

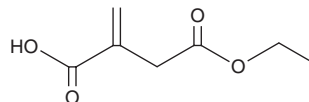
PRODUCT INFORMATION



Monoethyl Itaconate

Item No. 43276

CAS Registry No.: 57718-07-7
Formal Name: 2-methylene-butanedioic acid, 4-ethyl ester
Synonyms: β -ethyl Itaconate, 4-ethyl Itaconate, Itaconic Acid Monoethyl ester
MF: $C_7H_{10}O_4$
FW: 158.2
Purity: $\geq 95\%$
Supplied as: A solid
Storage: -20°C
Stability: ≥ 4 years



Information represents the product specifications. Batch specific analytical results are provided on each certificate of analysis.

Laboratory Procedures

Monoethyl itaconate is supplied as a solid. A stock solution may be made by dissolving the monoethyl itaconate in the solvent of choice, which should be purged with an inert gas. Monoethyl itaconate is soluble (≥ 10 mg/ml) in ethanol and DMSO.

Further dilutions of the stock solution into aqueous buffers or isotonic saline should be made prior to performing biological experiments. Ensure that the residual amount of organic solvent is insignificant, since organic solvents may have physiological effects at low concentrations. Organic solvent-free aqueous solutions of monoethyl itaconate can be prepared by directly dissolving the solid in aqueous buffers. Monoethyl itaconate is soluble (≥ 10 mg/ml) in PBS (pH 7.2). We do not recommend storing the aqueous solution for more than one day.

Description

Monoethyl itaconate is a copolymerization agent.¹ It has been used in the generation of copolymeric hydrogels for the formation of methotrexate-containing polymer discs.

Reference

1. Teijón, C., Guerrero, S., Olmo, R., *et al.* Swelling properties of copolymeric hydrogels of poly(ethylene glycol) monomethacrylate and monoesters of itaconic acid for use in drug delivery. *J. Biomed. Mater. Res. B Appl. Biomater.* **91**(2), 716-726 (2009).

WARNING

THIS PRODUCT IS FOR RESEARCH ONLY - NOT FOR HUMAN OR VETERINARY DIAGNOSTIC OR THERAPEUTIC USE.

SAFETY DATA

This material should be considered hazardous until further information becomes available. Do not ingest, inhale, get in eyes, on skin, or on clothing. Wash thoroughly after handling. Before use, the user must review the [complete](#) Safety Data Sheet, which has been sent via email to your institution.

WARRANTY AND LIMITATION OF REMEDY

Buyer agrees to purchase the material subject to Cayman's Terms and Conditions. Complete Terms and Conditions including Warranty and Limitation of Liability information can be found on our website.

Copyright Cayman Chemical Company, 06/17/2025

CAYMAN CHEMICAL

1180 EAST ELLSWORTH RD
ANN ARBOR, MI 48108 · USA

PHONE: [800] 364-9897
[734] 971-3335

FAX: [734] 971-3640

CUSTSERV@CAYMANCHEM.COM
WWW.CAYMANCHEM.COM