



W.A. Cleary Chemical

C O R P O R A T I O N

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# WATER ACIDIFIER AND CHELATION AGENT

## MATERIAL SAFETY DATA SHEET

### PRODUCT IDENTIFICATION

PRODUCT NAME: Water Acidifier and  
Chelation Agent

W.A. CLEARY PRODUCT CODE: 4782

CHEMICAL NAME: 2-Hydroxy-1,2,3-propanetricarboxylic acid  
SYNONYMS: Citric acid  
E.P.A. REG. NO.: Not regulated

### INGREDIENTS

INGREDIENTS (CAS #)	PERCENT	EXPOSURE LIMITS
2-Hydroxy-1,2,3-propanetricarboxylic acid (77-92-9)	12.5%	N/E

### PHYSICAL DATA

Boiling Point: > 212° F

Melting Point: N/A

Freezing Point: 0° C (32° F)

Specific Gravity (25 C): 1.046

Vapor Pressure (@ 20 C mm Hg): N/A

% Volatile: 87

Evaporation Rate: N/A

Solubility in Water: 100%

Appearance and Odor: Colorless to pale yellow, nil odor  
pH: 2

### FIRE & EXPLOSION DATA

Flash Point (Method): Not flammable

Flammable Limits (vol % in air): LEL N/A, UEL N/A

Autoignition Temperature: None

Extinguishing Media: N/A

Special Firefighting Procedures: N/A

Unusual Fire and Explosion Hazards: None

### REACTIVITY HAZARD DATA

Stability: Stable at normal conditions

Conditions to Avoid: N/A

Incompatibility: Oxidizing agents, strong bases

Hazardous Polymerization: Will not occur

Hazardous Decomposition Products: Oxides of carbon

### HEALTH HAZARD DATA

Inhalation: N/A

Eye Contact: May cause mild irritation.

Skin Contact: Prolonged exposure may cause temporary irritation.

Chronic Effects of Overexposure: There is no mention in the literature of systemic poisoning caused by 2-hydroxy-1,2,3-propanetricarboxylic acid. It can irritate the eyes and skin, but produces no permanent damage if promptly treated.

Other Toxic Effects: N/A

**TOXICITY DATA:**

ORAL (acute): LD<sub>50</sub> (rat) 11,700 mg/kg  
DERMAL (acute): LD<sub>50</sub> (mouse) 5040 mg/kg  
INHALATION (acute): N/E  
CHRONIC: None anticipated  
SUBCHRONIC: N/A

**EMERGENCY AND FIRST AID PROCEDURES**

**Ingestion:** Seek medical attention due to low pH of product.  
**Skin Contact:** Wash well with mild soap and water.  
**Eye Contact:** Flush immediately with plenty of water for at least 15 minutes. If irritation persists, seek medical attention.  
**Inhalation:** Non-toxic in normal circumstances.

**SPECIAL PROTECTION INFORMATION**

**Protective Clothing:** Not usually required.  
**Eye Protection:** Chemical goggles or safety glasses with side shields.  
**Ventilation:** For use outdoors.  
**Respiratory Protection:** Not normally required.  
**Other:** None

**SPILL OR LEAK PROCEDURES**

**Steps to be Taken in Case Material is Released or Spilled:** Absorb onto sand clay, vermiculite or "Kitty Litter," sweep up and dispose.  
**Waste Disposal Methods:** If product or spray solution cannot be used according to label, dispose of in accordance with all Federal, state and local laws.

**SPECIAL PRECAUTIONS**

**Precautions to be Taken in Handling and Storing:** Do not contaminate water, food or feed be storage or disposal.  
KEEP FROM FREEZING.

**ADDITIONAL REGULATORY INFORMATION**

**DOT Shipping Name:** Adjuvants, sprayable product  
**DOT Hazard Classification:** None  
**DOT Label Requirements:** None required  
**UN Identification Number:** N/A  
**Hazardous Substance:** None  
**Reportable Quantity:** N/A  
**OSHA Hazard Classification:** N/A  
**EPA SARA Title III Data:** ACUTE Low      CHRONIC Low      FIRE None      REACTIVE Low

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