

Nimbin

Chemical Properties

CAS No.:	5945-86-8
Formula:	C ₃₀ H ₃₆ O ₉
Molecular Weight:	540.61
Appearance:	N/A
Storage:	0-4°C for short term (days to weeks), or -20°C for long term (months).

Biological Description

Description	Nimbin is an anti-pyretic, can be used to treat arthritis, hypoglycaemia, peptic ulcers, anti-secretory activity, and it can also be used as an antibiotic. Nimbin requires to elicit a 50% inhibition of this steroid hydroxylase activity in the three insect species examined ranged from approximately 2×10^{-5} to 1×10^{-3} . Nimbin also shows anti-feedant activity and toxicity against larvae of three species of Lepidoptera, <i>Spodoptera littoralis</i> (Boisd), <i>Spodoptera frugiperda</i> (FE Smith) and <i>Helicoverpa armigera</i> (Hübner) and nymphs of the locusts <i>Schistocerca gregaria</i> (Forskål) and <i>Locusta migratoria</i> (L).
Targets(IC ₅₀)	COX: None Immunology & Inflammation related: None
In vitro	Photo-oxidation of the neem limonoids Nimbin and salannin with UV light in the presence of oxygen gives two isomeric lactone products per limonoid, Nimbinolide and isoNimbinolide, and salanninolide and isosalanninolide, respectively. METHODS AND RESULTS: When compared in insect tests with the important limonoids of neem seeds, azadirachtin, Nimbin and salannin, isoNimbinolide and isosalanninolide show activity greater than that of Nimbin or salannin and in some respects show activity approaching that of azadirachtin. The photo-oxidation products were tested for anti-feedant activity and toxicity against larvae of three species of Lepidoptera, <i>Spodoptera littoralis</i> (Boisd), <i>Spodoptera frugiperda</i> (FE Smith) and <i>Helicoverpa armigera</i> (Hübner) and nymphs of the locusts <i>Schistocerca gregaria</i> (Forskål) and <i>Locusta migratoria</i> (L).

Solubility Information

Solubility	< 1 mg/ml refers to the product slightly soluble or insoluble
------------	---

Preparing Stock Solutions

	1mg	5mg	10mg
1 mM	1.850 mL	9.249 mL	18.498 mL
5 mM	0.370 mL	1.850 mL	3.700 mL
10 mM	0.185 mL	0.925 mL	1.850 mL
50 mM	0.037 mL	0.185 mL	0.370 mL

Please select the appropriate solvent to prepare the stock solution, according to the solubility of the product in different solvents. The storage conditions and period of the stock solution: - 80 °C for 6 months; - 20 °C for 1 month. Please use it as soon as possible.

Reference

1. Comparison of anti-feedant and insecticidal activity of nimbin and salannin photo-oxidation products with neem (*Azadirachta indica*) limonoids. *Pest Manag Sci.* 2004 May;60(5):459-64.
2. Supercritical CO₂ extraction of nimbin from neem seeds - an experimental study. *J. Food Eng.*, 2001, 47(4): 289-93.

[Inhibitors](#) · [Natural Compounds](#) · [Compound Libraries](#)

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