

Synonym

CXCL8,GCP1,IL8,LECT,LUCT,LYNAP,MDNCF,MONAP,NAF,NAP-1

Source

Human IL-8 Protein, His Tag, premium grade(IL8-H52H3) is expressed from human 293 cells (HEK293). It contains AA Ser 28 - Ser 99 (Accession # P10145-1).

Predicted N-terminus: Ser 28

Human IL-8 Protein, His Tag, premium grade (IL8-H52H3), designed for preclinical stage, has the same activity and performance with GMP Human IL-8 Protein, which enables a seamless transition from preclinical development to clinical phases. Premium Grade product offer a cost efficient alternative of GMP Grade products for the early development phase when safety of raw materials is not top priority. By using Premium Grade products in early development phase, you can transition easily into clinical and commercial phase without need to revalidate the raw materials and modify manufacturing process.

Molecular Characterization

IL-8(Ser 28 - Ser 99) P10145-1

Poly-his

This protein carries a polyhistidine tag at the C-terminus.

The protein has a calculated MW of 10.3 kDa. The protein migrates as 13 kDa when calibrated against <u>Star Ribbon Pre-stained Protein Marker</u> under reducing (R) condition (SDS-PAGE) due to glycosylation.

Endotoxin

Less than $0.1 \; EU$ per μg by the LAL method.

Sterility

The sterility testing was performed by membrane filtration method.

Mycoplasma

Negative.

Purity

>90% as determined by SDS-PAGE.

Formulation

Lyophilized from 0.22 µm filtered solution in PBS, pH7.4 with trehalose as protectant.

Contact us for customized product form or formulation.

Reconstitution

Please see Certificate of Analysis for specific instructions.

For best performance, we strongly recommend you to follow the reconstitution protocol provided in the CoA.

Storage

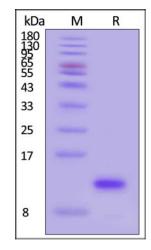
For long term storage, the product should be stored at lyophilized state at -20°C or lower.

Please avoid repeated freeze-thaw cycles.

This product is stable after storage at:

- -20°C to -70°C for 12 months in lyophilized state;
- -70°C for 3 months under sterile conditions after reconstitution.

SDS-PAGE

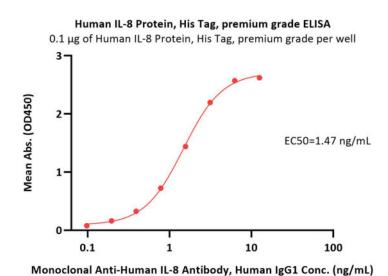


Human IL-8 Protein, His Tag, premium grade on SDS-PAGE under reducing (R) condition. The gel was stained with Coomassie Blue. The purity of the protein is greater than 90% (With <u>Star Ribbon Pre-stained Protein Marker</u>).

Bioactivity-ELISA







Immobilized Human IL-8 Protein, His Tag, premium grade (Cat. No. IL8-H52H3) at 1 μ g/mL (100 μ L/well) can bind Monoclonal Anti-Human IL-8 Antibody, Human IgG1 with a linear range of 0.1-3 μ g/mL (QC tested).

Background

Interleukin 8 (IL8 or chemokine (C-X-C motif) ligand 8, CXCL8) is a chemokine produced by macrophages and other cell types such as epithelial cells, airway smooth muscle cells and endothelial cells. There are many receptors on the surface membrane capable of binding IL-8, the most frequently studied types are the G protein-coupled serpentine receptors CXCR1 and CXCR2. Expression and affinity for IL-8 differs between the two receptors (CXCR1 > CXCR2). IL-8(6-77) has a 5-10-fold higher activity on neutrophil activation, IL-8(5-77) has increased activity on neutrophil activation and IL-8(7-77) has a higher affinity to receptors CXCR1 and CXCR2 as compared to IL-8(1-77), respectively.

Clinical and Translational Updates

Please contact us via <u>TechSupport@acrobiosystems.com</u> if you have any question on this product.

