For Research Use Only

Beta Galactosidase Monoclonal antibody

Catalog Number:66586-1-lg

Featured Product

4 Publications



Basic Information

Catalog Number: GenBank Accession Number: 66586-1-lg BC007493 GeneID (NCBI): Concentration: 1000 ug/ml 2720 **UNIPROT ID:** Source: Mouse P16278 Full Name: Isotype: lgG1 galactosidase, beta 1

Immunogen Catalog Number: Calculated MW:

AG8069 76 kDa

Observed MW: 64-66 kDa, 76-85 kDa

Purification Method:

Protein G purification

CloneNo.: 4F4F4

Recommended Dilutions: WB 1:5000-1:50000 IHC 1:250-1:1000 IF/ICC 1:200-1:800

Applications

Tested Applications: WB, IHC, IF/ICC, ELISA Cited Applications: WB, IHC, IF Species Specificity:

Species Specificity: human, mouse, rat Cited Species:

human, mouse, rabbit, sheep

Note-IHC: suggested antigen retrieval with TE buffer pH 9.0; (*) Alternatively, antigen retrieval may be performed with citrate buffer pH 6.0

Positive Controls:

WB: LNCaP cells, A549 cells, HepG2 cells, HeLa cells, HEK-293 cells, Jurkat cells, K-562 cells

IHC: human kidney tissue, 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). GBL1 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). GLB1 has 3 isoforms with MW of 76 kDa, 73 kda and 61 kDa.

Notable Publications

Author	Pubmed ID	Journal	Application
Joseph R Schell	39824446	Free Radic Biol Med	WB,IHC
Weili Wang	39896347	Noncoding RNA Res	WB,IF
Ingrid K Stake	39491502	Am J Sports Med	IHC

Storage

Storage:

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

PBS with 0.02% sodium azide and 50% glycerol, pH7.3

Aliquoting is unnecessary for -20°C storage

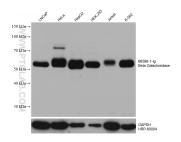
For technical support and original validation data for this product please contact:

T: 4006900926 E: Proteintech-CN@ptglab.com

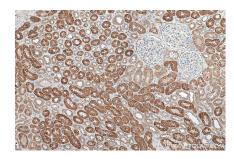
W: ptgcn.com

This product is exclusively available under Proteintech Group brand and is not available to purchase from any other manufacturer.

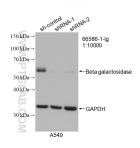
Selected Validation Data



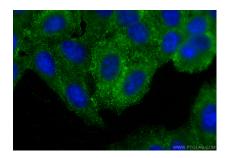
Various lysates were subjected to SDS PAGE followed by western blot with 66586-1-1g (Beta Galactosidase antibody) at dilution of 1:20000 incubated at room temperature for 1.5 hours. The membrane was stripped and reblotted with HRP-conjugated GAPDH Monoclonal antibody (HRP-60004) as loading control.



Immunohistochemical analysis of paraffinembedded human kidney tissue slide using 66586-1-lg (Beta Galactosidase antibody) at dilution of 1:500 (under 10x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



WB result of Beta Galactosidase antibody (66586-1-Ig; 1:10000; incubated at room temperature for 1.5 hours) with sh-Control and sh-Beta Galactosidase transfected A549 cells.



Immunofluorescent analysis of (-20°C Ethanol) fixed HepG2 cells using Beta Galactosidase antibody (66586-1-Ig, Clone: 4F4F4) at dilution of 1:400 and CoraLite®488-Conjugated Goat Anti-Mouse IgG(H+L) (SA00013-1).