

Rabbit MGAT2 Polyclonal Antibody | anti-MGAT2 antibody

Anti-MGAT2 Antibody Picoband

CATALOG #	HOST	REACTIVITY	APPLICATIONS
AAA127368	Rabbit	Human, Mouse, Rat	ELISA, Flow Cytometry, Functional Assay, Immunohistochemistry, Western Blot

PRODUCT SYNONYMS

MGAT2; Polyclonal Antibody; Anti-MGAT2 Antibody Picoband; RAS protein activator like 1 ; RasGAP-activating-like protein 1; RAS protein activator like 1; anti-MGAT2 antibody

PRODUCT SPECIFICATIONS

Host	Rabbit
Reactivity	Human, Mouse, Rat
Clonality	Polyclonal
Isotype	Rabbit IgG
Specificity	Highly expressed in thyroid and adrenal medulla, lower expression in brain, spinal cord and trachea (PubMed:9751798). Expressed in melanocytes (PubMed:23999003).
Purity/Purification	Immunogen affinity purified.
Form/Format	Lyophilized. Each vial contains 4 mg Trehalose, 0.9 mg NaCl, 0.2 mg Na ₂ HPO ₄ .
Applicable Applications for anti-MGAT2 antibody	ELISA, FCM/FACS (Flow Cytometry), IHC (Immunohistochemistry), WB (Western Blot)
Immunogen	E coli-derived human MGAT2 recombinant protein (Position: Q81-K427).
Reconstitution	Adding 0.2 ml of distilled water will yield a concentration of 500ug/ml.
Cross Reactivity	No cross-reactivity with other proteins.
Protein Function	Probable inhibitory regulator of the Ras-cyclic AMP pathway (PubMed:9751798). Plays a role in dendrite formation by melanocytes (PubMed:23999003).
Preparation and Storage	At -20 degree C for one year from date of receipt. After reconstitution, at 4 degree C for one month. It can also be aliquotted and stored frozen at -20 degree C for six months. Avoid repeated freezing and thawing.

IMAGES



FCM/FACS (Flow Cytometry)

Figure 4. Flow Cytometry analysis of HepG2 cells using anti-MGAT2 antibody (AAA127368). Overlay histogram showing HepG2 cells stained with AAA127368 (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-MGAT2 Antibody (AAA127368, 1ug/1x10⁶ cells) for 30 min at 20 degree C. DyLight488 conjugated goat anti-rabbit IgG was used as secondary antibody for 30 minutes at 20 degree C. Isotype control antibody (Green line) was rabbit IgG (1ug/1x10⁶) used under the same conditions. Unlabelled sample (Red line) was also used as a control.



IHC (Immunohistochemistry)

Figure 3. IHC analysis of MGAT2 using anti-MGAT2 antibody (AAA127368). MGAT2 was detected in a paraffin-embedded section of human rectal cancer tissue. Heat mediated antigen retrieval was performed in EDTA buffer (pH 8.0, epitope retrieval solution). The tissue section was blocked with 10% goat serum. The tissue section was then incubated with 2ug/ml rabbit anti-MGAT2 Antibody (AAA127368) overnight at 4 degree C. Peroxidase Conjugated Goat Anti-rabbit IgG was used as secondary antibody and incubated for 30 minutes at 37 degree C. The tissue section was developed using HRP Conjugated Rabbit IgG Super Vision Assay Kit with DAB as the chromogen.



IHC (Immunohistochemistry)

Figure 2. IHC analysis of MGAT2 using anti-MGAT2 antibody (AAA127368). MGAT2 was detected in a paraffin-embedded section of human large B-cell lymphoma tissue. Heat mediated antigen retrieval was performed in EDTA buffer (pH 8.0, epitope retrieval solution). The tissue section was blocked with 10% goat serum. The tissue section was then incubated with 2ug/ml rabbit anti-MGAT2 Antibody (AAA127368) overnight at 4 degree C. Peroxidase Conjugated Goat Anti-rabbit IgG was used as secondary antibody and incubated for 30 minutes at 37 degree C. The tissue section was developed using HRP Conjugated Rabbit IgG Super Vision Assay Kit with DAB as the chromogen.



