For Research Use Only

LPCAT1 Monoclonal antibody

Catalog Number:66044-1-lg

Featured Product

9 Publications



Basic Information

Catalog Number:

GenBank Accession Number:

Purification Method:

66044-1-lg

GeneID (NCBI):

Protein A purification

Size:

CloneNo.:

150ul , Concentration: 1000 ug/ml by 79888Nanodrop and 508 ug/ml by Bradford UNIPROT ID:

BC020166

8B6E9

method using BSA as the standard; Source:

Q8NF37 Full Name: Recommended Dilutions:

Mouse Isotype: lysophosphatidylcholine acyltransferase 1

WB 1:5000-1:50000 IHC 1:50-1:500 IF-P 1:200-1:800 IF/ICC 1:400-1:1600

lgG2b

Calculated MW: 534 aa. 59 kDa

Immunogen Catalog Number: AG9060

Observed MW:

55 kDa

Applications

Tested Applications:

WB, IHC, IF/ICC, IF-P, ELISA

Cited Applications:

WB, IHC, IF

Species Specificity: human, mouse, rat

Cited Species:

human, mouse, rat

Positive Controls:

WB: LNCaP cells, MCF-7 cells, PC-12 cells, ROS1728 cells, HeLa cells, HEK-293 cells, HepG2 cells, Jurkat cellls, K-562 cells, HSC-T6 cells, NIH/3T3 cells, 4T1

IHC: human lung cancer tissue, human liver cancer

IF-P: mouse lung tissue,

IF/ICC: HeLa cells,

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

buffer pH 6.0

Background Information

 $LPCAT1, also \ named\ as\ AYTL2, PFAAP3\ and\ LysoPAFAT, belongs\ to\ the\ 1-acyl-sn-glycerol-3-phosphate$ acyltransferase family. It is a key enzyme for remodeling phospholipids, including phosphatidylcholine. The expression level of LPCAT1 is able to differentiate prostate cancer from noncancerous prostatic changes, and correlates to the tumor grade of prostate cancer. LPCAT1 possesses both acyltransferase and acetyltransferase activities. It mediates the conversion of 1-acyl-sn-glycero-3-phosphocholine (LPC) into phosphatidylcholine (PC).

Notable Publications

Author	Pubmed ID	Journal	Application
Mingyue Tao	34518524	Cell Death Dis	WB,IF,IHC
Shotaro Yamano	36056156	Sci Rep	IHC
Yufei Liu	34221998	Front Oncol	IHC, WB

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

*** 20ul sizes contain 0.1% BSA

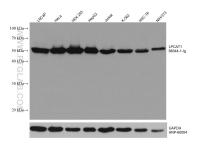
For technical support and original validation data for this product please contact:

T: 1 (888) 4PTGLAB (1-888-478-4522) (toll free in USA), or 1(312) 455-8498 (outside USA)

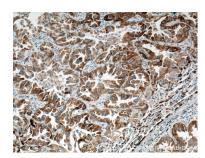
E: proteintech@ptglab.com W: ptglab.com

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

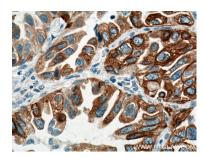
Selected Validation Data



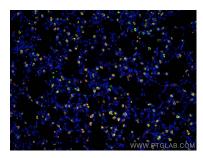
Various lysates were subjected to SDS PAGE followed by western blot with 66044-1-lg (LPCAT1 antibody) at dilution of 1:10000 incubated at room temperature for 1.5 hours. The membrane was stripped and reblotted with HRP-conjugated GAPDH Monoclonal antibody (HRP-60004) as loading control



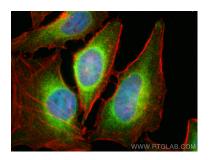
Immunohistochemical analysis of paraffinembedded human lung cancer tissue slide using 66044-1-Ig (LPCAT1 Antibody) at dilution of 1:200 (under 10x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



Immunohistochemical analysis of paraffinembedded human lung cancer tissue slide using 66044-1-Ig (LPCAT1 Antibody) at dilution of 1:200 (under 40x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



Immunofluorescent analysis of (4% PFA) fixed mouse lung tissue using LPCAT1 antibody (66044-1-lg, Clone: 8B6E9) at dilution of 1:400 and CoraLite®594-Conjugated Goat Anti-Mouse IgG(H+L), SFTPC antibody (10774-1-AP, green).



Immunofluorescent analysis of (4% PFA) fixed HeLa cells using LPCAT1 antibody (66044-1-1g, Clone: 8B6E9) at dilution of 1:800 and CoraLite®488-Conjugated Goat Anti-Mouse IgG(H+L), CL594-Phalloidin (red).