abcam

ab169952

Anti-Apolipoprotein L1/APOL1 antibody [EPR2907(2)] - BSA and Azide free

Recombinant | RabMAb

Key facts

Isotype	IgG
Host species	Rabbit
Storage buffer	Constituents: PBS
Form	Liquid
Clonality	Monoclonal
Immunogen	The exact immunogen used to generate this antibody is proprietary information.
Carrier free	Yes
Clone number	EPR2907(2)
Purification technique	Affinity purification Protein A
Specificity	The immunogen used for this product shares 89% homology with Apol2. Cross-reactivity with this protein has not been confirmed experimentally.
Concentration	1.023 - 1.071 mg/mL The concentration of this product may be batch-dependent Batch concentration finder →

Reactivity data

IP

Tested

Species	Human
Dilution info	-
Notes	-

WB

Expected

Species	Human
Dilution info	Use at an assay dependent concentration.
Notes	-

ICC/IF

Tested

Species	Human
Dilution info	-
Notes	-

Flow Cyt (Intra)

Tested

Species	Human
Dilution info	-
Notes	ab199376 - Rabbit monoclonal IgG, is suitable for use as an isotype control with this antibody.

Target data

See full target information APOL1

Function	May play a role in lipid exchange and transport throughout the body. May participate in reverse cholesterol transport from peripheral cells to the liver. A component of trypanosome lytic factor of human serum; plays a crucial role in killing Trypanosoma brucei by forming pores in parasite lysosomal membranes and sensitizing T.brucei to oxidation-stimulated osmotic lysis (PubMed:12621437, PubMed:16020735, PubMed:19997494, PubMed:26645690, PubMed:7723792).

Storage

Shipped at conditions	Blue Ice
Appropriate short-term storage conditions	+4°C
Appropriate long-term storage conditions	+4°C
Storage information	Do Not Freeze

Notes

ab169952 is the carrier-free version of ab108315.

Patented technology
Our RabMAb® technology is a patented hybridoma-based technology for making rabbit monoclonal antibodies. For details on our patents, please refer to RabMAb® patents.

What are the advantages of a recombinant monoclonal antibody?
This product is a recombinant monoclonal antibody, which offers several advantages including:

- High batch-to-batch consistency and reproducibility
- Improved sensitivity and specificity
- Long-term security of supply
- Animal-free batch production

For more information, read more on recombinant antibodies.

Conjugation ready
Our carrier-free antibodies are typically supplied in a PBS-only formulation, purified and free of BSA, sodium azide and glycerol. This conjugation-ready format is designed for use with fluorochromes, metal isotopes, oligonucleotides, and enzymes, which makes them ideal for antibody labelling, functional and cell-based assays, flow-based assays (e.g. mass cytometry) and Multiplex Imaging applications.

Use our conjugation kits for antibody conjugates that are ready-to-use in as little as 20 minutes with 1 minute hands-on-time and 100% antibody recovery: available for fluorescent dyes, HRP, biotin and gold.

Compatibility
This product is compatible with the Maxpar® Antibody Labeling Kit from Fluidigm, without the need for antibody preparation. Maxpar® is a trademark of Fluidigm Canada Inc.

Supplementary info

This supplementary information is collated from multiple sources and compiled automatically.

Activity summary	Apolipoprotein L1 also known as APOL1 is a protein with a mass of approximately 42 kDa. It is primarily expressed in the liver but can also be found in various

	tissues including the placenta pancreas and kidney. As a part of the apolipoprotein family APOL1 contributes to lipid binding and transport processes. The protein is involved in innate immunity due to its ability to bind and kill certain trypanosomes which are parasites that can cause disease in humans.
Biological function summary	APOL1 functions as a component in lipid transport and immune response. It plays an important role in the lytic pathway against trypanosomes by forming a pore in their lysosomal membranes leading to cell death. While it does not form part of a larger complex its activity is important when interacting with other factors and lipids. APOL1's actions demonstrate an integral aspect of the body's defense system particularly with its influence on cellular structures through lipid interactions.
Pathways	APOL1 is involved in the regulation of lipid metabolism and immune response pathways. It plays a role in the high-density lipoprotein (HDL) particle remodeling pathway. Another significant pathway involving APOL1 is the APOL family protein pathway which includes related proteins like APOL2 and APOL3. These proteins collaboratively contribute to intracellular lipid transport and immune defense establishing an interconnected network among them.
Associated diseases and disorders	There is a significant connection between APOL1 variants and chronic kidney disease (CKD) and non-diabetic forms of End-Stage Renal Disease (ESRD). The risk alleles of the APOL1 gene are associated with increased incidence of CKD especially in individuals of African descent. These associations highlight the interaction between APOL1 and renal pathology as well as its linkage to other proteins like MYH9 which also relate to kidney diseases. Understanding APOL1's role in these conditions may aid in developing targeted medical interventions.

