abcam

Product datasheet

Anti-Rab5 antibody [EPR5438] - Early Endosome Marker ab109534





RabMAb

★★★★☆ 9 Abreviews 15 References 8 Images

Overview

Product name Anti-Rab5 antibody [EPR5438] - Early Endosome Marker

Description Rabbit monoclonal [EPR5438] to Rab5 - Early Endosome Marker

Host species Rabbit

Tested applications Suitable for: WB, IHC-P

Unsuitable for: Flow Cyt,ICC/IF or IP

Species reactivity Reacts with: Mouse, Rat, Human

Immunogen Synthetic peptide. This information is proprietary to Abcam and/or its suppliers.

Positive control 293T, HeLa and Jurkat whole cell lysate (ab7899); Human brain tissue.

General notesThis product is a recombinant monoclonal antibody, which offers several advantages including:

- High batch-to-batch consistency and reproducibility

Improved sensitivity and specificityLong-term security of supplyAnimal-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**.

Properties

Form Liquid

Storage instructions Shipped at 4°C. Store at -20°C. Stable for 12 months at -20°C.

Storage buffer pH: 7.20

Preservative: 0.01% Sodium azide

Constituents: 40% Glycerol (glycerin, glycerine), 59% PBS, 0.05% BSA

Purity Protein A purified

Clonality Monoclonal
Clone number EPR5438

Isotype IgG

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Applications

The Abpromise guarantee

Our <u>Abpromise guarantee</u> covers the use of ab109534 in the following tested applications.

The application notes include recommended starting dilutions; optimal dilutions/concentrations should be determined by the end user.

Application	Abreviews	Notes
WB	★★★★ ★ <u>(5)</u>	1/1000 - 1/10000. Predicted molecular weight: 24 kDa.
IHC-P	★★★★ (1)	1/100 - 1/250. Perform heat mediated antigen retrieval via the pressure cooker method before commencing with IHC staining protocol.

Application notes

Is unsuitable for Flow Cyt,ICC/IF or IP.

Target

Function Requ

Required for the fusion of plasma membranes and early endosomes.

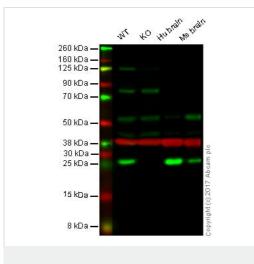
Sequence similarities

Belongs to the small GTPase superfamily. Rab family.

Cellular localization

Cell membrane. Early endosome membrane. Melanosome. Enriched in stage I melanosomes.

Images



Western blot - Anti-Rab5 antibody [EPR5438] -

Early Endosome Marker (ab109534)

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

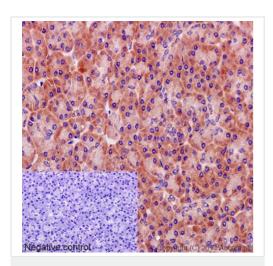
Lane 2: Rab5 knockout HAP1 whole cell lysate (20 µg)

Lane 3: Hu brain whole cell lysate (20 µg)

Lane 4: Ms brain whole cell lysate (20 µg)

Lanes 1 - 4: Merged signal (red and green). Green - ab109534 observed at 25 kDa. Red - loading control, **ab8245**, observed at 37

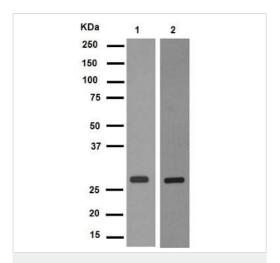
kDa.



Immunohistochemistry (Formalin/PFA-fixed paraffinembedded sections) - Anti-Rab5 antibody

[EPR5438] - Early Endosome Marker (ab109534)

Immunohistochemical staining of paraffin embedded human pancreas with purified ab109534 at a working dilution of 1 in 1000. The secondary antibody used is a HRP polymer for rabbit IgG. The sample is counter-stained with hematoxylin. Antigen retrieval was perfomed using Tris-EDTA buffer, pH 9.0. PBS was used instead of the primary antibody as the negative control, and is shown in the inset.



