

Anti-LRP1 antibody [EPR3724] - BSA and Azide free ab215997

KO 評価済 リコンビナント RabMAb

17 References 画像数 12

製品の概要

製品名	Anti-LRP1 antibody [EPR3724] - BSA and Azide free
製品の詳細	Rabbit monoclonal [EPR3724] to LRP1 - BSA and Azide free
由来種	Rabbit
アプリケーション	適用あり: Flow Cyt (Intra), IP, IHC-P, WB, ICC/IF
種交差性	交差種: Mouse, Rat, Human, Pig
免疫原	Synthetic peptide. This information is proprietary to Abcam and/or its suppliers.
ポジティブ・コントロール	WB: PMBC and A549 cell lysates; mouse brain, heart, kidney and spleen tissue lysates; rat brain, heart, kidney or spleen tissue lysates; human fetal brain tissue lysates; pig liver and heart tissue lysates. IHC-P: Human liver, clear cell carcinoma, brain, lung and placenta tissues. ICC/IF: U87-MG cells. Flow Cyt (intra): Jurkat cells. IP: A549 cells.
特記事項	ab215997 is the carrier-free version of ab92544 .

Our **carrier-free** antibodies are typically supplied in a PBS-only formulation, purified and free of BSA, sodium azide and glycerol. The carrier-free buffer and high concentration allow for increased conjugation efficiency.

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.

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.

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 production

For more information [see here](#).

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

製品の特性

製品の状態	Liquid
保存方法	Shipped at 4°C. Store at +4°C. Do Not Freeze.
バッファー	pH: 7.20 Constituent: PBS
キャリア・フリー	はい
精製度	Protein A purified
ポリ/モノ	モノクローナル
クローン名	EPR3724
アイソタイプ	IgG

アプリケーション

The Abpromise guarantee Abpromise保証は、次のテスト済みアプリケーションにおけるab215997の使用に適用されます
アプリケーションノートには、推奨の開始希釈率がありますが、適切な希釈率につきましてはご検討ください。

アプリケーション	Abreviews	特記事項
Flow Cyt (Intra)		Use at an assay dependent concentration. ab199376 - Rabbit monoclonal IgG, is suitable for use as an isotype control with this antibody.
IP		Use at an assay dependent concentration.
IHC-P		Use at an assay dependent concentration. Perform heat mediated antigen retrieval before commencing with IHC staining protocol. See <u>IHC antigen retrieval protocols</u> .
WB		Use at an assay dependent concentration. Predicted molecular weight: 85 kDa.
ICC/IF		Use at an assay dependent concentration.

ターゲット情報

機能	Endocytic receptor involved in endocytosis and in phagocytosis of apoptotic cells. Required for early embryonic development. Involved in cellular lipid homeostasis. Involved in the plasma clearance of chylomicron remnants and activated LRPAP1 (alpha 2-macroglobulin), as well as the local metabolism of complexes between plasminogen activators and their endogenous inhibitors. May modulate cellular events, such as APP metabolism, kinase-dependent intracellular signaling, neuronal calcium signaling as well as neurotransmission. Functions as a receptor for Pseudomonas aeruginosa exotoxin A.
組織特異性	Most abundant in liver, brain and lung.
配列類似性	Belongs to the LDLR family.

Contains 22 EGF-like domains.
Contains 31 LDL-receptor class A domains.
Contains 34 LDL-receptor class B repeats.

翻訳後修飾

Cleaved into a 85 kDa membrane-spanning subunit (LRP-85) and a 515 kDa large extracellular domain (LRP-515) that remains non-covalently associated. Gamma-secretase-dependent cleavage of LRP-85 releases the intracellular domain from the membrane.

The N-terminus is blocked.

