

Product datasheet

Anti-p73 antibody [EPR18409(T)(MIX)] ab189896

Recombinant **RabMAb**

★★★★☆ **3 Abreviews** **3 References** [16 Images](#)

Overview

Product name	Anti-p73 antibody [EPR18409(T)(MIX)]
Description	Rabbit monoclonal [EPR18409(T)(MIX)] to p73
Host species	Rabbit
Specificity	The immunogen used for this product shares 76% homology with p63. Cross-reactivity with this protein has not been confirmed experimentally.
Tested applications	Suitable for: Flow Cyt (Intra), WB, IHC-P, ICC/IF, IP
Species reactivity	Reacts with: Mouse, Rat, Human
Immunogen	Synthetic peptide. This information is proprietary to Abcam and/or its suppliers.
Positive control	WB: Recombinant fragment of human p73 protein; HeLa, Jurkat, K562, WEHI-3, C6, RAW 264.7, PC-12 and NIH/3T3 whole cell lysates; Human fetal brain and fetal kidney lysates; Mouse, brain, heart, kidney and spleen lysates; Rat brain and spleen lysates. IHC-P: Human testis, glioma and gastric carcinoma tissues. ICC/IF: MCF7 and HeLa cells. Flow Cyt (intra): Jurkat and K562 cells. IP: HeLa and MCF7 whole cell lysates.
General notes	<p>This product is a recombinant monoclonal antibody, which offers several advantages including:</p> <ul style="list-style-type: none"> - High batch-to-batch consistency and reproducibility - Improved sensitivity and specificity - Long-term security of supply - Animal-free production <p>For more information see here.</p> <p>Our RabMAb[®] technology is a patented hybridoma-based technology for making rabbit monoclonal antibodies. For details on our patents, please refer to RabMAb[®] patents.</p>

Properties

Form	Liquid
Storage instructions	Shipped at 4°C. Store at +4°C short term (1-2 weeks). Upon delivery aliquot. Store at -20°C long term. Avoid freeze / thaw cycle.
Storage buffer	<p>pH: 7.2</p> <p>Preservative: 0.01% Sodium azide</p> <p>Constituents: 59% PBS, 40% Glycerol (glycerin, glycerine), 0.05% BSA</p>

Purity	Protein A purified
Clonality	Monoclonal
Clone number	EPR18409(T)(MIX)
Isotype	IgG

Applications

The Abpromise guarantee Our **Abpromise guarantee** covers the use of ab189896 in the following tested applications.

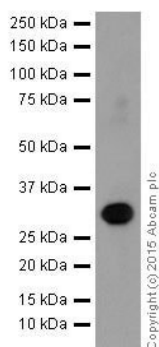
The application notes include recommended starting dilutions; optimal dilutions/concentrations should be determined by the end user.

Application	Abreviews	Notes
Flow Cyt (Intra)		1/300.
WB	★★★★★ (1)	1/5000. Detects a band of approximately 70 kDa (predicted molecular weight: 70 kDa).
IHC-P	★★★★★ (1)	1/1000. Perform heat mediated antigen retrieval with Tris/EDTA buffer pH 9.0 before commencing with IHC staining protocol.
ICC/IF	★★★★★ (1)	1/1000.
IP		1/80.

Target

Function	Participates in the apoptotic response to DNA damage. Isoforms containing the transactivation domain are pro-apoptotic, isoforms lacking the domain are anti-apoptotic and block the function of p53 and transactivating p73 isoforms. May be a tumor suppressor protein.
Tissue specificity	Expressed in striatal neurons of patients with Huntington disease (at protein level). Brain, kidney, placenta, colon, heart, liver, spleen, skeletal muscle, prostate, thymus and pancreas. Highly expressed in fetal tissue.
Sequence similarities	Belongs to the p53 family. Contains 1 SAM (sterile alpha motif) domain.
Domain	Possesses an acidic transactivation domain, a central DNA binding domain and a C-terminal oligomerization domain that binds to the ABL tyrosine kinase SH3 domain. The WW-binding motif mediates interaction with WWOX.
Post-translational modifications	Isoform alpha (but not isoform beta) is sumoylated on Lys-627, which potentiates proteasomal degradation but does not affect transcriptional activity. Higher levels of phosphorylation seen in the brain from patients with Huntington disease. Ubiquitinated; leading to its degradation by the proteasome.
Cellular localization	Nucleus. Accumulates in the nucleus in response to DNA damage.