Western blot - Anti-Rab5 antibody [EPR5438] - Early Endosome Marker (ab109534)

All lanes : Anti-Rab5 antibody [EPR5438] - Early Endosome Marker (ab109534) at 1/5000 dilution (purified)

Lane 1 : Mouse brain
Lane 2 : Rat brain

Lysates/proteins at 10 µg per lane.

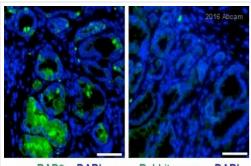
Secondary

All lanes: HRP goat anti-rabbit (H+L) at 1/1000 dilution

Predicted band size: 24 kDa **Observed band size:** 24 kDa

Blocking buffer: 5% NFDM/TBST

Dilution buffer: 5% NFDM/TBST



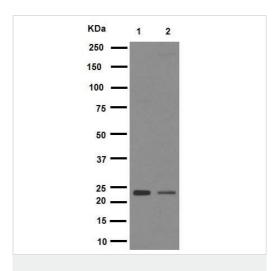
RAB5 + DAPI Rabbit serum + DAPI

Immunohistochemistry (Formalin/PFA-fixed paraffinembedded sections) - Anti-Rab5 antibody

[EPR5438] - Early Endosome Marker (ab109534)

This image is courtesy of an anonymous abreview.

Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) analysis of Pancreas tissue sections (with ADM and PanlN lesions) from KC mice labeling Rab5 with ab109534 at 1/200 dilution. Tissue was fixed with paraformaldehyde and permeabilized with TritonX100 0.1% for 10 min at room temperature. Heat-mediated antigen retrieval was performed using TRIS-EDTA pH9 buffer. Tissue sections were blocked with 10% goat serum for 1 hour at 20°C. A polyclonal goat anti-rabbit Alexa Fluor 488 secondary antibody was used at 1/500 dilution.



Western blot - Anti-Rab5 antibody [EPR5438] -Early Endosome Marker (ab109534)

All lanes : Anti-Rab5 antibody [EPR5438] - Early Endosome Marker (ab109534) at 1/5000 dilution (purified)

Lane 1 : MCF7 cell lysate
Lane 2 : HEK293 cell lysate

Lysates/proteins at 10 µg per lane.

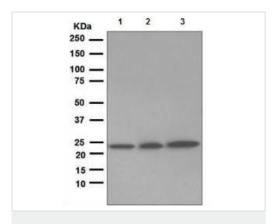
Secondary

All lanes: HRP goat anti-rabbit (H+L) at 1/1000 dilution

Predicted band size: 24 kDa Observed band size: 24 kDa

Blocking buffer: 5% NFDM/TBST

Dilution buffer: 5% NFDM/TBST



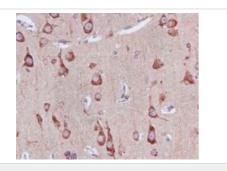
Western blot - Anti-Rab5 antibody [EPR5438] -Early Endosome Marker (ab109534)

All lanes : Anti-Rab5 antibody [EPR5438] - Early Endosome Marker (ab109534) at 1/1000 dilution (unpurified)

Lane 1 : 293T cell lysate
Lane 2 : HeLa cell lysate
Lane 3 : Jurkat cell lysate

Lysates/proteins at 10 µg per lane.

Predicted band size: 24 kDa

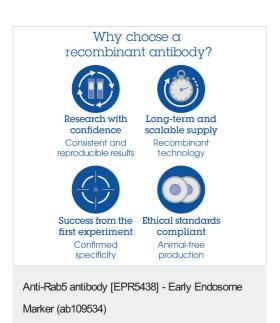


Immunohistochemistry (Formalin/PFA-fixed paraffinembedded sections) - Anti-Rab5 antibody

[EPR5438] - Early Endosome Marker (ab109534)

Immunohistochemical staining of Rab5 in paraffin embedded human brain tissue with unpurified ab109534, at 1/100 dilution.

Perform heat mediated antigen retrieval via the pressure cooker method before commencing with IHC staining protocol.



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