

Anti-alpha smooth muscle Actin antibody [1A4]

Anti-alpha smooth muscle Actin antibody [1A4] (ab7817) is a mouse monoclonal antibody detecting alpha smooth muscle Actin in **Western Blot, Flow Cytometry (Intra), IHC-P, ICC/IF**. Suitable for **Human, Mouse, Rat**.

- KO validated for confirmed specificity
- Over 1240 publications
- Trusted since 2002

KO Validated

Key facts

Isotype	IgG2a
Host species	Mouse
Storage buffer	pH: 7.4 Preservative: 0.02% Sodium azide Constituents: PBS, 6.97% L-Arginine
Form	Liquid
Clonality	Monoclonal
Immunogen	The exact immunogen used to generate this antibody is proprietary information.
Clone number	1A4
Purification technique	Affinity purification
Light chain type	kappa
Concentration	1 mg/mL The concentration of this product may be batch-dependent Batch concentration finder →

Reactivity data

IHC-P

Tested

Species	Human
Dilution info	0.034 µg/mL
Notes	Perform heat-mediated antigen retrieval before commencing with IHC staining protocol.
Species	Mouse
Dilution info	1/50000
Notes	-
Species	Rat
Dilution info	1/50000
Notes	-

Predicted

Species	Sheep, Rabbit, Cow, Pig, Mammals, Baboon
Dilution info	-
Notes	-

ICC/IF

Tested

Species	Mouse
Dilution info	1 µg/mL
Notes	-
Species	Rat
Dilution info	1 µg/mL
Notes	-
Species	Human
Dilution info	1 µg/mL
Notes	-

Predicted

Species	Sheep, Rabbit, Cow, Pig, Mammals, Baboon
Dilution info	-
Notes	-

Flow Cyt (Intra)

Tested

Species	Rat
Dilution info	5 µg/mL
Notes	-

Expected

Species	Human, Mouse
Dilution info	Use at an assay dependent concentration.
Notes	-

Predicted

Species	Sheep, Rabbit, Cow, Pig, Mammals, Baboon
Dilution info	-
Notes	-

WB

Tested

Species	Human
Dilution info	1 µg/mL
Notes	-

Species	Mouse
Dilution info	1 µg/mL

Notes	-
Species	Rat
Dilution info	1 µg/mL
Notes	-

Predicted

Species	Sheep, Rabbit, Cow, Pig, Mammals, Baboon
Dilution info	-
Notes	-

Target data

[See full target information ACTA2](#) 

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

Shipped at conditions	Blue Ice
Appropriate short-term storage duration	1-2 weeks
Appropriate short-term storage conditions	+4°C
Appropriate long-term storage conditions	-20°C
Aliquoting information	Upon delivery aliquot
Storage information	Avoid freeze / thaw cycle

Notes

Anti-alpha smooth muscle Actin antibody [1A4] (ab7817) is a mouse monoclonal antibody and is validated for use in Flow Cyt (Intra), ICC/IF, IHC-P and WB.

Anti-alpha smooth muscle Actin antibody [1A4] (ab7817) was first used in a scientific publication in 1986 and has

been cited over 1242 times in peer reviewed journals. Its performance in Western blot, immunofluorescence and IHC in human, mouse and rat samples is trusted by the scientific community.

Abcam's high quality validation processes ensure Anti-alpha smooth muscle Actin antibody [1A4] (ab7817) has high sensitivity and specificity.

The specificity of Anti-alpha smooth muscle Actin antibody [1A4] (ab7817) has been confirmed by ICC/IF testing in alpha smooth muscle Actin knockout HeLa cells (ab264014).

Anti-alpha smooth muscle Actin antibody [1A4] (ab7817) has 103 independent reviews from customers.

Anti-alpha smooth muscle Actin antibody [1A4] (ab7817) specifically detects alpha smooth muscle Actin (UniProt ID: P62736; Molecular weight: 42kDa) and is sold in 100 ug and 1 mg selling sizes.

Conjugation-ready, carrier free format available for antibody clone 1A4 - ab240654.

Antibody clone 1A4 is also available pre-conjugated to a variety of labels for your convenience - Biotin, Alexa Fluor® 488, Alexa Fluor® 594, HRP, FITC (ab12557, ab184675, ab22368, ab23696, ab8211).

