



MATERIAL SAFETY DATA SHEET

Well Klean Pre-Blend

Section 01 - Chemical And Product And Company Information

Product Identifier Well Klean Pre-Blend

Product Use Used for cleaning potable water systems of deposits.

Supplier Name ClearTech Industries Inc.
2302 Hanselman Avenue
Saskatoon, SK. Canada
S7L 5Z3

Prepared By ClearTech Industries Inc. Technical Department
Phone: (306)664-2522

Preparation Date May 25, 2005

24-Hour Emergency Phone 306-664-2522



Section 02 - Composition / Information on Ingredients

Hazardous Ingredients.....	Hydrochloric Acid	27.50%
	Inert Ingredients	65.00%
	Proprietary Composition	7.50%
	<i>(The composition of this mixture is proprietary information. In the event of a medical emergency, composition information will be provided to a physician or nurse.)</i>	

CAS Number.....Hydrochloric Acid 7647-10-0

Synonym (s).....None



Section 03 - Hazard Identification

- Inhalation**..... Vapour or mist can cause irritation to nose, throat, and upper respiratory tract. Symptoms include: coughing, choking, and bleeding of the nose and gums. Severe exposure can result in pulmonary edema and corrosion of tissues in the nose and throat.

- Skin Contact / Absorption**..... Contact may produce severe irritation or corrosive skin damage, depending upon length of contact and amount of acid. Effects range from dermatitis, photo sensitization, redness, swelling, pain, permanent scarring, to death.

- Eye Contact**..... Low concentrations of vapour or mist can be irritating, causing redness. Concentrated vapour, mist or splashed liquid can cause severe irritation, burns and permanent blindness.

- Ingestion**..... Causes severe burns of the mouth, esophagus, and stomach, with consequent pain, nausea, vomiting, diarrhea, circulatory collapse, and possibly death.

- Exposure Limits**..... ACGIH TLV-C= 5ppm (hydrochloric acid)
 Proprietary Ingredients: PEL= 3ppm
 TLV= 3ppm

Section 04 - First Aid Measures

- Inhalation**..... Remove victim to fresh air. Give artificial respiration only if breathing has stopped. If breathing is difficult, give oxygen. Seek immediate medical attention.

- Skin Contact / Absorption**..... Remove contaminated clothing. Wash affected area with soap and water. Seek medical attention if irritation occurs or persists.

- Eye Contact**..... Flush immediately with water for at least 20 minutes. Forcibly hold eyelids apart to ensure complete irrigation of eye tissue. Seek immediate medical attention

- Ingestion**..... Do not induce vomiting. If vomiting occurs, lean victim forward to prevent breathing in vomitus. Rinse mouth out with water. If the victim can swallow, give 1 cup of water or milk to dilute. If vomiting occurs, rinse the mouth out and give another cup of water. Do not give anything by mouth to an unconscious or convulsing person. Seek immediate medical attention.

- Additional Information**..... Not available



Section 05 - Fire Fighting

- Conditions of Flammability**..... Non-flammable
- Means of Extinction**..... Product does not burn. Where fire is involved, use any fire fighting agent appropriate for surrounding material; use water spray to cool fire-exposed surfaces.
- Flash Point**..... > 93°C
- Auto-ignition Temperature**..... Not available
- Upper Flammable Limit** Not available
- Lower Flammable Limit**..... Not available
- Hazardous Combustible Products**... Oxides of carbon, nitrogen and sulphur may form.
- Special Fire Fighting Procedures**..... Wear NIOSH-approved self-contained breathing apparatus and protective clothing.
- Explosion Hazards**..... Normally none, but when in contact with metals explosive hydrogen gas may be evolved.

Section 06 - Accidental Release Measures

- Leak / Spill**..... Wear appropriate personal protective equipment. Ventilate area. Only enter area with PPE. Stop or reduce leak if safe to do so. Prevent material from entering sewers.
- Deactivating Materials**..... Soda ash, lime, limestone

Section 07 - Handling and Storage

- Handling Procedures**..... Only persons wearing PPE should be allowed to enter leak areas. Ventilate area. Vapours from spills can be knocked down with water fog. Small spills can be neutralized with soda ash or lime. (Releases carbon dioxide, be careful). Dilute large spills and recover. Never add water to strong acids as exothermic reaction can occur resulting in boiling and/or spattering. Always add acid slowly to water while mixing.



Storage Requirements..... Store in a cool, dry, well-ventilated place. Keep container tightly closed, and away from incompatible materials.

Section 08 - Personal Protection and Exposure Controls

Protective Equipment

Eyes..... Chemical goggles, full-face shield, or a full-face respirator is to be worn at all times when product is handled. Contact lenses should not be worn; they may contribute to severe eye injury.

Respiratory..... At concentrations up to 50ppm, chemical charge respirator or air-purifying respirator is recommended. Above this level, a self-contained breathing apparatus is required.

