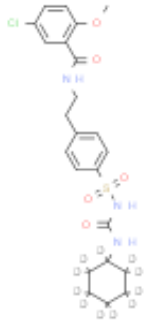
Product Data Sheet

Cas No.:	1189985-02-1	Cat. No:	PL07330
Product Name:	Glyburide-d11		
Product synonym:	格列本脲 d11		
Chemical name:	Glyburide-d11		
MF:	C23H28CLN3O5S	FW:	505.07130241394
Purity:	-	Batch No.:	-
Storage:			
Structural formula:			
λmax：	-	Formulation：	-
Solubility :			
SMILES :	ClC1C=CC(=C(C=1)C(NCCC1C=CC(=CC=1)S(NC(NC1([2H])C([2H])([2H])C([2H])([2H])C([2H])([2H])C([2H])([2H])C1([2H])[2H])=O)(=O)=O)=O)OC		
InChI Code:	-		
InChI Key:			
WARNING This product is not for human or veterinary use.			

Product Description

Glyburide-d11 是 Glibenclamide 的氘代物。Glibenclamide (Glyburide) 是一种具有口服活性的 ATP 敏感的 K⁺ 通道 (KATP) 抑制剂，可用于糖尿病和肥胖的研究。Glibenclamide 抑制 P-glycoprotein。Glibenclamide 直接结合并阻断KATP 的 SUR1 亚基并抑制囊性纤维化跨膜传导调节蛋白 (CFTR)。Glibenclamid 通过诱导膜离子通透性干扰线粒体生物能。Glibenclamid 可诱导自噬。

生物活性	Glyburide-d 11 is the deuterium labeled Glibenclamide. Glibenclamide (Glyburide) is an orally active ATP-sensitive K+ channel (KATP) inhibitor and can be used for the research of diabetes and obesity[1]. Glibenclamide inhibits P-glycoprotein. Glibenclamide directly binds and blocks the SUR1 subunits of KATP and inhibits the cystic fibrosis transmembrane conductance regulator protein (CFTR)[3]. Glibenclamide interferes with mitochondrial bioenergetics by inducing changes on membrane ion permeability[4]. Glibenclamide can induce autophagy[5].
体外研究(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. has not independently confirmed the accuracy of these methods. They are for reference only.

包装储存	Please store the product under the recommended conditions in the Certificate of Analysis.