

Screening Libraries

Proteins

Inhibitors

Product Data Sheet

Ecotin Protein, E. coli (His)

Cat. No.: HY-P79083

Synonyms: Ecotin Species: E.coli

Source: E. coli

NP_416713 (A21-R162) Accession:

Gene ID: 946700

Molecular Weight: Approximately 18 kDa

PROPERTIES

AA Sequence

AESVQPLEKI APYPQAEKGM KRQVIQLTPQ EDESTLKVEL LIGQTLEVDC NLHRLGGKLE NKTLEGWGYD YYVFDKVSSP VSTMMACPDG KKEKKFVTAY LGDAGMLRYN SKLPIVVYTP

DNVDVKYRVW KAEEKIDNAV V R

Biological Activity

Measured by its ability to inhibit trypsin cleavage of a fluorogenic peptide substrate, Mca-RPKPVE-Nval-WRK(Dnp)-NH2. The IC50 value is <1.4 nM.

Appearance

Lyophilized powder

Formulation

Lyophilized from a 0.2 µm filtered solution of Tris and NaCl or 50 mM Tris-HCL, 300 mM NaCl, pH 7.4.

Endotoxin Level

<1 EU/µg, determined by LAL method.

Reconsititution

It is not recommended to reconstitute to a concentration less than 100 μg/mL in ddH₂O. For long term storage it is recommended to add a carrier protein (0.1% BSA, 5% HSA, 10% FBS or 5% Trehalose).

Storage & Stability

Stored at -20°C for 2 years. After reconstitution, it is stable at 4°C for 1 week or -20°C for longer (with carrier protein). It is recommended to freeze aliquots at -20°C or -80°C for extended storage.

Shipping

Room temperature in continental US; may vary elsewhere.

DESCRIPTION

Background

Ecotin is a protein inhibitor that regulates protease activity in bacteria. It specifically inhibits several serine proteases, including trypsin and subtilisin. This regulatory role allows bacteria to control protease-mediated processes, impacting various cellular functions. Ecotin's interaction with proteases involves a unique surface loop that forms a stable complex, influencing enzymatic activity. This protein plays a crucial role in bacterial physiology and is of interest in studying protease inhibition mechanisms.

Page 1 of 2

 $\label{lem:caution:Product} \textbf{Caution: Product has not been fully validated for medical applications. For research use only.}$

Tel: 609-228-6898 Fax: 609-228-5909

E-mail: tech@MedChemExpress.com

Address: 1 Deer Park Dr, Suite Q, Monmouth Junction, NJ 08852, USA

Page 2 of 2 www.MedChemExpress.com