Data Sheet (Cat.No.TQ0150)



Levcromakalim

Chemical Properties

CAS No.: 94535-50-9

Formula: C16H18N2O3

Molecular Weight: 286.33

Appearance: no data available

Storage: Powder: -20°C for 3 years | In solvent: -80°C for 1 year

Biological Description

Description	Levcromakalim (BRL 38227) is an activator of the ATP-sensitive K+ channel.			
Targets(IC50)	Potassium Channel			
In vitro	Levcromakalim inhibits spontaneous contractions completely in a glibenclamide-sensitive manner. LevCromakalim (5 μM) inhibits spontaneous contractions, which are recovered by glibenclamide. Levcromakalim (1, 5 and 10 μM) inhibits phasic contractions to 34±21.1%, 20.1±20.0% and 0% of the control. Glibenclamide reverses the inhibition of spontaneous isometric contractions caused by LevCromakalim (5 μM) to 84±1.5% of the control. Levcromakalim (20 and 100 μM) also inhibits oxytocin (OXT) (10 nM)-induced phasic contractions to 34±21.4% and 14±12.6% of the control [2]. LevCromakalim induces dose-dependent relaxation in both the young and old mesenteric artery (MAs); there is no difference in relaxation with age. However, the relaxation is markedly reduced in response to the high-salt (HS) diet in the old MAs (P<0.05). Maximum dilations to Levcromakalim (10-4 M) are 97 ± 3% in the young MAs			
	versus $98 \pm 1\%$ in the young salt arteries, while dilations are $99\pm0.7\%$ in the old MAs when compared with $85 \pm 5\%$ in the old salt arteries (P<0.05) [3].			

Solubility Information

Solubility	H2O: Insoluble,	
	DMSO: 50 mg/mL (174.62 mM),	
	(< 1 mg/ml refers to the product slightly soluble or insoluble)	

Page 1 of 2 www.targetmol.com

Preparing Stock Solutions

	1mg	5mg	10mg
1 mM	3.4925 mL	17.4624 mL	34.9247 mL
5 mM	0.6985 mL	3.4925 mL	6.9849 mL
10 mM	0.3492 mL	1.7462 mL	3.4925 mL
50 mM	0.0698 mL	0.3492 mL	0.6985 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.

Reference

Matsumoto T, et al. Tunicamycin-Induced Alterations in the Vasorelaxant Response in Organ-Cultured Superior Mesenteric Arteries of Rats. Biol Pharm Bull. 2016;39(9):1475-81.

Inhibitor · Natural Compounds · Compound Libraries · Recombinant Proteins

This product is for Research Use Only· Not for Human or Veterinary or Therapeutic Use

Tel:781-999-4286 E_mail:info@targetmol.com Address:36 Washington Street,Wellesley Hills,MA 02481

Page 2 of 2 www.targetmol.com