

Human IL-2 R alpha/CD25 Protein

Cat. No. CD5-HM425

Description

Source	Recombinant Human IL-2 R alpha/CD25 Protein is expressed from HEK293 with His tag and Avi tag at the C-Terminus. It contains Glu22-Cys213.
Accession	P01589
Molecular Weight	The protein has a predicted MW of 24.6 kDa. Due to glycosylation, the protein migrates to 40-50 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 > 95% as determined by HPLC

Formulation and Storage

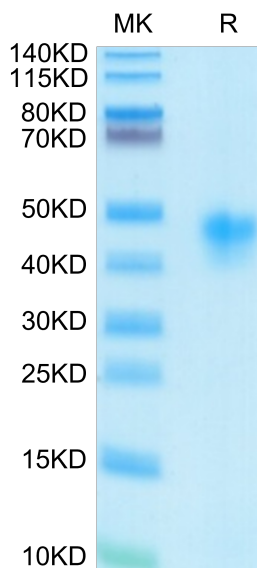
Formulation	Lyophilized from 0.22µm filtered solution in PBS (pH 7.4). Normally 8% trehalose is added as protectant before lyophilization.
Reconstitution	Centrifuge the tube before opening. Reconstituting to a concentration more than 100 µg/ml is recommended. Dissolve the lyophilized protein in distilled water.
Storage	-20 to -80°C for 24 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

Human IL-2 receptor alpha (IL-2 R alpha), also known as Tac antigen and as CD25, was initially identified as a 55 kDa membrane glycoprotein that is capable of binding IL2.eceptor for interleukin-2. The receptor is involved in the regulation of immune tolerance by controlling regulatory T cells (TREGs) activity. TREGs suppress the activation and expansion of autoreactive T-cells.

Assay Data

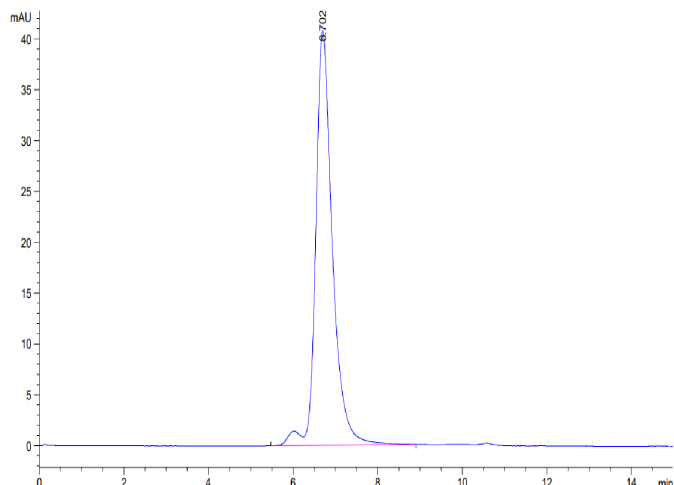
Bis-Tris PAGE



Human IL-2 R alpha on Bis-Tris PAGE under reduced condition. The purity is greater than 95%.

SEC-HPLC

Assay Data

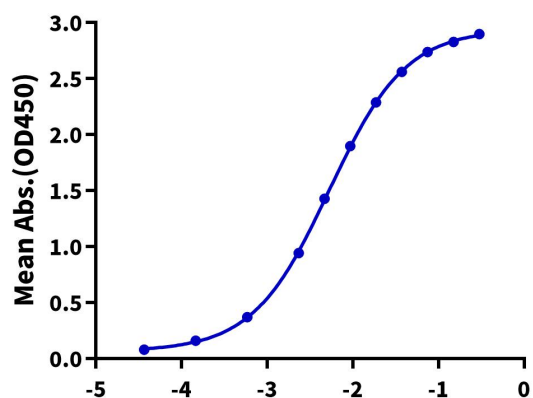


The purity of Human IL-2 R alpha is greater than 95% as determined by SEC-HPLC.

ELISA Data

Human IL-2 R alpha, His Tag ELISA

0.05µg Human IL-2 R alpha, His Tag Per Well



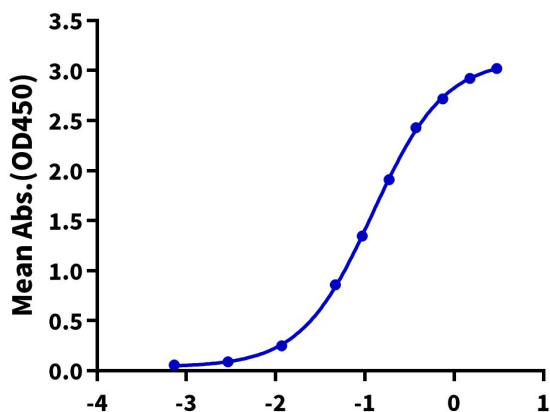
Immobilized Human IL-2 R alpha, His Tag at 0.5µg/ml (100µl/well) on the plate. Dose response curve for Anti-IL-2 R alpha Antibody, hFc Tag with the EC50 of 5.3ng/ml determined by ELISA (QC Test).

Log Anti-IL-2 R alpha Antibody, hFc Tag Conc.(µg/ml)

ELISA Data

Human IL-2 R alpha, His Tag ELISA

0.1µg Human IL-2 R alpha, His Tag Per Well

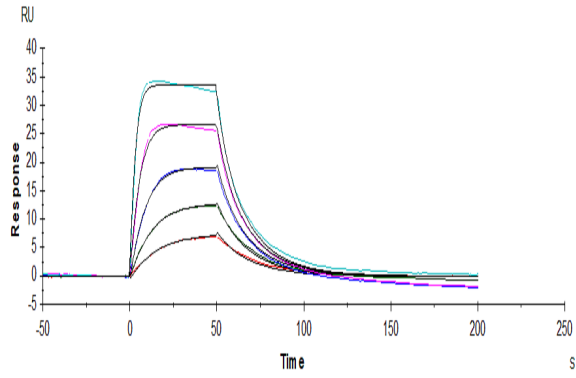


Immobilized Human IL-2 R alpha, His Tag at 1µg/ml (100µl/well) on the plate. Dose response curve for Biotinylated Human IL-2, His Tag with the EC50 of 0.12µg/ml determined by ELISA.

Log Biotinylated Human IL-2, His Tag Conc.(µg/ml)

SPR Data

Assay Data



Human IL-2 R alpha, His Tag captured on CM5 Chip via anti-His antibody can bind Human IL-2, No Tag with an affinity constant of 15.2nM as determined in SPR assay (Biacore T200).