Alpha-Smooth Muscle Actin (α -SMA) is a critical protein involved in smooth muscle contraction, encoded by the ACTA2 gene. Predominantly found in vascular smooth muscle cells, α -SMA plays a vital role in fibrogenesis and wound healing. It is often used as a marker for myofibroblast formation, which are specialized cells that contribute to tissue repair and fibrosis. The expression of α -SMA is associated with the activation of myofibroblasts, making it an important indicator in studies of fibrosis and other related conditions.

Supplementary info

This supplementary information is collated from multiple sources and compiled automatically.

Activity summary

Alpha smooth muscle Actin also known as alpha-sma ACTA2 or anti alpha is a protein with a molecular weight of approximately 42 kDa. It is an important component of the cytoskeletal structure found in smooth muscle cells. This actin isoform is expressed predominantly in vascular smooth muscle uterine smooth muscle and gastrointestinal tissues. It plays an important role in the contractile function of these tissues contributing to the generation of force and maintenance of cell shape.

Biological function summary

The actin family of proteins including alpha smooth muscle Actin facilitate cellular movements and structural integrity. It is vital in cellular contraction and is a part of the actin-myosin complex which enables muscle cells to contract. Alpha smooth muscle Actin also participates in cell adhesion and morphology influencing the mechanical properties of tissues. Its expression indicates differentiation of smooth muscle tissue and can act as a marker for fibroblast to myofibroblast transformation often used in alpha sma staining.

Pathways

The regulation of alpha smooth muscle Actin expression serves a definitive role in the TGF-beta signaling pathway which influences cell migration proliferation and differentiation. This protein interacts with other actin isoforms and cytoskeletal components to modulate cellular responses to stimuli. Additionally it connects

with proteins like caldesmon and tropomyosin during muscle contraction helping stabilize actin filaments within smooth muscle cells.

Associated diseases and disorders

Abnormalities in alpha smooth muscle Actin expression are associated with conditions such as pulmonary hypertension and liver fibrosis. The protein is often upregulated in fibrotic diseases with its presence directly linked to excessive extracellular matrix deposition and tissue stiffness. In these disorders its interaction with TGF-beta and other transforming growth factor family members enhances pathological tissue remodeling and constitutes a target of interest for therapeutic intervention.

Product promise

Tested

We have tested this species and application combination and it works. It is covered by our product promise.

Expected

We have not tested this specific species and application combination in-house, but expect it will work. It is covered by our product promise.

Predicted

This species and application combination has not been tested, but we predict it will work based on strong homology. However, this combination is not covered by our product promise.

Not recommended

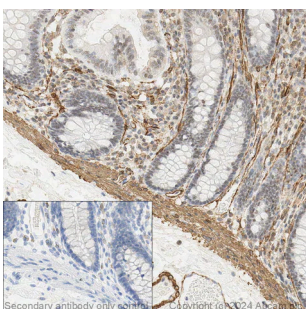
We do not recommend this combination. It is not covered by our product promise.

We are dedicated to supporting your work with high quality reagents and we are here for you every step of the way should you need us.

In the unlikely event of one of our products not working as expected, you are covered by our product promise.

Full details and terms and conditions can be found here:
Terms & Conditions.

19 product images

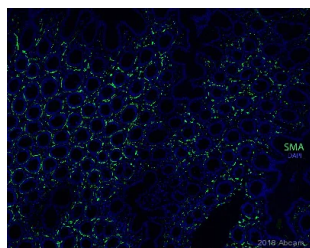


Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) - Anti-alpha smooth muscle Actin antibody [1A4] (ab7817)

Alpha smooth muscle Actin Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) staining of human colon using mouse Anti-alpha smooth muscle Actin antibody

Immunohistochemical analysis of formalin fixed paraffin embedded human colon labelling alpha smooth muscle actin with ab7817 at a concentration of 0.01 µg/ml. The immunostaining was performed on a Ventana DISCOVERY ULTRA (Roche Tissue Diagnostics) instrument with an

OptiView DAB IHC Detection Kit. Heat mediated antigen retrieval was conducted for 32 mins at 100°C with ULTRA cell conditioning solution (CC1, pH 8.5). ab7817 anti-alpha smooth muscle actin antibody [1A4] was incubated at 37°C for 16 mins. Sections were counterstained with Hematoxylin II. Image inset shows absence of staining in secondary antibody only control.

