# **Human CTLA-4 Protein (His Tag)**

Catalog Number: 11159-H08H



### **General Information**

#### Gene Name Synonym:

ALPS5.CD.CD152.CELIAC3.CTLA-4.GRD4.GSE.IDDM12

#### **Protein Construction:**

A DNA sequence encoding the human CTLA4 (NP005205.2) extracellular domain(Lys36-Phe162) was fused with the a polyhistidine tag at the C-terminus

Source: Human

Expression Host: HEK293 Cells

**QC** Testing

Purity: ≥ 95 % as determined by SDS-PAGE. ≥ 95 % as determined by

SEC-HPLC.

**Endotoxin:** 

< 1.0 EU per µg protein as determined by the LAL method.

Predicted N terminal: Lys 36

#### **Bio Activity:**

- 1. Immobilized Recombinant Human CD86 / B7-2 Protein (Fc Tag)(Cat:10699-H02H) at 2  $\mu$ g/ml (100  $\mu$ l/well) can bind Recombinant Human CTLA-4 Protein (His Tag) (Cat:11159-H08H), the EC50 is 2.6-8 ng/mL.
- 2. Measured by its ability to inhibit IL-2 secretion by stimulated Jurkat human acute T cell leukemia cells. The ED50 for this effect is 0.05-0.3µg/mL when stimulated with 1 µg/mL Recombinant Human B7- 1/CD80.
- 3.Captured Ipilimumab (68052-H001) on proA Chip can bind CTLA-4 (Cat.No.11159-H08H) with an affinity constant of 20.03nM as determined in a SPR assay (Biacore T200)(Routinely tested).
- 4.Loaded Ipilimumab on ProA Biosensor, can bind CTLA-4 Protein, Human, Recombinant, His Tag(Cat.No.11159-H08H) with an affinity constant of 5.15nM as determined in BLI assay (Sartorius Octet Red384) (Routinely tested).
- 5.Loaded Recombinant Human B7-1 Protein, hFc Tag (Cat. No. 10698-H02H) on ProA Biosensor, can bind Recombinant Human CTLA-4 Protein, His Tag (Cat. No. 11159-H08H) with an affinity constant of 2.66nM as determined in BLI assay (Sartorius Octet RED384) (Routinely tested).
- 6.Loaded Recombinant Human CD86 Protein, hFc Tag (Cat. No. 10699-H02H) on ProA Biosensor, can bind Recombinant Human CTLA-4 Protein, His Tag (Cat. No. 11159-H08H) with an affinity constant of 5.34nM as determined in BLI assay (Sartorius Octet RED384) (Routinely tested).

#### **Molecular Mass:**

The recombinant human CTLA4 consists of 137 amino acids and predicts a molecular mass of 14.95 kDa. It migrates as an approximately 22.67kDa and 20.84kDa band in SDS-PAGE under reducing conditions.

### Formulation:

Lyophilized from sterile PBS, pH 7.4.

Normally 5 % - 8 % trehalose, mannitol and 0.01% Tween80 are added as protectants before lyophilization. Specific concentrations are included in the hardcopy of COA. Please contact us for any concerns or special requirements.

# **Usage Guide**

## Stability & Storage:

Samples are stable for twelve months from date of receipt at -20°C to -80°C.

# Reconstitution:

Detailed reconstitution instructions are sent along with the products.

#### SDS-PAGE:

