

Basic Information

Product Name	Anti-GFAP Antibody	
Gene Name	GFAP	
Source	Mouse	
Isotype	IgG1	
Species Reactivity	human, pig, mouse, rat	
Tested Application	WB, IHC, IHC-F, IF	
Contents	200ug/ml antibody with PBS , 0.02% NaN ₃ , 1mg BSA	
Immunogen	GFAP from pig spinal cord.	
concentration	200 ug/ml	
Purification	Ascites	
Observed MW	50KD	
Dilution Ratios	Western blot(WB): 1:500-2000 Immunohistochemistry in paraffin section (IHC): 1:50-400 Immunohistochemistry in frozen section (IHC-F):1:50-400 Immunofluorescence (IF): 1:50-400	

Storage

12 months from date of receipt, -20°C as supplied. 6 months 2 to 8°C after reconstitution. Avoid repeated freezing and thawing.

Background Information

Glial fibrillary acidic protein (GFAP) is a protein that is encoded by the GFAP gene in humans. It is an intermediate filament(IF) protein that is expressed by numerous cell types of the central nervous system (CNS) including astrocytes, and ependymal cells. It is mapped to 17q21.31. GFAP is closely related to its non-epithelial family members, vimentin, desmin, and peripherin, which are all involved in the structure and function of the cell's cytoskeleton. GFAP is thought to help to maintain astrocyte mechanical strength, as well as the shape of cells. This gene has been shown to play a role in mitosis by adjusting the filament network present in the cell. GFAP is necessary for many critical roles in the CNS. What's more, GFAP also plays a role in astrocyte-neuron interactions as well as cell-cell communication.

Reference

Anti-GFAP Antibody被引用在11文献中。

Selected Validation Data

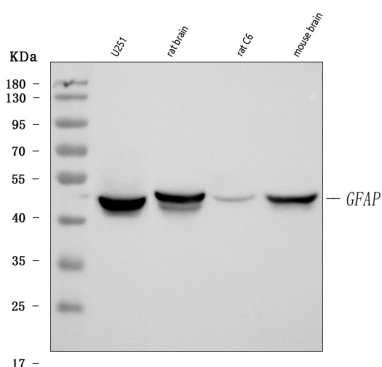


Figure 1. Western blot analysis of anti- GFAP antibody (BM0055).

The sample well of each lane was loaded with 50ug of sample under reducing conditions.

Lane 1: U251 whole cell lysates,

Lane 2: rat brain tissue lysates,

Lane 3: rat C6 whole cell lysates,

Lane 4: mouse brain tissue lysates.

Use mouse anti- GFAP 1:1000, probed with a goat anti-mouse IgG-HRP secondary antibody. The signal is developed using an Enhanced Chemiluminescent detection (ECL) kit (Catalog # EK1001). A specific band was detected for GFAP at approximately 50KD. The expected band size for GFAP is at 54KD.

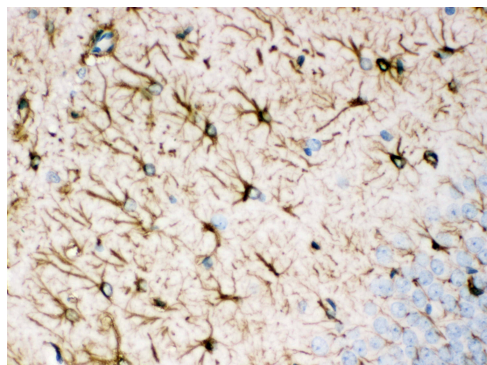


Figure 2. IHC analysis using anti- GFAP antibody (BM0055).

detected in paraffin-embedded section of rat brain tissue.

Biotinylated goat anti-mouse IgG was used as secondary antibody.

The tissue section was developed using Streptavidin-Biotin-Complex (SABC) (Catalog # SA1021) with DAB as the chromogen.

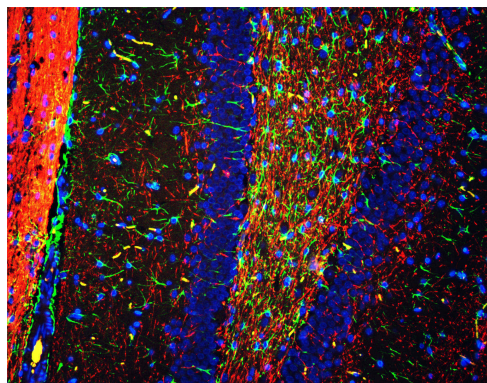


Figure 3. IF analysis of GFAP, MBP using anti- GFAP antibody

(BM0055), anti-MBP antibody (BA0094), detected in paraffin-embedded section of rat brain tissues. Heat mediated antigen retrieval was performed in citrate buffer (pH6, epitope retrieval solution) for 20 mins. The tissue section was blocked with 10% goat serum. The tissue section was then incubated with 1μg/mL mouse anti-GFAP, DyLight488 Conjugated Goat Anti-Mouse IgG (BA1126), rabbit anti-MBP Antibody, Cy3 Conjugated goat anti-rabbit IgG (BA1032) overnight at 4°C. The section was counterstained with DAPI. Visualize using a fluorescence microscope and filter sets appropriate for the label used.