100 Bridge Street, Pelham, NH 03076, USA

Tel: (603) 635-2255 Toll Free: (800) 374-9513 Fax: (603) 635-2448 E-mail: info@medicalisotopes.com Internet: www.medicalisotopes.com

SAFETY DATA SHEET

SECTION 1. Identification

Product:

L-Malic acid-13C4

Catalog number: C27732

Supplier:

Medical Isotopes, Inc. 100 Bridge Street Pelham, NH 03076 USA

Tel: +1-603-635-2255 Fax: +1-603-635-2448

Email: info@medicalisotopes.com

Suitability:

For laboratory use only.

Emergency Contact Information:

Call Chemtrec 24/7

DOMESTIC NORTH AMERICA 800-424-9300

INTERNATIONAL, CALL 703-527-3887 (collect calls accepted)

SECTION 2. Hazard(s) identification

Hazard classification:

Skin irritation (Category 2), H315 Eye irritation (Category 2A), H319

Specific target organ toxicity - single exposure (Category 3), Respiratory system, H335

Signal Word:

Warning

Hazard Statements:

N/A

Pictogram:



Precautionary Statements:

Hazard statement(s)

H315 Causes skin irritation.

H319 Causes serious eye irritation.

H335 May cause respiratory irritation.

Precautionary statement(s)

P261 Avoid breathing dust/ fume/ gas/ mist/ vapours/ spray.

P264 Wash skin thoroughly after handling.

P271 Use only outdoors or in a well-ventilated area.

P280 Wear protective gloves/ eye protection/ face protection.

P302 + P352 IF ON SKIN: Wash with plenty of soap and water.

P304 + P340 IF INHALED: Remove victim to fresh air and keep at rest in a position

comfortable for breathing.

P305 + P351 + P338 IF IN EYES: Rinse cautiously with water for several minutes. Remove

contact lenses, if present and easy to do. Continue rinsing.

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P312 Call a POISON CENTER or doctor/ physician if you feel unwell.

P321 Specific treatment (see supplemental first aid instructions on this label).

P332 + P313 If skin irritation occurs: Get medical advice/ attention.

P337 + P313 If eye irritation persists: Get medical advice/ attention.

P362 Take off contaminated clothing and wash before reuse.

P403 + P233 Store in a well-ventilated place. Keep container tightly closed.

P405 Store locked up.

P501 Dispose of contents/ container to an approved waste disposal plant.

Other hazards:

N/A



MEDICAL ISOTOPES, Inc.

SECTION 3. Composition/Information on Ingredients

Chemical name:

L-Malic acid-13C4

Synonyms:

(S)-(-)-2-Hydroxysuccinic acid-13C4 L-Hydroxybutanedioic acid-13C4

CAS number:

N/A

Impurities/Additives:

N/A

SECTION 4. FIRST AID MEASURES

Skin Contact: Wash with soap and water for several minutes. Consult a physician.

Ingestion: Never give anything by mouth to an unconscious person. Rinse mouth with water. Consult a physician. Do

NOT Induce Vomiting

Inhalation: Remove from exposure and move to fresh air immediately. Consult a physician.

Eye Contact: Rinse thoroughly with plenty of water. Consult a physician.

SECTION 5. FIRE FIGHTING MEASURES

Suitable extinguishing media

Use water spray, foam, dry chemical or carbon dioxide.

Special protective equipment for firefighters

Wear self-contained breathing apparatus for fire-fighting if necessary.

Hazardous combustion products: Carbon oxides

SECTION 6. ACCIDENTAL RELEASE MEASURES

Personal Precautions: Make sure to wear appropriate protective equipment as listen in section 8. Avoid breathing dust, vapors, or mists.

Spill Clean-up Methods: Clean up spills immediately, observing precautions in the Protective Equipment section. Cover with a non-combustible material (e.g. sand, earth, diatomaceous earth), sweep up, and place into a suitable container for disposal. Avoid breathing the resulting dust.

SECTION 7. HANDLING & STORAGE

Usage/Handling Precautions: Make sure to wear appropriate PPE as listed in section 8. Avoid contact with skin and eyes

Storage Conditions: Keep tightly closed in a dry and well-ventilated place. Store under inert gases

SECTION 8. EXPOSURE CONTROL / PERSONAL PROTECTION

Engineering Controls: Use fumehood if available.

Personal Protective Equipment

Eyes: Always wear safety glasses when working with chemicals. Wear chemical goggles when working with liquids.

Skin: Wear protective gloves and a lab coat to prevent skin exposure.

SECTION 9. PHYSICAL AND CHEMICAL PROPERTIES

Appearance: Solid

Odor: N/A pH: N/A

Melting Point: 101 -103 °C (214 -217 °F)

Water Solubility (%): Low Flash Point (°C): N/A Vapor pressure: N/A

Autoignition Temperature (°C): N/A Flammability Limits in Air (% by Vol.): N/A

SECTION 10. STABILITY & REACTIVITY

Reactivity: N/A

Chemical Stability: Stable under recommended storage conditions

Conditions to Avoid: Heat, flames and sparks. Extremes of temperature and direct sinlight

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Hazardous decomposition products: Carbon oxides, Nitrogen oxides (NOx), sulphur oxides

SECTION 11. TOXICOLOGICAL INFORMATION

Inhalation: N/A Ingestion: N/A

Skin and eye contact: N/A

Other: N/A

SECTION 12. ECOLOGICAL INFORMATION

N/A

SECTION 13. DISPOSAL CONSIDERATIONS

Disposal Procedures: Via licensed disposal company. Dispose of according to federal, state/province and local regulations. Burn in a chemical incinerator equipped with an afterburner and scrubber but exert extra care in igniting as this material is highly flammable.

SECTION 14. TRANSPORT INFORMATION

N/A

SECTION 15. REGULATORY INFORMATION

SARA 302 Components

SARA 302: No chemicals in this material are subject to the reporting requirements of SARA Title III, Section 302.

SARA 313 Components

SARA 313: This material does not contain any chemical components with known CAS numbers that exceed the threshold (De Minimis) reporting levels established by SARA Title III, Section 313.

SARA 311/312 Hazards

Acute Health Hazard

Massachusetts Right To Know Components

No components are subject to the Massachusetts Right to Know Act.

Pennsylvania Right To Know Components

L-Malic acid-13C4

CAS-No.

New Jersey Right To Know Components

L-Malic acid-13C4

CAS-No.

California Prop. 65 Components

This product does not contain any chemicals known to State of California to cause cancer, birth defects, or any other reproductive harm.

SECTION 16. OTHER INFORMATION

Preparation information: Last revised on 7/14/2016.

THE ABOVE INFORMATION IS BELIEVED TO BE CORRECT BUT DOES NOT PURPORT TO BE ALL INCLUSIVE AND SHALL BE USED ONLY AS A GUIDE. MEDICAL ISOTOPES, INC. SHALL NOT BE HELD LIABLE FOR ANY DAMAGE RESULTING FROM HANDLING OR FROM CONTACT WITH THE ABOVE PRODUCT.

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