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Mouse Pnpla3 Antibody (C-term)

Affinity Purified Rabbit Polyclonal Antibody (Pab)
Catalog # AP18690b

Product Information

Application	WB, E
Primary Accession	Q91WW7
Other Accession	NP_473429.2
Reactivity	Rat, Mouse
Host	Rabbit
Clonality	Polyclonal
Isotype	Rabbit IgG
Clone Names	RB38656
Calculated MW	45772
Antigen Region	366-393

Additional Information

Gene ID	116939
Other Names	Patatin-like phospholipase domain-containing protein 3, Acylglycerol O-acyltransferase, 231-, Adiponutrin, Calcium-independent phospholipase A2-epsilon, iPLA2-epsilon, Pnpla3, Adpn
Target/Specificity	This Mouse Pnpla3 antibody is generated from rabbits immunized with a KLH conjugated synthetic peptide between 366-393 amino acids from the C-terminal region of mouse Pnpla3.
Dilution	WB~~1:1000 E~~Use at an assay dependent concentration.
Format	Purified polyclonal antibody supplied in PBS with 0.05% (V/V) Proclin 300. This antibody is prepared by Saturated Ammonium Sulfate (SAS) precipitation followed by dialysis against PBS.
Storage	Maintain refrigerated at 2-8°C for up to 2 weeks. For long term storage store at -20°C in small aliquots to prevent freeze-thaw cycles.
Precautions	Mouse Pnpla3 Antibody (C-term) is for research use only and not for use in diagnostic or therapeutic procedures.

Protein Information

Name	Pnpla3 {ECO:0000312|MGI:MGI:2151796}
Synonyms	Adpn

Function	Specifically catalyzes coenzyme A (CoA)-dependent acylation of 1-acyl-sn-glycerol 3-phosphate (2-lysophosphatidic acid/LPA) to generate phosphatidic acid (PA), an important metabolic intermediate and precursor for both triglycerides and glycerophospholipids. Does not esterify other lysophospholipids. Acyl donors are long chain (at least C16) fatty acyl-CoAs: arachidonoyl-CoA, linoleoyl-CoA, oleoyl-CoA and at a lesser extent palmitoyl-CoA (PubMed:22560221). Additionally possesses low triacylglycerol lipase and CoA-independent acylglycerol transacylase activities and thus may play a role in acyl-chain remodeling of triglycerides (By similarity). In vitro may express hydrolytic activity against glycerolipids triacylglycerol, diacylglycerol and monoacylglycerol, with a strong preference for oleic acid as the acyl moiety (By similarity). However, the triacylglycerol hydrolase activity is controversial and may be very low (PubMed:22560221). Possesses phospholipase A2 activity (By similarity).
Cellular Location	Membrane; Single-pass membrane protein. Lipid droplet
Tissue Location	Restricted to adipose tissue. Expressed in inguinal and epididymal white adipose tissues and in interscapular brown adipose tissue (PubMed:11431482). Also expressed in liver in response to high- sucrose diet (PubMed:22560221).

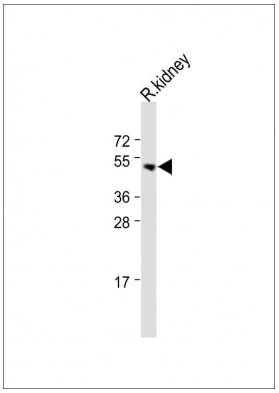
Background

Multifunctional enzyme which has both triacylglycerol lipase and acylglycerol O-acyltransferase activities (By similarity).

References

Chen, W., et al. Hepatology 52(3):1134-1142(2010)
Hoekstra, M., et al. J. Hepatol. 52(2):244-251(2010)
Kershaw, E.E., et al. Diabetes 55(1):148-157(2006)
Baulande, S., et al. J. Biol. Chem. 276(36):33336-33344(2001)

Images



All lanes : Anti-Mouse Pnpla3 Antibody (C-term) at 1:1000 dilution Lane 1: Rat kidney lysate Lysates/proteins at 20 µg per lane. Secondary Goat Anti-Rabbit IgG, (H+L), Peroxidase conjugated (ASP1615) at 1/15000 dilution. Observed band size : 46kDa Blocking/Dilution buffer: 5% NFDM/TBST.

Please note: All products are 'FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC OR THERAPEUTIC PROCEDURES'.