Gloves..... Impervious gloves of chemically resistant material (rubber or PVC) should be worn at all times. Wash contaminated clothing with soap and water, dry thoroughly before reuse.

Clothing..... Body suits, aprons, and/or coveralls of chemical resistant material should be worn at all times. Wash contaminated clothing with soap and water, dry thoroughly before reuse.

Footwear..... Impervious boots of chemically resistant material should be worn at all times

Engineering Controls

Ventilation Requirements..... Mechanical ventilation (dilution or local exhaust), process or personnel enclosure, and control of process conditions. Supply sufficient replacement air to make up for air removed by exhaust systems.

Other..... Emergency shower and eyewash should be in close proximity.

Section 09 - Physical and Chemical Properties

Physical State..... Liquid

Odor and Appearance..... Pungent odor, light amber liquid

Odor Threshold..... Not available

Specific Gravity (Water=1)..... 1.16



Vapor Pressure (mm Hg, 20C)..... 25mm Hg at 20°C
Vapor Density (Air=1)..... > 1
Evaporation Rate..... Not available
Boiling Point..... ~81.1°C
Freeze/Melting Point..... ~ -51°C
pH..... < 1
Water/Oil Distribution Coefficient.... Not available
Bulk Density..... Not available
% Volatiles by Volume..... 81%
Solubility in Water..... Completely miscible
Molecular Formula..... Not available
Molecular Weight..... Not available

Section 10 - Stability and Reactivity

Stability..... Stable
Incompatibility..... Incompatible with strong bases, metals, phosphines, acetylides, borides, carbides, silicides, vinyl acetate, formaldehyde, hypochlorites, cyanides, and sulphides.
Hazardous Products of Decomposition.. Acid will react with most metals to release hydrogen gas.
Polymerization..... Will not occur

Section 11 - Toxicological Information

Irritancy..... Strong irritant, very corrosive to eyes, mucous membranes, respiratory passages and skin.
Sensitization..... Not available
Chronic/Acute Effects..... Not available



Synergistic Materials..... Not available

Animal Toxicity Data..... LC₅₀(inhalation,mouse, 4 hrs)= 757ppm (hydrochloric acid)
LD₅₀(oral,rabbit)= 900mg/kg (hydrochloric acid)

Carcinogenicity..... Not considered to be carcinogenic by IARC and ACGIH

Reproductive Toxicity..... Not available

Teratogenicity..... Not available

Mutagenicity..... Not available

Section 12 - Ecological Information

Fish Toxicity..... Not available

Biodegradability..... Not available

Environmental Effects..... Not available

Section 13 - Disposal Consideration

Waste Disposal.....Dispose in accordance with all federal, provincial, and/or local regulations including the Canadian Environmental Protection Act.

Section 14 - Transportation Information

TDG Classification

Class..... 8

Group..... II

PIN Number..... UN 1789

Other..... Secure containers (full and/or empty) with suitable hold down devises during shipment.

Section 15 - Regulatory Information

WHMIS Classification.....E



NOTE: THE PRODUCT LISTED ON THIS MSDS HAS BEEN CLASSIFIED IN ACCORDANCE WITH THE HAZARD CRITERIA OF THE CANADIAN CONTROLLED PRODUCTS REGULATIONS. THIS MSDS CONTAINS ALL INFORMATION REQUIRED BY THOSE REGULATIONS

Section 16 - Other Information

Note: The responsibility to provide a safe workplace remains with the user. The user should consider the health hazards and safety information contained herein as a guide and should take those precautions required in an individual operation to instruct employees and develop work practice procedures for a safe work environment. The information contained herein is, to the best of our knowledge and belief, accurate. However, since the conditions of handling and use are beyond our control, we make no guarantee of results, and assume no liability for damages incurred by the use of this material. It is the responsibility of the user to comply with all applicable laws and regulations.

ClearTech Industries Inc. - Locations

Corporate Head Office: 2302 Hanselman Avenue, Saskatoon, SK, S7L 5Z3

Phone: 306-664-2522

Fax: 306-665-6216

www.ClearTech.ca

Location	Address	Postal Code	Phone Number	Fax Number
Richmond BC	12431 Horseshoe way	V7A 4X6	604-272-4000	604-272-4596
Calgary AB	5516E - 40 th St. S.E.	T2C 2A1	403-279-1096	403-236-0989
Edmonton AB	11750 - 180 th Street	T5S 1N7	780-452-6000	780-452-4600
Saskatoon SK	2302 Hanselman Avenue	S7L 5Z3	306-933-0177	306-933-3282
Regina SK	555 Henderson Drive	S42 5X2	306-721-7737	306-721-8611
Winnipeg MB	340 Saulteaux Crescent	R3J 3T2	204-987-9777	204-987-9770
Mississauga ON	7480 Bath Road	L4T 1L2	905-612-0566	905-612-0575

24 Hour Emergency Number - All Locations - 306-664-2522