



# **Certificate of Analysis**

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Product Name: AMZ 30 Catalog No.: 6923 Batch No.: 1

CAS Number: 1313613-09-0

IUPAC Name: (2E)-2-[(4-Fluorophenyl)sulfonyl]-3-[1-[(3-nitrophenyl)sulfonyl]-1H-pyrrol-2-yl]-2-propenenitrile

### 1. PHYSICAL AND CHEMICAL PROPERTIES

**Batch Molecular Formula:**  $C_{19}H_{12}FN_3O_6S_2$ .

Batch Molecular Weight: 461.45

Physical Appearance: Off White solid
Solubility: DMSO to 100 mM
Storage: Store at -20°C

**Batch Molecular Structure:** 

#### 2. ANALYTICAL DATA

**HPLC:** Shows 98.7% purity

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

Mass Spectrum: Consistent with structure

Microanalysis: Carbon Hydrogen Nitrogen

Theoretical 49.46 2.62 9.11 Found 49.35 2.59 9.04

Caution - Not Fully Tested • Research Use Only • Not For Human or Veterinary Use



## **Product Information**

Print Date: Jun 13th 2022

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**AMZ 30** 

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#### **Description:**

**Product Name:** 

AMZ 30 is a potent, selective and irreversible inhibitor of protein phosphatase methylesterase-1 (PME-1; IC<sub>50</sub> = 600 nM) with > 100-fold selectivity for PME-1 over other serine hydrolases in human cell lysates. AMZ 30 inactivates PME-1 and reduces the demethylated form of serine/threonine protein phosphatase 2A (PP2A) in HEK 293T cells. AMZ 30 perturbs leucine carboxyl methyltransferase-1 (LCMT1)-PME-1 methylation equilibrium leading to shortening of mitotic spindles and mitotic arrest in HeLa cells. It also shows antiproliferative properties in an in vitro model of endometrial carcinoma.

#### **Physical and Chemical Properties:**

Batch Molecular Formula: C<sub>19</sub>H<sub>12</sub>FN<sub>3</sub>O<sub>6</sub>S<sub>2</sub>.

Batch Molecular Weight: 461.45 Physical Appearance: Off White solid

**Minimum Purity:** ≥98%

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

NO.

Storage: Store at -20°C

#### Solubility & Usage Info:

DMSO 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).

Catalog No.: 6923

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:

Elgenaidi et al (2019) Regulation of the phosphoprotein phosphatase 2A system and its modulation during oxidative stress: A potential therapeutic target? Pharmacol. Ther. 198 68. PMID: 30797822.

Xia et al (2015) A LCMT1-PME-1 methylation equilibrium controls mitotic spindle size. Cell Cycle 14 (12) 1938. PMID: 25839665.

Bachovchin et al (2011) Discovery and optimization of sulfonyl acrylonitriles as selective, covalent inhibitors of protein phosphatase methylesterase-1. J.Med.Chem. 54 (14) 5229. PMID: 21639134.

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