Human 4-1BB Ligand / TNFSF9 Protein, Mouse IgG2a Fc Tag, low endotoxin

Catalog # 41L-H5254

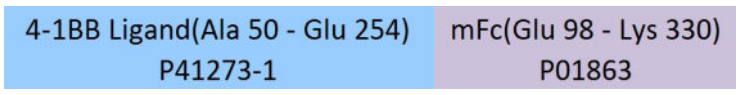
Synonym

4-1BB Ligand,TNFSF9,CD137L

Source

Human 4-1BB Ligand, Mouse IgG2a Fc Tag, low endotoxin (41L-H5254) is expressed from human 293 cells (HEK293). It contains AA Ala 50 - Glu 254 (Accession # P41273-1).
Predicted N-terminus: Ala 50

Molecular Characterization



This protein carries a mouse IgG2a Fc tag at the C-terminus.

The protein has a calculated MW of 48.3 kDa. The protein migrates as 47-50 kDa under reducing (R) condition (SDS-PAGE) due to glycosylation.

Endotoxin

Less than 0.1 EU per μg by the LAL method.

Purity

>90% as determined by SDS-PAGE.

Formulation

Lyophilized from 0.22 μm filtered solution in
Tris with Glycine, Arginine and NaCl, pH7.5. Normally trehalose is added as protectant before lyophilization.

Contact us for customized product form or formulation.

Reconstitution

Please see Certificate of Analysis for specific instructions.

For best performance, we strongly recommend you to follow the reconstitution protocol provided in the CoA.

Storage

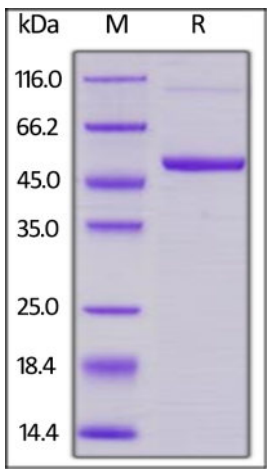
For long term storage, the product should be stored at lyophilized state at -20°C or lower.

Please avoid repeated freeze-thaw cycles.

This product is stable after storage at:

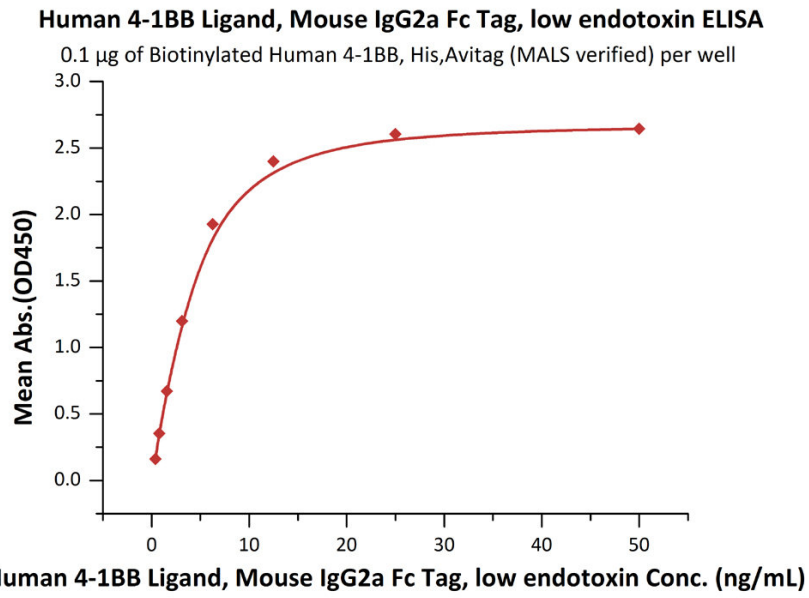
- -20°C to -70°C for 12 months in lyophilized state;
- -70°C for 3 months under sterile conditions after reconstitution.

SDS-PAGE



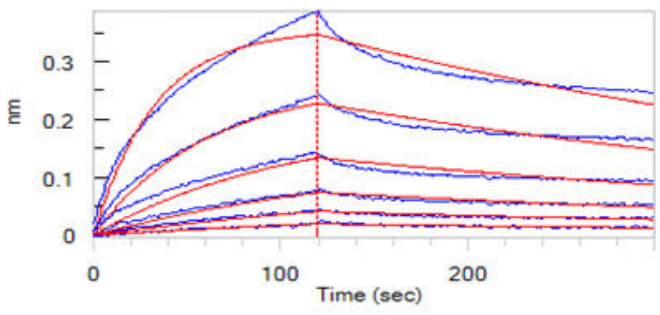
Human 4-1BB Ligand, Mouse IgG2a Fc Tag, low endotoxin on SDS-PAGE under reducing (R) condition. The gel was stained overnight with Coomassie Blue. The purity of the protein is greater than 90%.

Bioactivity-ELISA



Immobilized Biotinylated Human 4-1BB, His,Avitag (MALS verified) (Cat. No. 41B-H82E6) at 1 μg/mL (100 μL/well) on Recombinant Streptavidin (Cat. No. STN-N5116) precoated (0.5 μg/well) plate, can bind Human 4-1BB Ligand, Mouse IgG2a Fc Tag, low endotoxin (Cat. No. 41L-H5254) with a linear range of 0.2-6 ng/mL (QC tested).

Bioactivity-BLI



Loaded Human 4-1BB Ligand, Mouse IgG2a Fc Tag, low endotoxin (Cat. No. 41L-H5254) on Protein A Biosensor, can bind Human 4-1BB, His Tag, low endotoxin (Cat. No. 41B-H522a) with an affinity constant of 16.9 nM as determined in BLI assay (ForteBio Octet Red96e) (Routinely tested).

Background

Tumor necrosis factor ligand superfamily member 9 (4-1BBL) is also known as 4-1BB ligand, CD137L or TNFSF9, which is a cytokine that binds to TNFRSF9. 4-1BBL is the high affinity ligand of 4-1BB. 4-1BBL induces the proliferation of activated peripheral blood T-cells. Also, 4-1BBL may have a role in activation-induced cell death (AICD). Furthermore, 4-1BBL may play a role in cognate interactions between T-cells and B-cells/macrophages. As for diseases, 4-1BBL is involved in cancers, infectious diseases and autoimmune diseases.

Clinical and Translational Updates

Please contact us via TechSupport@acrobiosystems.com if you have any question on this product.