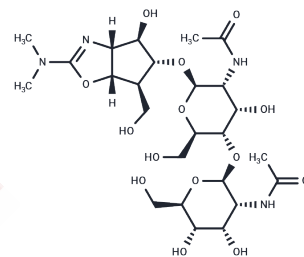


## Allosamidin

### Chemical Properties

|                   |  |
|-------------------|--|
| CAS No. :         | 103782-08-7  |
| Formula:          | C <sub>25</sub> H <sub>42</sub> N <sub>4</sub> O <sub>14</sub>   |
| Molecular Weight: | 622.625  |
| Storage:          | Powder: -20°C for 3 years   In solvent: -80°C for 1 year<br><i>Actual storage temperature shall be subject to the COA.</i> |



### Biological Description

|               |   |
|---------------|---|
| Description   | Allosamidin, a chitinase inhibitor and typical secondary metabolite of Streptomyces, may be used as a pesticide and anti-asthmatic agent. |
| Targets(IC50) | Others,Parasite   |

### Preparing Stock Solutions

|       | 1mg       | 5mg       | 10mg       |
|-------|-----------|-----------|------------|
| 1 mM  | 1.6061 mL | 8.0305 mL | 16.0609 mL |
| 5 mM  | 0.3212 mL | 1.6061 mL | 3.2122 mL  |
| 10 mM | 0.1606 mL | 0.803 mL  | 1.6061 mL  |
| 50 mM | 0.0321 mL | 0.1606 mL | 0.3212 mL  |

Please select the appropriate solvent to prepare the stock solution, according to the solubility of the product in different solvents. Please use it as soon as possible.

Note: The dilution table applies only to solid products. For liquid products, please calculate the stock solution based on the stated concentration and/or density.

### Reference

- Suzuki S, Nagasawa H, Sakuda S. Identification of the allosamidin-releasing factor in allosamidin-producing *Streptomyces*. *J Antibiot (Tokyo)*. 2014 Feb;67(2):195-7. doi: 10.1038/ja.2013.109. Epub 2013 Oct 30. PubMed PMID: 24169800.
- Sato Y, Suzuki S, Muraoka S, Kikuchi N, Noda N, Matsumoto T, Inoue H, Nagasawa H, Sakuda S. Preparation of allosamidin and demethylallosamidin photoaffinity probes and analysis of allosamidin-binding proteins in asthmatic mice. *Bioorg Med Chem*. 2011 May 15;19(10):3054-9. doi: 10.1016/j.bmc.2011.04.012. Epub 2011 Apr 13. PubMed PMID: 21530272.
- Suzuki S, Nakanishi E, Ohira T, Kawachi R, Nagasawa H, Sakuda S. Chitinase inhibitor allosamidin is a signal molecule for chitinase production in its producing *Streptomyces* I. Analysis of the chitinase whose production is promoted by allosamidin and growth accelerating activity of allosamidin. *J Antibiot (Tokyo)*. 2006 Jul;59(7):402-9. PubMed PMID: 17025016.
- Wang Y, Liu T, Yang Q, Li Z, Qian X. A modeling study for structure features of  $\beta$ -N-acetyl-D-hexosaminidase from *Ostrinia furnacalis* and its novel inhibitor allosamidin: species selectivity and multi-target characteristics. *Chem Biol Drug Des*. 2012 Apr;79(4):572-82. doi: 10.1111/j.1747-0285.2011.01301.x. Epub 2012 Jan 30. PubMed PMID: 22177554.

**Inhibitor · Natural Compounds · Compound Libraries · Recombinant Proteins**

This product is for Research Use Only · Not for Human or Veterinary or Therapeutic Use

Tel:781-999-4286 E\_mail:info@targetmol.com Address:34 Washington Street,Wellesley Hills,MA 02481