

Datasheet for ABIN2870572

HEK-293 Cells IgG isotype control (AVI tag, Biotin)





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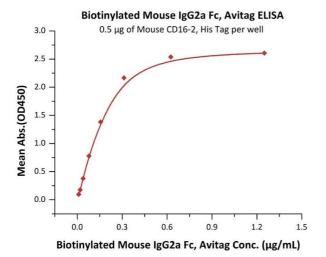
| Quantity: | 500 μg |
|----------------------|------------------------|
| Target: | IgG |
| Reactivity: | Mouse |
| Host: | HEK-293 Cells |
| Biological Activity: | Active |
| Conjugate: | AVI tag,Biotin |
| Application: | Isotype Control (IsoC) |

Product Details

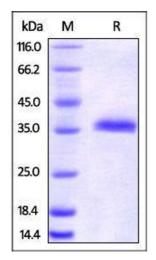
| Brand: | MABSol®,PrecisionAvi | |
|------------------|---|--|
| Isotype: | IgG | |
| Fragment: | Fc fragment | |
| Specificity: | Biotinylation of this product is performed using Avitag™ technology. Briefly, the single lysine residue in the Avitag is enzymatically labeled with biotin. | |
| Characteristics: | This protein carries an Avi tag (Avitag™) at the C-terminus. The protein has a calculated MW of 28.2 kDa. The protein migrates as 36 kDa on a SDS-PAGE gel under reducing (R) condition due to glycosylation. | |
| Purity: | >95 % as determined by SDS-PAGE. | |
| Endotoxin Level: | Less than 1.0 EU per μg by the LAL method. | |

Target Details

| Target: | IgG | | |
|---------------------|---|--|--|
| Abstract: | IgG Products | | |
| Target Type: | Antibody | | |
| Background: | Immunoglobulin G2 (IgG2) is a member of many immunoglobulin G developed and secreted be effective B cells. In wake of cutting by pepsin, IgG is divided into two F(ab)s with one antigen binding site and a high conserved Fc segment. The Fc segment bears a highly conserved N-glycosylation site. There are two members of IgG2: IgG2a and IgG2b. It was found that IgG2a was superior to IgG1 in activating complement. The glycosylation of the circulating immunoglobulin-γ (IgG) antibody molecules changes in rheumatoid arthritis. | | |
| Molecular Weight: | 28.2 kDa | | |
| Application Details | | | |
| Application Notes: | Optimal working dilution should be determined by the investigator. | | |
| Comment: | Ready-to-use AvitagTM biotinylated protein: The product is exclusively produced using the AvitagTM technology. Briefly, a unique 15 amin acid peptide, the Avi tag, is introduced into the recombinant protein during expression vector construction. The single lysine residue in the Avi tag is enzymatically biotinylated by the E. Colbiotin ligase BirA. | | |
| | This single-point enzymatic labeling technique brings many advantages for commonly used binding assays. The biotinylation happens on the lysine residue of Avi tag, and therefore does NOT interfere with the target protein's natural binding activities. In addition, when immobilized on an avidin-coated surface, the protein orientation is uniform because the position of the Avi tag in the protein is precisely controlled. | | |
| Restrictions: | For Research Use only | | |
| Handling | | | |
| Format: | Lyophilized | | |
| 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. | | |
| Buffer: | 50 mM Tris, 100 mM Glycine, pH 7.5 | | |
| Storage: | -20 °C | | |
| | | | |



Biotinylated Mouse IgG2a Fc, Avi Tag (Avitag[™]) ELISA 0.5 µg of recombinant protein A per well 2.5 1.5 0.0 2.0 2.0 40 60 80 100 Biotinylated Mouse IgG2a Fc, Avi Tag (Avitag[™]) Con. (ng/mL)



ELISA

Image 1. Immobilized Mouse CD16-2, His Tag (ABIN6731239,ABIN6809892,ABIN6951007) at $5 \mu g/mL$ (100 $\mu L/well$) can bind Biotinylated Mouse IgG2a Fc, Avitag (ABIN2870572,ABIN2870573) with a linear range of 0.01-0.313 $\mu g/mL$ (Routinely tested).

Binding Studies

Image 2. Immobilized Recombinant Protein A (Cat# RPA-S3149) at 5 μ g/mL (100 μ L/well) can bind Biotinylated Mouse IgG2a Fc with a linear range of 0.4-12.5 ng/mL.

SDS-PAGE

Image 3. Biotinylated Mouse IgG2a Fc, Tag Free on SDS-PAGE under reducing (R) condition. The gel was stained overnight with Coomassie Blue. The purity of the protein is greater than 95%.