

Synonym

Glucagon R, GCGR, Glucagon receptor

Source

Human GCGR, His Tag(GCR-H52H3) is expressed from human 293 cells (HEK293). It contains AA Ala 26 - Lys 136 (Accession # [P47871-1](#)).

Predicted N-terminus: Ala 26

Molecular Characterization

GCGR(Ala 26 - Lys 136)
P47871-1 Poly-his

This protein carries a polyhistidine tag at the C-terminus

The protein has a calculated MW of 14.9 kDa. The protein migrates as 28-40 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 PBS, pH7.4 with trehalose as protectant.

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.

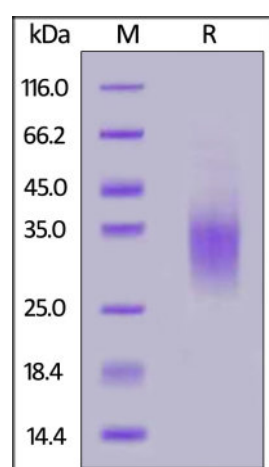
Storage

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

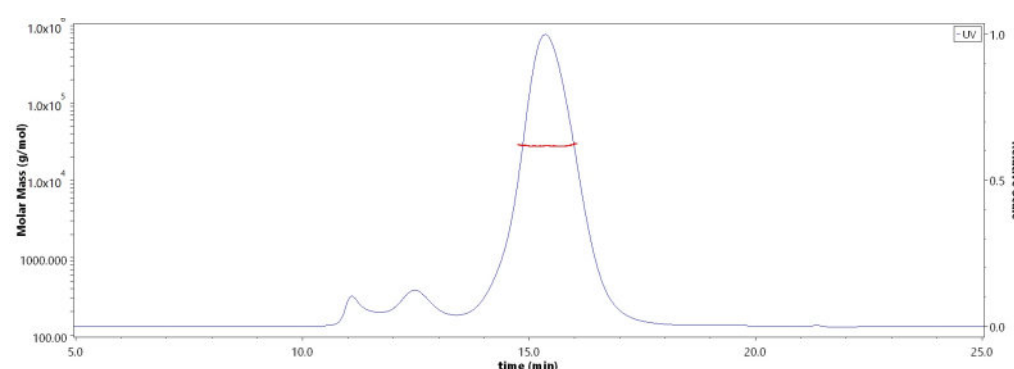
Please avoid repeated freeze-thaw cycles.

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.

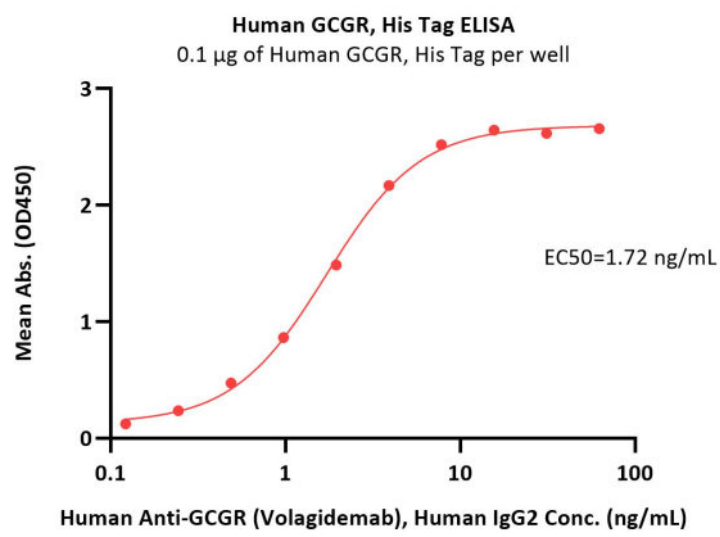
SDS-PAGE

Human GCGR, His Tag 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**SEC-MALS**

The purity of Human GCGR, His Tag (Cat. No. GCR-H52H3) is more than 85% and the molecular weight of this protein is around 23-33 kDa verified by SEC-MALS.

[Report](#)



Immobilized Human GCGR, His Tag (Cat. No. GCR-H52H3) at 1 µg/mL (100 µL/well) can bind Human Anti-GCGR (Volagidemab), Human IgG2 with a linear range of 0.1-4 ng/mL (QC tested).

Background

G-protein coupled receptor for glucagon that plays a central role in the regulation of blood glucose levels and glucose homeostasis. Regulates the rate of hepatic glucose production by promoting glycogen hydrolysis and gluconeogenesis. Plays an important role in mediating the responses to fasting. Ligand binding causes a conformation change that triggers signaling via guanine nucleotide-binding proteins (G proteins) and modulates the activity of down-stream effectors, such as adenylate cyclase. Promotes activation of adenylate cyclase. Besides, plays a role in signaling via a phosphatidylinositol-calcium second messenger system.

Clinical and Translational Updates

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