

# **Certificate of Analysis**

Print Date: Jan 14<sup>th</sup> 2016

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Product Name: TC-SP 14 Catalog No.: 4363 Batch No.: 2

CAS Number: 1257093-40-5

IUPAC Name: 1-[[3-Fluoro-4-[5-[(2-fluorophenyl)methyl]-2-benzothiazolyl]phenyl]methyl]-3-azetidinecarboxylic acid

### 1. PHYSICAL AND CHEMICAL PROPERTIES

Batch Molecular Formula:  $C_{25}H_{20}F_2N_2O_2S.1\frac{1}{4}H_2O$ 

Batch Molecular Weight: 473.02

Physical Appearance: Off-white solid

**Solubility:** DMSO to 50 mM with gentle warming

Storage: Desiccate at RT

Batch Molecular Structure:

#### 2. ANALYTICAL DATA

**TLC:**  $R_f = 0.13$  (Chloroform:Methanol [4:1])

HPLC: Shows 99.6% purity

1H NMR: Consistent with structure

Mass Spectrum: Consistent with structure

Microanalysis: Carbon Hydrogen Nitrogen

Theoretical 63.48 4.79 5.92 Found 63.51 4.66 5.86



# **Product Information**

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### **Description:**

Potent and selective  $S1P_1$  agonist (EC<sub>50</sub> values are 0.042 and 3.47  $\mu$ M for human  $S1P_1$  and  $S1P_3$  respectively). Attenuates immune response to antigen challenge and reduces circulating blood lymphocyte counts in a rodent model of delayed-type hypersensitivity. Orally bioavailable.

## **Physical and Chemical Properties:**

Batch Molecular Formula:  $C_{25}H_{20}F_2N_2O_2S.1\frac{1}{4}H_2O$ 

Batch Molecular Weight: 473.02 Physical Appearance: Off-white solid

# **Minimum Purity: >98%**

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

Storage: Desiccate at RT

### Solubility & Usage Info:

DMSO to 50 mM with gentle warming

### 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.

#### References:

Lanman et al (2011) Discovery of a potent, S1P<sub>3</sub>-sparing benzothiazole agonist of sphingosine-1-phosphate receptor 1 (S1P<sub>1</sub>). ACS Med.Chem.Lett. **2** 102.