



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

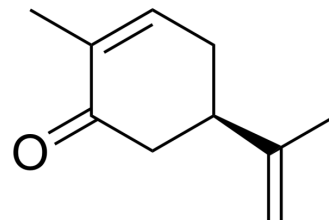
mail@szabo-scandic.com

www.szabo-scandic.com

[linkedin.com/company/szaboscandic](https://www.linkedin.com/company/szaboscandic) 

(-)-Carvone

Cat. No.:	HY-W017423	
CAS No.:	6485-40-1	
Molecular Formula:	C ₁₀ H ₁₄ O	
Molecular Weight:	150.22	
Target:	Cholinesterase (ChE)	
Pathway:	Neuronal Signaling	
Storage:	Pure form	-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 (665.69 mM; Need ultrasonic)

Preparing Stock Solutions	Solvent Concentration	Mass		
		1 mg	5 mg	10 mg
	1 mM	6.6569 mL	33.2845 mL	66.5690 mL
	5 mM	1.3314 mL	6.6569 mL	13.3138 mL
	10 mM	0.6657 mL	3.3285 mL	6.6569 mL

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

BIOLOGICAL ACTIVITY

Description

(-)-Carvone is an insect neurotoxin and a irreversible acetylcholinesterase (AChE) inhibitor. (-)-Carvone can be used as a bird repellent, inhibits larval growth, decreases pupation rate, and increases mortality of larvae^{[1][2]}.

IC₅₀ & Target

eel AChE
2.19 mM (K_i)

In Vitro

(-)-Carvone (3.04 mM; 30 min) inactivates eel AChE with K_i value of 2.19 mM^[1].
MCE has not independently confirmed the accuracy of these methods. They are for reference only.

In Vivo

(-)-Carvone (5% in absolute ethanol v/v, 20 µL; application to the thoraces ventral surfaces) inhibits AChE such as horse serum cholinesterase, house fly head cholinesterases, and head and thorax cholinesterases from the Madagascar roach in vitro^[1].
(-)-Carvone (0.05%-0.1% w/v; p.o.; 7 d) inhibits E. insulana larvae growth, decreases weight of larvae^[2].
MCE has not independently confirmed the accuracy of these methods. They are for reference only.

Animal Model:	Female roaches (<i>Gromphadorhina portentosa</i>) (6.4 g-6.8 g) ^[1]
Dosage:	5% in absolute ethanol v/v, 20 µL
Administration:	Application to the ventral surfaces of their thoraces; decapitated and crude at various time intervals (0, 2, 4, 5, 20, 24, and 26 hr)
Result:	Inhibited the activity of AChE in the extracts of both the head and thorax.

REFERENCES

[1]. Grundy D L, et al. Inhibition of acetylcholinesterases by pulegone-1, 2-epoxide[J]. Pesticide biochemistry and physiology, 1985, 23(3): 383-388.

[2]. Meisner J, et al. The response of *Earias insulana* Boisd. larvae to phagodeterrent (-)-carvone incorporated in an artificial diet 1[J]. Zeitschrift für Angewandte Entomologie, 1980, 90(1-5): 80-82.

Caution: Product has not been fully validated for medical applications. For research use only.

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