



Safety Data Sheet

Section 1: Identification

Product Name: Citric Acid (12.5% Solution)

Product Use: Mild chelating agent for removal of smear layer

Manufacturer: Inter-Med, Inc. / Vista Dental Products

Address: 2200 South St. Suite A, Racine, WI 53404

Phone: (877) 418-4782 **Fax:** (262) 636-9760

24 HR. Emergency Telephone Number CHEMTREC (North America) : 800-424-9300

24 HR. Emergency Telephone Number CHEMTREC (International) : +1 (703) 527-3887

Section 2: Hazard(s) Identification

2.1. GHS Classification:

Health	Environmental	Physical
Harmful if swallowed – Category 4 – H302 May be harmful in contact with skin – Category 5 – H313 Causes serious eye irritation – Category 2A – H319 Harmful if inhaled – Category 4 – H332	Not Applicable	Not Applicable

2.2. GHS Label:

OSHA HCS 2012



WARNING



<i>Hazard Statements</i>	<i>Precautionary Statements</i>
H302: Harmful if swallowed. H313: May be harmful in contact with skin. H319: Causes serious eye irritation. H332: Harmful if inhaled.	P261: Avoid breathing dust/fume/gas/mist/vapours/spray. P264: Wash skin thoroughly after handling. P270: Do not eat, drink, or smoke when using this product. P271: Use only outdoors or in a well-ventilated area. P280: Wear protective gloves/eye protection/face protection.

Refer to Section 15.2 for full text of EU Classifications and R/S Phrases.

Section 3: Composition/Information on Ingredients

Chemical Components	CAS #	EINECS	Weight %
Citric acid monohydrate	5949-29-1	unlisted	12.5%

Section 4: First-Aid Measures

4.1. Description of first aid measures

Eye Contact: Flush eyes with plenty of water for at least 15 minutes, occasionally lifting the upper and lower eyelids. Get medical aid, if irritation persists.

Skin Contact: Flush skin with plenty of soap and water for at least 15 minutes while removing contaminated clothing and shoes. Get medical aid if irritation develops or persists.

Inhalation: Remove to fresh air. If not breathing, give artificial respiration or give oxygen by trained personnel. Seek immediate medical attention.

Ingestion: Do not induce vomiting unless medical advice is given from a professional. Never give anything by mouth to an unconscious person. Get medical attention immediately.

4.2. Most important symptoms and effects, both acute and delayed

Symptoms/Injuries: May cause serious eye irritation and possibly injury. Causes skin and respiratory tract irritation. If



ingested, symptoms may include: vomiting, diarrhea, and nausea. Excessive intake of citric acid may cause erosion of teeth.

4.3. Indication of immediate medical attention and special treatment needed

Consult a physician or contact Poison Control Center if chemical solution is ingested in large amounts. Physicians are required to treat victim symptomatically.

Section 5: Fire-Fighting Measures

5.1. Suitable Extinguishing Media:

Use dry chemical, foam, water spray, or carbon dioxide to extinguish fire.

5.2. Fire Fighting Procedures:

Do not flush waste down sewers or other drainage systems. Exposed firefighters must wear NIOSH-approved positive pressure, self-contained breathing apparatus with full-face mask and full protective clothing. During the fire, irritating and highly toxic gases may be generated by thermal decomposition or combustion. This material in sufficient quantity and reduced particle size is capable of creating a dust explosion.

5.3. Unusual Fire and Explosion Hazards:

Material is not considered flammable but residue may burn in presence of strong ignition source after water has evaporated.

5.4. Combustion Products:

Carbon oxides (CO, CO₂).

Section 6: Accidental Release Measures

6.1. Personal Precautions, Protective Equipment, and Emergency Procedures

Wear proper personal protective equipment as indicated in Section 8. Follow instructions listed in Section 6.3 to follow clean up procedures.

6.2. Environmental Precautions

Follow all government regulations for waste disposal. Prevent release to the environment if possible. Do not flush waste



into sewer or drains that may lead to waterways.

6.3. Methods and Materials for Containment and Cleaning Up

Small Spills: Wipe up small amounts with cloth, soap, and water.

Large Spills: Absorb with inert, damp non-combustible material then after removal, flush contaminated area thoroughly with water.

Section 7: Handling and Storage

7.1. Handling

For intraoral use only by trained and experienced dental professionals. Follow good hygiene practices. Do not smoke, eat or drink while using. Use suitable protective equipment when handling. Wash thoroughly after handling and avoid any chemical contact with eyes, skin, and clothing. Keep syringes tightly closed to avoid inhalation or accidental ingestion. Use with adequate ventilation.

