(+)-Menthol

Cat. No.: HY-W017277

CAS No.: 15356-60-2

Molecular Formula: $C_{10}H_{20}O$

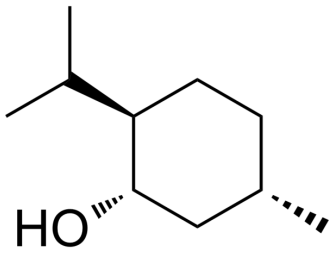
Molecular Weight: 156.27

Target: Others

Pathway: Others

Storage:

Powder	-20°C	3 years
	4°C	2 years
In solvent	-80°C	6 months
	-20°C	1 month



SOLVENT & SOLUBILITY

In Vitro

DMSO : 100 mg/mL (639.92 mM; Need ultrasonic)

Preparing Stock Solutions

Solvent / Mass / Concentration	1 mg	5 mg	10 mg
1 mM	6.3992 mL	31.9959 mL	63.9918 mL
5 mM	1.2798 mL	6.3992 mL	12.7984 mL
10 mM	0.6399 mL	3.1996 mL	6.3992 mL

Please refer to the solubility information to select the appropriate solvent.

In Vivo

1. Add each solvent one by one: 10% DMSO >> 40% PEG300 >> 5% Tween-80 >> 45% saline
   Solubility: ≥ 2.5 mg/mL (16.00 mM); Clear solution
2. Add each solvent one by one: 10% DMSO >> 90% (20% SBE-β-CD in saline)
   Solubility: ≥ 2.5 mg/mL (16.00 mM); Clear solution
3. Add each solvent one by one: 10% DMSO >> 90% corn oil
   Solubility: ≥ 2.5 mg/mL (16.00 mM); Clear solution

BIOLOGICAL ACTIVITY

Description

(+)-Menthol (D-Menthol) is one of the optical isomers of Menthol. (+)-Menthol can reduce the electrically evoked contractions of rat phrenic hemidiaphragm in vitro. Local anaesthetic activity. (+)-Menthol can also inhibit the growth of Microcystis aeruginosa cells[1][2][3].

In Vitro

(+)-Menthol (0.0001-0.1 μg/ml) reduces the electrically evoked contractions of rat phrenic hemidiaphragm dose-dependently in vitro, up to complete abolishment of contractions. [1].

MCE has not independently confirmed the accuracy of these methods. They are for reference only.

REFERENCES

[1]. Galeotti N, et al. Local anaesthetic activity of (+)- and (-)-menthol. Planta Med. 2001 Mar;67(2):174-6.

[2]. Galeotti N, et al. Menthol: a natural analgesic compound. Neurosci Lett. 2002 Apr 12;322(3):145-8.

[3]. Hu X, et al. Effects of d-menthol stress on the growth of and microcystin release by the freshwater cyanobacterium Microcystis aeruginosa FACHB-905. Chemosphere. 2014 Oct;113:30-5.

Tel: 609-228-6898 Fax: 609-228-5909 E-mail: tech@MedChemExpress.com

Address: 1 Deer Park Dr, Suite Q, Monmouth Junction, NJ 08852, USA