Spectrin beta III (SPTBN2) Antibody

Mouse Monoclonal Antibody [Clone SPTBN2/1778]

Catalog No	Format	Size
6712-MSM5-P0	Purified Ab with BSA and Azide at 200ug/ml	20 ug
6712-MSM5-P1	Purified Ab with BSA and Azide at 200ug/ml	100 ug
6712-MSM5-P1ABX	Purified Ab WITHOUT BSA and Azide at 1.0mg/ml	100 ug

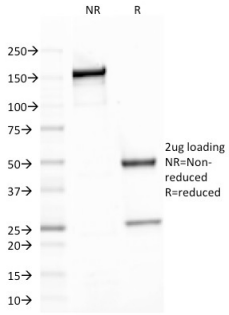
Applications	Tested Dillution	Note
Immunofluorescence (IF)	1-3ug/ml	
Immunohistochemistry (IHC)	1-2ug/ml	30 min at RT. Staining of formalin-fixed tissues requires heating tissue sections in 10mM Tris with 1mM EDTA, pH 9.0, for 45 min at 95°C followed by cooling at RT for 20 minutes
Western Blot (WB)	2-4ug/ml	

Product Details

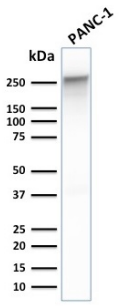
Clone	SPTBN2/1778
Gene Name	SPTBN2
Immunogen	Recombinant fragment (around aa356-475) of human SPTBN2 protein (exact sequence is proprietary)
Host	Mouse
Clonality	Monoclonal
Isotype / Light Chain	IgG1 / Kappa
Mol. Weight of Antigen	246kDa
Cellular Localization	Cell cortex, Cytoplasm, Cytoskeleton
Species Reactivity	Human
Positive Control	HeLa or PC-3 cells. Human brain, PANC-1, pancreas or liver.

**Optimal dilution for a specific application should be determined.*

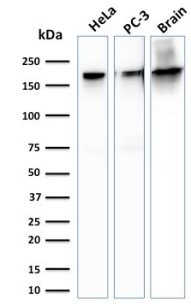
Product Images for Spectrin beta III (SPTBN2) Antibody



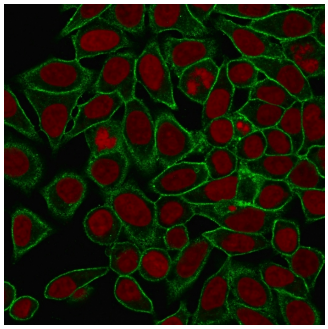
SDS-PAGE Analysis Purified Spectrin beta III Mouse Monoclonal Antibody (SPTBN2/1778). Confirmation of Purity and Integrity of Antibody.



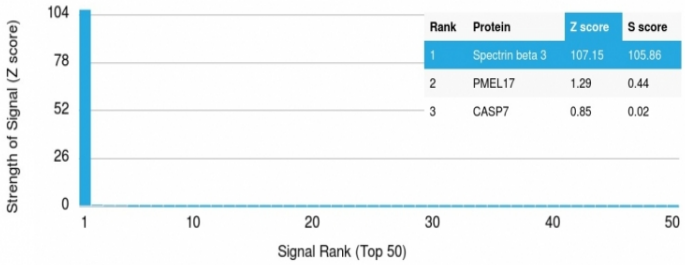
Western Blot Analysis of human PANC-1 cell lysate using Spectrin beta III Mouse Monoclonal Antibody (SPTBN2/1778).



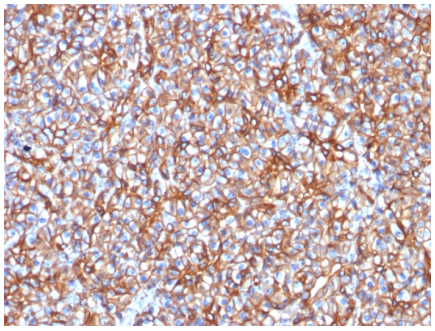
Western Blot Analysis of HeLa, PC-3 cell lysates and brain tissue lysate using Spectrin beta III Mouse Monoclonal Antibody (SPTBN2/1778).



Immunofluorescence Analysis of MeOH-fixed HeLa cells labeling Spectrin beta III with Spectrin beta III Mouse Monoclonal Antibody (SPTBN2/1778) followed by goat anti-mouse IgG-CF488 (green). Nuclei stained with RedDot (red).



Analysis of Protein Array containing more than 19,000 full-length human proteinsusing Spectrin beta III Mouse Monoclonal Antibody (SPTBN2/1778). Z- and S- Score: The Z-score represents the strength of a signal that a monoclonal antibody (MAb) (in combination with a fluorescently-tagged anti-IgG secondary antibody) produces when binding to a particular protein on the HuProtTM array. Z-scores are described in units of standard deviations (SD's) above the mean value of all signals generated on that array. If targets on HuProtTM are arranged in descending order of the Z-score, the S-score is the difference (also in units of SD's) between the Z-score. S-score therefore represents the relative target specificity of a MAb to its intended target. A MAb is considered to specific to its intended target, if the MAb has an S-score of at least 2.5. For example, if a MAb binds to protein X with a Z-score of 43 and to protein Y with a Z-score of 14, then the S-score for the binding of that MAb to protein X is equal to 29.



Formalin-fixed, paraffin-embedded human pancreas stained with Spectrinbeta III Mouse Monoclonal Antibody (SPTBN2/1778).

Specificity & Comments

Spectrin is an actin binding protein that is a major component of the plasma membrane skeleton. Spectrins function as membrane organizers and stabilizers by forming dimers, tetramers and higher polymers. Vertebrate spectrins have two alpha-subunits (alpha-I/alpha-II), four beta-subunits (beta-I-beta-IV) and a beta-H subunit creating diversity and specialization of function. Spectrin ? and spectrin ? are present in erythrocytes, whereas spectrin ? II (also designated fodrin ?) and spectrin ? I (also designated fodrin ?) are present in other somatic cells. The spectrin tetramers in erythrocytes act as barriers to lateral diffusion, but spectrin dimers seem to lack this function. Spectrin ? III is highly homologous to both spectrin ? I and spectrin ? II. Spectrin ? III is highly expressed in brain, kidney, pancreas and liver, and at lower levels in lung and placenta. Spectrin beta 3 is primarily expressed in nervous tissues with highest expression levels in the cerebellum, where it is found in Purkinje cell soma and dendrites.

Supplied As

200ug/ml of Ab purified from Bioreactor Concentrate by Protein A/G. Prepared in 10mM PBS with 0.05% BSA & 0.05% azide. Also available WITHOUT BSA & azide at 1.0mg/ml.

Storage and Stability

Antibody with azide - store at 2 to 8 °C. Antibody without azide - store at -20 to -80 °C. Antibody is stable for 24 months. Non-hazardous. No MSDS required.

Research Areas

Developmental Biology, Immunology, Signal Transduction

Limitations and Warranty

This antibody is available for research use only and is not approved for use in diagnosis.There are no warranties, expressed or implied, which extend beyond this description. Company is not liable for any personal injury or economic loss resulting from this product.