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Goat Anti-Smooth muscle alpha-actin Antibody

Peptide-affinity purified goat antibody
Catalog # AF2010a

Specification

Goat Anti-Smooth muscle alpha-actin Antibody - Product Information

Application	**IHC, WB**
Primary Accession	P62736
Other Accession	NP_001135417, 59
Reactivity	**Human, Mouse, Rat, Pig**
Predicted	**Dog**
Host	**Goat**
Clonality	**Polyclonal**
Concentration	**100ug/200ul**
Isotype	**IgG**
Calculated MW	**42009**

Goat Anti-Smooth muscle alpha-actin Antibody - Additional Information

Gene ID 59

Other Names
Actin, aortic smooth muscle, Alpha-actin-2, Cell growth-inhibiting gene 46 protein, ACTA2, ACTSA, ACTVS

Format
0.5 mg IgG/ml in Tris saline (20mM Tris pH7.3, 150mM NaCl), 0.02% sodium azide, 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
Goat Anti-Smooth muscle alpha-actin Antibody is for research use only and not for use in diagnostic or therapeutic procedures.

Goat Anti-Smooth muscle alpha-actin Antibody - Protein Information

Name ACTA2

Synonyms ACTSA, ACTVS

Function
Actins are highly conserved proteins that are involved in various types of cell motility and are ubiquitously expressed in all eukaryotic cells.

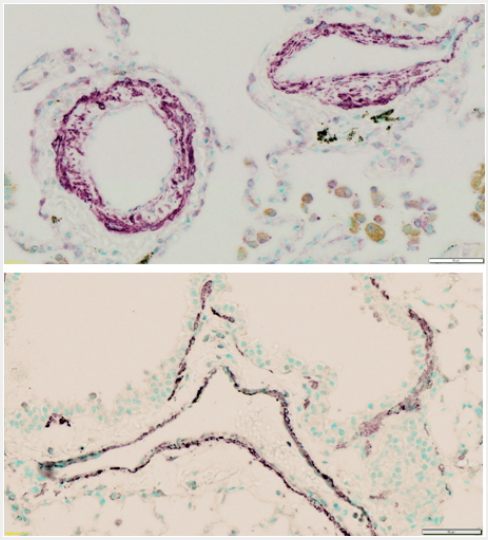
Cellular Location
Cytoplasm, cytoskeleton.

Goat Anti-Smooth muscle alpha-actin Antibody - Protocols

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

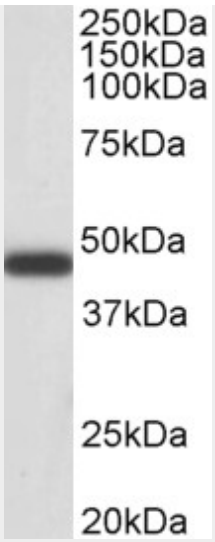
- Western Blot
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- Cell Culture

Goat Anti-Smooth muscle alpha-actin Antibody - Images

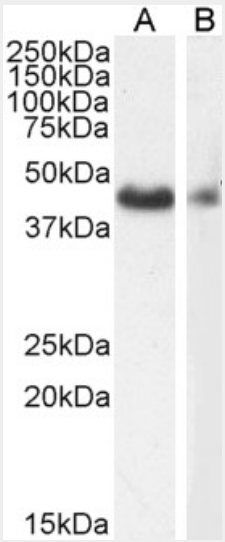


AF2010a (2.5 µg/ml) staining of paraffin embedded Human Lung (top) and Mouse Lung (bottom). Trypsin-mediated antigen retrieval, HRP-staining. Bar in right lower corner represents 50um. Data provided by Dr L. Marsh, Ludwig Boltzmann Institute for Lung Vascular Research, Graz, Austria

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AF2010a staining (0.5 µg/ml) of Human Duodenum lysate (RIPA buffer, 35 µg total protein per lane). Primary incubated for 1 hour. Detected by western blot using chemiluminescence.

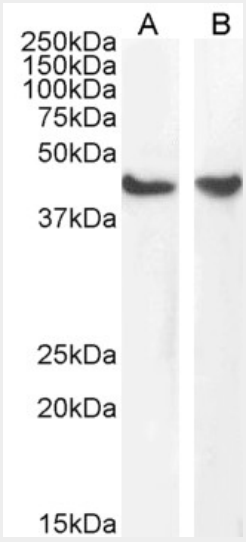


EB06450 (1µg/ml) staining of HeLa (A) and (2ug/ml) NIH3T3 (B) cell lysate (35µg protein in RIPA buffer). Detected by chemiluminescence.



