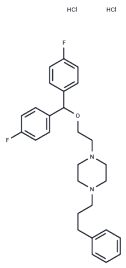
Data Sheet (Cat.No.T7153)

TargetMol
YOUR TARGET MOLECULES

Vanoxerine dihydrochloride

Chemical Properties



CAS No. : 67469-78-7

Formula: C28H34Cl2F2N2O

Molecular Weight: 523.49

Appearance: no data available

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

Biological Description

Description	Vanoxerine dihydrochloride (GBR-12909 dihydrochloride) is a potent inhibitor that blocks dopamine uptake (IC50 : 1-51 nM)
Targets(IC50)	Dopamine Receptor
In vivo	In 9 SP dogs, 11 episodes each of sustained (>10 minutes) AF and AFL were induced. Electrophysiological studies were performed before and after infusion of vanoxerine, which effectively terminated AF and AFL in 19 of 22 episodes. Simultaneous multisite mapping during 3 AF and 3 AFL episodes demonstrated that termination of each arrhythmia occurred with termination of the driver (a reentrant circuit) following an increase in tachycardia CL. Except for conduction in an area of slow conduction in the driver's reentrant circuit, vanoxerine did not significantly affect intraatrial or atrioventricular conduction time, QRS duration, or QT/QTc intervals. Ventricular refractoriness prolonged minimally during ventricular pacing at 400 and 333 ms (176 +/- 16 ms to 182 +/- 16 ms; 173 +/- 11 ms to 178 +/- 18 ms, respectively). Vanoxerine minimally increased (mean 0.7 mA) atrial stimulus threshold for capture[1].Vanoxerine dihydrochloridealso blocks ligand binding to sigma receptors in rat brain (IC50 = 48 nM)[2].

Solubility Information

Solubility	DMSO: 9.4 mg/mL (17.96 mM), (< 1 mg/ml refers to the product slightly soluble or insoluble)

Preparing Stock Solutions

	1mg	5mg	10mg
1 mM	1.9103 mL	9.5513 mL	19.1026 mL
5 mM	0.3821 mL	1.9103 mL	3.8205 mL
10 mM	0.191 mL	0.9551 mL	1.9103 mL
50 mM	0.0382 mL	0.191 mL	0.3821 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

Vanoxerine, a New Drug for Terminating Atrial Fibrillation and Flutter[J]. J Cardiovasc Electrophysiol, 2010, 21(3): 311-319.