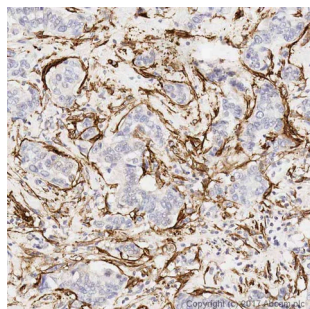


This image is courtesy of a customer review submitted by David Ivancic

Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) - Anti-alpha smooth muscle Actin antibody [1A4] (ab7817)

Alpha smooth muscle Actin Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) staining of 10% NBF-fixed human colon tissue using mouse Anti-alpha smooth muscle Actin antibody

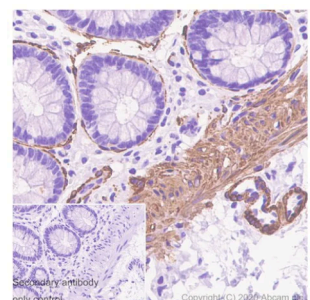
Immunohistochemistry analysis (Formalin/PFA-fixed paraffin-embedded sections) of 10% NBF-fixed human colon tissue permeabilized with 0.05% tween 20. Stained with ab7817 at 1/100 dilution. Secondary antibody used was Alexa fluor® 488 Donkey anti-Rabbit IgG at 1/300 dilution. Blocking was done with Sea Block for 30 minutes at 22°C. The sample was incubated with the primary antibody and Sea Block for 14 hours at 4°C. Antigen retrieval method was heat mediated, [ab94674](#) 100X Citrate Buffer pH 6.0.



Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) - Anti-alpha smooth muscle Actin antibody [1A4] (ab7817)

Alpha smooth muscle Actin Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) staining of Human breast ductal carcinoma using mouse Anti-alpha smooth muscle Actin antibody

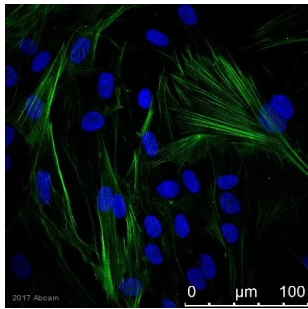
IHC image of alpha smooth muscle actin staining in a human breast ductal carcinoma formalin fixed paraffin embedded tissue section*, performed on a Leica Bond™ system using the standard protocol F. The section was pre-treated using heat mediated antigen retrieval with sodium citrate buffer (pH6, epitope retrieval solution 1) for 20 mins. The section was then incubated with ab7817, 0.034µg/ml, for 15 mins at room temperature and detected using an HRP conjugated compact polymer system. DAB was used as the chromogen. The section was then counterstained with haematoxylin and mounted with DPX.



Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) - Anti-alpha smooth muscle Actin antibody [1A4] (ab7817)

Alpha smooth muscle Actin Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) staining using mouse Anti-alpha smooth muscle Actin antibody

Immunohistochemical analysis of Human colon tissue labelling alpha smooth muscle Actin with ab7817 at 1/50000 dilution and ready to use LeicaDS9800 (Bond™ Polymer Refine Detection) Secondary antibody. Positive cytoplasmic staining on Human colon tissue is observed. Counterstained with Hematoxylin.
Secondary antibody only control: Used PBS instead of primary antibody, secondary antibody was ready to use LeicaDS9800 (Bond™ Polymer Refine Detection).

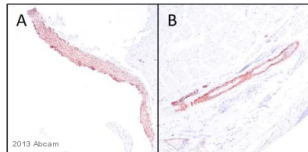


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Immunocytochemistry/ Immunofluorescence - Anti-alpha smooth muscle Actin antibody [1A4] (ab7817)

Alpha smooth muscle Actin Immunocytochemistry/ Immunofluorescence staining of IMR-90 cells using mouse Anti-alpha smooth muscle Actin antibody

ab7817 staining alpha smooth muscle Actin in human IMR-90 (Human Lung Fibroblast Cell Line) cells by ICC/IF (Immunocytochemistry/immunofluorescence). Cells were fixed with paraformaldehyde permeabilized with 0.1% TritonX-100 and blocked with 100% Cad-Block for 30 minutes at room temperature. Samples were incubated with primary antibody 3.41μg/ml in antibody diluent buffer for 16 hours at 4°C. An Alexa Fluor® 488-conjugated polyclonal Goat anti-mouse IgG dilution 1/400 was used as secondary antibody.