7.2. Storage

Store syringes at room temperature in a cool, dry, well-ventilated area away from incompatible substances. Store protected from moisture. Shelf life is thirty months from date of manufacture, provided that it is stored properly.

Section 8: Exposure Controls/Personal Protection

8.1. Exposure Limits / Engineering Controls

Chemical Components	ACGIH	NIOSH	OSHA – Final PELs
Citric acid monohydrate	None listed	None listed	None listed

Engineering Controls: Use adequate ventilation to keep airborne concentrations low. Emergency shower and eyewash should be nearby while handling the product.

8.2. Personal Protective Equipment (PPE) Information

Eye Protection: Wear appropriate protective eyeglasses or chemical safety goggles as described by OSHA's eye and face protection regulations in 29 CFR 1910.133 or European Standard EN166.

Skin Protection: Wear appropriate protective gloves and lab coat to prevent skin exposure. Use good personal hygiene and wash hands after use.



Clothing Protection: Wear appropriate protective clothing to prevent skin exposure.

Respiratory Protection: Follow the OSHA respirator regulations found in 29 CFR 1910.134 or European Standard EN 149. Always use a NIOSH or European Standard EN 149 approved respirator when necessary.

Section 9: Physical and Chemical Properties

9.1. Appearance / Color

Physical State: Liquid

Appearance: Orange

Odor: Odorless

Odor Threshold: Not applicable

9.2. Important health, safety and environmental information

Flashpoint: Not applicable

Autoignition Temperature: 1,010 °C (1,8500 °F)

Boiling Point: Not determined

Melting Point: Not determined

Freezing Point: Not determined

Vapor Pressure: Not determined

Relative Density: Not determined

Vapor Density (Air=1): Not determined

Solubility in Water: Soluble

Decomposition Temperature: Not determined

Pour Point: Not applicable

Lower Flammability Limit: Not available

Upper Flammability Limit: Not available

Specific Gravity: Not determined

Evaporation Rate (Water=1): Not available

Viscosity: Not determined

Octanol/Water Partition Coefficient: Not determined

pH: 2.2

Molecular Weight: 210.15 g/mol

Section 10: Stability and Reactivity

Chemical Stability: Stable under normal temperatures and pressures.



Hazardous Polymerization: Will not occur.

Hazardous Decomposition Products: Irritating and toxic fumes of carbon dioxide, and carbon monoxide.

Incompatible Materials: Strong oxidizing agents, strong caustics, strong reducing agents, strong bases, metal nitrates, and metals.

Conditions to Avoid: Dust generation, moisture, ignition sources, and incompatibles.

Section 11: Toxicological Information

11.1. Signs and Symptoms of Overexposure: Eye and skin irritation on contact.

Eye Contact: Mildly irritating to eyes.

Skin Contact: Substance does not generally irritate, it only is mildly irritating to the skin.

Inhalation: Move affected person to fresh air. If recovery not rapid, seek medical attention.

Ingestion: Do NOT induce vomiting. In case of spontaneous vomiting, vomit freely because of the danger of suffocation. Seek medical attention immediately.

11.2. Additional Toxicity Information

Target Organ(s): None.

Chronic Effects: No information found.

Acute Toxicity:

Acute Toxicity Values

RTECS#:

CAS# 5949-29-1: GE7810000

CAS# 77-92-9: GE7350000

LD50/LC50:

Not available.

CAS# 77-92-9:

Draize test, rabbit, eye: 750 ug/24H Severe;

Draize test, rabbit, skin: 500 mg/24H Mild;

Oral, mouse: LD50 = 5040 mg/kg;



Oral, rat: LD50 = 3 gm/kg;.

Carcinogenicity:

CAS# 5949-29-1: Not listed by ACGIH, IARC, NTP, or CA Prop 65.

CAS# 77-92-9: Not listed by ACGIH, IARC, NTP, or CA Prop 65.

Epidemiology: No information available.

Teratogenicity: No information available.

Reproductive Effects: No information available.

Mutagenicity: No information available.

Neurotoxicity: No information available.

Section 12: Ecological Information

Not established.

Section 13: Disposal Considerations

Chemical waste generators must determine whether a discarded chemical is classified as a hazardous waste. US EPA guidelines for the classification determination are listed in 40 CFR Parts 261.3. Additionally, waste generators must consult state and local hazardous waste regulations to ensure complete and accurate classification.

