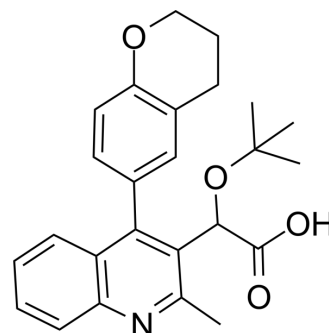


(±)-BI-D

Cat. No.:	HY-18601		
CAS No.:	1416258-16-6		
Molecular Formula:	C ₂₅ H ₂₇ NO ₄		
Molecular Weight:	405.49		
Target:	HIV; HIV Integrase		
Pathway:	Anti-infection; Metabolic Enzyme/Protease		
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 : ≥ 100 mg/mL (246.62 mM)
 * "≥" means soluble, but saturation unknown.

Preparing Stock Solutions	Solvent Concentration	Mass		
		1 mg	5 mg	10 mg
	1 mM	2.4662 mL	12.3308 mL	24.6615 mL
	5 mM	0.4932 mL	2.4662 mL	4.9323 mL
	10 mM	0.2466 mL	1.2331 mL	2.4662 mL

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

In Vivo

- Add each solvent one by one: 10% DMSO >> 40% PEG300 >> 5% Tween-80 >> 45% saline
 Solubility: ≥ 2.5 mg/mL (6.17 mM); Clear solution
- Add each solvent one by one: 10% DMSO >> 90% (20% SBE-β-CD in saline)
 Solubility: ≥ 2.5 mg/mL (6.17 mM); Clear solution
- Add each solvent one by one: 10% DMSO >> 90% corn oil
 Solubility: ≥ 2.5 mg/mL (6.17 mM); Clear solution

BIOLOGICAL ACTIVITY

Description

(±)-BI-D is a potent ALLINI (An allosteric IN inhibitor) that binds integrase at the LEDGF/p75 binding site. IC₅₀ value: 2.4–2.9 μM (HIV-Luc infection of WT and Hdgfrp2 KO cells) [1] Target: integrase inhibitor in vitro: Approximately 2.4–2.9 μM of BI-D was required to inhibit 50% of HIV-Luc infection of WT and Hdgfrp2 KO cells, while the IC₅₀ decreased dramatically, to 160–200 nM, in Psp1 and double-KO cells [1].

CUSTOMER VALIDATION

- Cell Host Microbe. 2018 Sep 12;24(3):392-404.e8.
- Mbio. 2023 Feb 6;e0356022.
- J Virol. 2017 Apr 13;91(9). pii: e02155-16.
- Viruses. 2022, 14(9), 1883.
- Retrovirology. 2020 Aug 31;17(1):28.

See more customer validations on www.MedChemExpress.com

REFERENCES

- [1]. Wang H, et al. HRP2 determines the efficiency and specificity of HIV-1 integration in LEDGF/p75 knockout cells but does not contribute to the antiviral activity of a potent LEDGF/p75-binding site integrase inhibitor. Nucleic Acids Res. 2012 Dec;40(22):11518-30.
- [2]. Fader LD, et al. Minimizing the Contribution of Enterohepatic Recirculation to Clearance in Rat for the NCINI Class of Inhibitors of HIV. ACS Med Chem Lett. 2014 Apr 16;5(6):711-6.

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