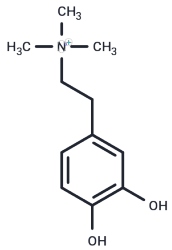
Data Sheet (Cat.No.TN7066)

TargetMol

Coryneine

Chemical Properties



CAS No. : 7224-66-0

Formula: C11H18NO2

Molecular Weight: 196.27

Storage: Keep away from direct sunlight
Powder: -20°C for 3 years | In solvent: -80°C for 1 year
Actual storage temperature shall be subject to the COA.

Biological Description

Description	Coryneine (Trimethyl(3,4-dihydroxyphenethyl)aminium) is a quaternary ammonium derivative of dopamine derived from aconite root.
Targets(IC50)	Others
In vivo	Coryneine (20-150 microM) blocked the nerve-evoked twitch response without affecting the contraction evoked by electrical stimulation of the muscle[1]. Coryneine (20 microM-2mM) itself depolarized the endplate membrane and this effect was reversibly suppressed by 1 and 5 microM pancuronium[1]. Coryneine 30 microM-10mM) produced contractions of denervated muscles in a concentration-dependent manner and the effects were reduced by 70nM pancuronium[1].

Solubility Information

Solubility	DMSO: 70 mg/mL (356.65 mM),Sonication is recommended. (< 1 mg/ml refers to the product slightly soluble or insoluble)

Preparing Stock Solutions

	1mg	5mg	10mg
1 mM	5.095 mL	25.4751 mL	50.9502 mL
5 mM	1.019 mL	5.095 mL	10.190 mL
10 mM	0.5095 mL	2.5475 mL	5.095 mL
50 mM	0.1019 mL	0.5095 mL	1.019 mL

Please select the appropriate solvent to prepare the stock solution, according to the solubility of the product in different solvents. Please use it as soon as possible.

Note: The dilution table applies only to solid products. For liquid products, please calculate the stock solution based on the stated concentration and/or density.

Reference

Kimura M, Kimura I, Muroi M, Nojima H, Diwan PV. Depolarizing neuromuscular blocking action of coryneine derived from aconite root in isolated mouse phrenic nerve-diaphragm muscles. Biol Pharm Bull. 1995 May;18(5): 691-5.

Nojima H, Okazaki M, Kimura I. Counter effects of higenamine and coryneine, components of aconite root, on acetylcholine release from motor nerve terminal in mice. J Asian Nat Prod Res. 2000;2(3):195-203.

Barlow RB. The effects of pH on the activity of coryneine and related phenolic quaternary ammonium salts on the frog rectus preparation. Br J Pharmacol. 1976 Aug;57(4):517-9.

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