## **Product** Data Sheet

## Ethyl pyruvate-d<sub>3</sub>

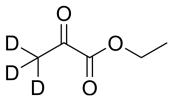
Cat. No.: HY-Y1362S CAS No.: 66966-38-9 Molecular Formula:  $C_5H_5D_3O_3$  Molecular Weight: 119.13

Target: Isotope-Labeled Compounds

Pathway: Others

Storage: Please store the product under the recommended conditions in the Certificate of

Analysis.



## **BIOLOGICAL ACTIVITY**

Description	Ethyl pyruvate-d <sub>3</sub> is the deuterium labeled Ethyl pyruvate[1]. Ethyl pyruvate is a simple derivative of the endogenous metabolite, pyruvic acid. Ethyl pyruvate is an anti-inflammatory agent[2].
In Vitro	Stable heavy isotopes of hydrogen, carbon, and other elements have been incorporated into drug molecules, largely as tracers for quantitation during the drug development process. Deuteration has gained attention because of its potential to affect the pharmacokinetic and metabolic profiles of drugs <sup>[1]</sup> .  MCE has not independently confirmed the accuracy of these methods. They are for reference only.

## **REFERENCES**

[1]. Russak EM, et al. Impact of Deuterium Substitution on the Pharmacokinetics of Pharmaceuticals. Ann Pharmacother. 2019 Feb;53(2):211-216.

[2]. Fink MP. Ethyl pyruvate: a novel anti-inflammatory agent. J Intern Med. 2007 Apr;261(4):349-62.

[3]. Olcum M, Tufekci KU, Durur DY, et al. Ethyl Pyruvate Attenuates Microglial NLRP3 Inflammasome Activation via Inhibition of HMGB1/NF-κB/miR-223 Signaling. Antioxidants (Basel). 202110(5):745.

Caution: Product has not been fully validated for medical applications. For research use only.

Tel: 609-228-6898

Fax: 609-228-5909

E-mail: tech@MedChemExpress.com

Address: 1 Deer Park Dr, Suite Q, Monmouth Junction, NJ 08852, USA