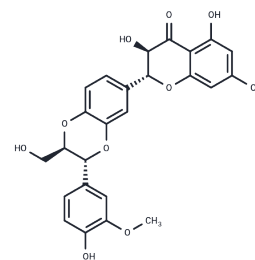


Silybin A

Chemical Properties

CAS No. :	22888-70-6
Formula:	C ₂₅ H ₂₂ O ₁₀
Molecular Weight:	482.44
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	Silybin A is the major active constituent of silymarin, a standardized extract of the milk thistle seeds, containing a mixture of flavonolignans consisting of silibinin, isosilibinin, silicristin, silidianin and others. Silibinin itself is a mixture of two diastereomers, silybin A and silybin B, in approximately equimolar ratio. Both in vitro and animal research suggest that silibinin has hepatoprotective (antihepatotoxic) properties that protect liver cells against toxins. Silibinin has also demonstrated in vitro anti-cancer effects against human prostate adenocarcinoma cells, estrogen-dependent and -independent human breast carcinoma cells, human ectocervical carcinoma cells, human colon cancer cells, and both small and nonsmall human lung carcinoma cells.
Targets(IC50)	Reactive Oxygen Species, Autophagy, ROS

Solubility Information

Solubility	DMSO: 260 mg/mL (538.93 mM), Sonication is recommended. H ₂ O: < 1 mg/mL (insoluble or slightly soluble), 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: 3.3 mg/mL (6.84 mM), Sonication is recommended. <i>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.</i>

Preparing Stock Solutions

	1mg	5mg	10mg
1 mM	2.0728 mL	10.364 mL	20.728 mL
5 mM	0.4146 mL	2.0728 mL	4.1456 mL
10 mM	0.2073 mL	1.0364 mL	2.0728 mL
50 mM	0.0415 mL	0.2073 mL	0.4146 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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