Images



Western blot - Anti-p73 antibody [EPR18409(T)(MIX)] (ab189896)

Anti-p73 antibody [EPR18409(T)(MIX)] (ab189896) at 1/5000 dilution + Recombinant fragment of human p73 protein at 0.005 µg

Secondary

Goat Anti-Rabbit IgG H&L (HRP) ([ab97051](#)) at 1/100000 dilution

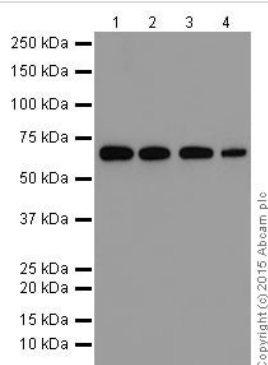
Predicted band size: 70 kDa

Observed band size: 28 kDa

Exposure time: 10 seconds

Blocking/Dilution buffer: 5% NFDm/TBST.

Recombinant fragment of human p73 protein contains aa380-636 with His-Tag®.



Western blot - Anti-p73 antibody [EPR18409(T)(MIX)] (ab189896)

All lanes : Anti-p73 antibody [EPR18409(T)(MIX)] (ab189896) at 1/5000 dilution

Lane 1 : HeLa (Human epithelial cell line from cervix adenocarcinoma) whole cell lysate

Lane 2 : Jurkat (Human T cell leukemia cell line from peripheral blood) whole cell lysate

Lane 3 : K562 (Human chronic myelogenous leukemia cell line from bone marrow) whole cell lysate

Lane 4 : WEHI-3 (Mouse leukemia cell line) whole cell lysate

Lysates/proteins at 10 µg per lane.

Secondary

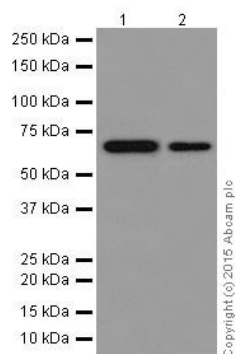
All lanes : Goat Anti-Rabbit IgG H&L (HRP) ([ab97051](#)) at 1/50000 dilution

Predicted band size: 70 kDa

Observed band size: 70 kDa

Exposure time: 3 minutes

Blocking/Dilution buffer: 5% NFDm/TBST.



Western blot - Anti-p73 antibody [EPR18409(T)(MIX)] (ab189896)

All lanes : Anti-p73 antibody [EPR18409(T)(MIX)] (ab189896) at 1/5000 dilution

Lane 1 : Human fetal brain lysate

Lane 2 : Human fetal kidney lysate

Lysates/proteins at 10 µg per lane.

Secondary

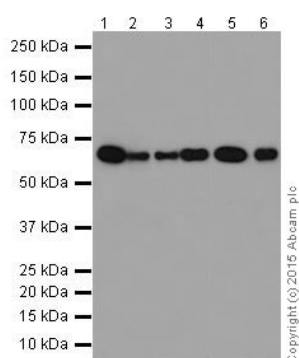
All lanes : Anti-Rabbit IgG (HRP), specific to the non-reduced form of IgG at 1/50000 dilution

Predicted band size: 70 kDa

Observed band size: 70 kDa

Exposure time: 3 minutes

Blocking/Dilution buffer: 5% NFDM/TBST.



Western blot - Anti-p73 antibody [EPR18409(T)(MIX)] (ab189896)

All lanes : Anti-p73 antibody [EPR18409(T)(MIX)] (ab189896) at 1/5000 dilution

Lane 1 : Mouse brain lysate

Lane 2 : Mouse heart lysate

Lane 3 : Mouse kidney lysate

Lane 4 : Mouse spleen lysate

Lane 5 : Rat brain lysate

Lane 6 : Rat spleen lysate

Lysates/proteins at 10 µg per lane.

Secondary

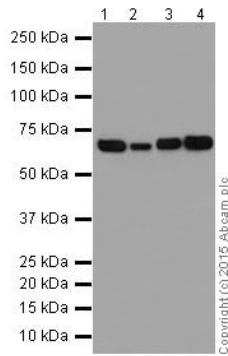
All lanes : Goat Anti-Rabbit IgG H&L (HRP) ([ab97051](#)) at 1/50000 dilution

Predicted band size: 70 kDa

Observed band size: 70 kDa

Exposure time: 3 minutes

Blocking/Dilution buffer: 5% NFDm/TBST.



