SZABO SCANDIC

Part of Europa Biosite

Produktinformation

- Forschungsprodukte & Biochemikalien
- Zellkultur & Verbrauchsmaterial
- Diagnostik & molekulare Diagnostik
- Laborgeräte & Service

Weitere Information auf den folgenden Seiten!
See the following pages for more information!

Lieferung & Zahlungsart

siehe unsere Liefer- und Versandbedingungen

Zuschläge

- Mindermengenzuschlag
- Trockeneiszuschlag
- Gefahrgutzuschlag
- Expressversand

SZABO-SCANDIC HandelsgmbH

Quellenstraße 110, A-1100 Wien

T. +43(0)1 489 3961-0

F. +43(0)1 489 3961-7

mail@szabo-scandic.com

www.szabo-scandic.com

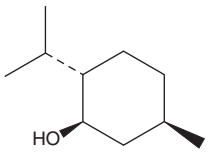
linkedin.com/company/szaboscandic

PRODUCT INFORMATION

(–)-Menthol

Item No. 30384

CAS Registry No.: 2216-51-5
Formal Name: (1R,2S,5R)-5-methyl-2-(1-methylethyl)-cyclohexanol
Synonyms: L-Menthol, (1R,2S,5R)-(–)-Menthol, NSC 62788
MF: $C_{10}H_{20}O$
FW: 156.3
Purity: ≥98%
Supplied as: A crystalline solid
Storage: -20°C
Stability: ≥4 years
Item Origin: Plant/*Mentha arvensis*



Information represents the product specifications. Batch specific analytical results are provided on each certificate of analysis.

Laboratory Procedures

(–)-Menthol is supplied as a crystalline solid. A stock solution may be made by dissolving the (–)-menthol in the solvent of choice, which should be purged with an inert gas. (–)-Menthol is soluble in organic solvents such as ethanol, DMSO, and dimethyl formamide (DMF). The solubility of (–)-menthol in ethanol and DMF is approximately 30 mg/ml and approximately 10 mg/ml in DMSO.

(–)-Menthol is sparingly soluble in aqueous buffers. For maximum solubility in aqueous buffers, (–)-menthol should first be dissolved in ethanol and then diluted with the aqueous buffer of choice. (–)-Menthol has a solubility of approximately 0.33 mg/ml in a 1:2 solution of ethanol:PBS (pH 7.2) using this method. We do not recommend storing the aqueous solution for more than one day.

Description

(–)-Menthol is a monoterpene that has been found in cornmint oil and has diverse biological activities.[1] It inhibits acetylcholinesterase (AChE; K_i = 1.25 mM for the bovine enzyme).[2] (–)-Menthol (1.6 mM) decreases expression of the genes encoding topoisomerase I, IIα, and IIβ in, and cell viability of, SNU-5 gastric cancer cells.[3] It reduces acetic acid-induced writhing and increases latency to paw licking in a hot plate test in mice when administered at doses ranging from 3-10 mg/kg.[4]

References

1. Kamatou, G.P., Vermaak, I., Viljoen, A.M., *et al.* Menthol: A simple monoterpene with remarkable biological properties. *Phytochemistry* **96**, 15-25 (2013).
2. Miyazawa, M., Watanabe, H., and Kameoka, H. Inhibition of acetylcholinesterase activity by monoterpenoids with a *p*-menthane skeleton. *J. Agric. Food Chem.* **45(3)**, 677-679 (1997).
3. Lin, J.P., Lu, H.F., Lee, J.H., *et al.* (-)-Menthol inhibits DNA topoisomerases I, II α and β and promotes NF-Î B expression in human gastric cancer SNU-5 cells. *Anticancer Res.* **25(3B)**, 2069-2074 (2005).
4. Galeotti, N., Di Cesare Mannelli, L., Mazzanti, G., *et al.* Menthol: A natural analgesic compound. *Neurosci. Lett.* **322(3)**, 145-148 (2002).

CAYMAN CHEMICAL
1180 EAST ELLSWORTH RD
ANN ARBOR, MI 48108 · USA
PHONE: [800] 364-9897
[734] 971-3335
FAX: [734] 971-3640
CUSTSERV@CAYMANCHEM.COM
WWW.**CAYMANCHEM**.COM