

Tau (phospho Ser214) Polyclonal Antibody

Catalog No: YP0259

Reactivity: Human; Mouse; Rat

Applications: WB;ELISA

Target: Tau

Fields: >>MAPK signaling pathway;>>Alzheimer disease;>>Parkinson

disease;>>Pathways of neurodegeneration - multiple diseases

Gene Name: MAPT

Protein Name: Microtubule-associated protein tau

P10636

P10637

Human Gene Id: 4137

Human Swiss Prot

No:

Mouse Gene Id: 17762

Mouse Swiss Prot

No:

Rat Swiss Prot No: P19332

Immunogen: The antiserum was produced against synthesized peptide derived from human

Tau around the phosphorylation site of Ser214. AA range:501-550

Specificity: Phospho-Tau (S214) Polyclonal Antibody detects endogenous levels of Tau

protein only when phosphorylated at S214.

Formulation: Liquid in PBS containing 50% glycerol, 0.5% BSA and 0.02% sodium azide.

Source: Polyclonal, Rabbit, lgG

Dilution: WB 1:500 - 1:2000. ELISA: 1:5000. Not yet tested in other applications.

Purification: The antibody was affinity-purified from rabbit antiserum by affinity-

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chromatography using epitope-specific immunogen.

Concentration: 1 mg/ml

Storage Stability: -15°C to -25°C/1 year(Do not lower than -25°C)

Observed Band: 50-85kD

Cell Pathway: MAPK_ERK_Growth;MAPK_G_Protein;Alzheimer's disease;

Background: This gene encodes the microtubule-associated protein tau (MAPT) whose

transcript undergoes complex, regulated alternative splicing, giving rise to several mRNA species. MAPT transcripts are differentially expressed in the nervous system, depending on stage of neuronal maturation and neuron type. MAPT gene mutations have been associated with several neurodegenerative disorders such as Alzheimer's disease, Pick's disease, frontotemporal dementia, cortico-basal degeneration and progressive supranuclear palsy. [provided by

RefSeq, Jul 2008],

Function : alternative products:Additional isoforms seem to exist. Isoforms differ from each

other by the presence or absence of up to 5 of the 15 exons. One of these optional exons contains the additional tau/MAP repeat, developmental stage: Four-repeat (type II) tau is expressed in an adult-specific manner and is not found in fetal brain, whereas three-repeat (type I) tau is found in both adult and fetal brain, disease: Defects in MAPT are a cause of corticobasal degeneration (CBD). It is marked by extrapyramidal signs and appraxia and can be associated with

It is marked by extrapyramidal signs and apraxia and can be associated with memory loss. Neuropathologic features may overlap Alzheimer disease, progressive supranuclear palsy, and Parkinson disease., disease:Defects in MAPT are a cause of frontotemporal dementia and parkinsonism linked to

chromosome 17 (FTDP17) [MIM:600274, 172700]; also called frontotemporal

dementia (FTD) or historically termed Pick complex. This form

Subcellular Cytoplasm, cytosol . Cell membrane ; Peripheral membrane protein ; Cytoplasmic side . Cytoplasm, cytoskeleton . Cell projection, axon . Cell

projection, dendrite . Secreted . Mostly found in the axons of neurons, in the

cytosol and in association with plasma membrane components

(PubMed:10747907). Can be secreted; the secretion is dependent on protein unfolding and facilitated by the cargo receptor TMED10; it results in protein translocation from the cytoplasm into the ERGIC (endoplasmic reticulum-Golgi

intermediate compartment) followed by vesicle entry and secretion

(PubMed:32272059)...

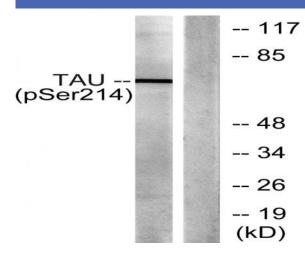
Expression: Expressed in neurons. Isoform PNS-tau is expressed in the peripheral nervous

system while the others are expressed in the central nervous system.

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Products Images



Western blot analysis of lysates from HeLa cells, using Tau (Phospho-Ser214) Antibody. The lane on the right is blocked with the phospho peptide.