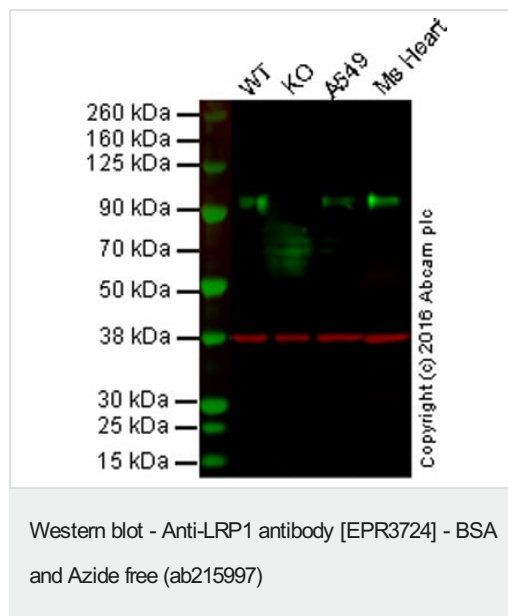
Phosphorylated on serine and threonine residues.

Phosphorylated on tyrosine residues upon stimulation with PDGF. Tyrosine phosphorylation promotes interaction with SHC1.

細胞内局在

Cytoplasm. Nucleus. After cleavage, the intracellular domain (LRPICD) is detected both in the cytoplasm and in the nucleus and Cell membrane. Membrane, coated pit.

画像



This WB data was generated using the same anti-LRP1 antibody clone, EPR3724, in a different buffer formulation (cat# [ab92544](#)).

Lane 1: Wild-type HAP1 cell lysate (20 µg)

Lane 2: LRP1 knockout HAP1 cell lysate (20 µg)

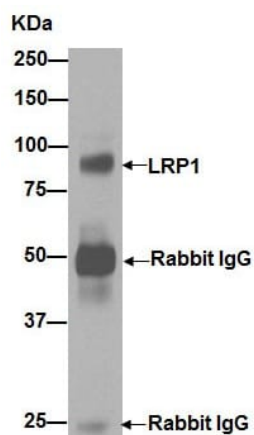
Lane 3: A549 cell lysate (20 µg)

Lane 4: Mouse heart tissue lysate (20 µg)

Lanes 1 - 4: Merged signal (red and green). Green -

[ab92544](#) observed at 92 kDa. Red - loading control, [ab8245](#), observed at 37 kDa.

[ab92544](#) was shown to specifically react with LRP1 in wild-type HAP1 cells. No band was observed when LRP1 knockout samples were used. Wild-type and LRP1 knockout samples were subjected to SDS-PAGE. [ab92544](#) and [ab8245](#) (loading control to GAPDH) were diluted at 1/5000 and 1/10,000 respectively and incubated overnight at 4°C. Blots were developed with Goat anti-Rabbit IgG H&L (IRDye® 800CW) preadsorbed ([ab216773](#)) and Goat anti-Mouse IgG H&L (IRDye® 680RD) preadsorbed ([ab216776](#)) secondary antibodies at 1/10,000 dilution for 1 hour at room temperature before imaging.



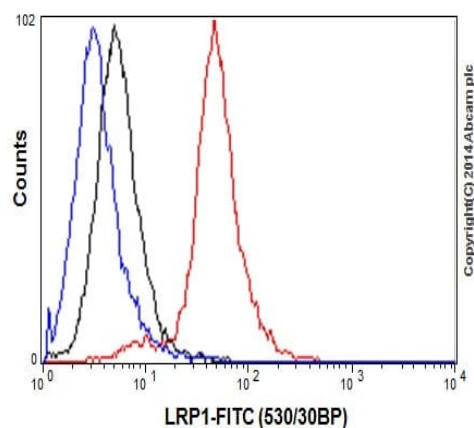
Immunoprecipitation - Anti-LRP1 antibody
[EPR3724] - BSA and Azide free (ab215997)

ab92544 (purified) at 1/30 immunoprecipitating LRP1 in A549 cell lysate. For western blotting, a peroxidase-conjugated goat anti-rabbit IgG (H+L) was used as the secondary antibody (1/1000).

Blocking buffer and concentration: 5% NFDM/TBST.

Diluting buffer and concentration: 5% NFDM /TBST.

