Product Data Sheet

L-Citrulline-d₆

Cat. No.: HY-N0391S2

CAS No.: 1331908-61-2

Molecular Formula: $C_6H_7D_6N_3O_3$ Molecular Weight: 181.22

Target: Endogenous Metabolite

Pathway: Metabolic Enzyme/Protease

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

Analysis.

$$I_2N$$
 N
 D
 D
 D
 D
 D
 N
 D
 D
 N
 D
 N

BIOLOGICAL ACTIVITY

| Description | L-Citrulline-d ₆ is the deuterium labeled L-Citrulline. L-Citrulline is an amino acid derived from ornithine in the catabolism of proline or glutamine and glutamate, or from l-arginine via arginine-citrulline pathway. |
|-------------|--|
| 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 ^[1] . MCE has not independently confirmed the accuracy of these methods. They are for reference only. |

REFERENCES

[1]. Fleszar MG, et al. Quantitative Analysis of l-Arginine, Dimethylated Arginine Derivatives, l-Citrulline, and Dimethylamine in Human Serum Using Liquid Chromatography-Mass Spectrometric Method. Chromatographia. 2018;81(6):911-921.

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

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