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GFAP Antibody
Mouse Monoclonal Antibody (Mab)
Catalog # AM1870B

Specification

GFAP Antibody - Product Information

Application	**IF, WB, IHC-P-Leica,E**
Primary Accession	P14136
Other Accession	NP_001124491.1
Reactivity	**Human**
Host	**Mouse**
Clonality	**Monoclonal**
Isotype	**IgG2b,k**

GFAP Antibody - Additional Information

Gene ID 2670

Other Names
Glial fibrillary acidic protein, GFAP, GFAP

Target/Specificity
This GFAP monoclonal antibody is generated from mouse immunized with GFAP recombinant protein.

Dilution
IF~~1:10~50
WB~~1:4000
IHC-P-Leica~~1:1000
E~~Use at an assay dependent concentration.

Format
Purified monoclonal antibody supplied in PBS with 0.09% (W/V) sodium azide. This antibody is purified through a protein G column, followed by dialysis against PBS.

Storage
Maintain refrigerated at 2-8°C for up to 2 weeks. For long term storage store at -20°C in small aliquots to prevent freeze-thaw cycles.

Precautions
GFAP Antibody is for research use only and not for use in diagnostic or therapeutic procedures.

GFAP Antibody - Protein Information

Name GFAP

Function GFAP, a class-III intermediate filament, is a cell-specific marker that, during the development of the central nervous system, distinguishes astrocytes from other glial cells.

Cellular Location
Cytoplasm. Note=Associated with intermediate filaments

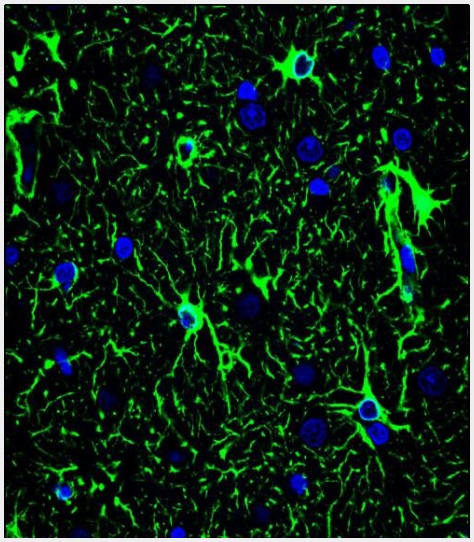
Tissue Location
Expressed in cells lacking fibronectin.

GFAP 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 Cytomety
- Cell Culture

GFAP Antibody - Images



Confocal immunofluorescent analysis of GFAP Antibody (Cat#AM1870b) with brain tissue followed by Alexa Fluor® 488-conjugated goat anti-mouse lgG (green). DAPI was used to stain the cell nuclear (blue).

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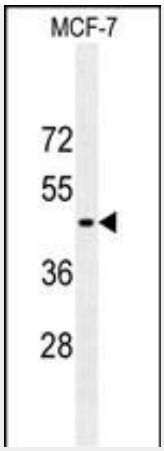
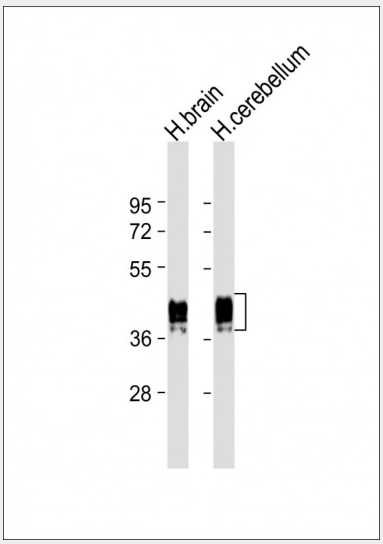
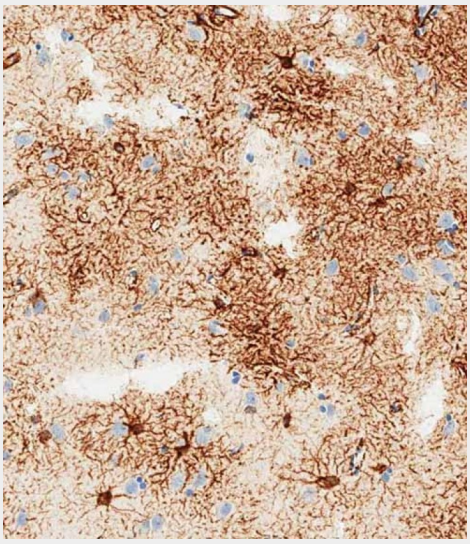


GFAP Antibody (Cat. #AM1870b) western blot analysis in MCF-7 cell line lysates (35µg/lane).This demonstrates the GFAP antibody detected the GFAP protein (arrow).



All lanes : Anti-GFAP Antibody at 1:4000 dilution Lane 1: human brain lysate Lane 2: human cerebellum lysate Lysates/proteins at 20 µg per lane. Secondary Goat Anti-mouse IgG, (H+L), Peroxidase conjugated at 1/10000 dilution. Predicted band size : 50 kDa Blocking/Dilution buffer: 5% NFDM/TBST.



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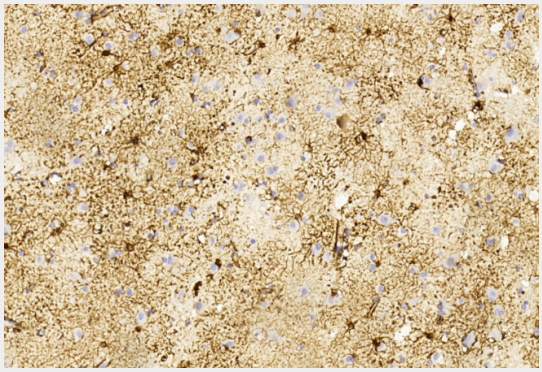
Immunohistochemical analysis of paraffin-embedded human brain tissue using AM1870B performed on the Leica® BOND RXm. Tissue was fixed with formaldehyde at room temperature; antigen retrieval was by heat mediation with a EDTA buffer (pH9. 0). Samples were incubated with primary antibody (1:1000) for 1 hours at room temperature. A undiluted biotinylated CRF Anti-Polyvalent HRP Polymer antibody was used as the secondary antibody.



Immunohistochemical analysis of paraffin-embedded Human brain section using Pink1(Cat#AM1870B). AM1870B was diluted at 1:2000 dilution. A undiluted biotinylated goat polyvalent antibody was used as the secondary, followed by DAB staining.

GFAP Antibody - Background

This gene encodes one of the major intermediate filament proteins of mature astrocytes. It is used as a marker to distinguish astrocytes from other glial cells during development. Mutations in this gene cause Alexander disease, a rare disorder of astrocytes in the central nervous system. Alternative splicing results in multiple transcript variants encoding distinct isoforms.

GFAP Antibody - References

van den Berge, S.A., et al. Aging Cell 9(3):313-326(2010) Martins-de-Souza, D., et al. J Psychiatr Res (2010) In press : Bargagna-Mohan, P., et al. J. Biol. Chem. 285(10):7657-7669(2010) Sultana, R., et al. Antioxid. Redox Signal. 12(3):327-336(2010) Middeldorp, J., et al. PLoS ONE 4 (11), E7663 (2009) :

GFAP Antibody - Citations

- Inactivation of cysteine 674 in the sarcoplasmic/endoplasmic reticulum calcium ATPase 2 causes retinopathy in the mouse