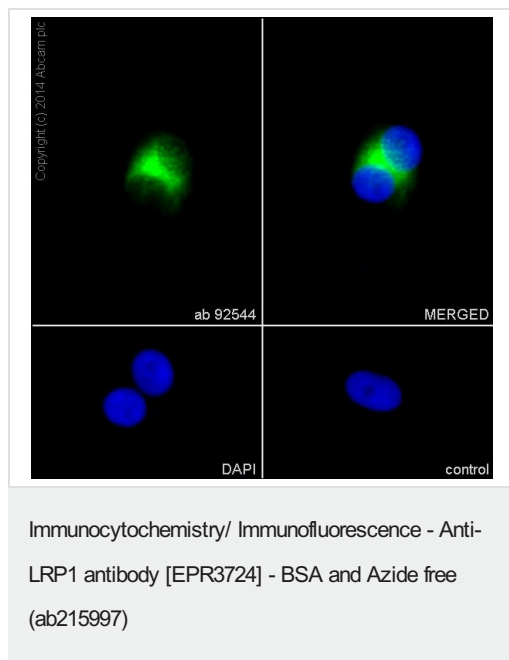
This data was developed using the same antibody clone in a different buffer formulation containing PBS, BSA, glycerol, and sodium azide (**ab92544**).



Flow Cytometry (Intracellular) - Anti-LRP1 antibody
[EPR3724] - BSA and Azide free (ab215997)

Intracellular Flow Cytometry analysis of Jurkat cells labelling LRP1 with purified **ab92544** at 1/100 (red). Cells were fixed with 2% paraformaldehyde. A FITC-conjugated goat anti-rabbit IgG (1/150) was used as the secondary antibody. Black - Isotype control, rabbit monoclonal IgG. Blue - Unlabelled control, cells without incubation with primary and secondary antibodies.

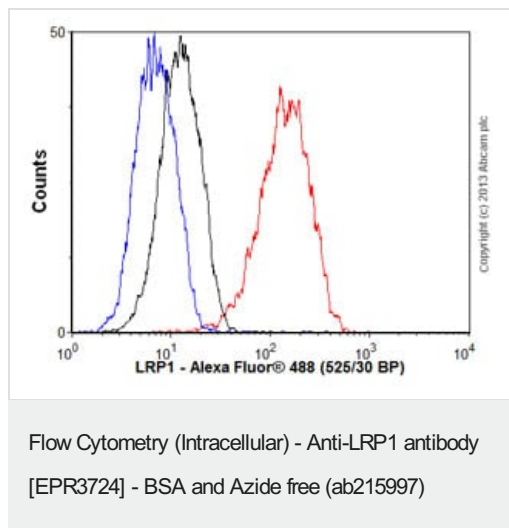
This data was developed using the same antibody clone in a different buffer formulation containing PBS, BSA, glycerol, and sodium azide (**ab92544**).



Immunocytochemistry/Immunofluorescence analysis of U87-MG cells labelling LRP1 with purified **ab92544** at 1/100. Cells were fixed with 4% paraformaldehyde and permeabilized with 0.1% Triton X-100. **ab150077**, an Alexa Fluor® 488-conjugated goat anti-rabbit IgG (1/500) was used as the secondary antibody. DAPI (blue) was used as the nuclear counterstain.

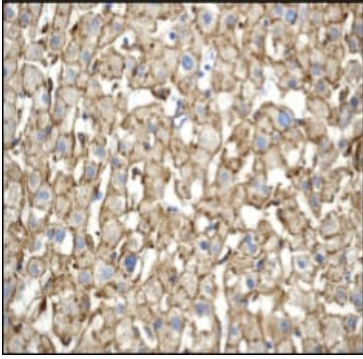
Control: primary antibody (1/100) and secondary antibody, **ab150120**, an Alexa Fluor® 594-conjugated goat anti-mouse IgG (1/500).

This data was developed using the same antibody clone in a different buffer formulation containing PBS, BSA, glycerol, and sodium azide (**ab92544**).



