

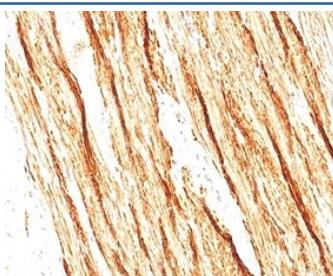
Recombinant Smoothelin Antibody / SMSMO / SMTN [clone SMTN/2320R] (V4050)

Catalog No.	Formulation	Size
V4050-100UG	0.2 mg/ml in 1X PBS with 0.1 mg/ml BSA (US sourced), 0.05% sodium azide	100 ug
V4050-20UG	0.2 mg/ml in 1X PBS with 0.1 mg/ml BSA (US sourced), 0.05% sodium azide	20 ug
V4050SAF-100UG	1 mg/ml in 1X PBS; BSA free, sodium azide free	100 ug

Recombinant **RABBIT MONOCLONAL**

Bulk quote request

Availability	1-3 business days
Species Reactivity	Human
Format	Purified
Host	Rabbit
Clonality	Recombinant Rabbit Monoclonal
Isotype	Rabbit IgG, kappa
Clone Name	SMTN/2320R
Purity	Protein A/G affinity
UniProt	P53814
Localization	Cytoplasm (Actin filaments), Nucleus
Applications	Immunohistochemistry (FFPE) : 1-2ug/ml
Limitations	This recombinant Smoothelin antibody is available for research use only.



IHC staining of FFPE human colon tissue with recombinant Smoothelin antibody (clone SMTN/2320R). HIER: boil tissue sections in pH6, 10mM citrate buffer, for 20 min and allow to cool before testing.



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Description

Smoothelin is found exclusively in contractile smooth muscle cells. It associates with stress fibers and constitutes part of the cytoskeleton. In the vascular system, smoothelin expression is limited to large veins and arteries capable of pulsatile contraction. As a marker for the highly differentiated contractile smooth muscle cell, smoothelin expression is useful for studying vascular malformation and injury. It is a constituent of the smooth muscle cell cytoskeleton protein exclusively found in differentiated smooth muscle cells (SMC). Cells with SMC-like characteristics, such as myofibroblasts and myoepithelial cells, as well as skeletal and cardiac muscle do not contain smoothelin. To distinguish bladder muscularis mucosae (MM) from muscularis propria (MP) muscle bundles is crucial for accurate staging of bladder carcinoma. Strong smoothelin expression is nearly exclusively observed in muscularis propria. Therefore, the staining pattern of MP (strongly positive) and MM (negative or weakly positive) makes this antibody an attractive diagnostic tool. Anti-smoothelin immunostaining can be helpful in differentiating benign (+) from malignant smooth muscle tumors (-), and other mimics (-).

Application Notes

Optimal dilution of the recombinant Smoothelin antibody should be determined by the researcher.

Immunogen

Recombinant full-length human protein was used as the immunogen for the recombinant Smoothelin antibody.

Storage

Aliquot the recombinant Smoothelin antibody and store frozen at -20°C or colder. Avoid repeated freeze-thaw cycles.