



# SAFETY DATA SHEET

## CITRIC ACID

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### 1. IDENTIFICATION OF THE SUBSTANCE/PREPARATION AND THE COMPANY:

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**PRODUCT NAME:** CITRIC ACID  
**CHEMICAL NAME 2:** 2-HYDROXY-1,2,3-PROPANETRICARBOXYLIC ACID MONOHYDRATE  
**PART No.:** RM076  
**SUPPLIER:** J M Loveridge plc  
Southbrook Road, Southampton  
Hampshire  
SO15 1BH  
Tel: 023 8022 2008  
Fax: 023 8022 2117

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### 2. COMPOSITION/INFORMATION ON INGREDIENTS:

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**EEC (EINECS) No.** 201-069-1  
**CAS No.:** 5949-29-1

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### 3. HAZARDS IDENTIFICATION:

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Irritating to eyes.

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### 4. FIRST AID MEASURES:

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**GENERAL:** IN ALL CASES OF DOUBT OR WHEN SYMPTOMS PERSIST, ALWAYS SEEK MEDICAL ATTENTION  
**INHALATION:** Move affected person to fresh air. If recovery not rapid, seek medical attention.  
**INGESTION:** DO NOT INDUCE VOMITING. In case of spontaneous vomiting, be sure that vomit can freely drain because of danger of suffocation. Only when conscious rinse mouth out. Obtain medical attention if adverse symptoms occur.  
**SKIN:** Remove contaminated clothing. Wash affected area with plenty of soap and water. If irritation persists, seek medical attention. Launder clothing before re-use.  
**EYES:** Rinse immediately with plenty of water for at least 5 minutes while lifting the eye lids. Seek medical attention. Continue to rinse.

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### 5. FIRE FIGHTING MEASURES:

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**EXTINGUISHING MEDIA:** Noncombustible or flammable but will burn or decompose in fire situation. Use

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extinguishing media suitable against surrounding fire or the cause of fire.

**SPECIAL FIRE FIGHTING PROCEDURES:**

Take measures to retain water used for extinguishing. Do not release contaminated water into drains, soil and surface water. Dispose of contaminated water and soil according to local regulations.

**HAZARDOUS COMBUSTION PRODUCTS:**

Burning will produce oxides of carbon.

**PROTECTIVE MEASURES IN FIRE:**

Fire fighters should wear self-contained breathing apparatus.

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**6. ACCIDENTAL RELEASE MEASURES:**

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**PERSONAL PRECAUTION IN SPILL:**

Avoid contact with eyes.

**PRECAUTIONS TO PROTECT ENVIRONMENT:**

Prevent contamination of soil, drains and surface water.

**SPILL CLEANUP METHODS:**

Cover spillage with damp inert material, take-up or collect and place into a suitable closable labelled container for disposal. Wash the area clean with water and detergent, observing environmental requirements.

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**7. HANDLING AND STORAGE:**

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**USAGE PRECAUTIONS:**

**HANDLING** - Product should be used in accordance with good industrial principles for handling and storing of hazardous chemicals. Ensure good ventilation and local exhaust extraction in work place. Avoid contact with skin or eyes.

**STORAGE PRECAUTIONS:**

Store in a cool, dry, well ventilated place, in securely closed original container.

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**8. EXPOSURE CONTROLS AND PERSONAL PROTECTION:**

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**INGREDIENT COMMENTS:**

No specific OES assigned, however for dusts of any kind, ensure LTEL (8-hour TWA ref. period) level does not exceed 10 mg.m<sup>3</sup> for total inhalable dust or 4 mg.m<sup>3</sup> for respirable dust (or) as recommended in current edition of EH40.

**VENTILATION:**

Provide adequate general and local exhaust ventilation.

**RESPIRATORS:**

If unable to control dust emissions below recommended limits, an approved respiratory protection (EN 149 FFP) must be used at all times providing at least P2S level of protection.

**PROTECTIVE GLOVES:**

Use protective gloves made of: Butyl rubber. Rubber (natural, latex). Neoprene. Polyvinyl chloride (PVC).

