

**Lysophospholipase 1 Antibody**  
**Rabbit mAb**  
**Catalog # AP92172**

**Specification**

**Lysophospholipase 1 Antibody - Product Information**

Application	WB, FC, ICC
Primary Accession	<a href="#">075608</a>
Reactivity	Rat
Clonality	Monoclonal
<b>Other Names</b>	
APT1; hAPT1; LPL1; LYPLA1; Lysophospholipase 1; LYSOPLA; LysoPLA I;	
Isotype	Rabbit IgG
Host	Rabbit
Calculated MW	24670 Da

**Lysophospholipase 1 Antibody - Additional Information**

Dilution	WB~~1:1000 FC~~1:10~50 ICC~~N/A
Purification	Affinity-chromatography
Immunogen	A synthesized peptide derived from human Lysophospholipase 1
Description	Hydrolyzes fatty acids from S-acylated cysteine residues in proteins such as trimeric G alpha proteins or HRAS. Has depalmitoylating activity and also low lysophospholipase activity.
Storage Condition and Buffer	Rabbit IgG in phosphate buffered saline , pH 7.4, 150mM NaCl, 0.02% sodium azide and 50% glycerol. Store at +4°C short term. Store at -20°C long term. Avoid freeze / thaw cycle.

**Lysophospholipase 1 Antibody - Protein Information**

**Name** LYPLA1

**Synonyms** APT1, LPL1

**Function**

Acts as an acyl-protein thioesterase (PubMed:<a href="http://www.uniprot.org/citations/19439193" target="\_blank">19439193</a>, PubMed:<a href="http://www.uniprot.org/citations/20418879" target="\_blank">20418879</a>). Hydrolyzes fatty acids from S-acylated cysteine residues in proteins such as trimeric G alpha proteins or HRAS (PubMed:<a href="http://www.uniprot.org/citations/20418879" target="\_blank">20418879</a>). Acts as a palmitoyl thioesterase that catalyzes depalmitoylation of proteins, such as ADRB2,

KCNMA1 and SQSTM1 (PubMed:<a href="http://www.uniprot.org/citations/22399288" target="\_blank">22399288</a>, PubMed:<a href="http://www.uniprot.org/citations/27481942" target="\_blank">27481942</a>, PubMed:<a href="http://www.uniprot.org/citations/37802024" target="\_blank">37802024</a>). Acts as a negative regulator of autophagy by mediating palmitoylation of SQSTM1, decreasing affinity between SQSTM1 and ATG8 proteins and recruitment of ubiquitinated cargo proteins to autophagosomes (PubMed:<a href="http://www.uniprot.org/citations/37802024" target="\_blank">37802024</a>). Acts as a lysophospholipase and hydrolyzes lysophosphatidylcholine (lyso-PC) (PubMed:<a href="http://www.uniprot.org/citations/19439193" target="\_blank">19439193</a>). Also hydrolyzes lysophosphatidylethanolamine (lyso- PE), lysophosphatidylinositol (lyso-PI) and lysophosphatidylserine (lyso-PS) (By similarity). Has much higher thioesterase activity than lysophospholipase activity (PubMed:<a href="http://www.uniprot.org/citations/19439193" target="\_blank">19439193</a>). Contributes to the production of lysophosphatidic acid (LPA) during blood coagulation by recognizing and cleaving plasma phospholipids to generate lysophospholipids which in turn act as substrates for ENPP2 to produce LPA (PubMed:<a href="http://www.uniprot.org/citations/21393252" target="\_blank">21393252</a>).

### **Cellular Location**

Cytoplasm. Cell membrane. Nucleus membrane. Endoplasmic reticulum. Note=Shows predominantly a cytoplasmic localization with a weak expression in the cell membrane, nuclear membrane and endoplasmic reticulum.

### **Tissue Location**

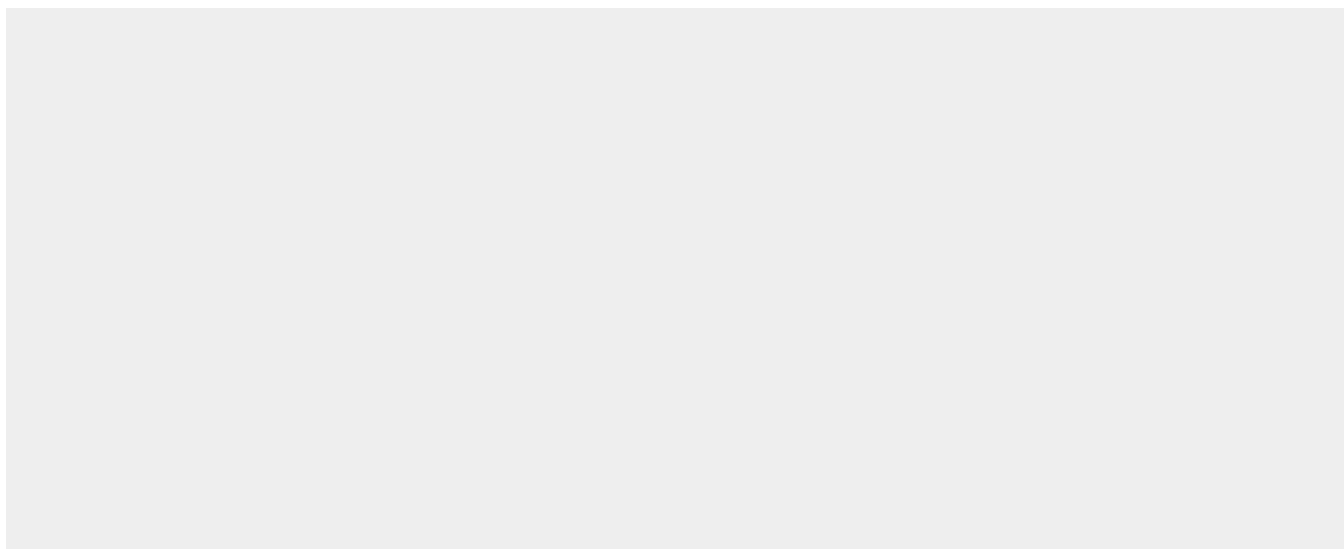
Platelets..

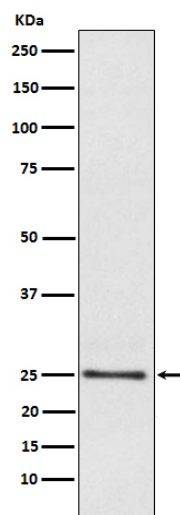
## **Lysophospholipase 1 Antibody - Protocols**

Provided below are standard protocols that you may find useful for product applications.

- [Western Blot](#)
- [Blocking Peptides](#)
- [Dot Blot](#)
- [Immunohistochemistry](#)
- [Immunofluorescence](#)
- [Immunoprecipitation](#)
- [Flow Cytometry](#)
- [Cell Culture](#)

## **Lysophospholipase 1 Antibody - Images**





Western blot analysis of Lysophospholipase 1 expression in Human fetal liver lysate.