



# **Certificate of Analysis**

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Product Name: HU 308 Catalog No.: 3088 Batch No.: 3

CAS Number: 256934-39-1

IUPAC Name: 4-[4-(1,1-Dimethylheptyl)-2,6-dimethoxyphenyl]-6,6-dimethylbicyclo[3.1.1]hept-2-ene-2-methanol

## 1. PHYSICAL AND CHEMICAL PROPERTIES

Batch Molecular Formula:  $C_{27}H_{42}O_3$ . <sup>1</sup>/<sub>4</sub> $H_2O$ 

Batch Molecular Weight: 419.12

**Physical Appearance:** Off White Waxy solid **Solubility:** DMSO to 100 mM

ethanol to 100 mM

Storage: Store at -20°C

Batch Molecular Structure:

## 2. ANALYTICAL DATA

**TLC:**  $R_f = 0.4$  (Dichloromethane)

**HPLC:** Shows 99% purity

<sup>1</sup>H NMR: Consistent with structure Mass Spectrum: Consistent with structure

**Optical Rotation:**  $[\alpha]_D = +119.5$  (Concentration = 2, Solvent = Chloroform)

Microanalysis: Carbon Hydrogen Nitrogen

Theoretical 77.37 10.22 Found 76.98 10.23





## **Product Information**

Print Date: Apr 28th 2015

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## **Description:**

Potent and selective CB $_2$  receptor agonist (K $_i$  values are 22.7 nM and > 10  $\mu$ M for CB $_2$  and CB $_1$  receptors respectively, EC $_{50}$  = 5.57 nM). Displays antiallodynic activity in the rat hindpaw incision model of postoperative pain. Also neuroprotective and improves motor performance in a mouse model of Huntington's Disease.

## **Physical and Chemical Properties:**

Batch Molecular Formula: C<sub>27</sub>H<sub>42</sub>O<sub>3</sub>.1/4H<sub>2</sub>O

Batch Molecular Weight: 419.12

Physical Appearance: Off White Waxy solid

## Minimum Purity: >98%

#### **Batch Molecular Structure:**

Storage: Store at -20°C

## Solubility & Usage Info:

DMSO to 100 mM ethanol to 100 mM

## Stability and Solubility Advice:

Some solutions can be difficult to obtain and can be encouraged by rapid stirring, sonication or gentle warming (in a 45-60°C water bath).

Information concerning product stability, particularly in solution, has rarely been reported and in most cases we can only offer a general guide. Our standard recommendations are:

SOLIDS: Provided storage is as stated on the product label and the vial is kept tightly sealed, the product can be stored for up to 6 months from date of receipt.

SOLUTIONS: We recommend that stock solutions, once prepared, are stored aliquoted in tightly sealed vials at -20°C or below and used within 1 month. Wherever possible solutions should be made up and used on the same day.

#### Other Information:

#### INFORMATION FOR CUSTOMERS IN CANADA ONLY

This product is a Schedule II CDSA controlled substance and customers in Canada require an import permit to purchase this material.

## References:

Hanus et al (1999) HU-308: a specific agonist for CB<sub>2</sub>, a peripheral cannabinoid receptor. Proc.Natl.Acad.Sci.USA **96** 14228. PMID: 10588688.

**LaBuda** *et al* (2005) Cannabinoid CB<sub>2</sub> receptor agonist activity in the hindpaw incision model of postoperative pain. Eur.J.Pharmacol. *527* 172. PMID: 16316653.

**Palazuelos** *et al* (2009) Microglial CB<sub>2</sub> cannabinoid receptors are neuroprotective in Huntington's disease excitotoxicity. Brain *132* 3152. PMID: 19805493.

