

# Biotinylated Human B7-1/CD80 Protein

Cat. No. B71-HM480B

## Description

<b>Source</b>	Recombinant Biotinylated Human B7-1/CD80 Protein is expressed from HEK293 with His tag and Avi tag at the C-Terminus. It contains Val35-Asn242.
<b>Accession</b>	P33681-1
<b>Molecular Weight</b>	The protein has a predicted MW of 26.8 kDa. Due to glycosylation, the protein migrates to 50-70 kDa based on Bis-Tris PAGE result.
<b>Endotoxin</b>	Less than 1EU per µg by the LAL method.
<b>Purity</b>	> 95% as determined by Bis-Tris PAGE > 95% as determined by HPLC

## Formulation and Storage

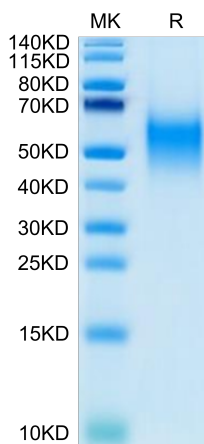
<b>Formulation</b>	Lyophilized from 0.22µm filtered solution in PBS (pH 7.4). Normally 8% trehalose is added as protectant before lyophilization.
<b>Reconstitution</b>	Centrifuge the tube before opening. Reconstituting to a concentration more than 100 µg/ml is recommended. Dissolve the lyophilized protein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

Cluster of differentiation 80 (also CD80 and B7-1) is a protein found on dendritic cells, activated B cells and monocytes that provides a costimulatory signal necessary for T cell activation and survival. It is the ligand for two different proteins on the T cell surface: CD28 and CTLA-4.

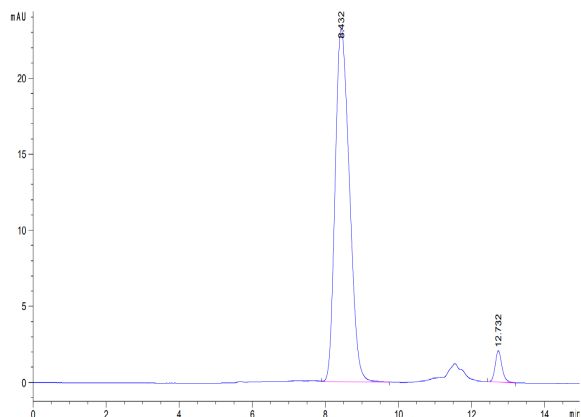
## Assay Data

### Bis-Tris PAGE



Biotinylated Human B7-1 on Bis-Tris PAGE under reduced condition. The purity is greater than 95%.

### SEC-HPLC



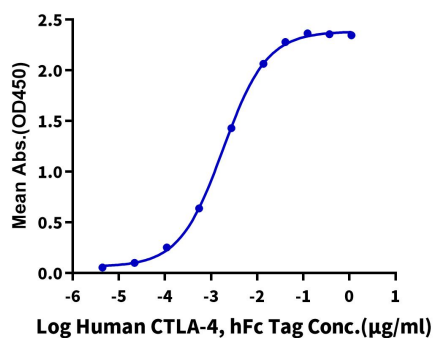
The purity of Biotinylated Human B7-1 is greater than 95% as determined by SEC-HPLC.

Assay Data

ELISA Data

**Biotinylated Human B7-1, His Tag ELISA**

0.05µg Biotinylated Human B7-1, His Tag Per Well



Immobilized Biotinylated Human B7-1, His Tag at 0.5µg/ml (100µl/Well) on streptavidin (5µg/ml) precoated plate. Dose response curve for Human CTLA-4, hFc Tag with the EC50 of 1.8ng/ml determined by ELISA.