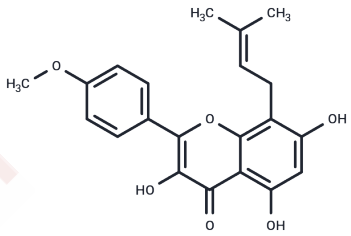
Data Sheet (Cat.No.T3398)

TargetMol

Icaritin

Chemical Properties



CAS No. : 118525-40-9

Formula: C21H20O6

Molecular Weight: 368.38

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	Icaritin (Anhydroicaritin) has hormone regulation activity and cardiovascular function improvement activity. Icaritin has anticancer activity, can induce S phase arrest and apoptosis, inhibit ENKL cell proliferation. Icaritin has anti-multiple myeloma activity, mainly mediated by inhibiting IL-6/JAK2/STAT3 signaling. Icaritin at low concentration (4 or 8 μMol/L) can promote rat chondrocyte proliferation and inhibit cell apoptosis, while the effect of Icaritin on rat chondrocyte at high concentration was reversed.
Targets(IC50)	Apoptosis,STAT,Autophagy,JAK

Solubility Information

Solubility	DMSO: 22.05 mg/mL (59.86 mM),Sonication is recommended. H2O: < 1 mg/mL (insoluble) (< 1 mg/ml refers to the product slightly soluble or insoluble)
In vivo Formulation	10% DMSO+40% PEG300+5% Tween 80+45% Saline: 1 mg/mL (2.71 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	2.7146 mL	13.5729 mL	27.1459 mL
5 mM	0.5429 mL	2.7146 mL	5.4292 mL
10 mM	0.2715 mL	1.3573 mL	2.7146 mL
50 mM	0.0543 mL	0.2715 mL	0.5429 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

Zhu S, et al. Oncotarget. 2015 Apr 30;6(12):10460-72.
Gao Y, Xu G, Ma L, et al. Icariside I specifically facilitates ATP or nigericin-induced NLRP3 inflammasome activation and causes idiosyncratic hepatotoxicity. Cell Communication and Signaling. 2021 Feb 11;19(1):13. doi: 10.1186/s12964-020-00647-1.
Gao Y, Xu G, Ma L, et al. Icarisid I specifically facilitates ATP or nigericin-induced NLRP3 inflammasome activation and causes idiosyncratic hepatotoxicity. Cell Communication and Signaling. 2020
Qin L, et al. Biomaterials. 2015 Aug;59:125-43.
Liu YQ, et al. Phytomedicine. 2014 Oct 15;21(12):1633-7.
Gao Y, Xu G, Ma L, et al. Icarisid I specifically facilitates ATP or nigericin-induced NLRP3 inflammasome activation and causes idiosyncratic hepatotoxicity[J]. Cell Communication and Signaling. 2020
Gao Y, Xu G, Ma L, et al. Icariside I specifically facilitates ATP or nigericin-induced NLRP3 inflammasome activation and causes idiosyncratic hepatotoxicity[J]. Cell Communication and Signaling. 2021, 19(1): 1-14.