

Cobaltic Protoporphyrin IX chloride

Chemical Properties

CAS No. : 102601-60-5

Formula: C₃₄H₃₂ClCoN₄O₄

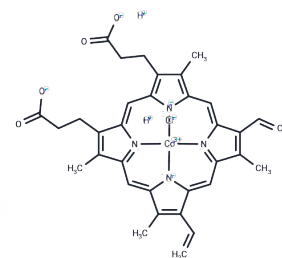
Molecular Weight: 655.03

Storage:

Store at low temperature, Keep away from direct sunlight

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	Cobaltic Protoporphyrin IX chloride (CoPP) is a potent heme oxygenase 1 (HO-1) inducer with antiviral activity that inhibits influenza A virus (IAV) infection by inducing a type I IFN response. mTOR inhibitor-8 is a potent mTOR inhibitor and autophagy inducer with antiviral and antitumor activities.
Targets(IC50)	Apoptosis, Bcl-2 Family, Caspase, Nrf2, Antibacterial, Autophagy, Cytochromes P450, ROS

Solubility Information

Solubility	Ethanol: 1 mg/mL (1.53 mM), Sonication is recommended. DMF: PBS (pH 7.2) (1:6): 0.14 mg/mL (0.21 mM), Sonication is recommended. DMSO: < 1 mg/mL (insoluble), Sonication is recommended. DMF: 30 mg/mL (45.8 mM), Sonication is recommended. (< 1 mg/ml refers to the product slightly soluble or insoluble)
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Preparing Stock Solutions

	1mg	5mg	10mg
1 mM	1.5266 mL	7.6332 mL	15.2665 mL
5 mM	0.3053 mL	1.5266 mL	3.0533 mL
10 mM	0.1527 mL	0.7633 mL	1.5266 mL
50 mM	0.0305 mL	0.1527 mL	0.3053 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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- Li, J., Wu, B., Teng, D., et al. Cobalt-protoporphyrin enhances heme oxygenase 1 expression and attenuates liver ischemia/reperfusion injury by inhibiting apoptosis *Mol. Med. Rep.* 17(3)4567-4572(2018)
- Willix, J.L., Stockton, J.L., Olson, R.M., et al. Activation of heme oxygenase expression by cobalt protoporphyrin treatment prevents pneumonic plague caused by inhalation of *Yersinia pestis* *Antimicrob. Agents Chemother.* 64(4) e01819-01819(2020)
- Shen, J., Kortlever, R., Kas, R., et al. Electrocatalytic reduction of carbon dioxide to carbon monoxide and methane at an immobilized cobalt protoporphyrin *Nat. Commun.* 68177(2015)

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