

Licoflavone C Datasheet

4th Edition (Revised in July, 2016)

[Product Information]

Name: Licoflavone C

Catalog No.: CFN92289

Cas No.: 72357-31-4

Purity: > 98%

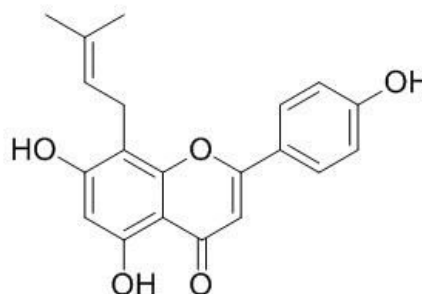
M.F: C₂₀H₁₈O₅

M.W: 338.4

Physical Description: Cryst.

Synonyms: 4',5,7-Trihydroxy-8-prenylflavone; 8-Prenylapigenin;

5,7-Dihydroxy-2-(4-hydroxyphenyl)-8-(3-methyl-2-butenyl)-4H-1-benzopyran-4-one.



[Intended Use]

1. Reference standards;
2. Pharmacological research;
3. Synthetic precursor compounds;
4. Intermediates & Fine Chemicals;
5. Others.

[Source]

The roots of *Glycyrrhiza inflata*.

[Biological Activity or Inhibitors]

Licoflavone C (LFLC), a naturally occurring prenyl-flavone extracted from *Genista ephedroides*, it attenuates the genotoxicity of cancer drugs in human peripheral lymphocyte, has protective effects toward the chromosome damage induced by mitomycin C (MMC) or daunorubicin (DAU) in cultured human peripheral lymphocytes.^[1]

Licoflavone C enhances the cytotoxicity inducing an apoptotic cell death in H4IIE cells without affecting antioxidative properties.^[2]

Licoflavone C shows a powerful estrogenic activity at 10^{-7} M (0.0338 $\mu\text{g/ml}$) and it is 47.45% than 10^{-8} M 17β -estradiol (0.00272 $\mu\text{g/ml}$), the estrogenicity of this flavone was found to be comparable to the activity showed by genistein at 10^{-6} M (0.27 $\mu\text{g/ml}$).^[3]

Licoflavone C and derrone are active against *Pseudomonas aeruginosa* and *Escherichia coli* (7.81-15.62 $\mu\text{g/mL}$) and show important antifungal activity, they also show strong cytotoxicity against Hep-2 cells; these two compounds may be interesting antimicrobial agents to be used against infectious diseases caused by many pathogens.^[4]

[Solvent]

Chloroform, Dichloromethane, Ethyl Acetate, DMSO, Acetone, etc.

[HPLC Method]^[5]

Mobile phase: Acetonitrile-1%Formic acid H₂O, gradient elution ;

Flow rate: 1.0 ml/min;

Column temperature: Room Temperature;

The wave length of determination: 280 nm.

[Storage]

2-8°C, Protected from air and light, refrigerate or freeze.

[References]

- [1] Scarpato R, Paganucci L, Bertoli A, *et al. Phytother. Res.*, 2008, 22(12):1650–4.
- [2] Wätjen W, Weber N, Lou Y J, *et al. Food Chem. Toxicol.* , 2007, 45(1):119-24.
- [3] Garritano S, Pinto B, Giachi I, *et al. Phytomedicine*, 2005, 12(1-2):143-7.
- [4] Edziri H, Mastouri M, Mahjoub M A, *et al. Molecules*, 2012, 17(6):7284-93.
- [5] Zhang J, Ni H, Qing D G, *et al. Chinese Medical Science and Technology*, 2012, 19 (3): 233-4.

[Contact]

Address:

S5-3 Building, No. 111, Dongfeng Rd.,
Wuhan Economic and Technological Development Zone,
Wuhan, Hubei 430056,
China

Email: info@chemfaces.com

Tel: +86-27-84237783

Fax: +86-27-84254680

Web: www.chemfaces.com

Tech Support: service@chemfaces.com