## **Product** Data Sheet

## SAH-<sup>13</sup>C<sub>5</sub>

Cat. No.:	HY-19528S1	
Molecular Formula:	$C_{9}^{13}C_{5}H_{20}N_{6}O_{5}S$	$HO \underbrace{\downarrow}_{O} S \xrightarrow{-13}_{H^{13}C} CH \underbrace{\downarrow}_{N} NH_2 \\ H^{13}C \underbrace{\downarrow}_{O} NH_2 \\ H^{13}C \underbrace{\downarrow}_{N} NH_2 \\ H^{13}C \underbrace{I}_{N} NH_2 \\ H^$
Molecular Weight:	389.37	
Target:	Endogenous Metabolite	
Pathway:	Metabolic Enzyme/Protease	
Storage:	Please store the product under the recommended conditions in the Certificate of Analysis.	

DIOLOGICAL ACTI	
Description	SAH- <sup>13</sup> C <sub>5</sub> is the <sup>13</sup> C-labeled SAH. SAH (S-Adenosylhomocysteine) is an amino acid derivative and a modulartor in several metabolic pathways. It is an intermediate in the synthesis of cysteine and adenosine[1]. SAH is an inhibitor for METTL3-METTL14 heterodimer complex (METTL3-14) with an IC50 of 0.9 μM[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;53(2):211-216.

[2]. DE LA HABA G, et al. The enzymatic synthesis of S-adenosyl-L-homocysteine from adenosine and homocysteine. J Biol Chem. 1959 Mar;234(3):603-8.

[3]. Li F, et al. A Radioactivity-Based Assay for Screening Human m6A-RNA Methyltransferase, METTL3-METTL14 Complex, and Demethylase ALKBH5. Biomol Screen. 2016 Mar;21(3):290-7.

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

