

For Research Use Only

# MARK1 Polyclonal antibody

Catalog Number: 21552-1-AP

Featured Product

10 Publications



## Basic Information

### Catalog Number:

21552-1-AP

### Size:

150ul, Concentration: 700 ug/ml by Nanodrop and 360 ug/ml by Bradford method using BSA as the standard;

### Source:

Rabbit

### Isotype:

IgG

### Immunogen Catalog Number:

AG16225

### GenBank Accession Number:

BC113869

### GeneID (NCBI):

4139

### UNIPROT ID:

Q9POL2

### Full Name:

MAP/microtubule affinity-regulating kinase 1

### Calculated MW:

795 aa, 89 kDa

### Observed MW:

85-89 kDa, 72 kDa

### Purification Method:

Antigen affinity purification

### Recommended Dilutions:

WB 1:1000-1:6000

IP 0.5-4.0 ug for 1.0-3.0 mg of total protein lysate

IHC 1:50-1:500

## Applications

### Tested Applications:

WB, IHC, IP, ELISA

### Cited Applications:

WB, IP

### Species Specificity:

human, mouse, rat

### Cited Species:

human, mouse, rat

**Note-IHC: suggested antigen retrieval with TE buffer pH 9.0; (\*) Alternatively, antigen retrieval may be performed with citrate buffer pH 6.0**

### Positive Controls:

WB: mouse brain tissue, HeLa cells, SH-SY5Y cells, mouse kidney tissue, rat brain tissue

IP: mouse brain tissue,

IHC: rat testis tissue,

## Background Information

MARK1, also named as MAP-microtubule affinity regulating kinase 1, which form a subfamily of the calcium/calmodulin-dependent protein kinase (CAMP) group of kinases (PMID: 22670221). It is involved in cell polarity by phosphorylating the microtubule-associated proteins MAP2, MAP4 and MAPT/TAU at KXGS motifs, causing detachment from microtubules, and their disassembly. MARK1 also act as a regulator of the neuronal migration and Wnt signaling pathway. It has 3 isoforms which molecular weight is 89,84,72 kDa. This antibody may detect all of the isoforms.

## Notable Publications

Author	Pubmed ID	Journal	Application
Tsz-Yin Chan	34504101	Nat Commun	IP
Vickie Kwan	27829159	Cell Rep	WB
Victoria L DiBona	34023358	Neurosci Res	WB

## Storage

### Storage:

Store at -20°C. Stable for one year after shipment.

### Storage Buffer:

PBS with 0.02% sodium azide and 50% glycerol pH 7.3.

Aliquoting is unnecessary for -20°C storage

\*\*\* 20ul sizes contain 0.1% BSA

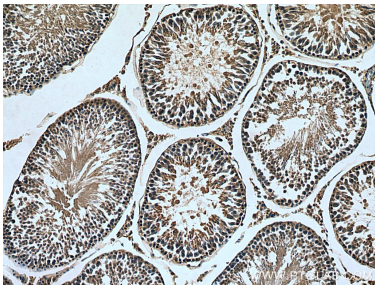
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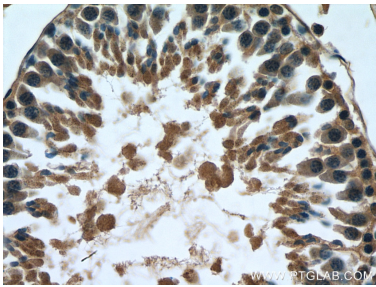
E: [proteintech@ptglab.com](mailto:proteintech@ptglab.com)  
W: [ptglab.com](http://ptglab.com)

This product is exclusively available under Proteintech Group brand and is not available to purchase from any other manufacturer.

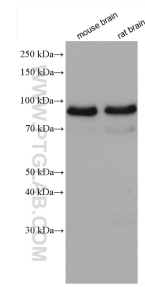
Selected Validation Data



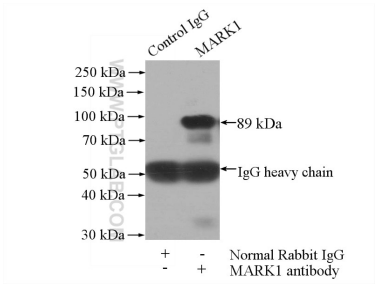
Immunohistochemical analysis of paraffin-embedded rat testis tissue slide using 21552-1-AP (MARK1 antibody) at dilution of 1:200 (under 10x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



Immunohistochemical analysis of paraffin-embedded rat testis tissue slide using 21552-1-AP (MARK1 antibody) at dilution of 1:200 (under 40x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



Various lysates were subjected to SDS PAGE followed by western blot with 21552-1-AP (MARK1 antibody) at dilution of 1:3000 incubated at room temperature for 1.5 hours.



IP result of anti-MARK1 (IP:21552-1-AP, 4ug; Detection:21552-1-AP 1:1000) with mouse brain tissue lysate 3440ug.