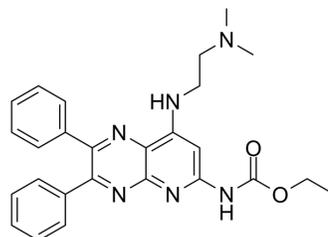


UNC10217938A

Cat. No.:	HY-136151		
CAS No.:	1347749-97-6		
Molecular Formula:	C ₂₆ H ₂₈ N ₆ O ₂		
Molecular Weight:	456.54		
Target:	Others		
Pathway:	Others		
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 : 10 mg/mL (21.90 mM); ultrasonic and warming and heat to 80°C)				
		Solvent Concentration	Mass 1 mg	5 mg	10 mg
	Preparing Stock Solutions	1 mM	2.1904 mL	10.9519 mL	21.9039 mL
		5 mM	0.4381 mL	2.1904 mL	4.3808 mL
10 mM		0.2190 mL	1.0952 mL	2.1904 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: ≥ 1 mg/mL (2.19 mM); Clear solution				

BIOLOGICAL ACTIVITY

Description	UNC10217938A is a 3-deazapteridine analog with strong oligonucleotide enhancing effects. UNC10217938A enhances oligonucleotides effects by modulating their intracellular trafficking and release from endosomes. UNC10217938A also enhances the effects of antisense and siRNA oligonucleotides ^[1] .
In Vitro	<p>UNC10217938A strongly enhances luciferase induction in HelaLuc705 cells when used in the 5-25 μM range and are substantially more effective and potent than Retro-1. As compared to splice switching oligonucleotide (SSO) alone, UNC10217938A provides a 60-fold enhancement at 10 μM and 220-fold at 20 μM, in contrast to a 11-fold enhancement for 100 μM Retro-1^[1].</p> <p>UNC10217938A can substantially enhance effects of receptor targeted oligonucleotide conjugates. UNC10217938A also can enhance effects of uncharged morpholino oligonucleotides as well as negatively charged oligonucleotides^[1].</p> <p>Exposure of cells to UNC10217938A leads to a major reduction in co-localization of the TAMRA-oligonucleotide with the late endosome marker Rab7, but had little effect on co-localization with the lysosomal marker LAMP-1. UNC10217938A causes</p>

	partial release of oligonucleotide from late endosomes to the cytosol followed by nuclear accumulation ^[1] . MCE has not independently confirmed the accuracy of these methods. They are for reference only.
In Vivo	Systemic treatment with SSO623 followed by administration of UNC10217938A (7.5 mg/kg; intravenous injection) produces distinct increases in EGFP fluorescence in liver, kidney and heart in EGFP654 mice ^[3] . MCE has not independently confirmed the accuracy of these methods. They are for reference only.

CUSTOMER VALIDATION

- Nucleic Acids Res. 2023 Feb 2;gkad023.

See more customer validations on www.MedChemExpress.com

REFERENCES

[1]. Yang B, et al. High-throughput screening identifies small molecules that enhance the pharmacological effects of oligonucleotides. Nucleic Acids Res. 2015 Feb 27;43(4):1987-96.

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