

Human IL-18BP Protein

Cat. No. IL8-HM1BP

Description

Source	Recombinant Human IL-18BP Protein is expressed from HEK293 with His tag at the C-Terminus. It contains Thr31-Gly194.
Accession	O95998-2
Molecular Weight	The protein has a predicted MW of 18.7 kDa. Due to glycosylation, the protein migrates to 40-60 kDa based on Bis-Tris PAGE result.
Endotoxin	Less than 1EU per μg by the LAL method.
Purity	> 95% as determined by Bis-Tris PAGE

Formulation and Storage

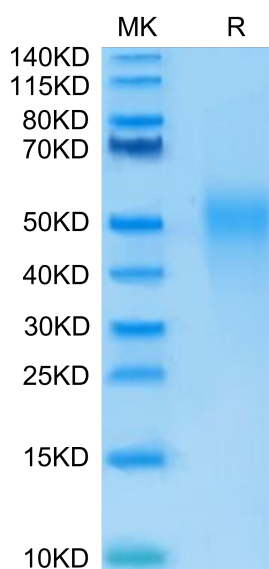
Formulation	Lyophilized from 0.22 μm filtered solution in PBS (pH 7.4). Normally 8% trehalose is added as protectant before lyophilization.
Reconstitution	Centrifuge the tube before opening. Reconstituting to a concentration more than 100 $\mu\text{g}/\text{ml}$ is recommended. Dissolve the lyophilized protein in distilled water.
Storage	-20 to -80°C for 12 months as supplied from date of receipt. -80°C for 3 months after reconstitution. Recommend to aliquot the protein into smaller quantities for optimal storage. Please minimize freeze-thaw cycles.

Background

Cytokines were the first modern immunotherapies to produce durable responses in patients with advanced cancer, components of the interleukin-18 (IL-18) pathway are upregulated on tumour-infiltrating lymphocytes, suggesting that IL-18 therapy could enhance anti-tumour immunity. IL-18BP, a high-affinity IL-18 decoy receptor, is frequently upregulated in diverse human and mouse tumours and limits the anti-tumour activity of IL-18 in mice.

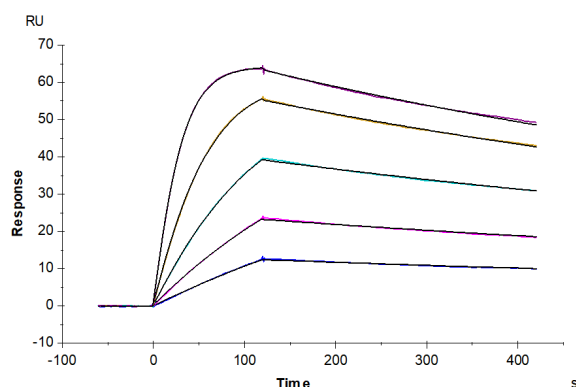
Assay Data

Bis-Tris PAGE



Human IL-18BP on Bis-Tris PAGE under reduced condition. The purity is greater than 95%.

SPR Data

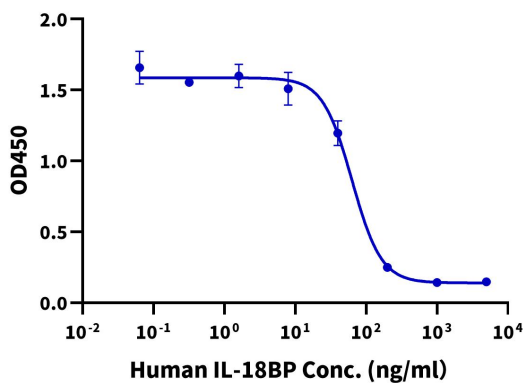


Human IL-18BP, His Tag captured on CM5 Chip via Anti-his antibody can bind Human IL-18, No Tag with an affinity constant of 0.41 nM as determined in SPR assay (Biacore T200).

Assay Data

Cell Based Assay

Recombinant Human IL-18BP Bioactivity



Measured by its ability to inhibit the IL-18-induced response of human natural killer lymphoma NK-92 cells. The ED50 for this effect is 0.04 - 0.08 µg/mL in the presence of 30 ng/mL of recombinant Human IL-18 (QC Test).