

SIRT3 Rabbit pAb

Catalog NO.: A7307SP **KO Validated** **17 Publications**

Basic Information

Observed MW

28 kDa

Calculated MW

29 kDa/44 kDa

Category

Polyclonal Antibodies

Applications

WB, IP, IF-F, IHC-P, ELISA

Cross-Reactivity

Human, Mouse, Rat

Conjugation

Unconjugated

Background

SIRT3 encodes a member of the sirtuin family of class III histone deacetylases, homologs to the yeast Sir2 protein. The encoded protein is found exclusively in mitochondria, where it can eliminate reactive oxygen species, inhibit apoptosis, and prevent the formation of cancer cells. SIRT3 has far-reaching effects on nuclear gene expression, cancer, cardiovascular disease, neuroprotection, aging, and metabolic control.

Recommended Dilutions

WB 1:1000 - 1:4000

IP

0.5 µg - 4 µg antibody for 200 µg - 400 µg extracts of whole cells

IF-F 1:100 - 1:200

IHC-P 1:200 - 1:800

ELISA

Recommended starting concentration is 1 µg/mL. Please optimize the concentration based on your specific assay requirements. For high-ratio antibody dilutions ($\geq 1:10000$), a sequential dilution method is strongly recommended to ensure measurement accuracy.

Contact

Immunogen Information

Gene ID

23410/64384

Swiss Prot

Q9NTG7/Q8R104

Immunogen

This information is considered to be commercially sensitive.

Synonyms

SIR2L3; SIRT3

Product Information

☒		order@abclonal.com
☒		service@abclonal.com
☒		www.abclonal.com

Source

Rabbit

Isotype

IgG

Purification

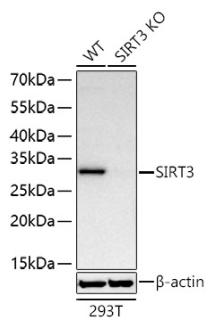
Affinity purification

Storage

Store at -20°C. Avoid freeze / thaw cycles.

Buffer: PBS, pH 7.3, containing 50% glycerol. Preserved with Proclin300 or sodium azide. May contain 0.05% BSA as specified on the Certificate of Analysis.

Validation Data



Western blot analysis of lysates from wild type (WT) and SIRT3 knockout (KO) 293T cells using [KO Validated] SIRT3

Rabbit pAb (A7307SP) at 1:1000 dilution incubated overnight at 4°C.

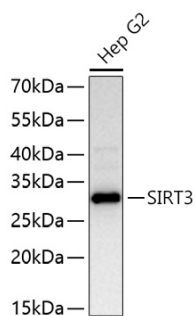
Secondary antibody: HRP-conjugated Goat anti-Rabbit IgG (H+L) (AS014) at 1:10000 dilution.

Lysates/proteins: 25 µg per lane.

Blocking buffer: 3% nonfat dry milk in TBST.

Detection: ECL Basic Kit (RM00020).

Exposure time: 30 s.



Western blot analysis of lysates from Hep G2 cells using [KO Validated] SIRT3 Rabbit pAb (A7307SP) at 1:1000 dilution incubated overnight at 4°C.

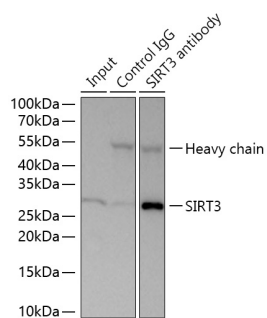
Secondary antibody: HRP-conjugated Goat anti-Rabbit IgG (H+L) (AS014) at 1:10000 dilution.

Lysates/proteins: 25 µg per lane.

Blocking buffer: 3% nonfat dry milk in TBST.

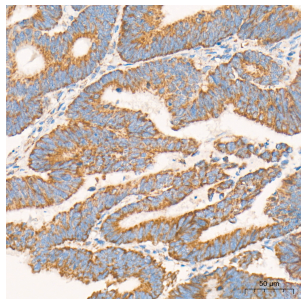
Detection: ECL Basic Kit (RM00020).

Exposure time: 30 s.

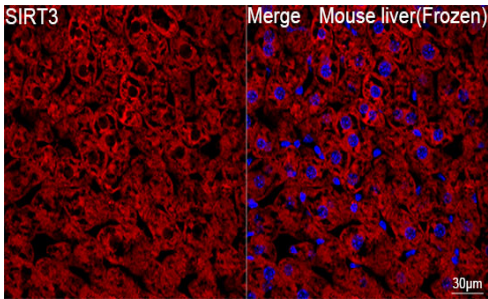


Immunoprecipitation of SIRT3 from 300 μ g extracts of 293T cells was performed using 2 μ g of [KO Validated] SIRT3 Rabbit pAb (A7307SP). Rabbit Control IgG (AC005) was used to precipitate the Control IgG sample. IP samples were eluted with 1x Laemmli Buffer. The Input lane represents 10% of the total input. Western blot analysis of immunoprecipitates was conducted using [KO Validated] SIRT3 Rabbit pAb (A7307SP) at a dilution of 1:20000.

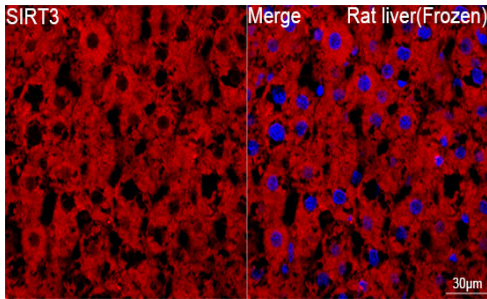
Validation Data



Immunohistochemistry analysis of paraffin-embedded Human colon carcinoma tissue using [KO Validated] SIRT3 Rabbit pAb (A7307SP) at a dilution of 1:500 (40x lens). High pressure antigen retrieval performed with 0.01M Tris-EDTA Buffer (pH 9.0) prior to IHC staining.



Confocal imaging of frozen sections of Mouse liver tissue using [KO Validated] SIRT3 Rabbit pAb (A7307SP, dilution 1:200) followed by a further incubation with Cy3-conjugated Goat anti-Rabbit IgG (H+L) (AS007, dilution 1:500) (Red). DAPI was used for nuclear staining (Blue). Microwave antigen retrieval performed with 0.01M Citrate Buffer (pH 6.0) prior to IF staining. Objective: 40x.



Confocal imaging of frozen sections of Rat liver tissue using [KO Validated] SIRT3 Rabbit pAb (A7307SP, dilution 1:200) followed by a further incubation with Cy3-conjugated Goat anti-Rabbit IgG (H+L) (AS007, dilution 1:500) (Red). DAPI was used for nuclear staining (Blue). Microwave antigen retrieval performed with 0.01M Citrate Buffer (pH 6.0) prior to IF staining. Objective: 40x.