Western blot - Anti-p73 antibody [EPR18409(T)(MIX)] (ab189896)

All lanes : Anti-p73 antibody [EPR18409(T)(MIX)] (ab189896) at 1/5000 dilution

Lane 1 : C6 (Rat glial tumor cell line) whole cell lysate

Lane 2 : RAW 264.7 (Mouse macrophage cell line transformed with Abelson murine leukemia virus) whole cell lysate

Lane 3 : PC-12 (Rat adrenal gland pheochromocytoma cell line) whole cell lysate

Lane 4 : NIH/3T3 (Mouse embryonic fibroblast cell line) whole cell lysate

Lysates/proteins at 10 µg per lane.

Secondary

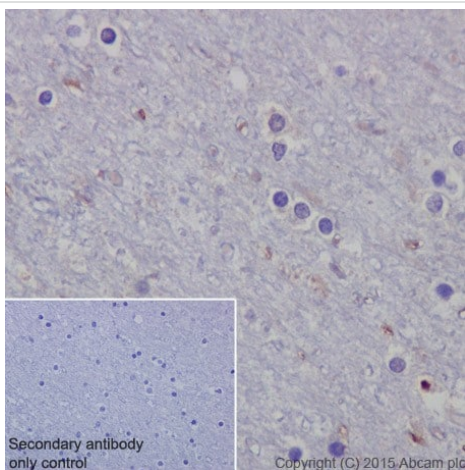
All lanes : Goat Anti-Rabbit IgG H&L (HRP) (**ab97051**) at 1/50000 dilution

Predicted band size: 70 kDa

Observed band size: 70 kDa

Exposure time: 5 seconds

Blocking/Dilution buffer: 5% NFDm/TBST.



Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) - Anti-p73 antibody [EPR18409(T)(MIX)] (ab189896)

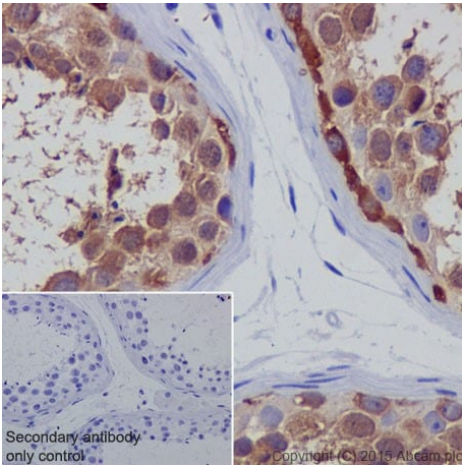
Immunohistochemical analysis of paraffin-embedded Human cerebral cortex tissue labeling p73 alpha+beta with ab189896 at 1/1000 dilution, followed by Goat Anti-Rabbit IgG H&L (HRP) (**ab97051**) at 1/500 dilution.

Negative staining on Human cerebral cortex.

Counter stained with Hematoxylin.

Secondary antibody only control: Used PBS instead of primary antibody, secondary antibody is **ab97051** at 1/500 dilution.

Perform heat mediated antigen retrieval with Tris/EDTA buffer pH 9.0 before commencing with IHC staining protocol.



Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) - Anti-p73 antibody [EPR18409(T)(MIX)] (ab189896)

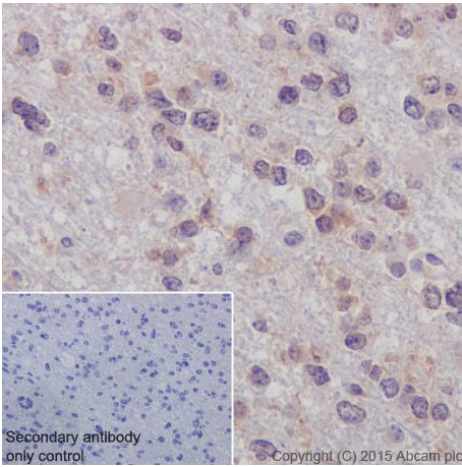
Immunohistochemical analysis of paraffin-embedded Human testis tissue labeling p73 alpha+beta with ab189896 at 1/1000 dilution, followed by Goat Anti-Rabbit IgG H&L (HRP) ([ab97051](#)) at 1/500 dilution.

Cytoplasmic and weak nucleus staining on Human spermatogonial cells is observed.

Counter stained with Hematoxylin.

Secondary antibody only control: Used PBS instead of primary antibody, secondary antibody is [ab97051](#) at 1/500 dilution.

