Product Data Sheet

Product Name: CP-809101
Cat. No.: GC17183

Chemical Properties

Cas. No.	479683-64-2		
Chemical Name	2-((3-chlorobenzyl)oxy)-6-(piperazin-1-yl)pyrazine		
SMILES	ClC1=CC=CC(COC2=NC(N3CCNCC3)=CN=C2)=C1		
Formula	$C_{15}H_{17}ClN_4O$	M.Wt	304.77
Solubility	DMF: 20 mg/ml,DMSO: 20 mg/ml,Ethanol: 2 mg/ml,PBS (pH 7.2): 0.1 mg/ml	Storage	Store at -20°C
General tips	For obtaining a higher solubility , please warm the tube at 37 ℃ and shake it in the ultrasonic bath for a while.Stock solution can be stored below -20℃ for several months.		
Shipping Condition	Evaluation sample solution : ship with blue ice All other available size: ship with RT , or blue ice upon request.		
Structure	CP-809101		

Background

CP-809101 is a potent and selective 5-HT2C receptor agonist with pEC50 of 9.96/7.19/6.81 for human 5-HT2C/5-HT2B/5-HT2A receptors respectively. IC50 Value: 9.96(pEC50 for 5-HT2C); 7.19(pEC50 for 5-HT2B); 6.81(pEC50 for 5-HT2A)Target: 5-HT2C ReceptorCP-809101 is a potent, functionally selective 5-HT2C agonist that displays approximately 100% efficacy in vitro. The aim of the present studies was to assess the efficacy of a selective 5-HT2C agonist in animal models predictive of antipsychotic-like efficacy and side-effect liability. Similar to currently available antipsychotic drugs, CP-809101 dose-dependently inhibited conditioned avoidance responding (CAR, ED50 = 4.8 mg/kg, sc). CP-809101 antagonized both PCP- and d-amphetamine-induced hyperactivity with ED50 values of 2.4 and 2.9 mg/kg (sc), respectively and also reversed an apomorphine induced-deficit in prepulse inhibition. At doses up to 56 mg/kg, CP-809101 did not produce catalepsy. Thus, the present results demonstrate that the 5-HT2C agonist, CP-809101, has a pharmacological profile similar to that of the atypical

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antipsychotics with low extrapyramidal symptom liability. CP-809101 was inactive in two animal models of antidepressant-like activity, the forced swim test and learned helplessness.

References:

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[4]. Siuciak JA, Chapin DS, McCarthy SA, et al. CP-809,101, a selective 5-HT2C agonist, shows activity in animal models of antipsychotic activity. Neuropharmacology. 2007 Feb;52(2):279-90.

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