

## Recombinant Mouse FCGRT & B2M Heterodimer Protein

**Catalog Number:** PKSM040322

**Note:** Centrifuge before opening to ensure complete recovery of vial contents.

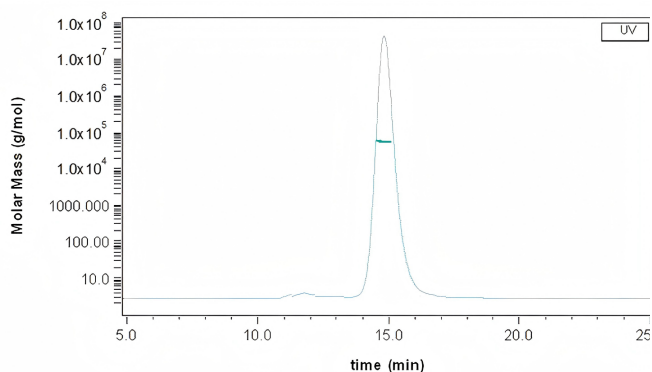
### Description

<b>Species</b>	Mouse
<b>Source</b>	HEK293 Cells-derived Mouse FCGRT & B2M Heterodimer protein Met 1-Ser 297& Met 1-Met 119(105Ala/Asp), with an C-terminal His
<b>Calculated MW</b>	43.5 kDa
<b>Observed MW</b>	35 & 12 kDa
<b>Accession</b>	P55899&P01887
<b>Bio-activity</b>	Measured by its ability to bind human IgG1 in functional ELISA.

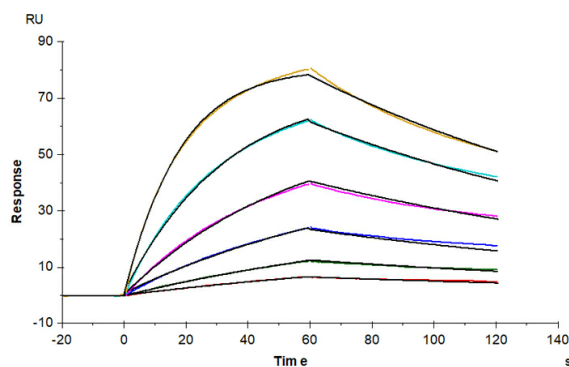
### Properties

<b>Purity</b>	> 95 % as determined by reducing SDS-PAGE.
<b>Endotoxin</b>	< 1.0 EU per µg of the protein as determined by the LAL method.
<b>Storage</b>	Generally, lyophilized proteins are stable for up to 12 months when stored at -20 to -80°C. Reconstituted protein solution can be stored at 4-8°C for 2-7 days. Aliquots of reconstituted samples are stable at < -20°C for 3 months.
<b>Shipping</b>	This product is provided as lyophilized powder which is shipped with ice packs.
<b>Formulation</b>	Lyophilized from sterile PBS, pH 7.4 Normally 5% - 8% trehalose, mannitol and 0.01% Tween 80 are added as protectants before lyophilization. Please refer to the specific buffer information in the printed manual.
<b>Reconstitution</b>	Please refer to the printed manual for detailed information.

### Data



The purity of Mouse FCGRT & B2M Heterodimer Protein (Cat: PKSM040322) is more than 95% and the molecular weight of this protein is around 50-60 kDa verified by SEC-MALS.



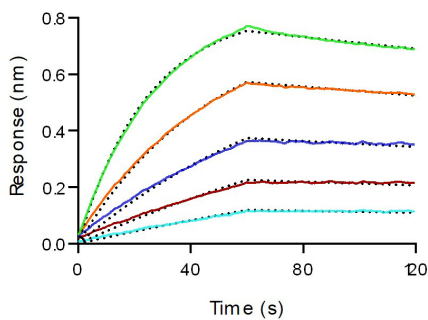
Captured Mouse FcRn recombinant protein (Cat: PKSM040322) on Anti-His Chip can bind Bevacizumab (IgG1) with an affinity constant of 32.9 nM as determined in an SPR assay (Biacore T200).

### For Research Use Only

Toll-free: 1-888-852-8623  
Web: [www.elabscience.com](http://www.elabscience.com)

Tel: 1-832-243-6086  
Email: [techsupport@elabscience.com](mailto:techsupport@elabscience.com)

Fax: 1-832-243-6017



Loaded Recombinant Mouse FCGRT & B2M Heterodimer Protein, His Tag (Cat: PKSM040322) on His1K Biosensor, can bind Monoclonal Anti-Human CD3 Antibody, Mouse IgG2a (OKT3) with an affinity constant of 4.98nM as determined in BLI assay (Sartorius Octet RED384)(QC tested).

## Background

$\beta$ -2-Microglobulin (B2M) is a secreted protein with 1 Ig-like C1-type (immunoglobulin-like) domain which belongs to the beta-2-microglobulin family. B2M component of major histocompatibility complex (MHC) class I molecules, involved in the presentation of peptide antigens to the immune system. Polymers of beta 2-microglobulin can be found in tissues from patients on long-term hemodialysis. B2M is a protein found on the surface of many cells and plentiful on the surface of white blood cells. Serum B2M concentration is increased in renal diseases, various malignant diseases and some inflammatory and autoimmune disorders. B2M may adopt the fibrillar configuration of amyloid in certain pathologic states. The capacity to assemble into amyloid fibrils is concentration dependent. B2M has been shown as a marker for monitoring inflammatory disease activity and it appears likely to have a destructive role in amyloidosis-related arthritis. B2M might be involved in the OA (osteoarthritis) pathogenesis. Defects in B2M are the cause of hypercatabolic hypoproteinemia. Affected individuals show marked reduction in serum concentrations of immunoglobulin and albumin, probably due to rapid degradation. B2M could be a potential therapeutic target in ovarian cancer.

## For Research Use Only

Toll-free: 1-888-852-8623  
Web: [www.elabscience.com](http://www.elabscience.com)

Tel: 1-832-243-6086  
Email: [techsupport@elabscience.com](mailto:techsupport@elabscience.com)

Fax: 1-832-243-6017