Human TNFRSF17 / BCMA (CD269) Protein (ECD, His Tag)

Catalog Number: 10620-H08H

Sino Biological
Biological Solution Specialist

General Information

Gene Name Synonym:

BCM; BCMA; CD269; TNFRSF13A

Protein Construction:

A DNA sequence encoding the human TNFRSF17 (NP_001183.2) (Met1-Ala54) was expressed with 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.

Bio Activity:

1. Immobilized Human BAFF (Cat:10056-H01H) at 2μg/mL (100 μl/well) can bind Human BCMA (Cat:10620-H08H), The EC50 of Human BCMA (Cat:10620-H08H) is 30-80 ng/mL.
2. Immobilized Mouse TNFSF13(Cat:50965-M01H) at 2μg/mL (100 μl/well) can bind Human BCMA (Cat:10620-H08H), The EC50 of Human BCMA (Cat:10620-H08H) is 0.6-2.1 ng/mL.
3. 293 cells were transduced with anti-BCMA-scFv and subjected to flow cytometric analysis using recombinant human BCMA (left, Cat. No. 10620-H08H, red) and a negative control protein (blue). The cells were then stained with a PE-conjugated anti-His antibody. Non-transduced 293 cells were used as a control (right).
4.Loaded Recombinant Human BAFF / BLyS / TNFSF13B Protein, hFc Tag (Cat. No. 10056-H01H) on ProA Biosensor, can bind Recombinant Human BCMA Protein, His Tag (Cat. No. 10620-H08H) with an affinity constant of 0.267 μM as determined in BLI assay (Sartorius Octet RED384) (Routinely tested).
5.Immobilized Anti-BCMA Antibody, Human IgG1 at 2 μg/mL (100 μL/well) can bind Recombinant Human TNFRSF17 / BCMA (CD269) Protein (ECD, His Tag) (Cat: 10620-H08H), the EC50 is 3-10 ng/mL (Routinely tested).
6.Anti-BCMA Antibody, Human IgG1 captured on Protein A chip can bind Recombinant Human BCMA Protein, His Tag (Cat. No. 10620-H08H) with an affinity constant of 22.3 nM as determined in an SPR assay (Biacore 8K) (Routinely tested).

Endotoxin:

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

Predicted N terminal: Met 1

Molecular Mass:

The recombinant human TNFRSF17 consists of 65 amino acids and predicts a molecular mass of 7.3 kDa. As a result of glycosylation, It migrates as an approximately 16.9 and 12.4 KDa 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℃ to -80℃.

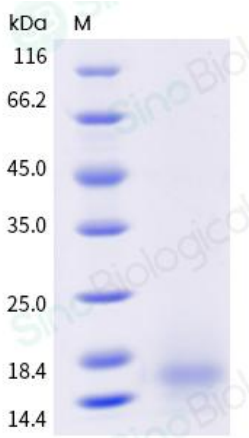
Store it under sterile conditions at -20℃ to -80℃ upon receiving. Recommend to aliquot the protein into smaller quantities for optimal storage.

Avoid repeated freeze-thaw cycles.

Reconstitution:

Detailed reconstitution instructions are sent along with the products.

SDS-PAGE:



Human TNFRSF17 / BCMA (CD269) Protein (ECD, His Tag)

Catalog Number: **10620-H08H**

Sino Biological
Biological Solution Specialist

General Information

Protein Description

Tumor necrosis factor receptor superfamily, member 17 (TNFRSF17), also known as B cell maturation antigen (BCMA) or CD269 antigen, is a member of the TNF-receptor superfamily. This receptor is preferentially expressed in mature B lymphocytes, and may be important for B cell development and autoimmune response. This receptor has been shown to specifically bind to the tumor necrosis factor (ligand) superfamily, member 13b (TNFSF13BBAFF), and to lead to NF-kappaB and MAPK8/JNK activation. TNFRSF17/BCMA/CD269 also binds to various TRAF family members, and thus may transduce signals for cell survival and proliferation. TNFRSF17/BCMA/CD269 is a receptor for TALL-1 and BCMA activates NF-kappaB through a TRAF5-, TRAF6-, NIK-, and IKK-dependent pathway. The identification of TNFRSF17 as a NF-kappaB-activating receptor for TALL-1 suggests molecular targets for drug development against certain immunodeficient or autoimmune diseases. TNFRSF17/BCMA is a target of donor B-cell immunity in patients with myeloma who respond to DLI. Antibody responses to cell-surface BCMA may contribute directly to tumor rejection in vivo.

References

1.Novak AJ, *et al.* (2004) Expression of BCMA, TACI, and BAFF-R in multiple myeloma: a mechanism for growth and survival. Blood. 103 (2): 689–94. 2.O'Connor BP, *et al.* (2004) BCMA is essential for the survival of long-lived bone marrow plasma cells. J Exp Med. 199(1): 91-8. 3.Moser K, *et al.* (2006) Stromal niches, plasma cell differentiation and survival. Curr Opin Immunol. 18(3): 265-70.