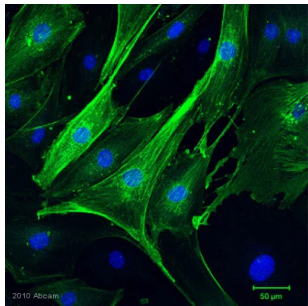
This image is courtesy of an anonymous customer review

Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) - Anti-alpha smooth muscle Actin antibody [1A4] (ab7817)

Alpha smooth muscle Actin Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) staining of mouse aorta and skin using mouse Anti-alpha smooth muscle Actin antibody

Immunohistochemical analysis of mouse aorta (A) or skin (B) tissue staining alpha smooth muscle Actin with ab7817.

Tissue was fixed with 10% Neutral Buffered Formalin and blocked with 1% serum for 45 minutes 21°C; antigen retrieval was by enzymatic method in 0.0001% Trypsin-CaCl. Samples were incubated with primary antibody (0.034μg/ml in 0.3% Triton X-100 in PBS) for 1 hour at 21°C. A biotin-conjugated horse anti-mouse polyclonal IgG (1/50 dilution) was used as the secondary antibody.

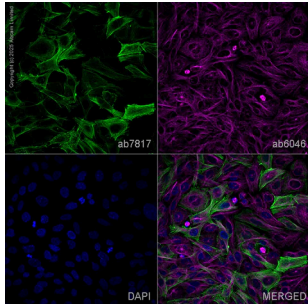


This image is courtesy of a customer review submitted by Dr. Ho-Jae Lee

Immunocytochemistry/ Immunofluorescence - Anti-alpha smooth muscle Actin antibody [1A4] (ab7817)

Alpha smooth muscle Actin Immunocytochemistry/ Immunofluorescence staining of mouse heart cells using mouse Anti-alpha smooth muscle Actin antibody

ab7817 staining alpha smooth muscle Actin in mouse heart cells by ICC/IF (Immunocytochemistry/immunofluorescence). Cells were fixed with paraformaldehyde permeabilized with TritonX-100 and blocked with 5% BSA for 30 minutes at room temperature. Samples were incubated with primary antibody 6.82μg/ml in blocking buffer for 2 hours. An Alexa Fluor® 488-conjugated Donkey monoclonal to mouse IgG dilution 1/200 was used as secondary antibody.



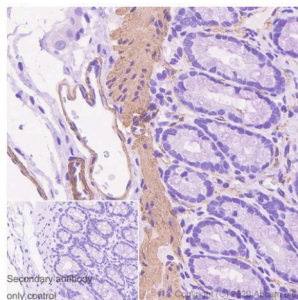
Immunocytochemistry/ Immunofluorescence - Anti-alpha smooth muscle Actin antibody [1A4] (ab7817)

Alpha smooth muscle Actin Immunocytochemistry/ Immunofluorescence staining of SaOS-2 cells using mouse Anti-alpha smooth muscle Actin antibody

ab7817 staining ACTA2 in SaOS-2 cells. The cells were fixed with 100% methanol (5 min), permeabilized with 0.1% PBS-Triton X-100 for 5 minutes and then blocked with 1% BSA/10% normal rabbit serum/0.3M glycine in 0.1%PBS-Tween for 1h. The cells were then incubated overnight at 4°C with ab7817 at 1μg/ml (shown in green) and Rabbit polyclonal to beta Tubulin - Loading Control (ab6046) (shown in pseudocolour magenta). Cells were then incubated with

[ab150117](#), Goat polyclonal Secondary Antibody to Mouse IgG H&L (Alexa Fluor® 488) preadsorbed at 1/1000 dilution. Nuclear DNA was labelled with DAPI (shown in blue).

Image was acquired with a high-content analyser (Operetta CLS, Perkin Elmer) and a maximum intensity projection of confocal sections is shown.

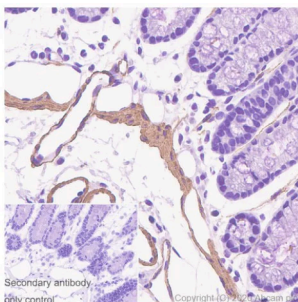


Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) - Anti-alpha smooth muscle Actin antibody [1A4] (ab7817)

Alpha smooth muscle Actin Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) staining using mouse Anti-alpha smooth muscle Actin antibody

Immunohistochemical analysis of Rat colon tissue labelling alpha smooth muscle Actin with ab7817 at 1/50000 dilution and ready to use LeicaDS9800 (Bond™ Polymer Refine Detection) Secondary antibody. Positive cytoplasmic staining on Rat colon tissue is observed. Counterstained with Hematoxylin.