**EYE PROTECTION:**

Wear approved chemical safety goggles where eye exposure is reasonably probable.

**OTHER PROTECTION:**

Wear suitable personal protective equipment appropriate to the task.

**HYGIENIC WORK PRACTICES:**

**SKIN PROTECTION** - apply barrier cream to hands and exposed skin. Regularly vacuum dust to minimise the potential of air-borne exposure.

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**9. PHYSICAL AND CHEMICAL PROPERTIES:**

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**APPEARANCE:**

Colourless transparent crystals.

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<b>ODOUR/TASTE:</b>	Odourless or no characteristic odour.		
<b>DENSITY/SPECIFIC GRAVITY (g/ml):</b>	1.54	<b>Temperature (°C):</b>	20
<b>pH-VALUE, DILUTED SOLUTION:</b>	1.8	<b>Concentration % M:</b>	(5% w/w aqueous soln.)
<b>SOLUBILITY DESCRIPTION:</b>	Very soluble in water. Very soluble in: Alcohol. Aqueous solutions are acidic.		
<b>DECOMPOSITION TEMP. (°C):</b>	Above 135°C may evolve carbon monoxide and carbon dioxide.		
<b>AUTO IGNITION TEMP. (°C):</b>	Requires external heat to burn.		

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## 10. STABILITY AND REACTIVITY:

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<b>STABILITY:</b>	Stable under normal conditions of use.
<b>MATERIALS TO AVOID:</b>	Alkalis, bases and oxidising agents.
<b>HAZARDOUS DECOMP. PRODUCTS:</b>	Thermal decomposition or burning will release oxides of carbon.

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## 11. TOXICOLOGICAL INFORMATION:

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	LD50. Rat. 885 mg/kg (intravenous)
<b>TOXIC DOSE - LD 50:</b>	11 700 mg/kg (oral rat)
<b>HEALTH HAZARDS, GENERAL:</b>	Irritating to eyes or if inhaled as dust.
<b>HEALTH WARNINGS:</b>	This chemical may cause skin/eye irritation and burns (corrosive). Aqueous solutions have corrosive effect.

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## 12. ECOLOGICAL INFORMATION:

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	LD50 fish 440 - 706 mg/l
<b>LC 50, 96 HRS, FISH mg/l:</b>	135 (Bluegill)
<b>DEGRADABILITY:</b>	Biodegradable - 98% within 2 to 24 hours.

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## 13. DISPOSAL CONSIDERATIONS:

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<b>DISPOSAL METHODS:</b>	This material and/or its container must be disposed of as hazardous waste according to Special Waste Regulations 1996 or according to local regulations, in compliance with Duty of Care Regulations and Special Waste Regulations.
<b>WASTE CLASS:</b>	WASTE CODE: 0705** HAZARDOUS PROPERTY: H4

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## 14. TRANSPORT INFORMATION:

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**GENERAL:** Not classified as hazardous for transport.

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## 15. REGULATORY INFORMATION:

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### LABEL FOR SUPPLY:



**RISK PHRASES:** R-36 Irritating to eyes.

**SAFETY PHRASES:** S-26 In case of contact with eyes, rinse immediately with plenty of water and seek medical advice.

**UK REGULATORY REFERENCES:** Classification, Packaging and Labelling Regulations 1984. Chemicals (Hazard Information & Packaging) Regulations 1993.

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## 16. OTHER INFORMATION:

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**INFORMATION SOURCES:** This product has been classified in accordance with CHIP3 regulations.

**REVISION COMMENTS:** Edition 01; Revised item(s):

**ISSUED BY:** MK

**SDS No.:** 121

**DATE:** 12/07/02

**DISCLAIMER:** The foregoing data has been compiled for safety information only and does not form part of any selling specification. Information contained in this Data Sheet is to the best of JMLs knowledge correct at the time of publication. Customers should always satisfy themselves, that the product which they have selected is entirely suitable for their purpose under their conditions of use and in compliance with current regulations. For any further information, please contact the supplier.