Overlay histogram showing Jurkat cells stained with unpurified **ab92544** (red line). The cells were fixed with 80% methanol (5 min) and then permeabilized with 0.1% PBS-Tween for 20 min. The cells were then incubated in 1x PBS / 10% normal goat serum / 0.3M glycine to block non-specific protein-protein interactions followed by the antibody (**ab92544**, 1/1000 dilution) for 30 min at 22°C. The secondary antibody used was Alexa Fluor® 488 goat anti-rabbit IgG (H+L) (**ab150077**) at 1/2000 dilution for 30 min at 22°C. Isotype control antibody (black line) was rabbit IgG (monoclonal) (1µg/1x10⁶ cells) used under the same conditions. Unlabelled sample (blue line) was also used as a control. Acquisition of >5,000 events were collected using a 20mW Argon ion laser (488nm) and 525/30 bandpass filter.

This data was developed using the same antibody clone in a different buffer formulation containing PBS, BSA, glycerol, and sodium azide (**ab92544**).

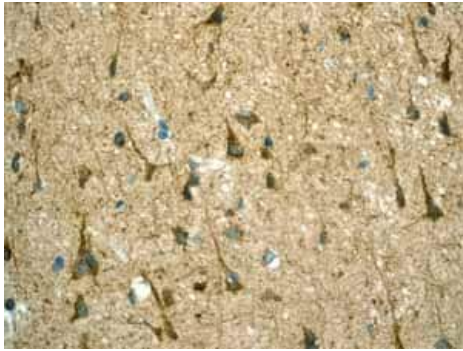


Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) - Anti-LRP1 antibody [EPR3724] - BSA and Azide free (ab215997)

Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) analysis of human liver tissue labelling LRP1 with unpurified [ab92544](#) at 1/100.

This data was developed using the same antibody clone in a different buffer formulation containing PBS, BSA, glycerol, and sodium azide ([ab92544](#)).

Perform heat mediated antigen retrieval before commencing with IHC staining protocol.

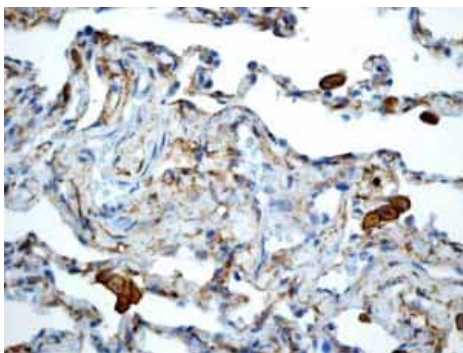


Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) - Anti-LRP1 antibody [EPR3724] - BSA and Azide free (ab215997)

Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) analysis of normal human brain tissue labelling LRP1 with unpurified [ab92544](#).

This data was developed using the same antibody clone in a different buffer formulation containing PBS, BSA, glycerol, and sodium azide ([ab92544](#)).

Perform heat mediated antigen retrieval before commencing with IHC staining protocol.

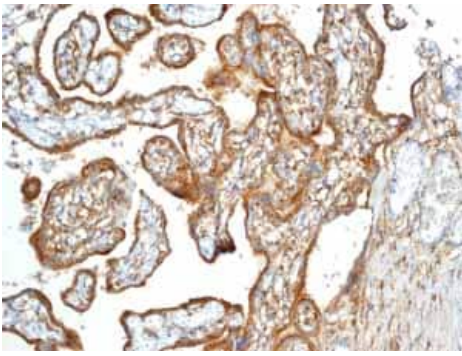


Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) - Anti-LRP1 antibody [EPR3724] - BSA and Azide free (ab215997)

Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) analysis of normal human lung tissue labelling LRP1 with unpurified [ab92544](#).

This data was developed using the same antibody clone in a different buffer formulation containing PBS, BSA, glycerol, and sodium azide ([ab92544](#)).

Perform heat mediated antigen retrieval before commencing with IHC staining protocol.

