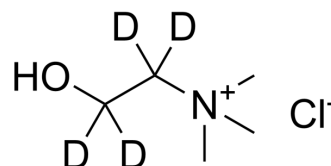


Choline-d₄ chloride

Cat. No.:	HY-B1337S
CAS No.:	285979-70-6
Molecular Formula:	C ₅ H ₁₀ D ₄ ClNO
Molecular Weight:	143.65
Target:	Cholinesterase (ChE)
Pathway:	Neuronal Signaling
Storage:	4°C, sealed storage, away from moisture * In solvent : -80°C, 6 months; -20°C, 1 month (sealed storage, away from moisture)



SOLVENT & SOLUBILITY

In Vitro

H₂O : ≥ 100 mg/mL (696.14 mM)
* "≥" means soluble, but saturation unknown.

Preparing Stock Solutions	Solvent Concentration	Mass	1 mg	5 mg	10 mg
	1 mM		6.9614 mL	34.8068 mL	69.6136 mL
	5 mM		1.3923 mL	6.9614 mL	13.9227 mL
	10 mM		0.6961 mL	3.4807 mL	6.9614 mL

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

BIOLOGICAL ACTIVITY

Description

Choline-d₄ (chloride) is the deuterium labeled Choline chloride. Choline chloride is an organic compound and a quaternary ammonium salt, an acyl group acceptor and choline acetyltransferase substrate, also is an important additive in feed especially for chickens where it accelerates growth.

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.

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