Human GLP1R Full Length Protein (L260F), Flag, His Tag (Detergent)

Catalog # GLR-H52D4



Synonym

GLP-1-R, GLP-1R, glucagon like peptide 1 receptor

Source

Human GLP1R Full Length Protein (L260F), Flag, His Tag(GLR-H52D4) is expressed from human 293 cells (HEK293). It contains AA Arg 24 - Ser 432 (Accession # P43220-1(L260F)).

Predicted N-terminus: Asp

Molecular Characterization



This protein carries flag tag at the N-terminus and polyhistidine tag at the C-terminus.

The protein has a calculated MW of 66.5 kDa.

Endotoxin

Less than 1.0 EU per µg by the LAL method.

Formulation

This product is not suitable for cell based experiments due to cytotoxicity of DDM.

DDM and CHS are INDISPENSABLE to keep membrane protein soluble and active, under no circumastance should you remove DDM and CHS.

DDM/CHS buffer (DC-11) is sold separately and not included in protein, and please contact us if you need the buffer.

If glycerol is not compatible to your application, remove glycerol just before immediate experiment, and NEVER store glycerol-free protein solution.

Supplied as $0.2 \mu m$ filtered solution in 50 mM HEPES, 150 mM NaCl, DDM, CHS, pH7.5 with glycerol as protectant.

Contact us for customized product form or formulation.

Shipping

This product is supplied and shipped with dry ice, please inquire the shipping cost.

Storage

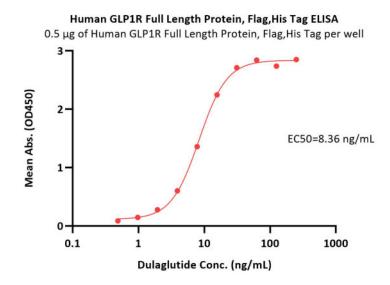
Please avoid repeated freeze-thaw cycles.

This product is stable after storage at:

- The product MUST be stored at -70°C or lower upon receipt;
- -70°C for 3 months under sterile conditions.

*The DDM/CHS buffer (Cat. No. <u>DC-11</u>) is sold separately and not included in protein, you can follow <u>this link</u> for product information.

Bioactivity-ELISA



Immobilized Human GLP1R Full Length Protein, Flag,His Tag (Cat. No. GLR-H52D4) at 5 μ g/mL (100 μ L/well) on a Nickel Coated plate (Cat. No. SP-16) can bind Dulaglutide with a linear range of 0.5-16 ng/mL (QC tested).

Human GLP1R Full Length Protein, Flag, His Tag ELISA 0.5 μg of Human GLP1R Full Length Protein, Flag, His Tag per well 2 EC50=0.51 ng/mL 0.01 0.1 1 10 100 1000 Glutazumab Conc. (ng/mL)

Immobilized Human GLP1R Full Length Protein (L260F), Flag,His Tag (Cat. No. GLR-H52D4) at 5 μ g/mL (100 μ L/well) can bind Glutazumab with a linear range of 0.06-1 ng/mL (Routinely tested).

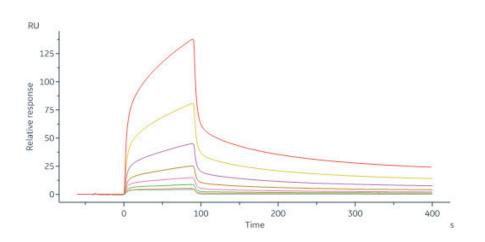
Bioactivity-SPR

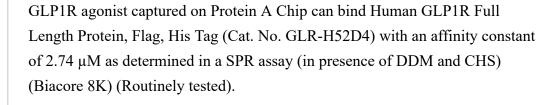


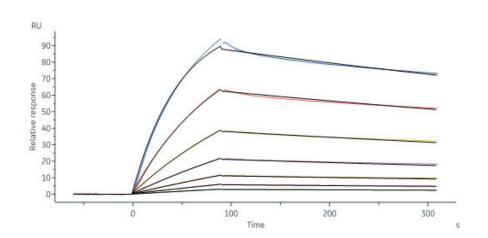
Human GLP1R Full Length Protein (L260F), Flag, His Tag (Detergent)











Monoclonal Anti-GLP1R (Glutazumab) Antibody, Human IgG2 captured on Protein A Chip can bind Human GLP1R Full Length Protein (L260F), Flag, His Tag (Cat. No. GLR-H52D4) with an affinity constant of 43.9 nM as determined in a SPR assay (in presence of DDM and CHS) (Biacore 8K) (Routinely tested).

Background

This gene encodes a 7-transmembrane protein that functions as a receptor for glucagon-like peptide 1 (GLP-1) hormone, which stimulates glucose-induced insulin secretion. This receptor, which functions at the cell surface, becomes internalized in response to GLP-1 and GLP-1 analogs, and it plays an important role in the signaling cascades leading to insulin secretion. It also displays neuroprotective effects in animal models. Polymorphisms in this gene are associated with diabetes. The protein is an important drug target for the treatment of type 2 diabetes and stroke.

Clinical and Translational Updates

