


Material Safety Data Sheet

Delta Education
80 Northwest Blvd.
Nashua, NH 03063

Phone (281) 479-2569
Chemtrec 800-424-9300
24 Hour Emergency Assistance

Section 1 Identification						Section 6 Accidental Release Measures																															
Product Number:	034-1064	<table border="1" style="width: 100%; border-collapse: collapse;"> <tr> <td style="width: 15%;">Health:</td> <td style="width: 15%;">1</td> </tr> <tr> <td>Flammability</td> <td>1</td> </tr> <tr> <td>Reactivity</td> <td>0</td> </tr> <tr> <td colspan="2">Hazard Rating:</td> </tr> <tr> <td>Least</td> <td>Slight</td> <td>Moderate</td> <td>High</td> <td>Extreme</td> </tr> <tr> <td>0</td> <td>1</td> <td>2</td> <td>3</td> <td>4</td> </tr> </table>				Health:	1	Flammability	1	Reactivity	0	Hazard Rating:		Least	Slight	Moderate	High	Extreme	0	1	2	3	4	Scoop spilled material into a beaker and neutralize to pH between 6 and 9 with an alkali such as soda ash. Flush neutralized waste down the drain with an excess of water													
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Product Name:	Citric Acid, Anhydrous Laboratory Grade, Anhydrous	<table border="1" style="width: 100%; border-collapse: collapse;"> <tr> <td colspan="5">NA = Not Applicable NE = Not Established</td> </tr> </table>				NA = Not Applicable NE = Not Established					Section 7 Handling and Storage																										
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Trade/Chemical Synonyms						Store tightly closed in a cool dry place																															
Formula:	H ⁺ O—C—					Section 8 Exposure Controls & Personal Protection																															
RTECS:	GE7350000	Respiratory Protection: NIOSH/MSHA-approved respirator																																			
C.A.S	CAS# 77-92-9					<table border="0" style="width: 100%;"> <tr> <td style="width: 50%;">Mechanical:</td> <td style="width: 50%;">Hand</td> <td style="width: 50%;">Wear appropriate gloves to</td> </tr> <tr> <td><input checked="" type="checkbox"/></td> <td></td> <td>Protection: prevent skin exposure</td> </tr> <tr> <td>Ventilation:</td> <td>Local Exhaust:</td> <td>Eye</td> </tr> <tr> <td><input checked="" type="checkbox"/></td> <td><input checked="" type="checkbox"/></td> <td>Protection: Splash Goggles</td> </tr> </table>				Mechanical:	Hand	Wear appropriate gloves to	<input checked="" type="checkbox"/>		Protection: prevent skin exposure	Ventilation:	Local Exhaust:	Eye	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	Protection: Splash Goggles																
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Section 2 Component Mixture						Other Protective Equipment: Wear appropriate clothing to prevent skin exposure																															
Sara 313	Component	CAS Number	%	Dim	Exposure Limits:	Section 9 Physical and Chemical Properties																															
	Citric Acid	CAS# 77-92-9	100%	W/W	OSHA PEL 5 mg/m ^f (respirable dust)	<table border="0" style="width: 100%;"> <tr> <td style="width: 30%;">Melting Point:</td> <td style="width: 30%;">153 Deg. C</td> <td style="width: 30%;">Specific Gravity</td> <td style="width: 10%;">1.54</td> </tr> <tr> <td>Boiling Point:</td> <td>N/A</td> <td>Percent Volatile by Volume:</td> <td>N/A</td> </tr> <tr> <td>Vapor Pressure:</td> <td>N/A</td> <td>Evaporation Rate:</td> <td>N/A</td> </tr> <tr> <td>Vapor Density:</td> <td>N/A</td> <td>Evaporation Standard:</td> <td></td> </tr> <tr> <td>Solubility in Water:</td> <td>60%</td> <td>Auto ignition Temperature:</td> <td>Not applicable</td> </tr> <tr> <td>Appearance and Odor:</td> <td>Colorless crystals, no odor</td> <td>Lower Flamm. Limit in Air:</td> <td>Not applicable</td> </tr> <tr> <td>Flash Point:</td> <td>+212°F</td> <td>Upper Flamm. Limit in Air:</td> <td>Not applicable</td> </tr> </table>				Melting Point:	153 Deg. C	Specific Gravity	1.54	Boiling Point:	N/A	Percent Volatile by Volume:	N/A	Vapor Pressure:	N/A	Evaporation Rate:	N/A	Vapor Density:	N/A	Evaporation Standard:		Solubility in Water:	60%	Auto ignition Temperature:	Not applicable	Appearance and Odor:	Colorless crystals, no odor	Lower Flamm. Limit in Air:	Not applicable	Flash Point:	+212°F	Upper Flamm. Limit in Air:	Not applicable
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Section 3 Hazard Identification (Also see section 11)						Section 10 Stability and Reactivity Information																															
FIRST AID: INGESTION: Call physician or Poison Control Center Immediately. Induce vomiting only if advised by appropriate medical personnel.						Stability: Stable Conditions to Avoid: Avoid contact with incompatible materials.																															
Section 4 First Aid Measures						Materials to Avoid:																															
FIRST AID: INGESTION: Call physician or Poison Control Center Immediately. Induce vomiting only if advised by appropriate medical personnel.						Exposure to flames, moisture, oxidizers, metal nitrate																															
EYES: Flush thoroughly with water for at least 15 minutes, lifting lower and upper eyelids occasionally. Get medical attention.						Hazardous Decomposition Products:																															
SKIN: Flush with mild soap and water.						releases acrid smoke and fumes in fire																															
INHALATION: Remove to fresh air. If not breathing, give artificial respiration. Get immediate medical attention.						Hazardous Polymerization: Will Not Occur																															
Section 5 Fire Fighting Measures						Condition to Avoid: None known																															
Fire Extinguisher Type:	Water spray, Carbon dioxide, dry chemical					Section 11 Additional Information																															
Fire/Explosion Hazards:	Explosive reaction with metal nitrates					May be irritating to eyes skin and respiratory tract. Conditions aggravated/target organs: Persons with pre-existing eye, skin, or respiratory conditions may be more susceptible.																															
Fire Fighting Procedure:	Wear self-contained breathing apparatus and protective clothing to prevent contact with skin and clothing.					DOT Classification: Not Regulated																															
						DOT regulations may change from time to time. Please consult the most recent version of the relevant regulations.																															
						Revision No:1 Date Entered: 9/1/2006 Approved by: WPF																															

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