To minimize exposure, refer to section 8 (exposure controls/personal protection).

Section 14: Transport Information

14.1. U.S. Department of Transportation (DOT) (N/A = Not applicable)

Proper Shipping Name: N/A

Identification Number: N/A

Hazard Class: N/A

Packing Group: N/A

U.S. DPT Labeling Requirements: N/A

IATA Class: N/A

IATA Packing Group: N/A

Not classified

14.2. Other Transportation Information

By SEA (IMDG): Not classified

By GROUND – Canada (TDG): Not classified



By AIR (IATA): Not classified

Section 15: Regulatory Information

15.1. U.S. Federal Regulations

TSCA

CAS# 5949-29-1 is not on the TSCA Inventory because it is a hydrate. It is considered to be listed if the CAS number for the anhydrous form is on the inventory (40CFR720.3(u)(2)).

CAS# 77-92-9 is listed on the TSCA inventory.

Health & Safety Reporting List

None of the chemicals are on the Health & Safety Reporting List.

Chemical Test Rules

None of the chemicals in this product are under a Chemical Test Rule.

Section 12b

None of the chemicals are listed under TSCA Section 12b.

TSCA Significant New Use Rule

None of the chemicals in this material have a SNUR under TSCA.

CERCLA Hazardous Substances and corresponding RQs

None of the chemicals in this material have an RQ.

SARA Section 302 Extremely Hazardous Substances

None of the chemicals in this product have a TPQ.

SARA Codes

CAS # 5949-29-1: immediate.

CAS # 77-92-9: immediate.

Section 313

No chemicals are reportable under Section 313.

Clean Air Act:

This material does not contain any hazardous air pollutants.

This material does not contain any Class 1 Ozone depletors.

This material does not contain any Class 2 Ozone depletors.

Clean Water Act:

None of the chemicals in this product are listed as Hazardous Substances under the CWA.

None of the chemicals in this product are listed as Priority Pollutants under the CWA.

None of the chemicals in this product are listed as Toxic Pollutants under the CWA.

OSHA:



None of the chemicals in this product are considered highly hazardous by OSHA.

STATE

CAS# 5949-29-1 is not present on state lists from CA, PA, MN, MA, FL, or NJ.

CAS# 77-92-9 is not present on state lists from CA, PA, MN, MA, FL, or NJ.

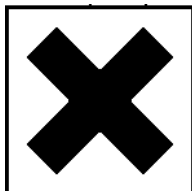
California Prop 65

California No Significant Risk Level: None of the chemicals in this product are listed.

15.2. European/International Regulations

European Labeling in Accordance with EC Directives

Hazard Symbol(s) and Classification: "Xi" – Irritant"



EU Risk (R) and Safety (S) Phrases:

R36/37/38: Irritating to eyes, respiratory system, and skin.

S25: Avoid contact with eyes.

S26: In case of contact with eyes, rinse immediately with plenty of water and seek medical advice.

S36/37: Wear suitable protective clothing and gloves.

S39: Wear eye/face protection.

WGK (Water Danger/Protection)

CAS# 5949-29-1: 1.

CAS# 77-92-9: 0.

Canada - DSL/NDSL

CAS# 5949-29-1 is listed on Canada's DSL List.

CAS# 77-92-9 is listed on Canada's DSL List.

Canadian Ingredient Disclosure List

CAS# 77-92-9 is listed on the Canadian Ingredient Disclosure List.

Canada - WHMIS

E – Corrosive material – Corrosive



E – Corrosive

Section 16: Other Information

National Fire Protection Association (NFPA) Ratings (estimated): This information is intended solely for the use of individuals trained in the NFPA system.

Health: 2

Flammability: 0

Reactivity: 0

Disclaimer: The information above is believed to be accurate and represents the best information currently available to us. However, we make no warranty of merchantability or any other warranty, express or implied, with respect to such information, and we assume no liability resulting from its use. The information relates only to the specific material designated and does not relate to its use in combination with other materials or its use as to any particular process. Users should make their own investigations to determine the suitability of the information for their particular purposes. In no event shall Inter-Med Inc. / Vista Dental Products be liable for any claims, losses, or damages of any third party or for lost profits or any special, indirect, incidental, consequential or exemplary damages, howsoever arising, even if Inter-Med Inc. / Vista Dental Products has been advised of the possibility of such damages.

Prepared: 3/14/2008

Revised: 7/21/2015