Secondary antibody only control: Used PBS instead of primary antibody, secondary antibody was ready to use LeicaDS9800 (Bond™ Polymer Refine Detection).

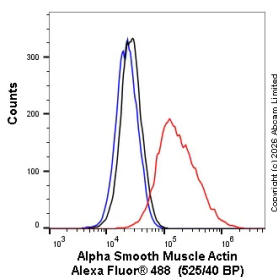


Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) - Anti-alpha smooth muscle Actin antibody [1A4] (ab7817)

Alpha smooth muscle Actin Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) staining using mouse Anti-alpha smooth muscle Actin antibody

Immunohistochemical analysis of Mouse colon tissue labelling alpha smooth muscle Actin with ab7817 at 1/50000 dilution and ready to use LeicaDS9800 (Bond™ Polymer Refine Detection) Secondary antibody. Positive cytoplasmic staining on Mouse colon tissue is observed. Counterstained with Hematoxylin.

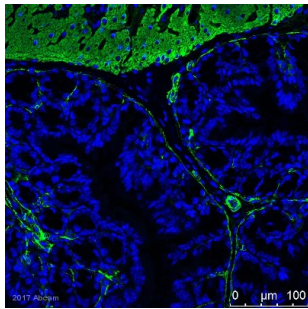
Secondary antibody only control: Used PBS instead of primary antibody, secondary antibody was ready to use LeicaDS9800 (Bond™ Polymer Refine Detection).



Flow Cytometry (Intracellular) - Anti-alpha smooth muscle Actin antibody [1A4] (ab7817)

Alpha smooth muscle Actin Flow Cytometry (Intracellular) staining of SV40LT-SMC cells using mouse Anti-alpha smooth muscle Actin antibody

Overlay histogram showing SV40LT-SMC cells stained with ab7817 (red line). The cells were fixed with 4% formaldehyde (10 min) and then permeabilized with 0.1% PBS-Triton X-100 for 15 min. The cells were then incubated in 1x PBS / 10% normal goat serum to block non-specific protein-protein interactions followed by the antibody (ab7817, 5µg/ml) for 30 min at 22°C. The secondary antibody used was Goat Anti-Mouse IgG H&L - preadsorbed (Alexa Fluor® 488) ([ab150117](#)) at 1/4000 dilution for 30 min at 22°C. Isotype control antibody (black line) was mouse IgG2a [MOPC-173] ([ab18413](#)) used at the same concentration and conditions as the primary antibody. Unlabelled sample (blue line) was also used as a control. Acquisition of >5000 events were collected using a 50 mW Blue laser (488nm) and 525/40 bandpass filter.

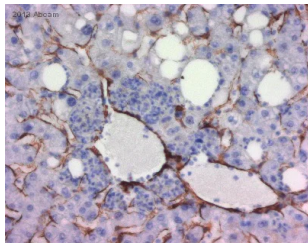


This image is courtesy of an anonymous customer review

Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) - Anti-alpha smooth muscle Actin antibody [1A4] (ab7817)

Alpha smooth muscle Actin Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) staining using mouse Anti-alpha smooth muscle Actin antibody

ab7817 staining alpha smooth muscle actin in Mouse intestine tissue by Immunohistochemistry-Immunofluorescence. Tissue was fixed with formaldehyde and blocked with 100% Cas-block for 30 minutes at room temperature; antigen retrieval was performed by heat mediated citrate buffer, pH6. The sample was incubated with primary antibody at 0.034μg/ml for 16 hours at 4°C. An Alexa Fluor® 488 Goat anti-mouse IgG was used as the secondary antibody at 1/400 dilution. Autofluorescence was blocked with 0.1% Sudan Black in 70% ethanol for 10 minutes at room temperature after antigen retrieval, and followed with 3X wash with PBS-T after antigen retrieval. Image was taken with confocal microscope.

