

Tropomyosin 4 / TPM4 Antibody (C-Term)
Peptide-affinity purified goat antibody
Catalog # AF4101a**Specification**

Tropomyosin 4 / TPM4 Antibody (C-Term) - Product Information

Application	WB
Primary Accession	P67936
Other Accession	NP_001138632.1 , NP_003281.1 , 7171 , 326618 (mouse), 24852 (rat)
Reactivity	Human, Mouse
Predicted	Rat, Pig, Dog, Cow
Host	Goat
Clonality	Polyclonal
Concentration	0.5 mg/ml
Isotype	IgG
Calculated MW	28522

Tropomyosin 4 / TPM4 Antibody (C-Term) - Additional Information**Gene ID** 7171**Other Names**

Tropomyosin alpha-4 chain, TM30p1, Tropomyosin-4, TPM4

Format

0.5 mg/ml in Tris saline, 0.02% sodium azide, pH7.3 with 0.5% bovine serum albumin

Storage

Maintain refrigerated at 2-8°C for up to 6 months. For long term storage store at -20°C in small aliquots to prevent freeze-thaw cycles.

Precautions

Tropomyosin 4 / TPM4 Antibody (C-Term) is for research use only and not for use in diagnostic or therapeutic procedures.

Tropomyosin 4 / TPM4 Antibody (C-Term) - Protein Information**Name** TPM4**Function**

Binds to actin filaments in muscle and non-muscle cells. Plays a central role, in association with the troponin complex, in the calcium dependent regulation of vertebrate striated muscle contraction. Smooth muscle contraction is regulated by interaction with caldesmon. In non-muscle cells is implicated in stabilizing cytoskeleton actin filaments (By similarity). Binds calcium (PubMed:1836432).

Cellular Location

Cytoplasm, cytoskeleton {ECO:0000250|UniProtKB:P09495}. Note=Associates with F-actin stress fibers. {ECO:0000250|UniProtKB:P09495}

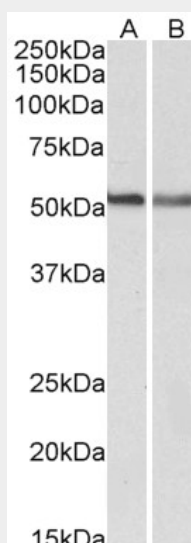
Tissue Location

Detected in cardiac tissue and platelets, the form found in cardiac tissue is a higher molecular weight than the form found in platelets. Expressed at higher levels in the platelets of hypertensive patients with cardiac hypertrophy than in the platelets of hypertensive patients without cardiac hypertrophy (at protein level)

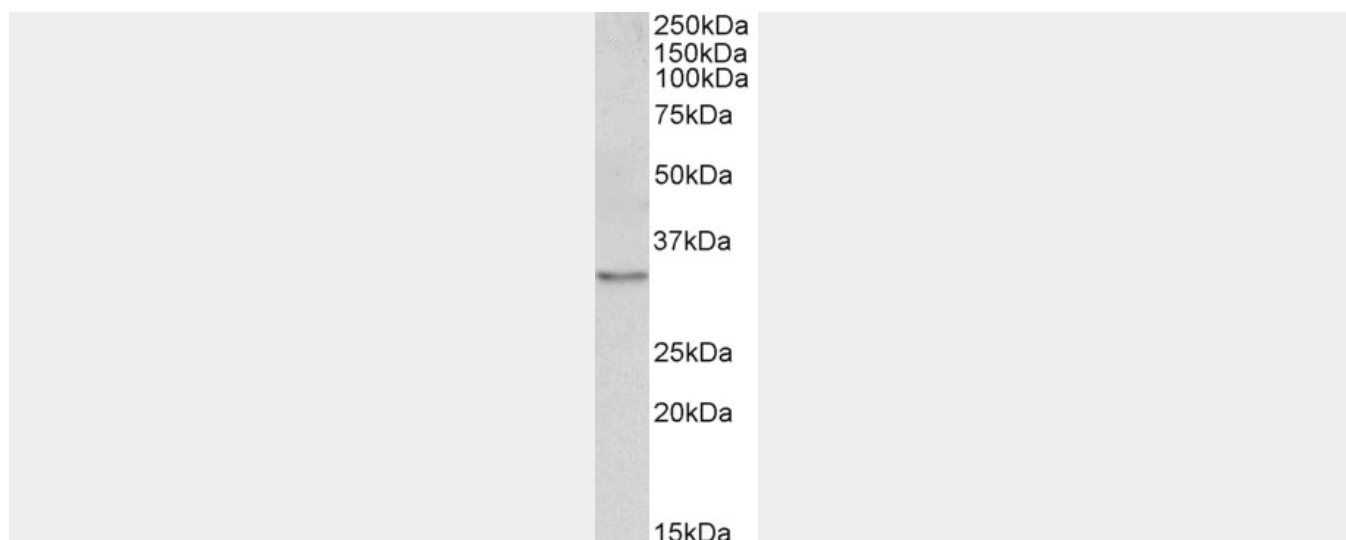
Tropomyosin 4 / TPM4 Antibody (C-Term) - Protocols

Provided below are standard protocols that you may find useful for product applications.

