

Na⁺/K⁺-ATPase Rabbit mAb

Catalog No.: AC072 Recombinant

Basic Information

Observed MW

100 kDa

Calculated MW

74 kDa/110 kDa/113 kDa

Category

Loading control antibody

Applications

WB,IF/ICC,IF-P,IHC-P,ELISA

Cross-Reactivity

Human, Mouse, Rat

CloneNo number

ARC0674

Background

The protein encoded by this gene belongs to the family of P-type cation transport ATPases, and to the subfamily of Na⁺/K⁺ -ATPases. Na⁺/K⁺ -ATPase is an integral membrane protein responsible for establishing and maintaining the electrochemical gradients of Na and K ions across the plasma membrane. These gradients are essential for osmoregulation, for sodium-coupled transport of a variety of organic and inorganic molecules, and for electrical excitability of nerve and muscle. This enzyme is composed of two subunits, a large catalytic subunit (alpha) and a smaller glycoprotein subunit (beta). The catalytic subunit of Na⁺/K⁺ -ATPase is encoded by multiple genes. This gene encodes an alpha 1 subunit. Multiple transcript variants encoding different isoforms have been found for this gene.

Recommended Dilutions

WB 1:10000 - 1:40000

IF/ICC 1:200 - 1:600

IF-P 1:200 - 1:600

IHC-P 1:2000 - 1:10000

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

Immunogen Information

Gene ID

476

Swiss Prot

P05023

Immunogen

Synthetic peptide. This information is considered to be commercially sensitive.

Synonyms

CMT2DD; HOMGSMR2

Product Information

Source

Rabbit

Isotype

IgG

Purification

Affinity purification

Storage


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

Buffer: PBS with 0.09% sodium azide, 0.05% BSA, 50% glycerol, negative IgG, pH7.3

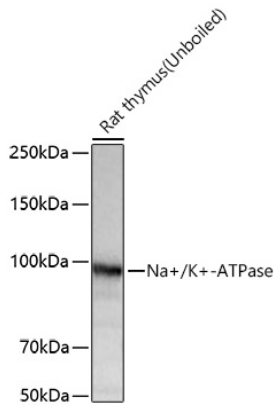
Contact

 | 400-999-6126

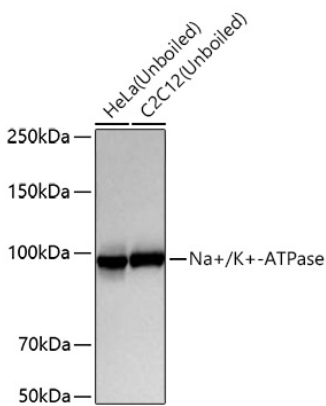
 | cn.market@abclonal.com.cn

 | www.abclonal.com.cn

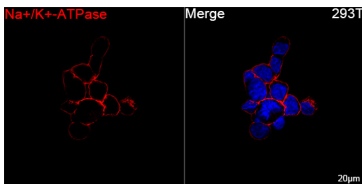
Validation Data



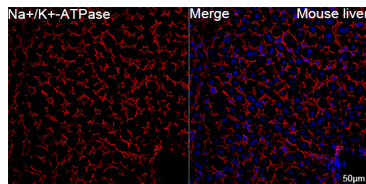
Western blot analysis of lysates from Rat thymus using Na⁺/K⁺-ATPase Rabbit mAb (AC072) at 1:20000 dilution incubated overnight at 4°C.
 Secondary antibody: HRP-conjugated Goat anti-Rabbit IgG (H+L) (AS014) at 1:10000 dilution.
 Lysates/proteins: 25 µg per lane.
 Blocking buffer: 3% nonfat dry milk in TBST.
 Detection: ECL Basic Kit (RM00020).
 Exposure time: 1 s.



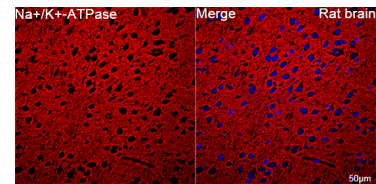
Western blot analysis of various lysates using Na⁺/K⁺-ATPase Rabbit mAb (AC072) at 1:20000 dilution incubated overnight at 4°C.
 Secondary antibody: HRP-conjugated Goat anti-Rabbit IgG (H+L) (AS014) at 1:10000 dilution.
 Lysates/proteins: 25 µg per lane.
 Blocking buffer: 3% nonfat dry milk in TBST.
 Detection: ECL Basic Kit (RM00020).
 Exposure time: 20 s.



Confocal imaging of 293T cells using Na⁺/K⁺-ATPase Rabbit mAb (AC072, 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). Objective: 100x.

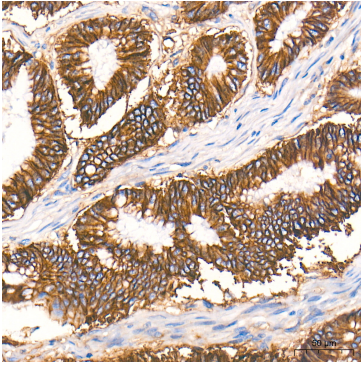


Confocal imaging of paraffin-embedded Mouse liver tissue using Na⁺/K⁺-ATPase Rabbit mAb (AC072, dilution 1:200) followed by a further incubation with Cy3-conjugated Goat anti-Rabbit IgG (H+L) (AS007, dilution 1:500) (Red). DAPI was used for nuclear staining (Blue). High pressure antigen retrieval performed with 0.01M Citrate Buffer (pH 6.0) prior to IF staining. Objective: 40x.