Product promise

Tested

We have tested this species and application combination and it works. It is covered by our product promise.

Expected

We have not tested this specific species and application combination in-house, but expect it will work. It is covered by our product promise.

Predicted

This species and application combination has not been tested, but we predict it will work based on strong homology. However, this combination is not covered by our product promise.

Not recommended

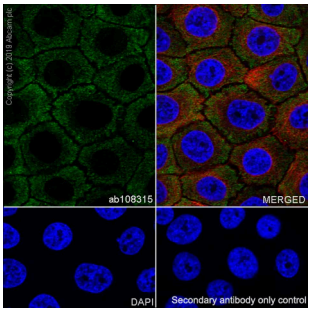
We do not recommend this combination. It is not covered by our product promise.

We are dedicated to supporting your work with high quality reagents and we are here for you every step of the way should you need us.

In the unlikely event of one of our products not working as expected, you are covered by our product promise.

Full details and terms and conditions can be found here:
Terms & Conditions.

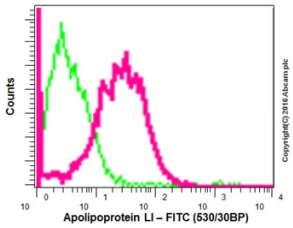
3 product images



Immunocytochemistry/ Immunofluorescence - Anti-Apolipoprotein L1/APOL1 antibody [EPR2907(2)] - BSA and Azide free (ab169952)

Apolipoprotein L1/APOL1 Immunocytochemistry/ Immunofluorescence staining using rabbit Anti-Apolipoprotein L1/APOL1 antibody

Immunocytochemistry/ Immunofluorescence analysis of BxPC-3 (human pancreas adenocarcinoma epithelial cell) cells labeling Apolipoprotein L1/APOL1 with purified ab108315 at 1/50 dilution (9.2 µg/mL). Cells were fixed in 4% Paraformaldehyde and permeabilized with 0.1% tritonX-100. Cells were counterstained with ab195889 Anti-alpha Tubulin antibody [DM1A] - Microtubule Marker (Alexa Fluor® 594) 1/200 (2.5 µg/mL). Goat anti rabbit IgG (Alexa Fluor® 488, ab150077) was used as the secondary antibody at 1/1000 (2 µg/mL) dilution. DAPI (blue) was used as nuclear counterstain. ab195889 Anti-alpha Tubulin antibody [DM1A] - Microtubule Marker (Alexa Fluor® 594) 1/200 (2.5 µg/mL) was used as the secondary antibody only control.
This data was developed using the same antibody clone in a different buffer formulation containing PBS, BSA, glycerol, and sodium azide (ab108315).

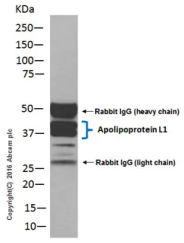


Flow Cytometry (Intracellular) - Anti-Apolipoprotein L1/APOL1 antibody [EPR2907(2)] - BSA and Azide free (ab169952)

Apolipoprotein L1/APOL1 Flow Cytometry (Intracellular) staining using rabbit Anti-Apolipoprotein L1/APOL1 antibody

This Flow Cyt data was generated using the same anti-Apolipoprotein L 1/APOL1 antibody clone, EPR2907 (2), in a different buffer formulation (cat ab108315).

Intracellular flow cytometric analysis of 2% paraformaldehyde-fixed HepG2 (Human hepatocellular carcinoma) cell line labeling Apolipoprotein L 1/APOL1 with ab108315 at 1/70 dilution (red) compared with a Rabbit IgG, monoclonal [EPR25A] - Isotype Control (ab172730) (Green). Goat anti Rabbit IgG (FITC) at 1/150 dilution was used as the secondary antibody.



Immunoprecipitation - Anti-Apolipoprotein L1/APOL1 antibody [EPR2907(2)] - BSA and Azide free (ab169952)

This IP data was generated using the same anti-Apolipoprotein L 1/APOL1 antibody clone, EPR2907(2), in a different buffer formulation (cat# ab108315).
Apolipoprotein L 1/APOL1 was immunoprecipitated from 1mg of Human plasma with ab108315 at 1/40 dilution.

Western blot was performed from the immunoprecipitate using ab108315 at 1/1000 dilution.

Goat Anti-Rabbit IgG peroxidase conjugated,was used as secondary antibody at 1/1000 dilution.

Lane 1:Human plasma

Blocking and dilution buffer and concentration: 5% NFDM/TBST.

Exposure time: 10 seconds.
All lanes:
Immunoprecipitation - Anti-Apolipoprotein L1/APOL1 antibody [EPR2907(2)] (ab108315)

Predicted band size: 44 kDa

Observed band size: 39 kDa, 42 kDa

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