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EB06450 (0.3µg/ml) staining of Human Duodenum lysate (35µg protein in RIPA buffer). Detected by chemiluminescence.

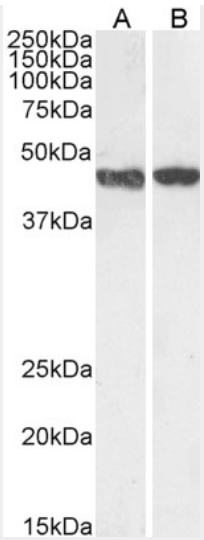


EB06450 (1µg/ml) staining of HeLa (A) and NIH3T3 (B) cell lysate (35µg protein in RIPA buffer). Detected by chemiluminescence.

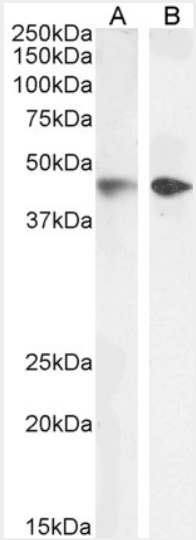


EB06450 (1µg/ml) staining of Human Duodenum lysate (35µg protein in RIPA buffer). Detected by chemiluminescence.

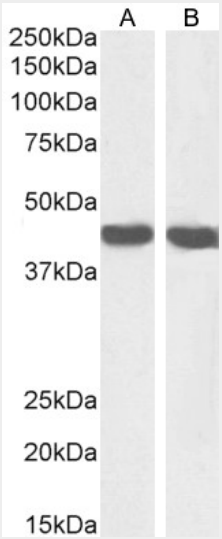
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EB06450 (1µg/ml) staining of HeLa (A) and NIH3T3 (B) cell lysate (35µg protein in RIPA buffer). Detected by chemiluminescence.

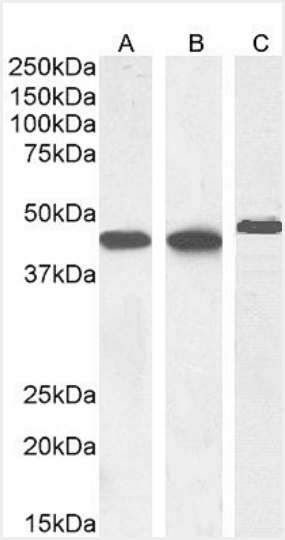


EB06450 (0.3µg/ml) staining of Human Heart (A) and (2µg/ml) Mouse Duodenum (B) lysate (35µg protein in RIPA buffer). Detected by chemiluminescence.



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EB06450 (1µg/ml) staining of HeLa (A) and NIH3T3 (B) cell lysate (35µg protein in RIPA buffer). Detected by chemiluminescence.



EB06450 (1µg/ml) staining of Human Heart (A), (0.1ug/ml) Mouse Duodenum (B) and (0.03ug/ml) Rat Heart (C) lysate (35µg protein in RIPA buffer). Detected by chemiluminescence.

Goat Anti-Smooth muscle alpha-actin Antibody - Background

The protein encoded by this gene belongs to the actin family of proteins, which are highly conserved proteins that play a role in cell motility, structure and integrity. Alpha, beta and gamma actin isoforms have been identified, with alpha actins being a major constituent of the contractile apparatus, while beta and gamma actins are involved in the regulation of cell motility. This actin is an alpha actin that is found in skeletal muscle. Defects in this gene cause aortic aneurysm familial thoracic type 6. Multiple alternatively spliced variants, encoding the same protein, have been identified.

Goat Anti-Smooth muscle alpha-actin Antibody - References

Variation at the NFATC2 Locus Increases the Risk of Thiazolinedinedione-Induced Edema in the Diabetes REduction Assessment with ramipril and rosiglitazone Medication (DREAM) Study. Bailey SD, et al. Diabetes Care, 2010 Jul 13. PMID 20628086.
Stromal expression of actin is a marker of aggressiveness in basal cell carcinoma. Adegboyega PA, et al. Hum Pathol, 2010 Aug. PMID 20381122.
New genetic associations detected in a host response study to hepatitis B vaccine. Davila S, et al. Genes Immun, 2010 Apr. PMID 20237496.
[Relationship between atrial fibroblast proliferation/fibrosis and atrial fibrillation in patients with rheumatic heart disease] Lin YZ, et al. Zhonghua Xin Xue Guan Bing Za Zhi, 2009 Sep. PMID 20128380.
Gene-centric association signals for lipids and apolipoproteins identified via the HumanCVD BeadChip. Talmud PJ, et al. Am J Hum Genet, 2009 Nov. PMID 19913121.