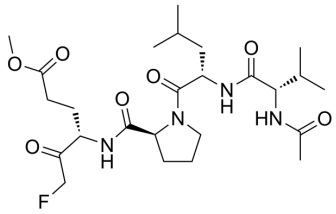
Ac-VLPE-FMK

Cat. No.:	HY-153614
CAS No.:	2679825-27-3
Molecular Formula:	$C_{25}H_{41}FN_4O_7$
Molecular Weight:	528.61
Target:	Cathepsin
Pathway:	Metabolic Enzyme/Protease
Storage:	Powder -20°C 3 years 4°C 2 years In solvent -80°C 6 months -20°C 1 month



BIOLOGICAL ACTIVITY

Description	Ac-VLPE-FMK, a tetrapeptidyl mono-fluoromethyl ketone (m-FMK), is a Cat-B and Cat-L inhibitor. Ac-VLPE-FMK can be used for the research of cancer aggressiveness[1][2].	
IC_{50} & Target	Cathepsin B	cathepsin L
In Vitro	Ac-VLPE-FMK (2 μM) significantly affects the cleavage of probe Ac-PLVQ-AMC by human recombinant CtsB and L[1]. Ac-VLPE-FMK (30 min) inhibits the generation of the fluorescence derived from the cleavage of the substrate Ac-PLVQ-AMC in 769-p and A498 cells[1]. Ac-VLPE-FMK (2.5-250 μM; 24-72 h) does not affect renal cancer cell viability, but influences cell migration rate, cellular adhesion, colony formation, and markers expression in renal cancer cells[1]. MCE has not independently confirmed the accuracy of these methods. They are for reference only.	

REFERENCES

[1]. Rudzińska M, et, al. Cysteine Cathepsins Inhibition Affects Their Expression and Human Renal Cancer Cell Phenotype. Cancers (Basel). 2020 May 21;12(5):1310.

[2]. Citarella A, et, al. Peptidyl Fluoromethyl Ketones and Their Applications in Medicinal Chemistry. Molecules. 2020 Sep 3;25(17):4031.

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