Product Data Sheet

Sacubitril-d4

Cat. No.:HY-15407SCAS No.:1884269-07-1Molecular Formula: $C_{24}H_{25}D_4NO_5$ Molecular Weight:415.52

Target: Neprilysin

Pathway: Metabolic Enzyme/Protease

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

Analysis.

BIOLOGICAL ACTIVITY

| Description | Sacubitril- d_4 is the deuterium labeled Sacubitril. Sacubitril (AHU-377) is a potent NEP inhibitor with an IC50 of 5 nM. Sacubitril (AHU-377) is a component of the heart failure medicine LCZ696. |
|-------------|--|
| 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]. Russak EM, et al. Impact of Deuterium Substitution on the Pharmacokinetics of Pharmaceuticals. Ann Pharmacother. 2019;53(2):211-216.

[2]. Ksander GM, et al. Dicarboxylic acid dipeptide neutral endopeptidase inhibitors. J Med Chem. 1995 May 12;38(10):1689-700.

 $[3]. \ Voors\ AA, et\ al.\ The\ potential\ role\ of\ valsartan+AHU377\ (\ LCZ696\)\ in\ the\ treatment\ of\ heart\ failure.\ Expert\ Opin\ Investig\ Drugs.\ 2013\ Aug; 22(8):1041-7.$

[4]. von Lueder TG, et al. Angiotensin receptor neprilysin inhibitor LCZ696 attenuates cardiac remodeling and dysfunction after myocardial infarction by reducing cardiac fibrosis and hypertrophy. Circ Heart Fail. 2015 Jan;8(1):71-8.

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