## Product overview

<table>
<thead>
<tr>
<th>Name</th>
<th>Salvinorin B (SALB)</th>
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<tbody>
<tr>
<td>Cat No</td>
<td>HB4887</td>
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<tr>
<td>Short description</td>
<td>Potent, selective KORD DREADD activator</td>
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| Biological description| Salvinorin B (SALB) is a pharmacologically inert ligand that potently and selectively activates the KORD (the κ-opioid designer receptor (DREADD)) \( \text{EC}_{50} = 11.8 \text{ nM} \). Salvinorin B (SALB) is ~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. | 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 |
Properties

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:

![Chemical Structure Image]

Molecular Formula: C_{21}H_{26}O_{7}

CAS Number: 92545-30-7

PubChem identifier: 11440685

SMILES: C[C@@]12CC[C@@@]3(C=C=O)O[C@@@]3(C=C=O)C[C@@@]1(=O)[C@@H]2[=O]OC)O)C)C4=OC=O

Source: Extracted from salvia divinorum

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)8-13(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

Storing and Using Your Product

Storage instructions: -20 °C

Solubility overview: Soluble in DMSO (20 mM)

Handling:

- 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.

References for Salvinorin B (SALB)

A New DREADD Facilitates the Multiplexed Chemogenetic Interrogation of Behavior.

PubMedID: 25937170

DREADDS: Use and application in behavioral neuroscience.
Smith et al (206) Behav Neurosci 130(2) : 137-55.

PubMedID: 26913540
Behavioral and Physiological Effects of a Novel Kappa-Opioid Receptor-Based DREADD in Rats.
PubMedID: 26019014

Antinociceptive and hypothermic effects of Salvinorin A are abolished in a novel strain of kappa-opioid receptor-1 knockout mice.
PubMedID: 16672569