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DATASHEET

Salvinorin B (SALB)

Product overview

Name Salvinorin B (SALB)

Cat No HB4887

Alternative names SALB, Divinorin B

Biological action Activator **Purity** >98%

Customer comments High quality with better price. I have compared SalB (Salvinorin B)) from different producer, Hello Bio

really provide a high quality compound with a cheaper price. Would definitely order again from

here. Verified customer, Stony Brook University

Description Potent, selective KORD DREADD activator

Biological Data

Biological description

Salvinorin B (SALB) is a pharmacologically inert ligand that potently and selectively activates the KORD (the κ -opioid designer receptor (DREADD)) (EC₅₀ = 11.8 nM).

Salvinorin B (SALB) is \sim 100-fold selective for the KORD DREADD over human κ opioid receptor and other targets and shows good CNS penetrability.

Activation of KORD by Salvinorin B (SALB) induces neuronal inhibition and modifies behaviour in vivo.

Salvinorin B (SALB) can be used in mice also expressing Clozapine N-Oxide (CNO) responsive DREADDS, to allow bi-directional manipulation of neural circuits.

CNO dihydrochloride (water soluble), Clozapine N-oxide (CNO) freebase, Compound 21 and perlapine freebase also available.

Please note this item is not for sale in Canada

Solubility & Handling

Storage instructions Solubility overview Handling

-20°C

Soluble in DMSO (20 mM)

- This compound is light sensitive; we therefore recommend protecting the solid and solutions from exposure to light.
- Salvinorin B (SalB) is unstable in solution and we recommend that solutions are stored at -20 °C and used within 24 hours.

Important

This product is for RESEARCH USE ONLY and is not intended for therapeutic or diagnostic use. Not for human or veterinary use.

Chemical Data

Chemical name (2S,4aR,6aR,7R,9S,10aS,10bR)-2-(3-Furanyl)dodecahydro-9-hydroxy-6a,10b-

dimethyl-4,10-dioxo-2H-naphtho[2,1-c]pyran-7-carboxylic acid methyl ester

Molecular Weight 390.43

Chemical structure

HO. HO.

 $\textbf{SMILES} \\ \textbf{C[C@@]12CC[C@H]3C(=O)O[C@@H](C[C@@]3([C@H]1C(=O)[C@H](C[C@H]2C(=O)OC)O)C)C} \\ \textbf{C[C@@]12CC[C@H]3C(=O)O[C@@H](C[C@@H]3C(=O)OC)OC)C} \\ \textbf{C[C@@]12CC[C@H]3C(=O)O[C@@H](C[C@@H]3C(=O)O[C@H]3C(=O)OC)OC)C} \\ \textbf{C[C@@]12CC[C@H]3C(=O)O[C@@H](C[C@@H]3C(=O)O[C@H]3C(=O)OC)OC)C} \\ \textbf{C[C@@]12CC[C@H]3C(=O)O[C@@H](C[C@@H]3C(=O)O[C@H]3C(=O)OC)OC)C} \\ \textbf{C[C@@]12CC[C@H]3C(=O)O[C@@H](C[C@@H]3C(=O)O[C@H]3C(=O)OC)OC)C} \\ \textbf{C[C@@]12CC[C@H]3C(=O)O[C@@H](C[C@@H]3C(=O)O[C@H]3C(=O)OC)OC)C} \\ \textbf{C[C@@]12CC[C@H]3C(=O)O[C]3C(=O)O[C@H]3C(=O)O[C]3C$

4=COC=C4

Source Extracted from salvia divinorum

InChi InChi InChi-1S/C21H26O7/c1-20-6-4-12-19(25)28-15(11-5-7-27-10-11)9-21(12,2)17(20)16(23)14(22)8-1

3(20)18(24)26-3/h5,7,10,12-15,17,22H,4,6,8-9H2,1-3H3/t12-,13-,14-,15-,17-,20-,21-/m0/s1

InChiKey BLTMVAIOAAGYAR-CEFSSPBYSA-N

MDL number MFCD16036232 Appearance Off-white solid

References

A New DREADD Facilitates the Multiplexed Chemogenetic Interrogation of Behavior.

Vardy et al (2015) Neuron. 86(4)

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DREADDS: Use and application in behavioral neuroscience.

Smith et al (206) Behav Neurosci 130(2) **PubMedID**26913540

Behavioral and Physiological Effects of a Novel Kappa-Opioid Receptor-Based DREADD in Rats.

Marchant et al (2016) Neuropsychopharmacology 41(2)

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Antinociceptive and hypothermic effects of Salvinorin A are abolished in a novel strain of kappa-opioid receptor-1 knockout mice.

Ansonoff MA et al (2006) J Pharmacol Exp Ther 318 (2):

PubMedID 16672569

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