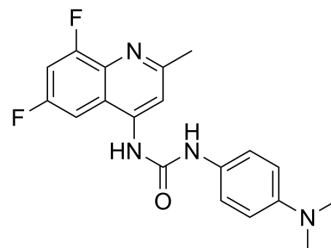


SB-408124

Cat. No.:	HY-70068		
CAS No.:	288150-92-5		
Molecular Formula:	C ₁₉ H ₁₈ F ₂ N ₄ O		
Molecular Weight:	356.37		
Target:	Orexin Receptor (OX Receptor)		
Pathway:	GPCR/G Protein; Neuronal Signaling		
Storage:	Powder	-20°C	3 years
		4°C	2 years
	In solvent	-80°C	2 years
		-20°C	1 year



SOLVENT & SOLUBILITY

In Vitro	DMSO : 50 mg/mL (140.30 mM; Need ultrasonic)			
		Solvent Concentration	Mass	
			1 mg	5 mg
			10 mg	
Preparing Stock Solutions	1 mM	2.8061 mL	14.0304 mL	28.0608 mL
	5 mM	0.5612 mL	2.8061 mL	5.6122 mL
	10 mM	0.2806 mL	1.4030 mL	2.8061 mL
Please refer to the solubility information to select the appropriate solvent.				
In Vivo	1. Add each solvent one by one: 10% DMSO >> 90% corn oil Solubility: ≥ 2.5 mg/mL (7.02 mM); Clear solution			

BIOLOGICAL ACTIVITY

Description	SB-408124 is a non-peptide OX ₁ receptor antagonist with K _i s of 57 nM and 27 nM in whole cell and membrane, respectively. SB-408124 exhibits 50-fold selectivity over OX ₂ receptor ^[1] .	
IC₅₀ & Target	OX ₁ Receptor 57 nM (K _i , in whole cell)	OX ₁ Receptor 27 nM (K _i , in cell membrane)
In Vivo	SB-408124 (30 μg/10 μl; i.c.v.; male Wistar rats) decreases Orexin-A induced water intake in Wistar rats ^[2] . MCE has not independently confirmed the accuracy of these methods. They are for reference only.	

REFERENCES

[1]. Langmead CJ, et al. Characterisation of the binding of [3H]-SB-674042, a novel nonpeptide antagonist, to the human orexin-1 receptor. *Br J Pharmacol.* 2004;141(2):340-346.

[2]. Kis GK, et al. The osmotically and histamine-induced enhancement of the plasma vasopressin level is diminished by intracerebroventricularly administered orexin in rats. *Pflugers Arch.* 2012;463(4):531-536.

Caution: Product has not been fully validated for medical applications. For research use only.

Tel: 609-228-6898

Fax: 609-228-5909

E-mail: tech@MedChemExpress.com

Address: 1 Deer Park Dr, Suite Q, Monmouth Junction, NJ 08852, USA