Alpha-hemolysin Protein, S. aureus (P.pastoris, His)

Cat. No.:	HY-P71825
Synonyms:	hly; hla; Alpha-HL; Alpha-toxin
Species:	Staphylococcus aureus
Source:	P. pastoris
Accession:	Q2G1X0 (27A-319N)
Gene ID:	3920722
Molecular Weight:	Approximately 35.3 kDa

PROPERTIES

AA Sequence	A D S D I N I K T G T T D I G S N T T V K T G D L V T Y D K E N G M H K K V F Y S F I D D K N H N K K L L V I R T K G T I A G Q Y R V Y S E E G A N K S G L A W P S A F K V Q L Q L P D N E V A Q I S D Y Y P R N S I D T K E Y M S T L T Y G F N G N V T G D D T G K I G G L I G A N V S I G H T L K Y V Q P D F K T I L E S P T D K K V G W K V I F N N M V N Q N W G P Y D R D S W N P V Y G N Q L F M K T R N G S M K A A D N F L D P N K A S S L L S S G F S P D F A T V I T M D R K A S K Q Q T N I D V I Y E R V R D D Y Q L H W T S T N W K G T N T K D K W I D R S S E R Y K I D W E K E E M T N
Appearance	Lyophilized powder.
Formulation	Lyophilized after extensive dialysis against solution in 20 mM Tris-HC1, 0.5 M NaCl, 6% Trehalose, pH 8.0.
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 ddH_2O.
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	Alpha-hemolysin Protein interacts with the membranes of eukaryotic cells, triggering the release of low-molecular-weight molecules and ultimately causing osmotic lysis. Additionally, it is implicated in the inhibition of host neutrophil chemotaxis to the lesion region. The lytic activity of this protein necessitates heptamer oligomerization and pore formation. It undergoes self-assembly, initially forming a non-lytic oligomeric intermediate and subsequently adopting a mushroom-shaped homoheptamer structure, measuring up to 100 Angstroms in length and diameter. These structural features

highlight the intricate mechanisms by which Alpha-hemolysin engages with cellular membranes and orchestrates processes leading to cell lysis and immune response modulation.

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