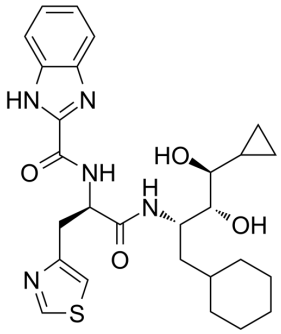
Ro 0437626

Cat. No.:	HY-108673
CAS No.:	134362-79-1
Molecular Formula:	$C_{27}H_{35}N_5O_4S$
Molecular Weight:	525.66
Target:	P2X Receptor
Pathway:	Membrane Transporter/Ion Channel
Storage:	Please store the product under the recommended conditions in the Certificate of Analysis.



BIOLOGICAL ACTIVITY

Description	Ro 0437626 is a selective purinergic ($P2X_1$) receptor antagonist (IC_{50} = 3 μM), but shows low affinity for P2X2, P2X3 and P2X2/3 receptors (IC_{50} > 100 μM)[1].
IC_{50} & Target	IC50: 3 μM (P2X1 receptor)
In Vitro	Ro 0437626 reduces PMA-evoked Ca^{2+}entry with 6.8 ± 4.7% of control[2]. MCE has not independently confirmed the accuracy of these methods. They are for reference only.
In Vivo	Ro 0437626 (1 and 10 μmol/kg; i.v.) causes a reduction in postinfusion isovolumetric contractions[3]. MCE has not independently confirmed the accuracy of these methods. They are for reference only.

Animal Model:	Female rat (urethane-anaesthetized)[3]
Dosage:	1 and 10 μmol/kg
Administration:	I.v.
Result:	Caused a reduction in postinfusion isovolumetric contractions.

REFERENCES

[1]. Jaime-Figueroa S, et al. Discovery and synthesis of a novel and selective drug-like P2X(1) antagonist. Bioorg Med Chem Lett. 2005;15(13):3292-3295.

[2]. Harper MT, et al. Phorbol ester-evoked Ca2+ signaling in human platelets is via autocrine activation of P(2X1) receptors, not a novel non-capacitative Ca2+ entry. J Thromb Haemost. 2010;8(7):1604-1613.

[3]. King BF, et al. Investigation of the effects of P2 purinoceptor ligands on the micturition reflex in female urethane-anaesthetized rats. Br J Pharmacol. 2004;142(3):519-530.

Caution: Product has not been fully validated for medical applications. For research use only.

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