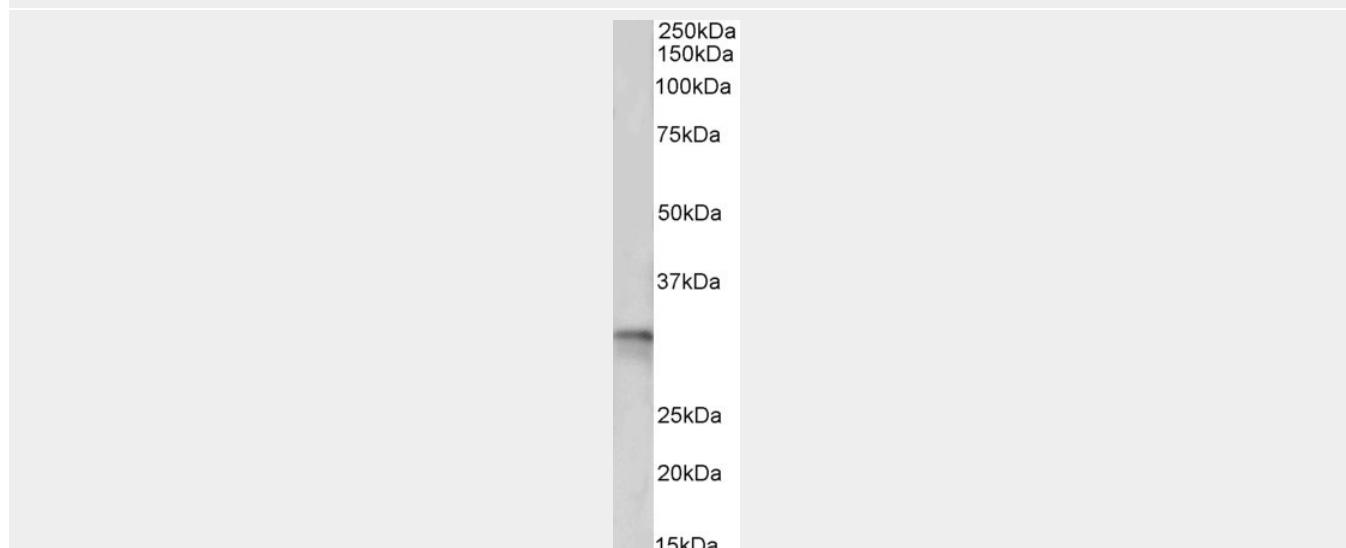
- [Western Blot](#)
- [Blocking Peptides](#)
- [Dot Blot](#)
- [Immunohistochemistry](#)
- [Immunofluorescence](#)
- [Immunoprecipitation](#)
- [Flow Cytometry](#)
- [Cell Culture](#)

Tropomyosin 4 / TPM4 Antibody (C-Term) - Images

AF4101a (0.03 µg/ml) staining of Human Platelets lysate (35 µg protein in RIPA buffer). Primary incubation was 1 hour. Detected by chemiluminescence.



AF4101a (0.1 µg/ml) staining of NIH3T3 lysate (35 µg protein in RIPA buffer). Primary incubation was 1 hour. Detected by chemiluminescence.



AF4101a (0.5 µg/ml) staining of Pig Heart lysate (35 µg protein in RIPA buffer). Primary incubation was 1 hour. Detected by chemiluminescence.

Tropomyosin 4 / TPM4 Antibody (C-Term) - Background

This antibody is expected to recognize both reported isoforms (NP_001138632.1; NP_003281.1).

Tropomyosin 4 / TPM4 Antibody (C-Term) - References

Tropomyosin 4 defines novel filaments in skeletal muscle associated with muscle remodelling/regeneration in normal and diseased muscle. Vlahovich N, Schevzov G, Nair-Shaliker V, Ilkovski B, Artap ST, Joya JE, Kee AJ, North KN, Gunning PW, Hardeman EC. Cell motility and the cytoskeleton 2008 Jan 65 (1): 73-85. PMID: 17968984