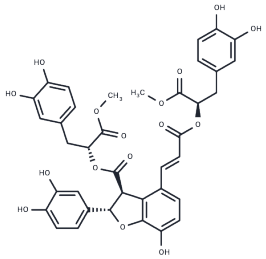
Data Sheet (Cat.No.T8299)

TargetMol

Dimethyl lithospermate B

Chemical Properties



CAS No. : 875313-64-7

Formula: C38H34O16

Molecular Weight: 746.67

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	Dimethyl lithospermate B (dmLSB) is a selective Na+ channel agonist.
Targets(IC50)	Sodium Channel
In vitro	Dimethyl lithospermate B slows inactivation of sodium current (INa), leading to the increased inward current during the early phases of the action potential [1][2].

Solubility Information

Solubility	DMSO: 132.5 mg/mL (177.45 mM),Sonication is recommended. (< 1 mg/ml refers to the product slightly soluble or insoluble)

Preparing Stock Solutions

	1mg	5mg	10mg
1 mM	1.3393 mL	6.6964 mL	13.3928 mL
5 mM	0.2679 mL	1.3393 mL	2.6786 mL
10 mM	0.1339 mL	0.6696 mL	1.3393 mL
50 mM	0.0268 mL	0.1339 mL	0.2679 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

Fish JM, et al. Dimethyl lithospermate B, an extract of Danshen, suppresses arrhythmogenesis associated with the Brugada syndrome. Circulation. 2006 Mar 21;113(11):1393-400.
Yoon JY, et al. A novel Na+ channel agonist, dimethyl lithospermate B, slows Na+ current inactivation and increases action potential duration in isolated rat ventricular myocytes. Br J Pharmacol. 2004 Nov;143(6):765-73.

Tel:781-999-4286 E_mail:info@targetmol.com Address:34 Washington Street,Wellesley Hills,MA 02481