

For Research Use Only

Beta galactosidase Recombinant antibody



Catalog Number: 83706-6-RR

Basic Information

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| Catalog Number: 83706-6-RR | GenBank Accession Number: BC007493 | Purification Method: Protein A purification |
| Size: 1000 µg/ml | GeneID (NCBI): 2720 | CloneNo.: 240788F1 |
| Source: Rabbit | UNIPROT ID: P16278 | Recommended Dilutions: WB 1:5000-1:50000 IF/ICC 1:125-1:500 |
| Isotype: IgG | Full Name: galactosidase, beta 1 | |
| Immunogen Catalog Number: AG7792 | Calculated MW: 76 kDa | |
| | Observed MW: 62-67 kDa | |

Applications

Tested Applications:
WB, IF/ICC, FC (Intra), ELISA

Species Specificity:
human

Positive Controls:
WB : A549 cells, HepG2 cells, SH-SY5Y cells, HEK-293 cells, K-562 cells
IF/ICC : HepG2 cells,

Background Information

GLB1(Beta-galactosidase) is also named as ELNR1 or Lactase. It cleaves beta-linked terminal galactosyl residues from gangliosides, glycoproteins, and glycosaminoglycans. This protein is identical to the elastin-binding protein (EBP), a major component of the nonintegrin cell surface receptor complex expressed in fibroblasts, smooth muscle cells, chondroblasts, leukocytes, and certain cancer cell types. Defects in GLB1 are the cause of GM1-gangliosidosis type 1 (GM1G1), GM1-gangliosidosis type 2 (GM1G2), GM1-gangliosidosis type 3 (GM1G3) and mucopolysaccharidosis type 4B (MPS4B). GLB1 is synthesized as an 85-kDa precursor that is C-terminally processed into a 64-66 kDa mature form and the released ~20-kDa proteolytic fragment was thought to be degraded (PMID: 10744681). The MW of GLB1 after glycosylation is 100-120 kd. GLB1 is prone to produce homodimers (220-240 kd) and higher multimers (PMID: 3926488). GLB1 has 3 isoforms with MW of 76 kDa, 73 kDa, and 61 kDa.

Storage

Storage:
Store at -20°C. Stable for one year after shipment.

Storage Buffer:
PBS with 0.02% sodium azide and 50% glycerol pH 7.3.

Aliquoting is unnecessary for -20°C storage

For technical support and original validation data for this product please contact:

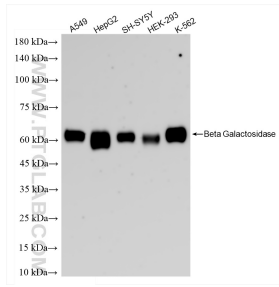
T: 4006900926

E: Proteintech-CN@ptglab.com

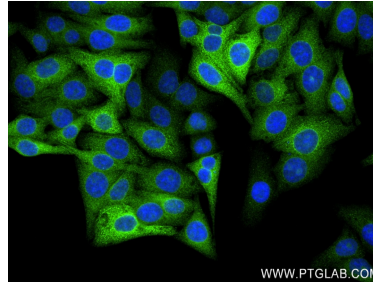
W: ptgcn.com

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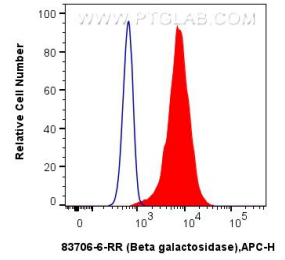
Selected Validation Data



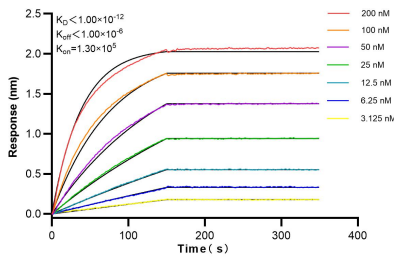
Various lysates were subjected to SDS PAGE followed by western blot with 83706-6-RR (Beta galactosidase antibody) at dilution of 1:10000 incubated at room temperature for 1.5 hours.



Immunofluorescent analysis of (4% PFA) fixed HepG2 cells using Beta galactosidase antibody (83706-6-RR, Clone: 240788F1) at dilution of 1:250 and CoraLite®488-Conjugated AffiniPure Goat Anti-Rabbit IgG(H+L) (SA00013-2).



1×10^6 A549 cells were intracellularly stained with 0.25 μ g Beta galactosidase Recombinant antibody (83706-6-RR, Clone:240788F1) and APC-Conjugated AffiniPure Goat Anti-Rabbit IgG(H+L) (red), or 0.25 μ g Isotype Control (blue). Cells were fixed with 4% PFA and permeabilized with Flow Cytometry Perm Buffer (PF00011-C).



Bi-layer interferometry (BLI) kinetic assays of 83706-6-RR against Human Beta galactosidase were performed. The affinity constant is below 1 pM.