

Recombinant Benzonase

Catalog # FL167

Product Specifications

Appearance	Sterile colorless liquid.
Purity	> 98% by SDS-PAGE or HPLC.
Endotoxin	< 0.01 EU/μg of protein as determined by LAL method.
Expression System	Expressed in E. coli.
Tag	Tag free.
Activity	Fully biologically active when compared to standard. 1mg of recombinant benzonase contains activity equivalent to at least 1.5×10^6 units.
Formulation	A 0.2 μm filtered concentrated solution in 50 mM Tris, with 20 mM NaCl, 2 mM MgCl ₂ , 50% (v/v) Glycerol, pH 8.0.
Reconstitution	Before use this product, please read the direction below carefully. This vial must be briefly centrifuged prior to opening to bring the contents to the bottom. Reconstitute in a sterile aqueous buffer to an appropriate concentration. Stock solutions should be aliquoted into working aliquots and stored at ≤ -20°C. Further dilutions should be made in appropriate buffered solutions.
Accession #	P13717 Ala22-Asn266
Amino acid sequence	ADTLESIDNCAVGCPTGGSSNVSIVRHAYTLNNSSTTKFANWVAYHITKDTPASGKTRNWKTDPALNPADTLAPADYTGANAALKVDRGHQAPLASLAGVSDWESLNYSNITPQKSDLNQGAWARLEDQERKLIDRADISSVYTVTGPLYERDMGKLPGTQKAHTIPSAYWKVIFINNSPAVNHYAFLFDQNTPKGADFCQFRVTVDEIEKRTGLIHWAGLPDDVQASLKS KPGVLPPELMGCKN
Molecular weight	Approximately 26.8 kDa, a single non-glycosylated polypeptide chain containing 246 amino acids.
Stability & Storage	Shipped on wet ice. For long term storage, the product should be stored ≤ -20°C. Please avoid repeated freeze-thaw cycles after reconstitution. 6 to 12 months from date of receipt, -20 to -70°C as supplied. 1 month, 2 to 8°C under sterile conditions after reconstitution. 3 months, -20 to -70°C under sterile conditions after reconstitution.
Precautions	Recombinant Benzonase is for research use only and not for use in diagnostic or therapeutic procedures.

Background

Benzonase is a nuclease that catalyzes the hydrolysis of both DNA and RNA, double- or single-stranded, at the 3' position of the phosphodiester bond to produce 5'-phosphorylated mono-, di-, tri- and tetranucleotides. DNA is a slightly better substrate than RNA. Recombinant benzonase is a 26.8 kDa nuclease consisting of 246 amino acid.