WB (Western Blot)

Figure 1. Western blot analysis of MGAT2 using anti-MGAT2 antibody (AAA127368). Electrophoresis was performed on a 5-20% SDS-PAGE gel at 70V (Stacking gel)/90V (Resolving gel) for 2-3 hours. The sample well of each lane was loaded with 30 ug of sample under reducing conditions. Lane 1: human SiHa whole cell lysates, Lane 2: human HepG2 whole cell lysates, Lane 3: human RT4 whole cell lysates, Lane 4: rat liver tissue lysates, Lane 5: mouse liver tissue lysates. After electrophoresis, proteins were transferred to a nitrocellulose membrane at 150 mA for 50-90 minutes. Blocked the membrane with 5% non-fat milk/TBS for 1.5 hour at RT. The membrane was incubated with rabbit anti-MGAT2 antigen affinity purified polyclonal antibody (#AAA127368) at 0.5ug/mL overnight at 4 degree C, then washed with TBS-0.1% Tween 3 times with 5 minutes each and probed with a goat anti-rabbit IgG-HRP secondary antibody at a dilution of 1:5000 for 1.5 hour at RT. The signal is developed using an Enhanced Chemiluminescent detection (ECL) kit with Tanon 5200 system. A specific band was detected for MGAT2 at approximately 50 kDa. The expected band size for MGAT2 is at 50 kDa.

ADDITIONAL INFORMATION

Related Product Information for anti-MGAT2 antibody	The brand Picoband indicates this is a premium antibody that guarantees superior quality, high affinity, and strong signals with minimal background in Western blot applications. Only our best-performing antibodies are designated as Picoband, ensuring unmatched performance.
Product Categories/Family for anti-MGAT2 antibody	Primary Antibodies; Cancer; G Protein Signaling; Oncoproteins/Suppressors; Regulators; Signal Transduction; Signaling Pathway; Small G Proteins; Tumor Suppressors
References	1. Alazami, A. M., Monies, D., Meyer, B. F., Alzahrani, F., Hashem, M., Salih, M. A., Alkuraya, F. S. Congenital disorder of glycosylation IIa: the trouble with diagnosing a dysmorphic inborn error of metabolism. (Letter) Am. J. Med. Genet. 158A: 245-246, 2012. 2. Alkuraya, F. S. Mental retardation, growth retardation, unusual nose, and open mouth: an autosomal recessive entity. Am. J. Med. Genet. 152A: 2160-2163, 2010. 3. Cormier-Daire, V., Amiel, J., Vuillaumier-Barrot, S., Tan, J., Durand, G., Munnich, A., Le Merrer, M., Seta, N. Congenital disorders of glycosylation IIa cause growth retardation, mental retardation, and facial dysmorphism. J. Med. Genet. 37: 875-877, 2000.

NCBI AND UNIPROT INFORMATION

NCBI GI #	1708004
NCBI GeneID	4247
UniProt Accession #	Q10469; B3KPC5; B3KQM0
Molecular Weight	51,550 Da
NCBI Official Full Name	Alpha-1,6-mannosyl-glycoprotein 2-beta-N-acetylglucosaminyltransferase
NCBI Official Synonym Full Names	mannosyl (alpha-1,6-)-glycoprotein beta-1,2-N-acetylglucosaminyltransferase
NCBI Official Symbol	MGAT2
NCBI Official Synonym Symbols	GNT2; CDG2A; CDGS2; GNT-II; GLCNACTII
NCBI Protein Information	alpha-1,6-mannosyl-glycoprotein 2-beta-N-acetylglucosaminyltransferase
UniProt Protein Name	Alpha-1,6-mannosyl-glycoprotein 2-beta-N-acetylglucosaminyltransferase
UniProt Gene Name	MGAT2
UniProt Synonym Gene Names	GNT-II

For Research Use Only. Not for use in diagnostic or therapeutic procedures. Small volumes of product may become entrapped in the seal of the vial during shipment and storage; if necessary, briefly centrifuge the vial on a tabletop centrifuge to dislodge any liquid in the cap.