Perform heat mediated antigen retrieval with Tris/EDTA buffer pH 9.0 before commencing with IHC staining protocol.



Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) - Anti-p73 antibody [EPR18409(T)(MIX)] (ab189896)

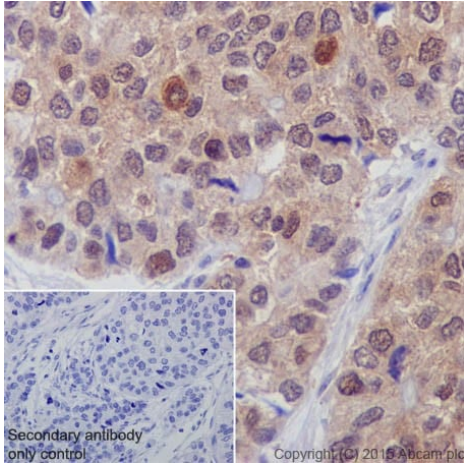
Immunohistochemical analysis of paraffin-embedded Human glioma tissue labeling p73 alpha+beta with ab189896 at 1/1000 dilution, followed by Goat Anti-Rabbit IgG H&L (HRP) ([ab97051](#)) at 1/500 dilution.

Nucleus and cytoplasmic staining on Human glioma is observed.

Counter stained with Hematoxylin.

Secondary antibody only control: Used PBS instead of primary antibody, secondary antibody is [ab97051](#) at 1/500 dilution.

Perform heat mediated antigen retrieval with Tris/EDTA buffer pH 9.0 before commencing with IHC staining protocol.



Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) - Anti-p73 antibody
[EPR18409(T)(MIX)] (ab189896)

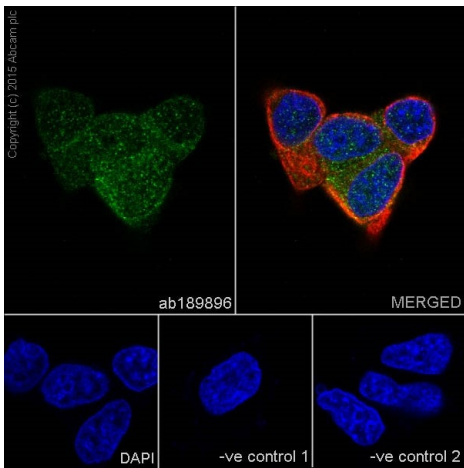
Immunohistochemical analysis of paraffin-embedded Human gastric carcinoma tissue labeling p73 alpha+beta with ab189896 at 1/1000 dilution, followed by Goat Anti-Rabbit IgG H&L (HRP) (**ab97051**) at 1/500 dilution.

Nucleus and cytoplasmic staining on Human gastric carcinoma is observed.

Counter stained with Hematoxylin.

Secondary antibody only control: Used PBS instead of primary antibody, secondary antibody is **ab97051** at 1/500 dilution.

Perform heat mediated antigen retrieval with Tris/EDTA buffer pH 9.0 before commencing with IHC staining protocol.



Immunocytochemistry/ Immunofluorescence - Anti-p73 antibody [EPR18409(T)(MIX)] (ab189896)

Immunofluorescent analysis of 4% paraformaldehyde-fixed, 0.1% Triton X-100 permeabilized MCF7 (Human breast adenocarcinoma cell line) cells labeling p73 alpha+beta with ab189896 at 1/1000 dilution, followed by Goat anti-rabbit IgG H&L (Alexa Fluor® 488) (**ab150077**) secondary antibody at 1/1000 dilution (green).

Confocal image showing nuclear and cytoplasm staining on MCF7 cell line.

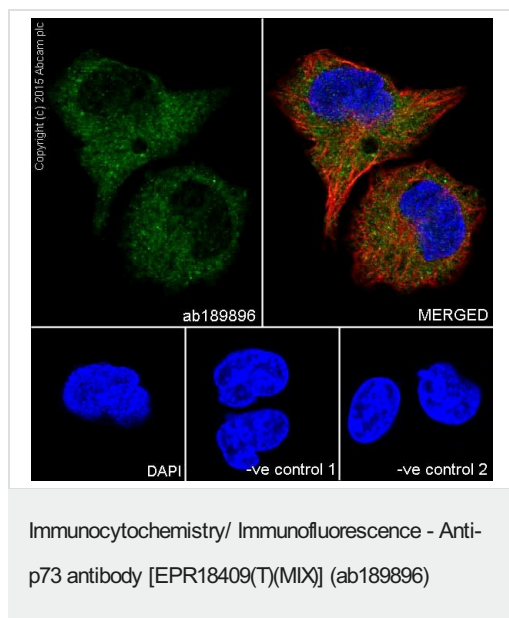
The nuclear counterstain is DAPI (blue).

