

For Research Use Only

# SPAST Monoclonal antibody

Catalog Number: 67361-1-Ig **1 Publications**



## Basic Information

<b>Catalog Number:</b> 67361-1-Ig	<b>GenBank Accession Number:</b> BC150260	<b>Purification Method:</b> Protein A purification
<b>Size:</b> 150ul , Concentration: 1200 ug/ml by Nanodrop and 1000 ug/ml by Bradford method using BSA as the standard;	<b>GeneID (NCBI):</b> 6683	<b>CloneNo.:</b> 1F5A7
<b>Source:</b> Mouse	<b>UNIPROT ID:</b> Q9UBP0	<b>Recommended Dilutions:</b> WB 1:2000-1:10000 IHC 1:500-1:2000 IF-P 1:200-1:800
<b>Isotype:</b> IgG2b	<b>Full Name:</b> spastin	
<b>Immunogen Catalog Number:</b> AG18866	<b>Calculated MW:</b> 616 aa, 67 kDa	
	<b>Observed MW:</b> 55 kDa	

## Applications

<b>Tested Applications:</b> WB, IHC, IF-P, ELISA	<b>Positive Controls:</b> WB : HEK-293 cells, NCCIT cells, HeLa cells, PC-3 cells, HepG2 cells IHC : mouse brain tissue, IF-P : mouse brain tissue,
<b>Cited Applications:</b> WB	
<b>Species Specificity:</b> Human, mouse	
<b>Cited Species:</b> human	
<b>Note-IHC: suggested antigen retrieval with TE buffer pH 9.0; (*) Alternatively, antigen retrieval may be performed with citrate buffer pH 6.0</b>	

## Background Information

SPAST encodes a microtubule-severing protein called spastin. By severing microtubules into small segments, SPAST participates in the regeneration of neurites. Mutations in the SPAST gene (previously known as SPG4) are the most common causes of hereditary spastic paraplegia (HSP-SPG4). Mammalian cells express at least two spastin isoforms, a less-abundant full-length form (M1-spastin, 68 kDa) and a more highly expressed isoform (M87-spastin, 60 kDa) that lacks the N-terminal 86 amino acids of the full-length protein. Also, there are two additional 64 kDa and 55 kDa isoforms due to alternative splicing of SPG4 exon 4. This antibody recognizes all these isoforms of spastin.

## Notable Publications

Author	Pubmed ID	Journal	Application
Marina Reichlmeir	39615799	Neurobiol Dis	WB

## Storage

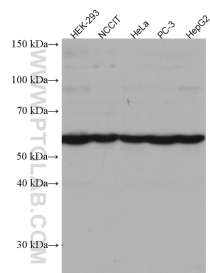
**Storage:**  
Store at -20°C. Stable for one year after shipment.  
**Storage Buffer:**  
PBS with 0.02% sodium azide and 50% glycerol pH 7.3.  
**Aliquoting is unnecessary for -20°C storage**

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

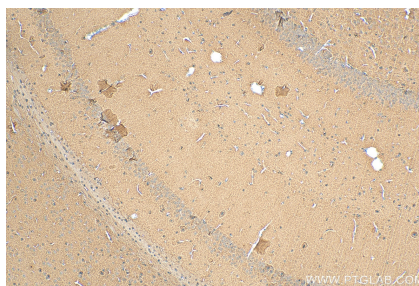
For technical support and original validation data for this product please contact:  
T: 1 (888) 4PTGLAB (1-888-478-4522) (toll free in USA), or 1(312) 455-8498 (outside USA)  
E: proteintech@ptglab.com  
W: ptglab.com

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

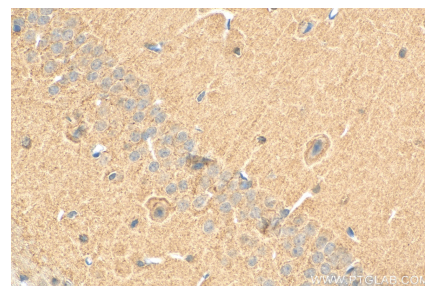
## Selected Validation Data



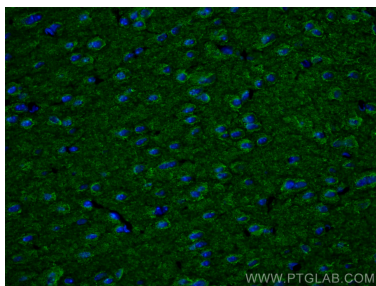
Various lysates were subjected to SDS PAGE followed by western blot with 67361-1-Ig (SPAST antibody) at dilution of 1:3000 incubated at room temperature for 1.5 hours.



Immunohistochemical analysis of paraffin-embedded mouse brain tissue slide using 67361-1-Ig (SPAST antibody) at dilution of 1:1000 (under 10x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



Immunohistochemical analysis of paraffin-embedded mouse brain tissue slide using 67361-1-Ig (SPAST antibody) at dilution of 1:1000 (under 40x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



Immunofluorescent analysis of (4% PFA) fixed mouse brain tissue using SPAST antibody (67361-1-Ig, Clone: 1F5A7) at dilution of 1:400 and CoraLite®488-Conjugated Goat Anti-Mouse IgG(H+L).