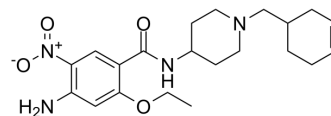


## Cinitapride

Cat. No.:	HY-B2089		
CAS No.:	66564-14-5		
Molecular Formula:	C <sub>21</sub> H <sub>30</sub> N <sub>4</sub> O <sub>4</sub>		
Molecular Weight:	402.49		
Target:	Dopamine Receptor; 5-HT Receptor		
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 : 20.83 mg/mL (51.75 mM; ultrasonic and warming and heat to 60°C)

Concentration	Mass		
	1 mg	5 mg	10 mg
1 mM	2.4845 mL	12.4227 mL	24.8453 mL
5 mM	0.4969 mL	2.4845 mL	4.9691 mL
10 mM	0.2485 mL	1.2423 mL	2.4845 mL

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

### BIOLOGICAL ACTIVITY

#### Description

Cinitapride is a nonselective 5-HT<sub>1</sub> and 5-HT<sub>4</sub> receptors agonist and a 5-HT<sub>2</sub> and D<sub>2</sub> antagonist. Cinitapride can be used in functional dyspepsia (FD) and gastroesophageal reflux disease (GERD) research<sup>[1]</sup>.

#### In Vivo

Cinitapride (intraperitoneal injection; 0.25-1 mg/kg; once) shows gastroprotective effects in gastric ulceration rat model<sup>[2]</sup>. MCE has not independently confirmed the accuracy of these methods. They are for reference only.

Animal Model:	Male Wistar rats with gastric ulceration <sup>[2]</sup>
Dosage:	0.25-1 mg/kg
Administration:	Intraperitoneal injection; 0.25-1 mg/kg; once
Result:	Reduced haemorrhagic lesions compared with the ulcerated control group. Decreased the percentage of ulceration to 28.76% at the highest dose (1 mg/kg). Attenuated the increase myeloperoxidase activity (p<0.05, p<0.01).

---

Increased GSH-px activity in the gastric mucosa.

---

## REFERENCES

---

- [1]. Du Y, et al. Efficacy and safety of cinitapride in the treatment of mild to moderate postprandial distress syndrome-predominant functional dyspepsia. *J Clin Gastroenterol.* 2014 Apr;48(4):328-35.
- [2]. Alarcón de la Lastra C, et al. Effects of cinitapride on gastric ulceration and secretion in rats. *Inflamm Res.* 1998 Mar;47(3):131-6.
- [3]. Alarcón-de-la-Lastra Romero C, et al. Cinitapride protects against ethanol-induced gastric mucosal injury in rats: role of 5-hydroxytryptamine, prostaglandins and sulfhydryl compounds. *Pharmacology.* 1997 Apr;54(4):193-202.
- 

**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](mailto:tech@MedChemExpress.com)

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