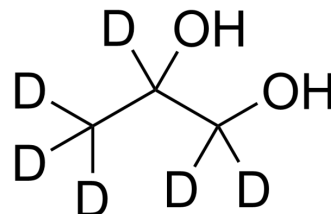


(±)-1,2-Propanediol-d₆

Cat. No.:	HY-Y0921S2		
CAS No.:	52910-80-2		
Molecular Formula:	C ₃ H ₂ D ₆ O ₂		
Molecular Weight:	82.13		
Target:	Endogenous Metabolite		
Pathway:	Metabolic Enzyme/Protease		
Storage:	Pure form	-20°C	3 years
		4°C	2 years
	In solvent	-80°C	6 months
		-20°C	1 month



SOLVENT & SOLUBILITY

In Vitro

H₂O : 250 mg/mL (3043.95 mM; Need ultrasonic)

Preparing Stock Solutions	Solvent Concentration	Mass		
		1 mg	5 mg	10 mg
	1 mM	12.1758 mL	60.8791 mL	121.7582 mL
	5 mM	2.4352 mL	12.1758 mL	24.3516 mL
	10 mM	1.2176 mL	6.0879 mL	12.1758 mL

Please refer to the solubility information to select the appropriate solvent.

BIOLOGICAL ACTIVITY

Description

(±)-1,2-Propanediol-d₆ is the deuterium labeled (±)-1,2-Propanediol[1]. (±)-1,2-Propanediol (1,2-(R,S)-Propanediol) is an aliphatic alcohol and frequently used as an excipient in many agent formulations to increase the solubility and stability of agents[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^[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 Feb;53(2):211-216.

[2]. De Cock RF, et al. Low but inducible contribution of renal elimination to clearance of propylene glycol in preterm and term neonates. Ther Drug Monit. 2014 Jun;36(3):278-87.

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