

RP01749

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Recombinant Human Pepsin A-4/PGA4 Protein

Catalog No.: RP01749

Recombinant

Sequence Information

| Species | Gene ID | Swiss Prot |
|--------------|---------|------------|
| HEK293 cells | 643847 | P0DJJD7 |

Tags

C-6His

Synonyms

Pepsin A-4 ; PGA4

Product Information

Source

HEK293 cells

Purification

> 97% by SDS-PAGE.

Endotoxin

<0.001EU/μg

Formulation

Lyophilized from a 0.22 μm filtered solution of PBS, pH 7.4.

Reconstitution

Centrifuge the vial before opening. Reconstitute to a concentration of 0.1-0.5 mg/mL in sterile distilled water. Avoid vortex or vigorously pipetting the protein. For long term storage, it is recommended to add a carrier protein or stabilizer (e.g. 0.1% BSA, 5% HSA, 10% FBS or 5% Trehalose), and aliquot the reconstituted protein solution to minimize free-thaw cycles.

Contact



www.abclonal.com

Background

PGA4 (Pepsinogen 4, group I), or Pepsinogen A, is a member of the peptidase A1 family. Pepsin is expressed as a pro-form zymogen, pepsinogen, whose primary structure has an additional 44 amino acids. Pepsin is stored as pepsinogen so it will only be released when needed, and does not digest the body's own proteins in the stomach's lining. Five types of zymogens of pepsins, gastric digestive proteinases, are known: pepsinogens A, B, and F, progastricsin, and prochymosin. There are two major groups of pepsinogen, namely pepsinogen A (PGA) and pepsinogen C (PGC) (or progastricsin), and each frequently has isozymogens. The PGA3, PGA4 and PGA5 genes encode identical human pepsinogen A enzymes.

Basic Information

Description

Recombinant Human Pepsin A-4/PGA4 Protein is produced by HEK293 cells expression system. The target protein is expressed with sequence (Met1-Ala388) of human Pepsin A-4/PGA4 (Accession #NP_001073276.1) fused with a 6×His tag at the C-terminus.

Bio-Activity

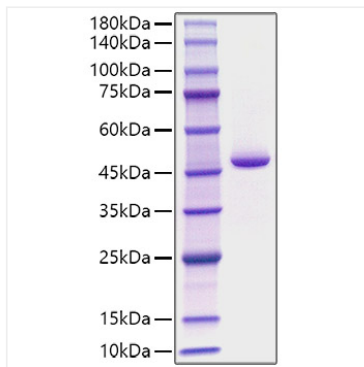
Measured by its ability to cleave the fluorogenic peptide substrate, Mca-RPKPVE-Nval-WRK(Dnp)-NH₂ (RD, Catalog # ES002). The specific activity is >27408 pmol/min/μg, as measured under the described conditions.

Storage

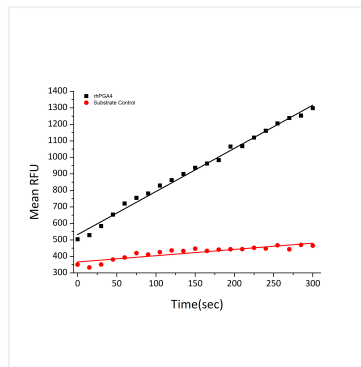
Store at -20°C. Store the lyophilized protein at -20°C to -80 °C up to 1 year from the date of receipt. After reconstitution, the protein solution is stable at -20°C for 3 months, at 2-8°C for up to 1 week. Avoid repeated freeze/thaw cycles.

* For your safety and health, please wear a lab coat and disposable gloves when handling.

Validation Data



Recombinant Human Pepsin A-4/PGA4 Protein was determined by SDS-PAGE with Coomassie Blue, showing a band at 45 kDa.



Recombinant Human Pepsin A-4/PGA4 cleave the fluorogenic peptide substrate, Mca-RPKPVE-Nval-WRK(Dnp)-NH₂ (RD, Catalog # ES002). The specific activity is >27408 pmol/min/μg, as measured under the described conditions.