggles or full face shield. Other protective equipment – Eye bath, safety shower, full protective clothing. Respiratory – Avoid breathing vapor and/or mist. Engineering Controls – If current ventilation practices are not adequate for minimizing exposures, additional ventilation or exhaust systems may be required. Leak and Spill Procedures – Before attempting clean-up, refer to hazard data given above. Small spills may be absorbed with non-reactive absorbent (sand) and placed in suitable covered, labeled containers. Prevent large spills from entering sewers or waterways. Contact emergency services and supplier for advice. Waste Disposal – Review federal, provincial, or state and local government requirements prior to disposal. Storage Requirements – KEEP OUT OF REACH OF CHILDREN. Keep container tightly closed. Store in fiberglass, polyethylene or polypropylene containers. Do not store in metal containers. Do not store in metal containers, especially aluminum. Storage in certain metal containers above 60°C/140°F may result in hydrogen gas evolution. Do not store at temperatures above 40°C/120°F.

**Section VIII – First Aid:** Inhalation – Move to fresh air. If not breathing, give artificial respiration. If breathing is difficult, give oxygen and seek medical attention. Skin – Immediately flush with mild soap and water for 15 minutes. Seek medical attention if irritation develops. Remove contaminated clothing and launder before reuse. Eye – Immediately flush with water for 15 minutes. Seek medical attention. Ingestion – Do NOT induce vomiting. If conscious, give 3–4 glasses of water to dilute and get immediate medical care.

**Section IX – Regulatory Information:** Shipping Information – DOT - Not regulated when shipped by ground or rail. Air or Water Transport: Regulated material corrosive liquid, N.O.S. Contains (Urea Monohydrochloride). Hazardous: Class 8, I.D. # UN1760. Pack Group: III. Shipping Containers – Polyethylene Drums 54.5 gallons – 570 lbs., Polyethylene Bottles 4 x 1 gallons – 40 lbs.

Disclaimer: As the handling and use of products under user's conditions are beyond our control, no warranty, expressed or implied, including, but not limited to merchantability or fitness for a particular use, is made concerning this product. The user assumes all risk of use or handling whether or not in accordance with any directions or suggestions of the supplier. Seller shall not be liable to purchaser or any other person for loss or damages directly or indirectly arising from the use of our products, from breach of any warranty or from any other cause, the exclusive remedy against the seller being to require replacement or repair of defective goods.