Product Data Sheet



3-Acetyldeoxynivalenol-¹³C₁₇

Cat. No.: CAS No.: Molecular Formula: Molecular Weight: Target: Pathway: Storage:	HY-N6685S11217476-81-7 $^{13}C_{17}H_{22}O_7$ 355.23Isotope-Labeled CompoundsOthersPlease store the product under the recommended conditions in the Certificate of	$\begin{array}{c} H & H & O^{-13}C \\ H_{3}^{13}C & & H \\ & H_{3}^{13}C & & H \\ & & & & \\ & & & \\ $
	Analysis.	

BIOLOGICAL ACTIVITY		
Description	3-Acetyldeoxynivalenol- ¹³ C ₁₇ is the ¹³ C labeled 3-Acetyldeoxynivalenol (HY-N6685) ^[1] . 3-Acetyldeoxynivalenol, a trichothecene mycotoxin deoxynivalenol (DON) acetylated derivative ^[2] , is a blood-brain barrier (BBB) permeable mycotoxin ^[3] .	
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]. Kadota T, et al. Comparative study of deoxynivalenol, 3-acetyldeoxynivalenol, and 15-acetyldeoxynivalenolon intestinal transport and IL-8 secretion in the human cell line Caco-2. Toxicol In Vitro. 2013 Sep;27(6):1888-95.

[2]. Behrens M, et al. Blood-Brain Barrier Effects of the Fusarium Mycotoxins Deoxynivalenol, 3Acetyldeoxynivalenol, and Moniliformin and Their Transfer to the Brain. PLoS One. 2015 Nov 23;10(11):e0143640.

[3]. Russak EM, et al. Impact of Deuterium Substitution on the Pharmacokinetics of Pharmaceuticals. Ann Pharmacother. 2019 Feb;53(2):211-220.

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

Tel: 609-228-6898 Fax: 609-228-5909

5909 E-mail: tech@MedChemExpress.com

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