Human CD32a / FCGR2A Protein (167 His, His & AVI Tag), Biotinylated

Catalog Number: 10374-H27H1-B

Sino Biological
Biological Solution Specialist

General Information

Gene Name Synonym:

CD32; CD32A; CDw32; Fc gamma RIIA; FCG2; FcGR; FCGR2; FCGR2A1; IGFR2

Protein Construction:

A DNA sequence encoding the extracellular domain (Met1-Met210) of human FCGR2A (P12318-1, with Natural variant H167) was fused with a C-terminal polyhistidine tagged AVI tag at the C-terminus. The expressed protein was biotinylated in vivo by the Biotin-Protein ligase (BirA enzyme) which is co-expressed.

Source: Human

Expression Host: HEK293 Cells

QC Testing

Purity: ≥ 95 % as determined by SDS-PAGE, ≥ 95 % as determined by SEC-HPLC, ≥ 95% as determined by SEC-MALS(Routinely tested).

Bio Activity:

1. Loaded Recombinant Human CD32a/FCGR2A Protein(H167,His&AVI Tag),Biotinylated (Cat: 10374-H27H1-B) on SA Biosensor, can bind anti-CD20(Research grade Rituximab Biosimilar) with an affinity constant of 0.53 μM as determined in BLI assay (Sartorius Octet RED384) (QC tested).
2. Recombinant Human CD32a/FCGR2A Protein(H167,His&AVI Tag),Biotinylated (Cat: 10374-H27H1-B) captured on SA chip, can bind anti-CD20(Research grade Rituximab Biosimilar) with an affinity constant of 0.568 μM as determined in an SPR assay (Biacore 8K) (Routinely tested).

Endotoxin:

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

Predicted N terminal: Gln 34

Molecular Mass:

The recombinant human CD32a consists of 213 amino acids after removal of the signal peptide and predicts a molecular mass of 23.7 KDa. It migrates as an approximately 33 KDa band due to glycosylation by SDS-PAGE under reducing conditions. The molecular weight of this protein is around 20-38 kDa verified by SEC-MALS (Routinely tested).

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:

