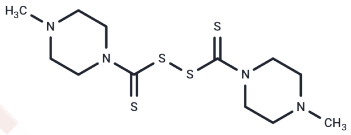
Data Sheet (Cat.No.T61214)

TargetMol

EWP 815

Chemical Properties



CAS No. : 20231-01-0

Formula: C12H22N4S4

Molecular Weight: 350.59

Storage: 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	EWP 815 is a disulfiram analogue that functions as a powerful inhibitor of Ins(1,4) P 2 phosphatase, Ins(1,4,5) P 3 5-phosphatase, and dopamine β-hydroxylase activity [1] [2].
Targets(IC50)	Hydroxylase,Phosphatase
In vitro	EWP 815 (6, 8 μM; 10 min) inhibits dephosphorylation of [3H]Ins(1,4,5)P3 5-phosphatase in particulate and soluble fractions with IC50s of 6 μM and 8 μM, respectively.[1] EWP 815 (30 μM; 1 h) exerts higher inhibition on Ins(1,4)P2 phosphatase rather than Ins (1,4,5)P3 5-phosphatase with the mean [3H]Ins(1,4)P2/mean [3H]InsP recovery ratio of 2.6.[1] EWP 815 (3-300 μM; 30 min) suppresses thyrotropin-releasing hormone (TRH)-stimulated (100 nM) inositol phospholipid production by 30% (100 μM) and 1.8% (300 μM), respectively, without affecting Ins(1,4,5)P3 binding.[1]
In vivo	EWP 815 (50 mg/kg; i.p.; administered 30 minutes before euthanasia) inhibits dopamine β-hydroxylase activity in mice, reducing the amount of 3 H-α-Me-NA by 12%.[2]

Solubility Information

Solubility	DMSO: 1 mg/mL (2.85 mM),Sonication is recommended. (< 1 mg/ml refers to the product slightly soluble or insoluble)

Preparing Stock Solutions

	1mg	5mg	10mg
1 mM	2.8523 mL	14.2617 mL	28.5233 mL
5 mM	0.5705 mL	2.8523 mL	5.7047 mL
10 mM	0.2852 mL	1.4262 mL	2.8523 mL
50 mM	0.057 mL	0.2852 mL	0.5705 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

Fowler CJ, et al. Inhibition of inositol 1,4,5-trisphosphate 5-phosphatase by micromolar concentrations of disulfiram and its analogues. Biochem J. 1993;289 (Pt 3)(Pt 3):853-859.
Carlsson A, et al. On the beta-hydroxylation of (+-)-alpha-methyldopamine in vivo. Eur J Pharmacol. 1968;5(1):85-9