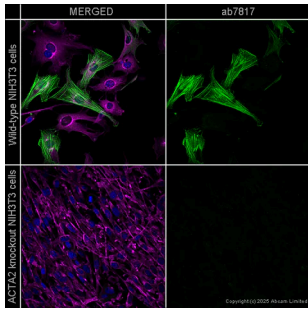


This image is courtesy of a customer review submitted by Rudolf Jung

Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) - Anti-alpha smooth muscle Actin antibody [1A4] (ab7817)

Alpha smooth muscle Actin Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) staining of Human liver tissue using mouse Anti-alpha smooth muscle Actin antibody

ab7817 staining alpha smooth muscle actin in Human liver tissue sections by Immunohistochemistry (IHC-P - paraformaldehyde-fixed paraffin-embedded sections). Tissue was fixed with paraformaldehyde and permeabilized with wash buffer with tween; antigen retrieval was by heat mediation in Tris-EDTA buffer pH 9.0. Samples were incubated with primary antibody (0.034μg/ml in blocking buffer) for 30 minutes at 20°C. A HRP-conjugated Goat anti-mouse IgG polyclonal (undiluted) was used as the secondary antibody.



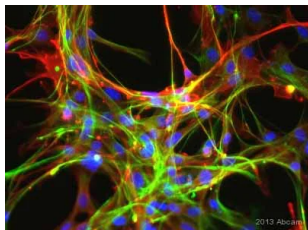
Immunocytochemistry/ Immunofluorescence - Anti-alpha smooth muscle Actin antibody [1A4] (ab7817)

Alpha smooth muscle Actin Immunocytochemistry/ Immunofluorescence staining using mouse Anti-alpha smooth muscle Actin antibody

ab7817 staining ACTA2 in NIH3T3 WT and NIH3T3-ACTA2 KO cells. The cells were fixed with 4% paraformaldehyde (10 min), permeabilized with 0.1% PBS-Triton X-100 for 5 minutes and then blocked with 1% BSA/10% normal rabbit serum/0.3M glycine in 0.1%PBS-Tween for 1h. The cells were then incubated overnight at 4°C with ab7817 at 1μg/ml (shown in green) and Rabbit polyclonal to beta Tubulin - Loading Control (ab6046) (shown in pseudocolour magenta). Cells were then incubated with ab150117, Goat polyclonal Secondary Antibody to Mouse IgG H&L (Alexa Fluor® 488) preadsorbed at 1/1000 dilution. Nuclear DNA was labelled with DAPI (shown in blue).

Also suitable in cells fixed with 100% methanol (5 min).

Image was acquired with a high-content analyser (Operetta CLS, Perkin Elmer) and a maximum intensity projection of confocal sections is shown.

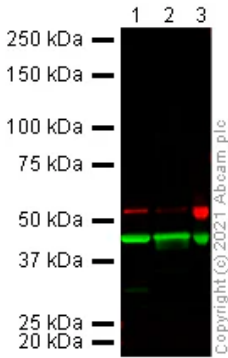


Immunocytochemistry/ Immunofluorescence - Anti-alpha smooth muscle Actin antibody [1A4] (ab7817)

Alpha smooth muscle Actin Immunocytochemistry/ Immunofluorescence staining of mouse primary colon myofibroblasts using mouse Anti-alpha smooth muscle Actin antibody

This image is courtesy of a customer review submitted by Charles Pallangyo

ab7817 staining alpha smooth muscle Actin (green) in Mouse primary colon myofibroblasts by ICC/IF (Immunocytochemistry/immunofluorescence). Cells were fixed with acetone and blocked with 5% BSA for 30 hours at 25°C. Samples were incubated with primary antibody (1/100 dilution in PBS + 5% BSA) for 2 hours at 25°C. Donkey Anti-Mouse IgG H&L (DyLight® 488) (ab96875) (1/1000 dilution) was used as the secondary antibody. Costained with ab92547 Rabbit anti-Vimentin (red).



Western blot - Anti-alpha smooth muscle Actin antibody [1A4] (ab7817)

Alpha smooth muscle Actin Western blot staining using mouse Anti-alpha smooth muscle Actin antibody

Gel type: MOPS
Blocking buffer: 3% milk

Loading control: alpha tubulin (ab52866), secondary Goat anti-Rabbit IgG H&L (IRDye® 680CW) preadsorbed (1:10000 dilution)

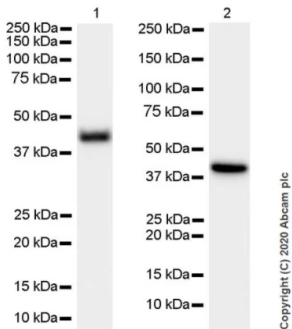
All lanes:
Western blot - Anti-alpha smooth muscle Actin antibody [1A4] (ab7817) at 1 µg/mL

