# Recombinant Tau(Phospho-Thr181) Rabbit mAb(G69)

Catalog No: #58002

Package Size: #58002-1 50ul #58002-2 100ul

Orders: order@signalwayantibody.com
Support: tech@signalwayantibody.com

## Description

| | |
|---|---|
| Product Name | Recombinant Tau(Phospho-Thr181) Rabbit mAb(G69) |
| Host Species | Recombinant Rabbit |
| Clonality | Monoclonal |
| Clone No. | G69 |
| Isotype | IgG |
| Purification | Affinity purification |
| Applications | ELISA,WB,IHC,IF |
| Species Reactivity | Human;Mouse;Rat |
| Specificity | The antibody detects endogenous level of Tau only when phosphorylated at threonine 181. |
| Immunogen Type | Peptide |
| Immunogen Description | Peptide sequence around phosphorylation site of threonine 181 derived from Human Tau. |
| Conjugates | Unconjugated |
| Target Name | Tau |
| Modification | Phospho |
| Other Names | MAPT; MTAPT; MTBT1; Neurofibrillary tangle protein; PHF-tau |
| Accession No. | Swiss-Prot: P10636NCBI Protein: NP _001116538.1 |
| Calculated MW | 48 62 78 kDa |
| SDS-PAGE MW | 50-80kDa |
| Concentration | 0.8 mg/ml |
| Formulation | PBS with 0.02% sodium azide,pH7.3. |
| Storage | Upon delivery aliquot and store at -20 °C for one year. Avoid freeze/thaw cycles. |

## Application Details

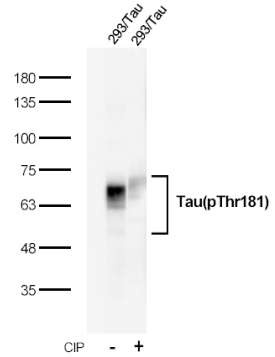
Elisa:1:10000

WB: 1:500~1:1000

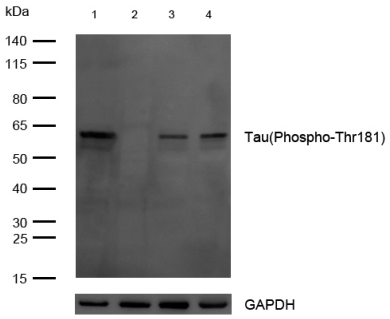
IHC: 1:50-1:200

IF: 1:50-1:200

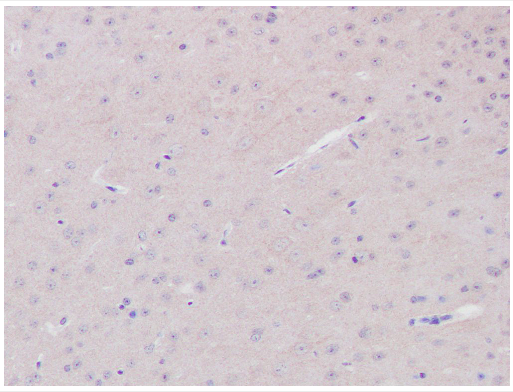
## Images



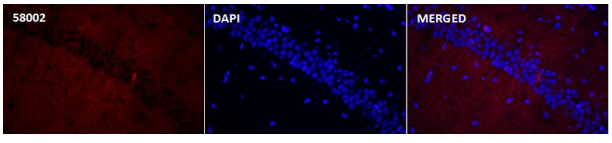

Western blot analysis of extracts from 293 cells, transfected with Tau and treated with calf intestinal phosphatase (CIP) using Tau(Phospho-Thr181) Rabbit mAb.



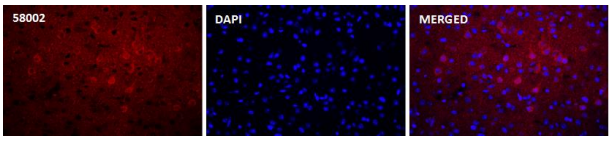

All lanes : Recombinant Tau(Phospho-Thr181) Rabbit mAb at 1/1k dilutionLane 1 : Wild-type HAP1 cell lysate Lane 2 : Tau(Phospho-Thr181) knockout HAP1 cell lysateLane 3 : Mouse Brain lysatesLane 4 : Rat Brain lysatesLysates/proteins at 20 µg per lane.SecondaryAll lanes : Goat Anti-Rabbit IgG H&L (HRP) at 1/20000 dilutionPredicted band size: 79 kDa Observed band size: 50-80 kDaExposure time: 7 seconds Lysates/proteins at 20 µg per lane.



Formalin-fixed, paraffin-embedded Mouse brain tissue stained for Tau(Phospho-Thr181) using 58002 at 1/50 dilution in immunohistochemical analysis.




Immunocytochemistry/ Immunofluorescence
Tau(Phospho-Thr181) antibody (58002)
ICC/IF staining of Tau(Phospho-Thr181) in mouse brain tissue. mouse brain was fixed with 4% Paraformaldehyde permeabilized for 20 minutes.
Samples were incubated with 58002 at a working dilution of 1/50. The secondary antibody was Alexa Fluor 647 goat anti rabbit, used at a dilution of 1/500.
Nuclei were counterstained with DAPI.

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## Background

Promotes microtubule assembly and stability, and might be involved in the establishment and maintenance of neuronal polarity. The C-terminus binds axonal microtubules while the N-terminus binds neural plasma membrane components, suggesting that tau functions as a linker protein between both. Axonal polarity is predetermined by tau localization (in the neuronal cell) in the domain of the cell body defined by the centrosome. The short isoforms allow plasticity of the cytoskeleton whereas the longer isoforms may preferentially play a role in its stabilization.
Puig B, et al.(2005) Acta Neuropathol (Berl). 110(3):261-268.

## Published Papers

Caixia Yan;Qilin Diao;Yuxi Zhao;Cheng Zhang;Xiaoya He;Ruijie Huang;Yan Li el at., Fusobacterium nucleatum infection-induced neurodegeneration and abnormal gut microbiota composition in Alzheimer's disease-like rats, , (2022)

PMID:36188448

Note: This product is for in vitro research use only and is not intended for use in humans or animals.