Tubulin is detected with Anti-alpha Tubulin antibody-Loading Control (**ab7291**) at 1/1000 dilution and Goat Anti-Mouse IgG H&L (AlexaFluor®594) preadsorbed (**ab150120**) at 1/1000 dilution (red).

The negative controls are as follows:-

-ve control 1: ab189896 at 1/1000 dilution followed by **ab150120** at 1/1000 dilution.

-ve control 2: **ab7291** at 1/1000 dilution followed by **ab150077** at 1/1000 dilution.



Immunofluorescent analysis of 4% paraformaldehyde-fixed, 0.1% Triton X-100 permeabilized HeLa (Human epithelial cell line from cervix adenocarcinoma) cells labeling p73 alpha+beta with ab189896 at 1/1000 dilution, followed by Goat anti-rabbit IgG (Alexa Fluor® 488) ([ab150077](#)) secondary antibody at 1/1000 dilution (green).

Confocal image showing cytoplasmic and weakly nuclear staining on HeLa cell line.

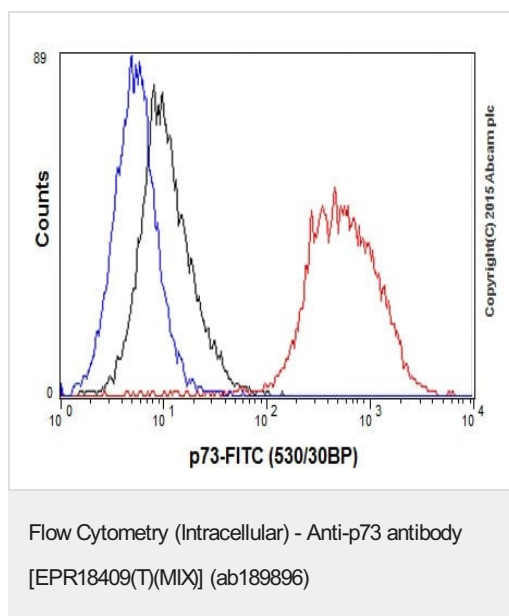
The nuclear counterstain is DAPI (blue).

Tubulin is detected with Anti-alpha Tubulin antibody - Loading Control ([ab7291](#)) at 1/1000 dilution and Goat Anti-Mouse IgG H&L (AlexaFluor®594) preadsorbed ([ab150120](#)) at 1/1000 dilution (red).

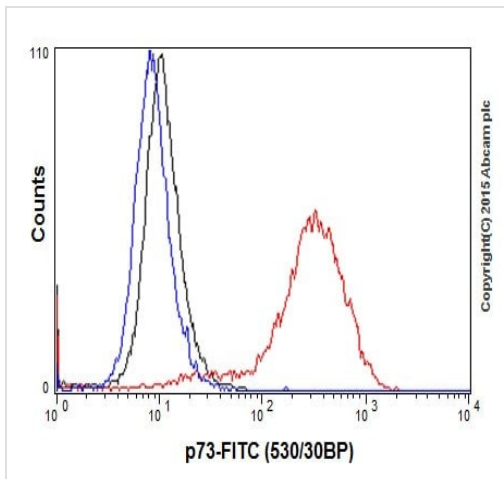
The negative controls are as follows:-

-ve control 1: ab189896 at 1/1000 dilution followed by [ab150120](#) at 1/1000 dilution.

-ve control 2: [ab7291](#) at 1/1000 dilution followed by [ab150077](#) at 1/1000 dilution.