- Lane 1:
Human colon tissue lysate at 20 µg
- Lane 2:
Mouse colon tissue lysate at 20 µg
- Lane 3:
Human Foreskin Fibroblast Whole Cell Lysate at 20 µg

Secondary
All lanes:
Goat anti-Mouse IgG H&L (IRDye® 800RD) at 1/10000 dilution

Predicted band size: 42 kDa

Observed band size: 42 kDa



Western blot - Anti-alpha smooth muscle Actin antibody [1A4] (ab7817)

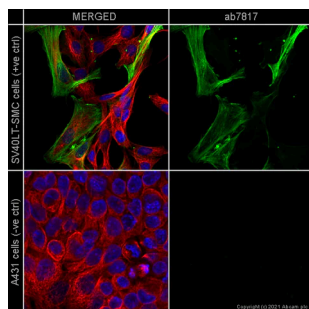
Alpha smooth muscle Actin Western blot staining using mouse Anti-alpha smooth muscle Actin antibody

Blocking and diluting buffer and concentration: 5% NFDm/TBST.

All lanes:
Western blot - Anti-alpha smooth muscle Actin antibody [1A4] (ab7817) at 1/1000 dilution

- Lane 1:
NIH 3T3 (mouse embryonic fibroblast) whole cell lysate at 20 µg
- Lane 2:
IMR-90 (human lung fibroblast), whole cell lysate at 20 µg

Secondary
All lanes:

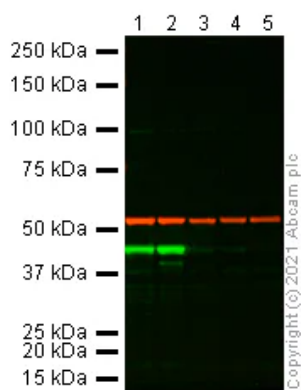


Immunocytochemistry/ Immunofluorescence - Anti-alpha smooth muscle Actin antibody [1A4] (ab7817)

Alpha smooth muscle Actin Immunocytochemistry/ Immunofluorescence staining of SV40LT-SMC cells using mouse Anti-alpha smooth muscle Actin antibody

ab7817 staining alpha smooth muscle Actin in SV40LT-SMC cells (positive control top panel) and A431 cells (negative control bottom panel). The cells were fixed with 100% methanol (5 min) then permeabilized with 0.1% Triton X-100 for 5 minutes and then blocked with 1% BSA/10% normal goat serum/0.3M glycine in 0.1% PBS-Tween for 1h. The cells were then incubated with ab7817 at 1µg/ml concentration and [ab6046](#) (Rabbit polyclonal to beta Tubulin) at 1/1000 dilution overnight at 4°C followed by a further incubation at room temperature for 1h with a goat secondary antibody to mouse IgG (Alexa Fluor® 488) ([ab150117](#)) at 2 µg/ml (shown in green) and a goat secondary antibody to rabbit IgG (Alexa Fluor® 594) ([ab150080](#)) at 2 µg/ml (shown in red). Nuclear DNA was labelled in blue with DAPI.

Image was taken with a confocal microscope (Leica-Microsystems TCS SP8).



Western blot - Anti-alpha smooth muscle Actin antibody [1A4] (ab7817)

Alpha smooth muscle Actin Western blot staining using mouse Anti-alpha smooth muscle Actin antibody

Gel type: MOPS

Blocking buffer: 3% milk

Loading control: alpha tubulin ([ab52866](#)), secondary Goat anti-Rabbit IgG H&L (IRDye® 680CW) preadsorbed (1:10000 dilution)

All lanes:

Western blot - Anti-alpha smooth muscle Actin antibody [1A4] (ab7817) at 1 µg/mL

Lane 1:

NIH 3T3 whole cell lysate at 20 µg

Lane 2:

SV40LT-SMC whole cell lysate at 20 µg

Lane 3:

A431 whole cell lysate at 20 µg

Lane 4:

A549 whole cell lysate at 20 µg

Lane 5:

Jurkat whole cell lysate at 20 µg

Secondary

All lanes:

Goat anti-Mouse IgG H&L (IRDye® 800RD) at 1/10000 dilution

Predicted band size: 42 kDa

Observed band size: 42 kDa

Please note: All products are 'FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC OR THERAPEUTIC PROCEDURES'.