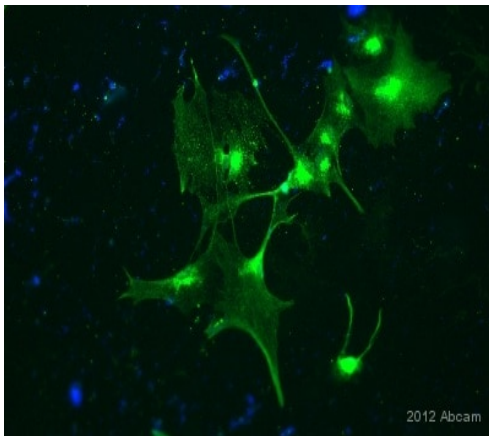


Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) - Anti-LRP1 antibody [EPR3724] - BSA and Azide free (ab215997)

Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) analysis of normal human placenta tissue labelling LRP1 with unpurified **ab92544**.

This data was developed using the same antibody clone in a different buffer formulation containing PBS, BSA, glycerol, and sodium azide (**ab92544**).

Perform heat mediated antigen retrieval before commencing with IHC staining protocol.

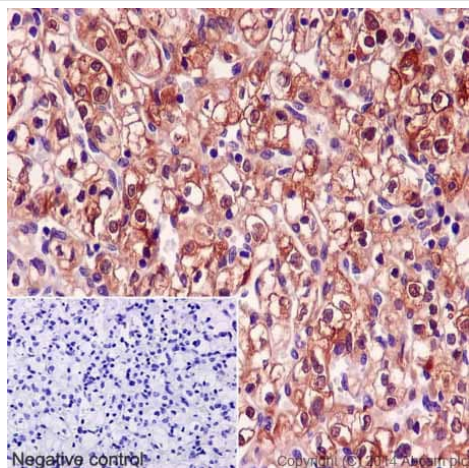


Immunocytochemistry/ Immunofluorescence - Anti-LRP1 antibody [EPR3724] - BSA and Azide free (ab215997)

This image is courtesy of an Abreview submitted by Ruma Raha-Chowdhury.

ICC/IF image of LRP1 staining on rat mixed glia culture using unpurified **ab92544** (1:200). The cells were fixed using paraformaldehyde. The cells were then permeabilised using 0.1% TritonX in 0.1% PBS. Non-specific protein was blocked using 10% donkey serum at 24°C for 1 hour. **ab92544** was diluted (1/200) using 0.1% TritonX with 0.1% PBS and 10% donkey serum and the cells were incubated for 4 hours at 24°C. The secondary antibody used was donkey polyclonal to Rabbit IgG conjugated to Alexa Fluor® 488. DAPI was used to stain the nucleus.

This data was developed using the same antibody clone in a different buffer formulation containing PBS, BSA, glycerol, and sodium azide (**ab92544**).



Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) - Anti-LRP1 antibody
[EPR3724] - BSA and Azide free (ab215997)

This IHC data was generated using the same anti-LRP1 antibody clone, EPR3724, in a different buffer formulation (cat# **ab92544**).

Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) analysis of human clear cell carcinoma of the kidney tissue labelling LRP1 with purified **ab92544** at 1/100. Heat mediated antigen retrieval was performed using Tris/EDTA buffer pH 9. **ab97051**, a HRP-conjugated goat anti-rabbit IgG (H+L) was used as the secondary antibody (1/500). Negative control using PBS instead of primary antibody. Counterstained with hematoxylin.

Why choose a recombinant antibody?



Research with confidence
Consistent and reproducible results



Long-term and scalable supply
Recombinant technology



Success from the first experiment
Confirmed specificity



Ethical standards compliant
Animal-free production

Anti-LRP1 antibody [EPR3724] - BSA and Azide free (ab215997)

Please note: All products are "FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC PROCEDURES"

Our Abpromise to you: Quality guaranteed and expert technical support

- Replacement or refund for products not performing as stated on the datasheet
- Valid for 12 months from date of delivery
- Response to your inquiry within 24 hours
- We provide support in Chinese, English, French, German, Japanese and Spanish
- Extensive multi-media technical resources to help you
- We investigate all quality concerns to ensure our products perform to the highest standards

If the product does not perform as described on this datasheet, we will offer a refund or replacement. For full details of the Abpromise, please visit <https://www.abcam.co.jp/abpromise> or contact our technical team.

Terms and conditions

- Guarantee only valid for products bought direct from Abcam or one of our authorized distributors