



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

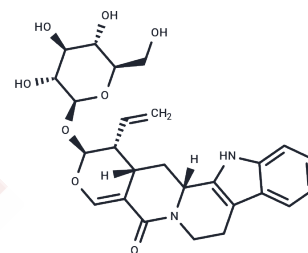
www.szabo-scandic.com

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

Vincosamide

Chemical Properties

CAS No. :	23141-27-7
Formula:	C ₂₆ H ₃₀ N ₂ O ₈
Molecular Weight:	498.52
Appearance:	no data available
Storage:	Powder: -20°C for 3 years In solvent: -80°C for 1 year



Biological Description

Description	Vincosamide is an alkaloid from Psychotria leiocarpa extract, inhibits the acetylcholinesterase (AChE) activity with anti-inflammatory activity. Vincosamide can effect relaxation of the supercoiled pBR322 plasmid DNA in the presence of Cu ²⁺ .
Targets(IC50)	Cholinesterase (ChE)
In vitro	<p>the compound vincosamide (PL-1) was identified for the first time in methanolic extract of the Psychotria leiocarpa (ME-PL) leaves, as well as the anti-inflammatory and anticholinesteric effects in rodents and molecular docking simulations. The fractionation of the chloroform fraction (CF-PL) through chromatographic methods afforded the known compound PL-1. The anti-inflammatory activity of the ME-PL (30, 100, and 300 mg/kg) and PL-1 (3, 30, and 100 mg/kg) was analyzed using experimental models: paw edema, pleurisy, and mechanical and thermal hyperalgesia induced by carrageenan. The anticholinesterase activity of the ME-PL (30 and 100 mg/kg) and PL-1 (30 mg/kg) was showed by acetylcholinesterase (AChE) inhibitory in brain structures. The molecular docking simulations were performed using Molegro Virtual Docker v6.0. Overall, the results indicated that ME-PL and PL-1 demonstrated an anti-edematogenic effect in Cg-induced paw edema, leukocyte migration in the pleurisy model, and significantly reduced mechanical hyperalgesia, cold response to acetone in mice. The samples exhibited maximal inhibition of enzyme acetylcholinesterase (AChE) in the frontal cortex. The molecular coupling of PL-1 with the AChE showed significant interactions with the catalytic and peripheral site, corroborating the activity presented in the inhibition assay. The acute administration of ME-PL did not cause signs of toxicity in the treated animals. The results showed that P. leiocarpa inhibited AChE and anti-inflammatory activity, and alkaloid vincosamide could be responsible, at least in part, for the observed effects, supporting the popular use of this genus.</p>

Preparing Stock Solutions

	1mg	5mg	10mg
1 mM	2.0059 mL	10.0297 mL	20.0594 mL
5 mM	0.4012 mL	2.0059 mL	4.0119 mL
10 mM	0.2006 mL	1.003 mL	2.0059 mL
50 mM	0.0401 mL	0.2006 mL	0.4012 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.

Reference

Formagio A S N , Volobuff C R F , Kassuya C A L , et al. Psychotria leiocarpa Extract and Vincosamide Reduce Chemically-Induced Inflammation in Mice and Inhibit the Acetylcholinesterase Activity[J]. Inflammation, 2019, 42

Inhibitor · Natural Compounds · Compound Libraries · Recombinant Proteins

This product is for Research Use Only. Not for Human or Veterinary or Therapeutic Use

Tel:781-999-4286 E_mail:info@targetmol.com Address:36 Washington Street,Wellesley Hills,MA 02481