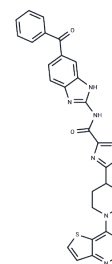


SC75741

Chemical Properties

CAS No. : 913822-46-5
 Formula: C₂₉H₂₃N₇O₂S₂
 Molecular Weight: 565.67
 Storage: Powder: -20°C for 3 years | In solvent: -80°C for 1 year
 Actual storage temperature shall be subject to the COA.



Biological Description

Description	SC75741 is a potent P65 inhibitor with IC ₅₀ of 200 nM
Targets(IC ₅₀)	NF-κB, Influenza Virus
In vitro	SC75741 shows immunosuppressive activity by inhibiting human PBMC proliferation with IC ₅₀ of 2.2 μM. [1] SC75741 inhibits replication of influenza A and B viruses by inhibiting NF-κB-mediated signalling on a transcriptional level. Moreover, SC75741 shows a high barrier for development of resistant virus variants. [2]
In vivo	SC75741 (15 mg/kg i.p.) reduces virus replication and cytokine expression in mice lungs after H5N1 influenza virus infection. [2]
Kinase Assay	NF-κB reporter gene assay: The NF-κB reporter gene assay is prepared with A549-NF-κB-SEAP cell line according to manufacturer's instructions. In short, A549 cells stably transfected with pNF-κB-SEAP reporter gene plasmid are plated and allowed to attach overnight. The cells are subsequently incubated for 5 h with described compounds at 100, 30, 10, 3, 1, 0.3, 0.1, and 0 μM and then stimulated with 10 ng/ml TNF-α for 22 h. The supernatant of the cell is analyzed for SEAP activity using a chemiluminescent SEAP reporter gene assay.
Cell Research	Cell viability assay is prepared using a CellTiter-Blu™ Cell Viability Assay. For each concentration of the compound four replicates are measured.(Only for Reference)

Solubility Information

Solubility	H ₂ O: < 1 mg/mL (insoluble or slightly soluble), DMSO: 50 mg/mL (88.39 mM), Sonication is recommended. Ethanol: < 1 mg/mL (insoluble or slightly soluble), (< 1 mg/ml refers to the product slightly soluble or insoluble)
In vivo Formulation	10% DMSO+40% PEG300+5% Tween 80+45% Saline: 2 mg/mL (3.54 mM), Sonication is recommended. Please add the solvents sequentially, clarifying the solution as much as possible before adding the next one. Dissolve by heating and/or sonication if necessary. Working solution is recommended to be prepared and used immediately. The formulation provided above is for reference purposes only. In vivo formulations may vary and should be modified based on specific experimental conditions.

Preparing Stock Solutions

	1mg	5mg	10mg
1 mM	1.7678 mL	8.8391 mL	17.6782 mL
5 mM	0.3536 mL	1.7678 mL	3.5356 mL
10 mM	0.1768 mL	0.8839 mL	1.7678 mL
50 mM	0.0354 mL	0.1768 mL	0.3536 mL

Please select the appropriate solvent to prepare the stock solution, according to the solubility of the product in different solvents. Please use it as soon as possible.

Note: The dilution table applies only to solid products. For liquid products, please calculate the stock solution based on the stated concentration and/or density.

Reference

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