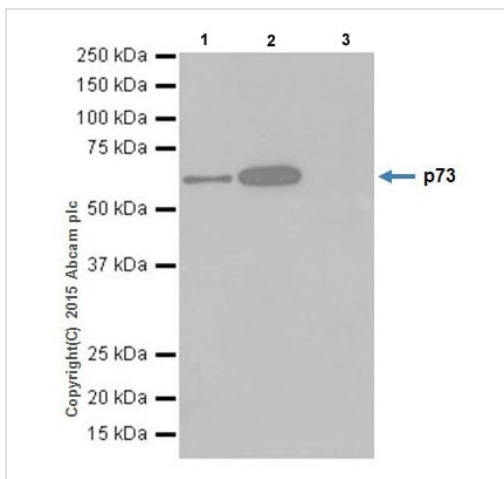


Intracellular flow cytometric analysis of 4% paraformaldehyde-fixed Jurkat (Human T cell leukemia cell line from peripheral blood) cells labeling p73 alpha+beta with ab189896 at 1/300 dilution (red) compared with a rabbit monoclonal IgG isotype control ([ab172730](#); black) and an unlabelled control (cells without incubation with primary antibody and secondary antibody; blue). Goat anti rabbit IgG (FITC) at 1/500 dilution was used as the secondary antibody.



Flow Cytometry (Intracellular) - Anti-p73 antibody
[EPR18409(T)(MIX)] (ab189896)

Intracellular flow cytometric analysis of 4% paraformaldehyde-fixed K562 (Human chronic myelogenous leukemia cell line from bone marrow) cells labeling p73 alpha+beta with ab189896 at 1/300 dilution (red) compared with a rabbit monoclonal IgG isotype control (**ab172730**; black) and an unlabelled control (cells without incubation with primary antibody and secondary antibody; blue). Goat anti rabbit IgG (FITC) at 1/500 dilution was used as the secondary antibody.



Immunoprecipitation - Anti-p73 antibody
[EPR18409(T)(MIX)] (ab189896)

p73 alpha+beta was immunoprecipitated from 1mg of HeLa (Human epithelial cell line from cervix adenocarcinoma) whole cell lysate with ab189896 at 1/80 dilution.

Western blot was performed from the immunoprecipitate using ab189896 at 1/1000 dilution.

Anti-Rabbit IgG (HRP), specific to the non-reduced form of IgG, was used as secondary antibody at 1/1500.

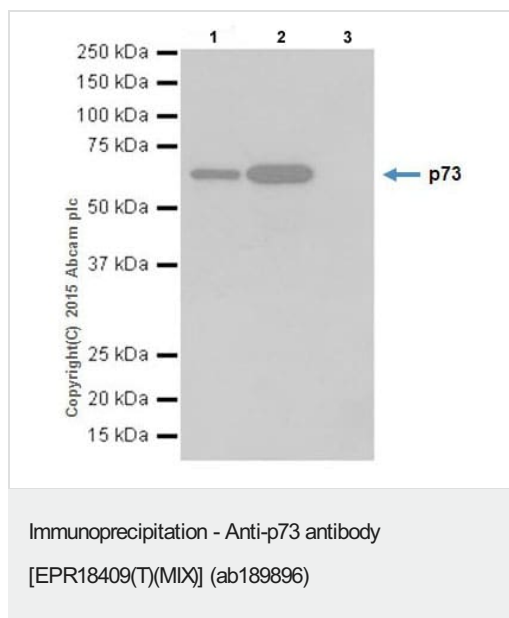
Lane 1: HeLa whole cell lysate 10ug (Input).

Lane 2: ab189896 IP in HeLa whole cell lysate.

Lane 3: Rabbit monoclonal IgG (**ab172730**) instead of ab189896 in HeLa whole cell lysate.

Blocking and dilution buffer and concentration: 5% NFDM/TBST.

Exposure time: 10 seconds.



p73 alpha+beta was immunoprecipitated from 1mg of MCF7 (Human breast adenocarcinoma cell line) whole cell lysate with ab189896 at 1/80 dilution.

Western blot was performed from the immunoprecipitate using ab189896 at 1/1000 dilution.

Anti-Rabbit IgG (HRP), specific to the non-reduced form of IgG, was used as secondary antibody at 1/1500.

Lane 1: MCF7 whole cell lysate 10ug (Input).





Lane 2: ab189896 IP in MCF7 whole cell lysate.

Lane 3: Rabbit monoclonal IgG (**ab172730**) instead of ab189896 in MCF7 whole cell lysate.

Blocking and dilution buffer and concentration: 5% NFDM/TBST.

Exposure time: 10 seconds.

Why choose a recombinant antibody?

 <p>Research with confidence Consistent and reproducible results</p>	 <p>Long-term and scalable supply Recombinant technology</p>
 <p>Success from the first experiment Confirmed specificity</p>	 <p>Ethical standards compliant Animal-free production</p>

Anti-p73 antibody [EPR18409(T)(MIX)] (ab189896)

Please note: All products are "FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC PROCEDURES"

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