

## GHR Antibody (monoclonal) (M01)

Mouse monoclonal antibody raised against a partial recombinant GHR. Catalog # AT2198a

#### Specification

## GHR Antibody (monoclonal) (M01) - Product Information

Application Primary Accession Other Accession Reactivity Host Clonality Isotype Calculated MW WB, E <u>P10912</u> <u>NM\_000163</u> Human mouse Monoclonal IgG2a Kappa 71500

## GHR Antibody (monoclonal) (M01) - Additional Information

Gene ID 2690

**Other Names** Growth hormone receptor, GH receptor, Somatotropin receptor, Growth hormone-binding protein, GH-binding protein, GHBP, Serum-binding protein, GHR

**Target/Specificity** GHR (NP\_000154, 19 a.a. ~ 118 a.a) partial recombinant protein with GST tag. MW of the GST tag alone is 26 KDa.

**Dilution** WB~~1:500~1000 E~~N/A

Format Clear, colorless solution in phosphate buffered saline, pH 7.2 .

Storage Store at -20°C or lower. Aliquot to avoid repeated freezing and thawing.

**Precautions** GHR Antibody (monoclonal) (M01) is for research use only and not for use in diagnostic or therapeutic procedures.

### GHR Antibody (monoclonal) (M01) - Protocols

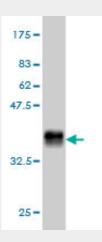
Provided below are standard protocols that you may find useful for product applications.

- <u>Western Blot</u>
- Blocking Peptides

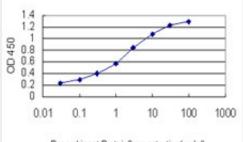


- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- <u>Cell Culture</u>

GHR Antibody (monoclonal) (M01) - Images

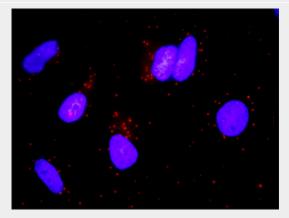


Antibody Reactive Against Recombinant Protein.Western Blot detection against Immunogen (36.74 KDa).



Recombinant ProteinConcentration(ng/ml)

Detection limit for recombinant GST tagged GHR is approximately 0.1ng/ml as a capture antibody.



Proximity Ligation Analysis of protein-protein interactions between STAT5A and GHR. HeLa cells were stained with anti-STAT5A rabbit purified polyclonal 1:1200 and anti-GHR mouse monoclonal antibody 1:50. Each red dot represents the detection of protein-protein interaction complex, and



# nuclei were counterstained with DAPI (blue).

# GHR Antibody (monoclonal) (M01) - Background

This gene encodes a protein that is a transmembrane receptor for growth hormone. Binding of growth hormone to the receptor leads to receptor dimerization and the activation of an intra- and intercellular signal transduction pathway leading to growth. A common alternate allele of this gene, called GHRd3, lacks exon three and has been well-characterized. Mutations in this gene have been associated with Laron syndrome, also known as the growth hormone insensitivity syndrome (GHIS), a disorder characterized by short stature. Other splice variants, including one encoding a soluble form of the protein (GHRtr), have been observed but have not been thoroughly characterized. In humans and rabbits, but not rodents, growth hormone binding protein (GHBP) is generated by proteolytic cleavage of the extracellular ligand-binding domain from the mature growth hormone receptor protein. The precise location of this cleavage site has not been determined for the human protein.

# GHR Antibody (monoclonal) (M01) - References

Comprehensive analysis of common genetic variation in 61 genes related to steroid hormone and insulin-like growth factor-I metabolism and breast cancer risk in the NCI breast and prostate cancer cohort consortium. Canzian F, et al. Hum Mol Genet, 2010 Oct 1. PMID 20634197.Variation at the NFATC2 Locus Increases the Risk of Thiazolinedinedione-Induced Edema in the Diabetes REduction Assessment with ramipril and rosiglitazone Medication (DREAM) Study. Bailey SD, et al. Diabetes Care, 2010 Jul 13. PMID 20628086.Influence of the d3GH receptor polymorphism on the metabolic and biochemical phenotype of GH-deficient adults at baseline and during short- and long-term recombinant human GH replacement therapy. Giavoli C, et al. Eur J Endocrinol, 2010 Sep. PMID 20592127.[A study of the single nucleotide polymorphism in seven genes (GHR, IGFBP3, IGFR1, IRS1, FMN1, ANXA2, TaGLN) in ethnic Russians and in patients with prostate cancer] Lisitskaia KV, et al. Mol Gen Mikrobiol Virusol, 2010. PMID 20540360.A Large-scale genetic association study of esophageal adenocarcinoma risk. Liu CY, et al. Carcinogenesis, 2010 Jul. PMID 20453000.