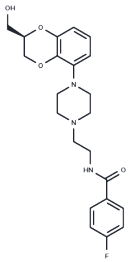
Data Sheet (Cat.No.T16711)

TargetMol

Flesinoxan

Chemical Properties



CAS No. : 98206-10-1

Formula: C22H26FN3O4

Molecular Weight: 415.46

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	Flesinoxan, a hypotensive agent, is an effective, high-affinity, and selective 5-hydroxytryptamine1A receptor agonist (EC50: 24 nM).
Targets(IC50)	5-HT Receptor
In vivo	Flesinoxan functions as a partial agonist at postsynaptic and a full agonist at presynaptic 5-HT1A receptors. Its intravenous delivery inhibits the activity of both CA3 pyramidal neurons and dorsal raphe 5-HT neurons, bearing a similar antagonistic effect on 5-HT's influence on CA3 pyramidal neurons as 8-OH-DPAT. Studies of acute brain penetration revealed that nine minutes post-intravenous administration, [3H]8-OH-DPAT achieves significantly higher brain concentrations than [3H]Flesinoxan. Both Flesinoxan and 8-OH-DPAT, when administered subcutaneously, induce dose-dependent hypothermia, with Flesinoxan's effect being notably reduced by the pre-administration of pindolol, a non-selective 5-HT1A antagonist, and methysergide, a 5-HT1/2 antagonist. Comparable levels of hypothermia are observed with 3 mg/kg of Flesinoxan and 0.5 mg/kg of 8-OH-DPAT, though Flesinoxan's peak effect transpires 30 minutes later than that of 8-OH-DPAT and diminishes more gradually.

Solubility Information

Solubility	DMSO: 31.25 mg/mL (75.22 mM),Sonication is recommended. (< 1 mg/ml refers to the product slightly soluble or insoluble)
In vivo Formulation	10% DMSO+40% PEG300+5% Tween-80+45% Saline: 2 mg/mL (4.81 mM),Sonication is recommended. *Please add the solvents sequentially, clarifying the solution as much as possible before adding the next one. Dissolve by heating and/or sonication if necessary. Working solution is recommended to be prepared and used immediately. The formulation provided above is for reference purposes only. In vivo formulations may vary and should be modified based on specific experimental conditions.*

Preparing Stock Solutions

	1mg	5mg	10mg
1 mM	2.407 mL	12.0349 mL	24.0697 mL
5 mM	0.4814 mL	2.407 mL	4.8139 mL
10 mM	0.2407 mL	1.2035 mL	2.407 mL
50 mM	0.0481 mL	0.2407 mL	0.4814 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

Hadrava V, et al. Characterization of 5-hydroxytryptamine1A properties of flesinoxan: in vivo electrophysiology and hypothermia study. Neuropharmacology. 1995 Oct;34(10):1311-26.
Schoeffter P, et al. Centrally acting hypotensive agents with affinity for 5-HT1A binding sites inhibit forskolin-stimulated adenylate cyclase activity in calf hippocampus. Br J Pharmacol. 1988 Nov;95(3):975-85.
Rodgers RJ, et al. Antianxiety and behavioral suppressant actions of the novel 5-HT1A receptor agonist, flesinoxan. Pharmacol Biochem Behav. 1994 Aug;48(4):959-63.