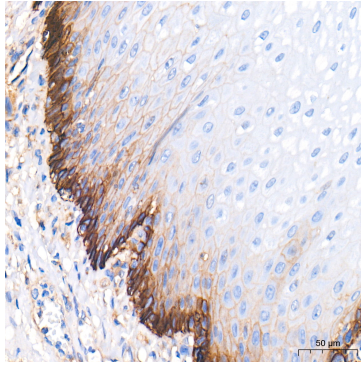


Confocal imaging of paraffin-embedded Rat brain tissue using Na⁺/K⁺-ATPase Rabbit mAb (AC072, dilution 1:200) followed by a further incubation with Cy3-conjugated Goat anti-Rabbit IgG (H+L) (AS007, dilution 1:500) (Red). DAPI was used for nuclear staining (Blue). Microwave antigen retrieval performed with 0.01M Citrate Buffer (pH 6.0) prior to IF staining. Objective: 40x.

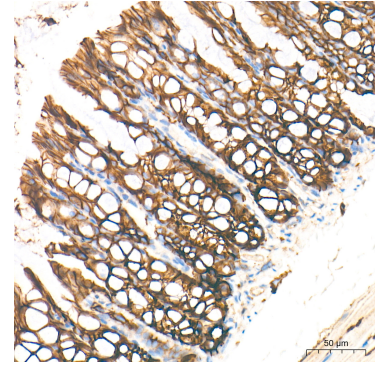
Validation Data



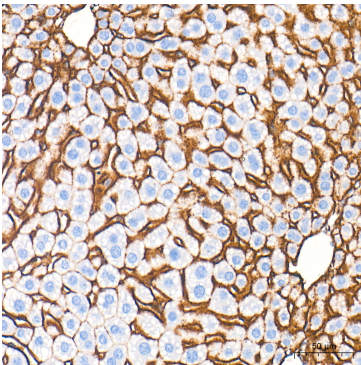
Immunohistochemistry analysis of paraffin-embedded Human colon carcinoma tissue using Na⁺/K⁺-ATPase Rabbit mAb (AC072) at a dilution of 1:5000 (40x lens). High pressure antigen retrieval performed with 0.01M Tris-EDTA Buffer (pH 9.0) prior to IHC staining.



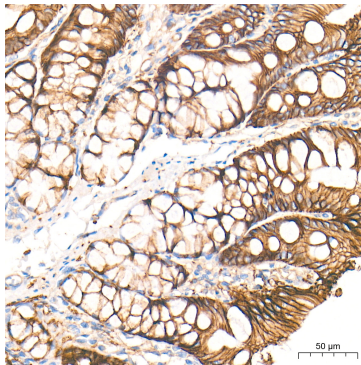
Immunohistochemistry analysis of paraffin-embedded Human esophagus tissue using Na⁺/K⁺-ATPase Rabbit mAb (AC072) at a dilution of 1:5000 (40x lens). High pressure antigen retrieval performed with 0.01M Tris-EDTA Buffer (pH 9.0) prior to IHC staining.



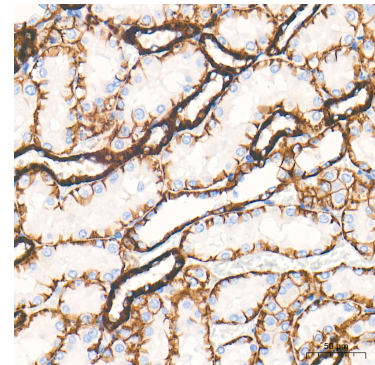
Immunohistochemistry analysis of paraffin-embedded Mouse colon tissue using Na⁺/K⁺-ATPase Rabbit mAb (AC072) at a dilution of 1:5000 (40x lens). High pressure antigen retrieval performed with 0.01M Tris-EDTA Buffer (pH 9.0) prior to IHC staining.



Immunohistochemistry analysis of paraffin-embedded Mouse liver tissue using Na⁺/K⁺-ATPase Rabbit mAb (AC072) at a dilution of 1:5000 (40x lens). High pressure antigen retrieval performed with 0.01M Tris-EDTA Buffer (pH 9.0) prior to IHC staining.



Immunohistochemistry analysis of paraffin-embedded Rat intestine tissue using Na⁺/K⁺-ATPase Rabbit mAb (AC072) at a dilution of 1:5000 (40x lens). High pressure antigen retrieval performed with 0.01M Tris-EDTA Buffer (pH 9.0) prior to IHC staining.



Immunohistochemistry analysis of paraffin-embedded Rat kidney tissue using Na⁺/K⁺-ATPase Rabbit mAb (AC072) at a dilution of 1:5000 (40x lens). High pressure antigen retrieval performed with 0.01M Tris-EDTA Buffer (pH 9.0) prior to IHC staining.