

# Biotinylated Human CD58 Protein

Cat. No. CD5-HM418B

## Description

<b>Source</b>	Recombinant Biotinylated Human CD58 Protein is expressed from HEK293 with His tag and Avi tag at the C-terminus. It contains Phe29-Arg215.
<b>Accession</b>	AAH05930
<b>Molecular Weight</b>	The protein has a predicted MW of 24.37 kDa. Due to glycosylation, the protein migrates to 35-58 kDa based on Bis-Tris PAGE result.
<b>Endotoxin</b>	Less than 1 EU per $\mu\text{g}$ by the LAL method.
<b>Purity</b>	> 95% as determined by Bis-Tris PAGE > 95% as determined by HPLC

## Formulation and Storage

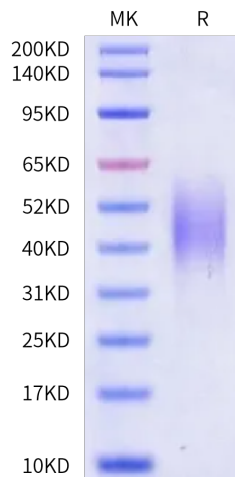
<b>Formulation</b>	Lyophilized from 0.22 $\mu\text{m}$ filtered solution in PBS (pH 7.4). Normally 8% trehalose is added as protectant before lyophilization.
<b>Reconstitution</b>	Dissolve the lyophilized protein in distilled water. Please refer to the Certificate of Analysis for detailed instructions.
<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

Loss of CD58 is a common mechanism for tumor immune evasion in lymphoid malignancies. CD58 loss is known to occur due to both genetic and non-genetic causes; therefore, we hypothesized that restoring CD58 expression in lymphoma cells may be an effective treatment approach. EZH2 is involved in the epigenetic silencing of CD58 in lymphoma cells as a mechanism for tumor immune escape, and EZH2 inhibitors are able to restore epigenetically suppressed CD58 expression.

## Assay Data

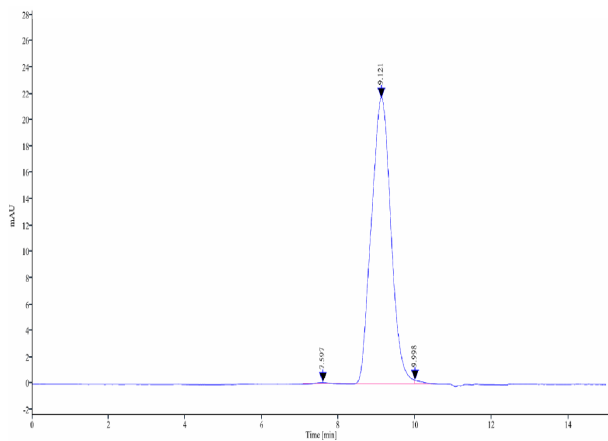
### Bis-Tris PAGE



Biotinylated Human CD58 on Bis-Tris PAGE under reduced condition. The purity is greater than 95%.

### SEC-HPLC

Assay Data



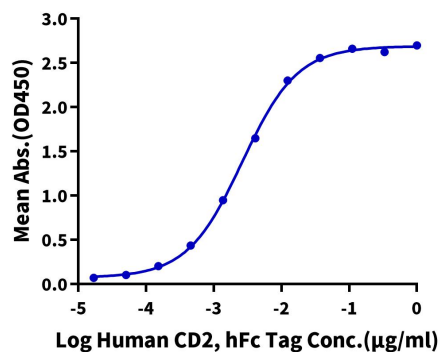
The purity of Biotinylated Human CD58 is greater than 95% as determined by SEC-HPLC.

Assay Data

ELISA Data

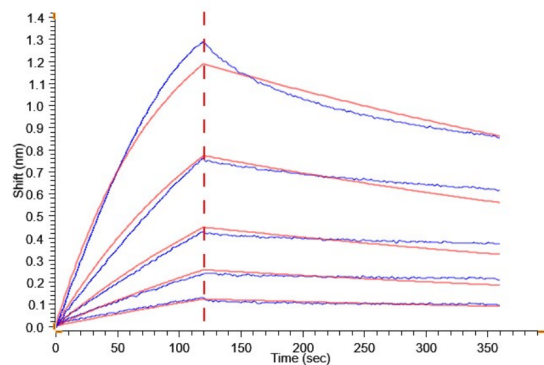
**Biotinylated Human CD58, His Avi Tag ELISA**

0.1µg Biotinylated Human CD58, His Avi Tag Per Well



Immobilized Biotinylated Human CD58, His Avi Tag at 1µg/ml(100µl/well) on the streptavidin precoated plate (5µg/ml). Dose response curve for Human CD2, hFc Tag (Cat. CD2-HM202) with the EC50 of 2.6ng/ml determined by ELISA.

BLI Data



Loaded Biotinylated Human CD58, His-Avi Tag on Streptavidin-Biosensor can bind Human CD2, hFc Tag (Cat. CD2-HM202) with an affinity constant of 6.46 nM as determined in BLI assay.