

AMPK alpha 2(Phospho-S345) Rabbit mAb

Catalog No: #13424

Package Size: #13424-1 50ul #13424-2 100ul

Description

Product Name	AMPK alpha 2(Phospho-S345) Rabbit mAb
Host Species	Rabbit
Clonality	Monoclonal
Clone No.	JJ08-19
Purification	ProA affinity purified
Applications	WB, ICC/IF, IHC
Species Reactivity	Hu, Ms, Rt
Immunogen Description	Synthetic phospho-peptide corresponding to residues surrounding Ser345 of human AMPK alpha 2.
Conjugates	Unconjugated
Other Names	5'-AMP-activated protein kinase catalytic subunit alpha-2 antibody AAPK2_HUMAN antibody ACACA kinase antibody Acetyl-CoA carboxylase kinase antibody AMPK alpha 2 chain antibody AMPK subunit alpha-2 antibody AMPK2 antibody AMPKa2 antibody AMPKalpha2 antibody HMGCR kinase antibody Hydroxymethylglutaryl-CoA reductase kinase antibody PRKAA antibody PRKAA2 antibody Protein kinase AMP activated alpha 2 catalytic subunit antibody Protein kinase AMP activated catalytic subunit alpha 2 antibody
Accession No.	Swiss-Prot#:P54646
Calculated MW	Predicted band size: 62 kDa
SDS-PAGE MW	Observed band size: 62 kDa
Formulation	Rabbit IgG in 10mM phosphate buffered saline , pH 7.4, 150mM sodium chloride, 0.05% BSA, 0.02% sodium azide and 50% glycerol.
Storage	Store at -20°C

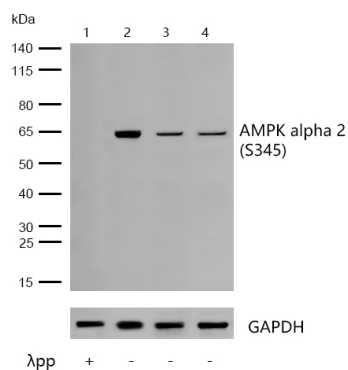
Application Details

WB: 1:500-1:2000

ICC/IF: 1:50-1:200

IHC: 1:50-1:200

Images



All lanes :AMPK alpha 2(Phospho-S345) Rabbit mAb at 1/500 dilution

Lane 1 : 293T whole cell lysates treated with λpp for 1 hour

Lane 2 : 293T whole cell lysates

Lane 3 : Mouse brain tissue lysates

Lane 4 : Rat brain tissue lysates

Lysates/proteins at 20 µg per lane.

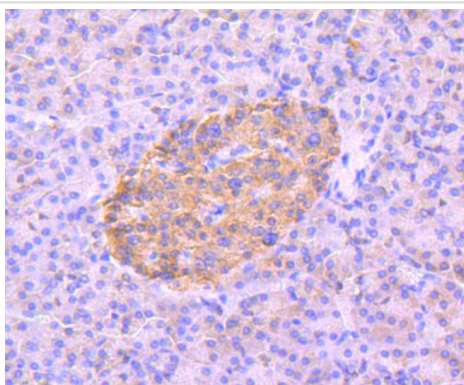
Secondary

All lanes : Goat Anti-Rabbit IgG H&L (HRP) at 1/20000 dilution

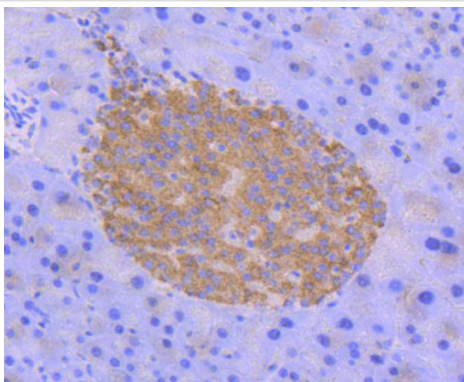
Predicted band size: 62 kDa

Observed band size: 62 kDa

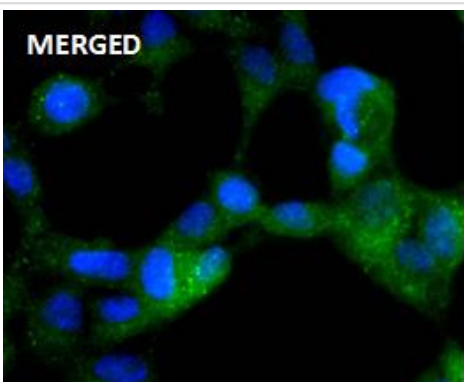
Exposure time: 12 seconds



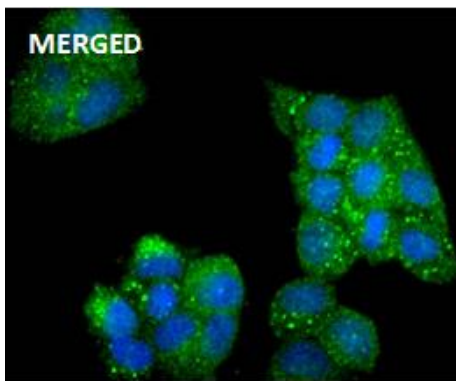
Formalin-fixed, paraffin-embedded human pancreas tissue stained for AMPK alpha 2(Phospho-S345) using 13424 at 1/100 dilution in immunohistochemical analysis.



Formalin-fixed, paraffin-embedded mouse pancreas tissue stained for AMPK alpha 2(Phospho-S345) using 13424 at 1/100 dilution in immunohistochemical analysis.



Immunocytochemistry/ Immunofluorescence AMPK alpha 2(Phospho-S345) antibody (13424)
ICC/IF staining of AMPK alpha 2(Phospho-S345) in 293 cells. Cells were fixed with 4% Paraformaldehyde permeabilized with 0.1% Triton X-100. Samples were incubated with 13424 at a working dilution of 1/100. The secondary antibody was Alexa FluorB 488 goat anti rabbit, used at a dilution of 1/500. Nuclei were counterstained with DAPI.



Immunocytochemistry/ Immunofluorescence AMPK alpha 2(Phospho-S345) antibody (13424)
 ICC/IF staining of AMPK alpha 2(Phospho-S345) in HeLa cells.
 Cells were fixed with 4% Paraformaldehyde permeabilized with 0.1% Triton X-100.
 Samples were incubated with 13424 at a working dilution of 1/100. The secondary antibody was Alexa FluorB 488 goat anti rabbit, used at a dilution of 1/500.
 Nuclei were counterstained with DAPI.

Background

Five-prime-AMP-activated protein kinase, known as AMPK, is a heterotrimeric complex that comprises of a catalytic α subunit, and regulatory β and γ . AMPK protects cells from stresses that cause ATP depletion by switching off ATP-consuming biosynthetic pathways. AMPK is activated by high AMP and low ATP via a mechanism involving allosteric regulation, promotion of phosphorylation by an upstream protein kinase known as AMPK kinase (AMPKK), and inhibition of dephosphorylation. Activated AMPK can phosphorylate and regulate in vivo hydroxymethylglutaryl-CoA reductase and acetyl-CoA carboxylase, which are key regulatory enzymes of sterol synthesis and fatty acid synthesis, respectively. The human AMPK α 1 gene maps to chromosome 5p12 and encodes a 548 amino acid protein. The major regulatory site phosphorylated by AMPKK on AMPK α has been identified as Thr 172 within the activation loop between the DFG and APE motifs of the alpha-subunits.

References

Note: This product is for in vitro research use only and is not intended for use in humans or animals.