

Basic Information

Product Name	Anti-OGT Antibody	
Gene Name	OGT	
Source	Rabbit	
Clonality	Polyclonal	
Isotype	IgG	
Species Reactivity	human, mouse, rat	
Tested Application	WB, IHC, ICC/IF, FCM	
Contents	500 ug/ml antibody with PBS, 0.02% NaN ₃ , 1 mg/ml BSA and 50% glycerol.	
Immunogen	A synthetic peptide corresponding to a sequence at the C-terminus of human OGT, identical to the related mouse and rat sequences.	
Concentration	500 ug/ml	
Purification	Immunogen affinity purified.	
Observed MW	110 kDa	
Dilution Ratios	Western blot (WB): 1:500-2000 Immunohistochemistry (IHC): 1:50-400 Immunocytochemistry/Immunofluorescence (ICC/IF): 1:50-400 Flow Cytometry (Fixed): 1:50-200 (Boiling the paraffin sections in 10mM citrate buffer,pH6.0,or PH8.0 EDTA repair liquid for 20 mins is required for the staining of formalin/paraffin sections.) Optimal working dilutions must be determined by end user.	

Storage

12 months from date of receipt, -20°C as supplied.

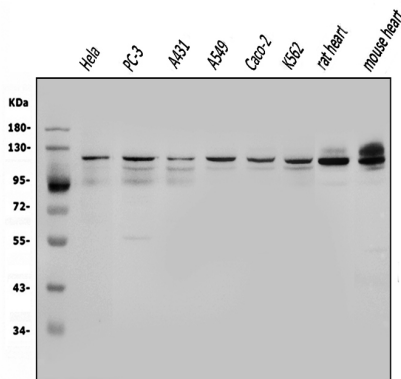
Background Information

O-linked N-acetylglucosamine (O-GlcNAc) transferase (OGT) is an enzyme that in humans is encoded by the OGT gene. This gene encodes a glycosyltransferase that catalyzes the addition of a single N-acetylglucosamine in O-glycosidic linkage to serine or threonine residues. Since both phosphorylation and glycosylation compete for similar serine or threonine residues, the two processes may compete for sites, or they may alter the substrate specificity of nearby sites by steric or electrostatic effects. The protein contains multiple tetratricopeptide repeats that are required for optimal recognition of substrates. Alternatively spliced transcript variants encoding distinct isoforms have been found for this gene.

Reference

Anti-OGT Antibody被引用在1文献中。

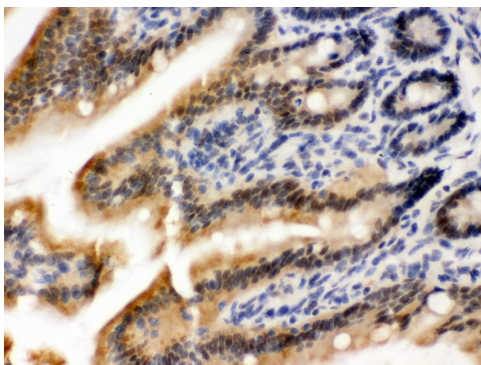
Selected Validation Data



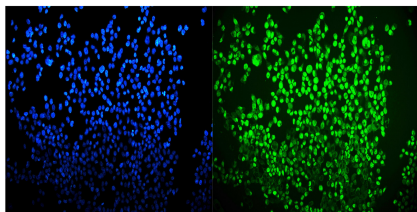
Western blot analysis of OGT using anti-OGT antibody (PB9767). The sample well of each lane was loaded with 30 ug of sample under reducing conditions.

Lane 1: human HELA whole cell lysates,
Lane 2: human PC-3 whole cell lysates,
Lane 3: human A431 whole cell lysates,
Lane 4: human A549 whole cell lysates,
Lane 5: human CACO-2 whole cell lysates,
Lane 6: human K562 whole cell lysates,
Lane 7: Rat heart tissue lysates,
Lane 8: Mouse heart tissue lysates.

After electrophoresis, proteins were transferred to a membrane. Then the membrane was incubated with rabbit anti-OGT antigen affinity purified polyclonal antibody (PB9767) at a dilution of 1:1000 and probed with a goat anti-rabbit IgG-HRP secondary antibody (Catalog # BA1054). The signal is developed using ECL Plus Western Blotting Substrate (Catalog # AR1197). A specific band was detected for OGT at approximately 110 kDa. The expected band size for OGT is at 117 kDa.

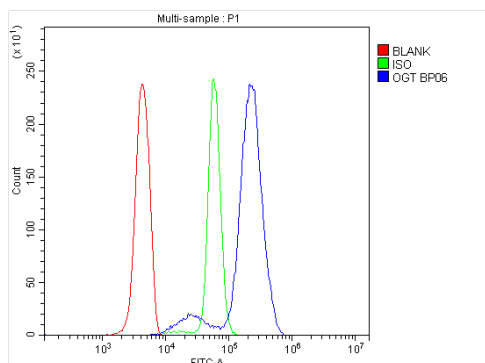


IHC analysis of OGT using anti-OGT antibody (PB9767). OGT was detected in a paraffin-embedded section of mouse intestine tissue. Biotinylated goat anti-rabbit IgG was used as secondary antibody. The tissue section was incubated with rabbit anti-OGT Antibody (PB9767) at a dilution of 1:200 and developed using Streptavidin-Biotin-Complex (SABC) (Catalog # SA1022) with DAB (Catalog # AR1027) as the chromogen.



IF analysis of OGT using anti-OGT antibody (PB9767).

OGT was detected in an immunocytochemical section of A431 cells. The section was incubated with rabbit anti-OGT Antibody (PB9767) at a dilution of 1:100. DyLight® 488 Conjugated Goat Anti-Rabbit IgG (Green) (Catalog # BA1127) was used as secondary antibody. The section was counterstained with DAPI (Catalog # AR1176) (Blue).



Flow Cytometry analysis of U937 cells using anti-OGT antibody (PB9767).

Overlay histogram showing U937 cells stained with PB9767 (Blue line). To facilitate intracellular staining, cells were fixed with 4% paraformaldehyde and permeabilized with permeabilization buffer. The cells were blocked with 10% normal goat serum. And then incubated with rabbit anti-OGT Antibody (PB9767) at 1:100 dilution for 30 min at 20°C. DyLight® 488 conjugated goat anti-rabbit IgG (BA1127) was used as secondary antibody at 1:100 dilution for 30 minutes at 20°C. Isotype control antibody (Green line) was rabbit IgG at 1:100 dilution used under the same conditions. Unlabelled sample without incubation with primary antibody and secondary antibody (Red line) was used as a blank control.