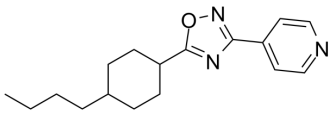
PSN 375963

Cat. No.:	HY-108258
CAS No.:	388575-52-8
Molecular Formula:	$C_{17}H_{23}N_3O$
Molecular Weight:	285.38
Target:	GPR119
Pathway:	GPCR/G Protein; Neuronal Signaling
Storage:	Powder -20°C 3 years 4°C 2 years In solvent -80°C 6 months -20°C 1 month



SOLVENT & SOLUBILITY

In Vitro

DMSO : 50 mg/mL (175.20 mM; Need ultrasonic)

Preparing Stock Solutions	Solvent / Mass / Concentration	1 mg	5 mg	10 mg
	1 mM	3.5041 mL	17.5205 mL	35.0410 mL
	5 mM	0.7008 mL	3.5041 mL	7.0082 mL
	10 mM	0.3504 mL	1.7520 mL	3.5041 mL

Please refer to the solubility information to select the appropriate solvent.

In Vivo

1. Add each solvent one by one: 10% DMSO >> 40% PEG300 >> 5% Tween-80 >> 45% saline
   Solubility: 2.5 mg/mL (8.76 mM); Clear solution; Need ultrasonic
2. Add each solvent one by one: 10% DMSO >> 90% (20% SBE-β-CD in saline)
   Solubility: ≥ 2.5 mg/mL (8.76 mM); Clear solution
3. Add each solvent one by one: 10% DMSO >> 90% corn oil
   Solubility: ≥ 2.5 mg/mL (8.76 mM); Clear solution

BIOLOGICAL ACTIVITY

Description

PSN 375963 is a potent GPR119 agonist, with EC_{50}s of 8.4 and 7.9 μM for human and mouse GPR119, respectively. PSN 375963 shows similar potency to the endogenous agonist oleoylethanolamide (OEA)[1][2].

In Vitro

The endogenous ligand OEA signals through GPR119 in a manner similar to glucagon-like peptide-1 (GLP-1) and its receptor with respect to insulin secretion, intracellular calcium and cAMP[2].

MCE has not independently confirmed the accuracy of these methods. They are for reference only.

REFERENCES

[1]. Overton HA, et al. Deorphanization of a G protein-coupled receptor for oleoylethanolamide and its use in the discovery of small-molecule hypophagic agents. Cell Metab. 2006;3(3):167-175.

[2]. Ning Y, et al. Endogenous and synthetic agonists of GPR119 differ in signalling pathways and their effects on insulin secretion in MIN6c4 insulinoma cells. Br J Pharmacol. 2008;155(7):1056-1065.

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