abcam

Product datasheet

Anti-Myelin oligodendrocyte glycoprotein antibody [EPR22629-310] ab233549



★★★★★ 3 Abreviews 9 Images

Overview

Product name Anti-Myelin oligodendrocyte glycoprotein antibody [EPR22629-310]

Rabbit monoclonal [EPR22629-310] to Myelin oligodendrocyte glycoprotein **Description**

Host species Rabbit

Tested applications Suitable for: IHC-P, WB, IHC-Fr, IP Species reactivity Reacts with: Mouse, Rat, Human

Immunogen Recombinant fragment. This information is proprietary to Abcam and/or its suppliers.

Positive control WB: Human brain tissue lysate; mouse brain tissue lysate; rat brain tissue lysate. IP: Mouse brain

tissue lysate. IHC-P: Human cerebellum tissue; mouse cerebellum tissue; rat cerebellum tissue.

IHC-Fr: Mouse cerebellum tissue: rat cerebellum tissue.

General notes 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**.

Properties

Form Liquid

Storage instructions Shipped at 4°C. Store at +4°C short term (1-2 weeks). Upon delivery aliquot. Store at -20°C long

term. Avoid freeze / thaw cycle.

Storage buffer pH: 7.2

Preservative: 0.01% Sodium azide

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

Purity Protein A purified

Clonality Monoclonal

Clone number EPR22629-310

Isotype IgG

Applications

The Abpromise guarantee Our Abpromise guarantee covers the use of ab233549 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
IHC-P	★★★★★(2)	1/500. Perform heat mediated antigen retrieval with Tris/EDTA buffer pH 9.0 before commencing with IHC staining protocol.
WB		1/1000. Detects a band of approximately 28 kDa (predicted molecular weight: 28 kDa).
IHC-Fr		1/500. Heat mediated antigen retrieval using sodium citrate buffer (10mM citrate pH 6.0 + 0.05% Tween-20).
IP		1/30.

Target

Function Mediates homophilic cell-cell adhesion (By similarity). Minor component of the myelin sheath. May

be involved in completion and/or maintenance of the myelin sheath and in cell-cell communication.

Tissue specificity Found exclusively in the CNS, where it is localized on the surface of myelin and oligodendrocyte

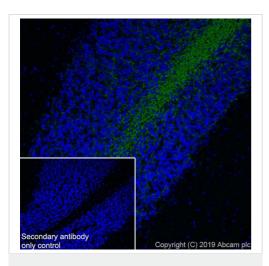
cytoplasmic membranes.

Sequence similarities Belongs to the immunoglobulin superfamily. BTN/MOG family.

Contains 1 lg-like V-type (immunoglobulin-like) domain.

Cellular localization Cell membrane.

Images

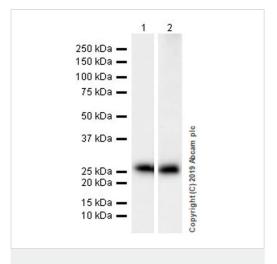


Immunohistochemistry (Frozen sections) - Anti-Myelin oligodendrocyte glycoprotein antibody [EPR22629-310] (ab233549)

Frozen section of 4% PFA-fixed, 0.2% Triton X-100 permeabilized rat cerebellum tissue labeling Myelin oligodendrocyte glycoprotein with ab233549 at 1/500 dilution, followed by Goat Anti-Rabbit IgG H&L (Alexa Fluor® 488) (ab150077), at 1/1000 dilution (green). Positive staining on nerve fiber tracts in rat cerebellum (PMID: 26347141) is observed. The nuclear counter stain is DAPI (blue).

Secondary antibody only control: Used PBS instead of primary antibody, secondary antibody is Goat Anti-Rabbit lgG H&L (Alexa Fluor[®] 488) (ab150077), at 1/1000 dilution.

Heat mediated antigen retrieval using sodium citrate buffer (10mM citrate pH 6.0 + 0.05% Tween-20).



Western blot - Anti-Myelin oligodendrocyte glycoprotein antibody [EPR22629-310] (ab233549)

All lanes : Anti-Myelin oligodendrocyte glycoprotein antibody [EPR22629-310] (ab233549) at 1/1000 dilution

Lane 1 : Mouse brain tissue lysate

Lane 2 : Rat brain tissue lysate

Lysates/proteins at 20 µg per lane.

Secondary

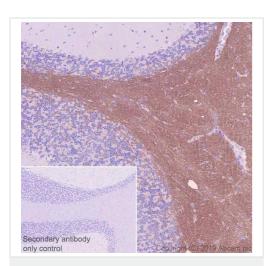
All lanes : Goat Anti-Rabbit lgG H&L (HRP) (<u>ab97051</u>) at 1/100000 dilution

Predicted band size: 28 kDa Observed band size: 28 kDa

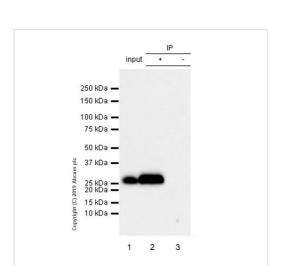
Blocking and dilution buffer: 5% NFDM/TBST.

