

SPARC / Osteonectin Antibody

Mouse Monoclonal Antibody [Clone OSTN/3933]

Catalog No	Format	Size
6678-MSM13-P0	Purified Ab with BSA and Azide at 200ug/ml	20 ug
6678-MSM13-P1	Purified Ab with BSA and Azide at 200ug/ml	100 ug
6678-MSM13-P1ABX	Purified Ab WITHOUT BSA and Azide at 1.0mg/ml	100 ug

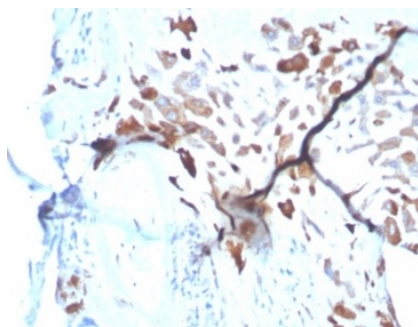
Applications	Tested Dillution	Note
Immunohistochemistry (IHC)	1-2ug/ml	30 min at RT. Staining of formalin-fixed tissues requires heating tissue sections in 10mM Tris with 1mM EDTA, pH 9.0, for 45 min at 95°C followed by cooling at RT for 20 minutes
Western Blot (WB)	2-4ug/ml	

Product Details

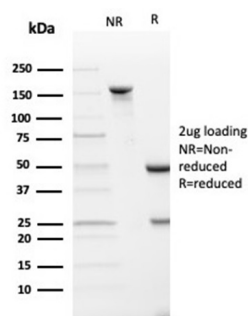
Clone	OSTN/3933
Gene Name	SPARC
Immunogen	Recombinant fragment (around aa1-200) of human SPARC protein (exact sequence is proprietary)
Host	Mouse
Clonality	Monoclonal
Isotype / Light Chain	IgG1 / Kappa
Mol. Weight of Antigen	38kDa
Cellular Localization	Basement membrane, Extracellular matrix, Extracellular space, Secreted
Species Reactivity	Human
Positive Control	Human placenta, lymph node or spleen. JEG3 or A549 or A-375 cell lysates.

*Optimal dilution for a specific application should be determined.

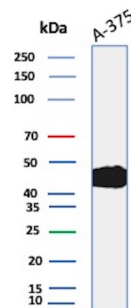
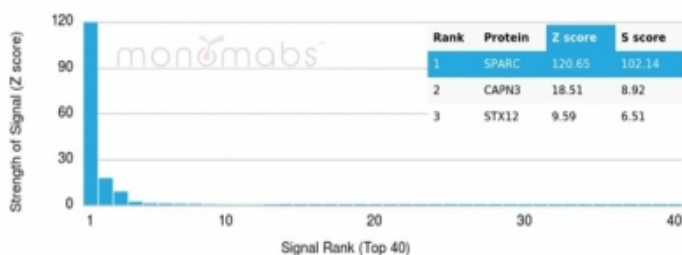
Product Images for SPARC / Osteonectin Antibody



Formalin-fixed, paraffin-embedded human placenta stained with SPARC / Osteonectin Mouse Monoclonal Antibody (OSTN/3933). HIER: Tris/EDTA, pH9.0, 45min. 2°C: HRP-polymer, 30min. DAB, 5min.

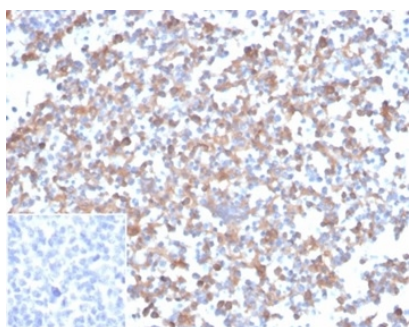


SDS-PAGE Analysis of Purified SPARC / Osteonectin Mouse Monoclonal Antibody (OSTN/3933). Confirmation of Purity and Integrity of Antibody.



Analysis of Protein Array containing more than 19,000 full-length human proteins using SPARC / Osteonectin Mouse Monoclonal Antibody (OSTN/3933). 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 HuProt™ 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 HuProt™ 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 be 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.

Western blot analysis of A-375 cell lysate using SPARC / Osteonectin Mouse Monoclonal Antibody (OSTN/3933).



Formalin-fixed, paraffin-embedded human tonsil stained with SPARC / Osteonectin Mouse Monoclonal Antibody (OSTN/3933). Inset: PBS instead of primary antibody; secondary only negative control.

Specificity & Comments

SPARC (for secreted protein acidic and rich in cysteine) is a phosphorylated, acidic, glycine-rich glycoprotein that is secreted by endothelial cells and is present in large amounts in the parietal endoderm of mouse embryos and in human placenta. It is identical to osteonectin, a protein important to bone calcification that is highly conserved between species. SPARC, which can be selectively expressed by the endothelium in response to certain types of injury, induces rounding in adherent endothelial cells in vitro. It regulates endothelial barrier function through F-Actin-dependent changes in cell shape, coincident with the appearance of intercellular gaps, which provide a paracellular pathway for extravasation of macromolecules.

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.

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

Cardiovascular, Endothelial Cell Marker, Mesenchymal Stem Cell Differentiation, Signal Transduction