

Human IL-7R alpha/CD127 Protein

Cat. No. IL7-HM2RA

Description

Source	Recombinant Human IL-7R alpha/CD127 Protein is expressed from HEK293 with hFc tag at the C-Terminus. It contains Glu21-Gly236.
Accession	P16871-1
Molecular Weight	The protein has a predicted MW of 51.6 kDa. Due to glycosylation, the protein migrates to 65-75 kDa based on Tris-Bis PAGE result.
Endotoxin	Less than 1EU per μg by the LAL method.
Purity	> 95% as determined by Tris-Bis PAGE > 95% as determined by HPLC

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 3-6 months after reconstitution. 2-8°C for 2-7 days after reconstitution. Recommend to aliquot the protein into smaller quantities for optimal storage. Please minimize freeze-thaw cycles.

Background

Interleukin 7 (IL-7) and its receptor (IL-7R, a heterodimer of IL-7R α and γc) are essential for normal lymphoid development. IL-7 and IL-7R activate three main pathways: STAT5, PI3K/Akt/mTOR and MEK/Erk, ultimately leading to the promotion of leukemia cell viability, cell cycle progression and growth.

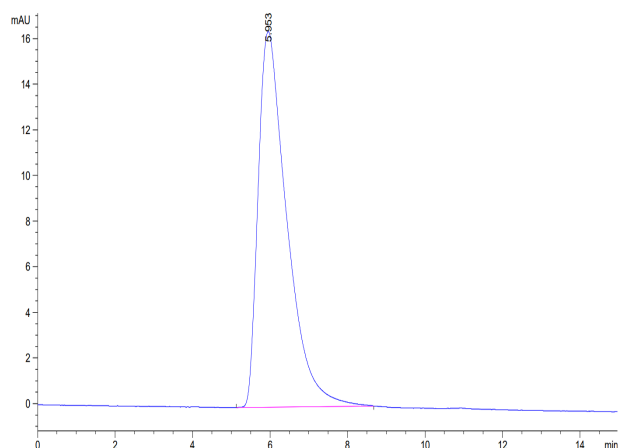
Assay Data

Tris-Bis PAGE



Human IL-7R alpha on Tris-Bis PAGE under reduced condition. The purity is greater than 95%.

SEC-HPLC



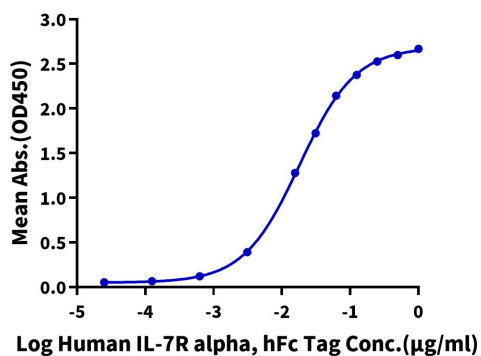
The purity of Human IL-7R alpha is greater than 95% as determined by SEC-HPLC.

Assay Data

ELISA Data

Human IL-7R alpha, hFc Tag ELISA

0.2µg Human IL-7, No Tag Per Well



Immobilized Human IL-7 at 2µg/ml (100µl/Well) on the plate. Dose response curve for Human IL-7R alpha, hFc Tag with the EC50 of 18.1ng/ml determined by ELISA.