Exposure times.

Lane 1: 26 seconds; Lane 2: 10 seconds.



Immunohistochemistry (Formalin/PFA-fixed paraffinembedded sections) - Anti-Myelin oligodendrocyte glycoprotein antibody [EPR22629-310] (ab233549)



Immunoprecipitation - Anti-Myelin oligodendrocyte glycoprotein antibody [EPR22629-310] (ab233549)

Immunohistochemical analysis of paraffin-embedded rat cerebellum tissue labeling Myelin oligodendrocyte glycoprotein with ab233549 at 1/500 dilution, followed by Rabbit specific IHC polymer detection kit HRP/DAB (ab209101). Positive staining on white matter of rat cerebellum (PMID: 25421634) is observed. Counter stained with hematoxylin.

Secondary antibody only control: Used PBS instead of primary antibody, secondary antibody is Rabbit specific IHC polymer detection kit HRP/DAB (ab209101).

The section was incubated with ab233549 for 30 mins at room temperature.

The immunostaining was performed on a Leica Biosystems BOND® RX instrument.

Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0, epitope retrieval solution 2) for 20mins.

Myelin oligodendrocyte glycoprotein was immunoprecipitated from 0.35 mg of mouse brain tissue lysate whole cell lysate with ab233549 at 1/30 dilution. Western blot was performed from the immunoprecipitate using ab233549 at 1/1000 dilution. VeriBlot for IP Detection Reagent (HRP) (ab131366), was used as secondary antibody at 1/5000 dilution.

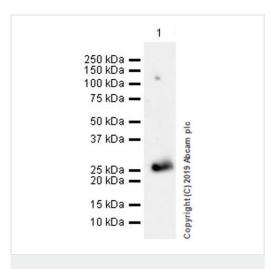
Lane 1: Mouse brain tissue lysate 10 µg (Input).

Lane 2: ab233549 IP in mouse brain tissue lysate.

Lane 3: Rabbit monoclonal IgG (<u>ab172730</u>) instead of ab233549 in mouse brain tissue lysate.

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

Exposure time: 30 seconds.



Western blot - Anti-Myelin oligodendrocyte glycoprotein antibody [EPR22629-310] (ab233549)

Anti-Myelin oligodendrocyte glycoprotein antibody [EPR22629-310] (ab233549) at 1/1000 dilution + Human brain tissue lysate at 20 µg

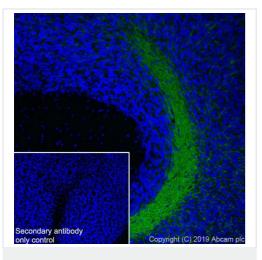
Secondary

VeriBlot for IP Detection Reagent (HRP) (ab131366) at 1/1000 dilution

Predicted band size: 28 kDa **Observed band size:** 28 kDa

Exposure time: 3 minutes

Blocking and dilution buffer: 5% NFDM/TBST.

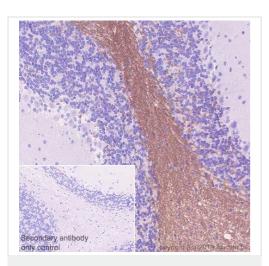


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Heat mediated antigen retrieval using sodium citrate buffer (10mM citrate pH 6.0 + 0.05% Tween-20).



Immunohistochemistry (Formalin/PFA-fixed paraffinembedded sections) - Anti-Myelin oligodendrocyte glycoprotein antibody [EPR22629-310] (ab233549)

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Secondary antibody only control: Used PBS instead of primary antibody, secondary antibody is Rabbit specific IHC polymer detection kit HRP/DAB (ab209101).

The section was incubated with ab233549 for 30 mins at room temperature.

The immunostaining was performed on a Leica Biosystems BOND® RX instrument.

Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0, epitope retrieval solution 2) for 20mins.



Immunohistochemistry (Formalin/PFA-fixed paraffinembedded sections) - Anti-Myelin oligodendrocyte glycoprotein antibody [EPR22629-310] (ab233549)

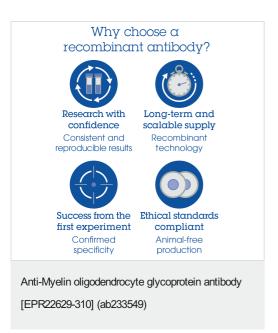
Immunohistochemical analysis of paraffin-embedded human cerebellum tissue labeling Myelin oligodendrocyte glycoprotein with ab233549 at 1/500 dilution, followed by Rabbit specific IHC polymer detection kit HRP/DAB (ab209101). Positive staining on white matter of human cerebellum (PMID: 25421634) is observed. Counter stained with hematoxylin.

Secondary antibody only control: Used PBS instead of primary antibody, secondary antibody is Rabbit specific IHC polymer detection kit HRP/DAB (ab209101).

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