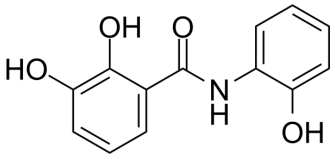
COX-2-IN-34

Cat. No.:	HY-155133
CAS No.:	2788578-71-0
Molecular Formula:	$C_{13}H_{11}NO_4$
Molecular Weight:	245.23
Target:	COX
Pathway:	Immunology/Inflammation
Storage:	Please store the product under the recommended conditions in the Certificate of Analysis.



BIOLOGICAL ACTIVITY

Description	COX-2-IN-34 (compound 8a) is a selective and orally active inhibitor of COX-2 , with an IC_{50} of 0.42 μM. COX-2-IN-34 has no gastric ulcer toxicity but has anti-inflammatory effects[1].
IC_{50} & Target	COX-2 0.42 μM (IC_{50})
In Vitro	COX-2-IN-34 (compound 8a) (100 μM, 24 h) shows no obvious cytotoxicity to RAW264.7 cells[1]. Cox-2- IN -34 selectively inhibits the COX-1 and COX-2 activity with IC_{50} values of 34.86 and 0.42μM, respectively. The inhibition effect of COX-2-IN-34 (10 μM) on COX-2 reaches 82%[1]. MCE has not independently confirmed the accuracy of these methods. They are for reference only.
In Vivo	COX-2-IN-34 (compound 8a) (50 mg/kg for p.o., three days) shows no gastric ulceration in normal male rat model[1]. COX-2-IN-34 (50 mg/kg for s.c., three times) shows significant anti-inflammatory effects in the Carrageenan-induced rat paw edema assay model [1]. MCE has not independently confirmed the accuracy of these methods. They are for reference only.

Animal Model:	The Carrageenan-induced rat paw edema assay model[1]
Dosage:	50 mg/kg
Administration:	Subcutaneous injection (s.c.)
Result:	Expressed the reduction of edema claw volume after 0h, 1 h, 2 h, 3h, 4 h, and 6 h of carrageenan injection compared to the control group. Exhibited superior inhibition of 42.90% and 45.95% at the 3rd and 4th hour, respectively, which was comparatively much closer in potency to that of the Celecoxib (HY-14398) group (45.18% inhibition of edema at 3h).

REFERENCES

[1]. 1. 1. Min Xin, et al. Synthesis and biological evaluation of resveratrol amide derivatives as selective COX-2 inhibitors. Chemico-Biological Interactions. Volume 380, 1

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