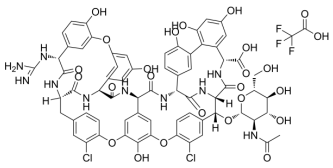
Antimicrobial agent-12

Cat. No.:	HY-151502
Molecular Formula:	$C_{69}H_{61}Cl_2F_3N_{10}O_{25}$
Molecular Weight:	1558.18
Target:	Bacterial; SARS-CoV
Pathway:	Anti-infection
Storage:	Please store the product under the recommended conditions in the Certificate of Analysis.



BIOLOGICAL ACTIVITY

Description	Antimicrobial agent-12 is a potent antibacterial agent with SARS-CoV-2 inhibitory activity[1].
IC_{50} & Target	Bacteria, SARS-CoV-2[1]
In Vitro	Antimicrobial agent-12 (compound 6) shows inhibitory activity on coronavirus (SARS-CoV-2) replication and spike-mediated pseudovirus entry in Vero E6 cells, with EC_{50} values of 13 μM[1]. Antimicrobial agent-12 inhibits $3CL^{Pro}$ enzyme activity and the ACE2-spike interaction, with EC_{50} values of 28 μM and 48 μM respectively[1]. Antimicrobial agent-12 (0-1 μg/mL approximately) shows activity against diverse species of Gram-positive bacteria including drug-resistant strains[1]. Antimicrobial agent-12 (0-100 μM, 2 h) inhibits SARS-CoV-2 pseudovirus entry in Vero and A549-AT cells[1]. MCE has not independently confirmed the accuracy of these methods. They are for reference only.

Cell Viability Assay[1]

Cell Line:	S. aureus, E. faecalis, E. faecium, S. epidermidis, S. haemolyticus
Concentration:	0-1 μg/mL approximately
Incubation Time:	
Result:	Inhibited bacteria activities with MIC values of 0.0625-0.27 μg/mL.

REFERENCES

[1]. Ilona Bereczki, et al. Semisynthetic teicoplanin derivatives with dual antimicrobial activity against SARS-CoV-2 and multiresistant bacteria. Sci Rep. 2022 Sep 26;12(1):16001.

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