

Product datasheet

Anti-ADK antibody [EPR27497-67] ab307357

KO VALIDATED Recombinant RabMAb

9 Images

Overview

Product name	Anti-ADK antibody [EPR27497-67]
Description	Rabbit monoclonal [EPR27497-67] to ADK
Host species	Rabbit
Specificity	This antibody is unsuitable for human IP and rat ICC.
Tested applications	Suitable for: WB, ICC/IF, Flow Cyt (Intra), IP Unsuitable for: IHC-Fr or IHC-P
Species reactivity	Reacts with: Mouse, Rat, Human
Immunogen	Recombinant fragment. This information is proprietary to Abcam and/or its suppliers.
Positive control	WB: RAW264.7, HeLa and C6 whole cell lysate. Wild-type HAP1 whole cell lysate. Mouse and rat liver tissue lysate. ICC/IF: Wild-type HAP1 cells. NIH/3T3 cells. Flow Cyt (Intra): Wild-type HAP1 cells. NIH/3T3 cells. IP: RAW264.7 and C6 whole cell lysate.
General notes	This product is a recombinant monoclonal antibody, which offers several advantages including: <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 For more information see here . Our RabMAb [®] technology is a patented hybridoma-based technology for making rabbit monoclonal antibodies. For details on our patents, please refer to RabMAb[®] patents .

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	pH: 7.20 Preservative: 0.01% Sodium azide Constituents: 40% Glycerol (glycerin, glycerine), 0.05% BSA, 59% PBS
Purity	Protein A purified

Clonality	Monoclonal
Clone number	EPR27497-67
Isotype	IgG

Applications

The Abpromise guarantee Our **Abpromise guarantee** covers the use of ab307357 in the following tested applications. The application notes include recommended starting dilutions; optimal dilutions/concentrations should be determined by the end user.

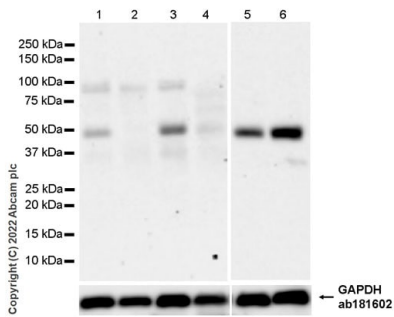
Application	Abreviews	Notes
WB		1/1000. Predicted molecular weight: 41 kDa.
ICC/IF		1/50 - 1/1000.
Flow Cyt (Intra)		1/50.
IP		1/30.

Application notes Is unsuitable for IHC-Fr or IHC-P.

Target

Function	ATP dependent phosphorylation of adenosine and other related nucleoside analogs to monophosphate derivatives. Serves as a potential regulator of concentrations of extracellular adenosine and intracellular adenine nucleotides.
Tissue specificity	Widely expressed. Highest level in placenta, liver, muscle and kidney.
Pathway	Purine metabolism; AMP biosynthesis via salvage pathway; AMP from adenosine 3',5'-bisphosphate: step 1/1.
Sequence similarities	Belongs to the carbohydrate kinase pfkB family.

Images



Western blot - Anti-ADK antibody [EPR27497-67] (ab307357)

All lanes : Anti-ADK antibody [EPR27497-67] (ab307357) at 1/1000 dilution

Lane 1 : Wild-type HAP1, whole cell lysate 20 µg

Lane 2 : ADK knockout HAP1, whole cell lysate 20 µg

Lane 3 : HeLa (human cervical adenocarcinoma epithelial cell), whole cell lysate 20 µg

Lane 4 : A549 (human lu carcinoma epithelial cell), whole cell lysate 20 µg

Lane 5 : RAW264.7 (mouse Abelson murine leukemia virus-induced tumor macrophage), whole cell lysate 20 µg

Lane 6 : C6 (rat glial tumor glial cell), whole cell lysate 20 µg

Secondary

All lanes : Goat Anti-Rabbit IgG, (H+L), Peroxidase conjugated (**ab97051**) at 1/100000 dilution

Predicted band size: 41 kDa

Observed band size: 45 kDa

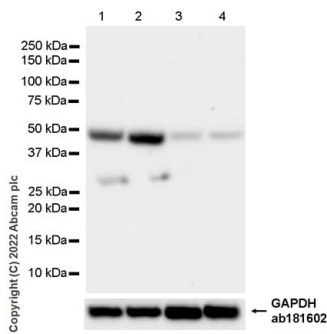
Blocking and diluting buffer and concentration: 5% NFDm/TBST

Low expression: A549

In Western blot, ab307357 was shown to bind specifically to ADK. A band was observed at 45 kDa in wild-type HAP1 cell lysates whereas no signal observed at this size in ADK knockout cell line.

This blot (lanes 1-4) was developed using a high sensitivity ECL substrate.

Exposure time: 125 seconds



Western blot - Anti-ADK antibody [EPR27497-67] (ab307357)

All lanes : Anti-ADK antibody [EPR27497-67] (ab307357) at 1/1000 dilution

Lane 1 : Mouse liver tissue lysate 20 µg

Lane 2 : Rat liver tissue lysate 20 µg

Lane 3 : Mouse heart tissue lysate 20 µg

Lane 4 : Rat heart tissue lysate 20 µg

Secondary

All lanes : Goat Anti-Rabbit IgG, (H+L), Peroxidase conjugated (**ab97051**) at 1/100000 dilution

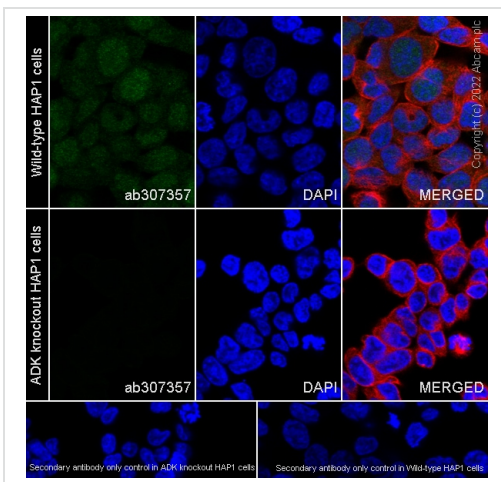
Predicted band size: 41 kDa

Observed band size: 45 kDa

Blocking and diluting buffer and concentration: 5% NFD/MTBST

Low expression: mouse heart (PMID:15930047;14736855), rat heart (PMID:15930047;14736855).

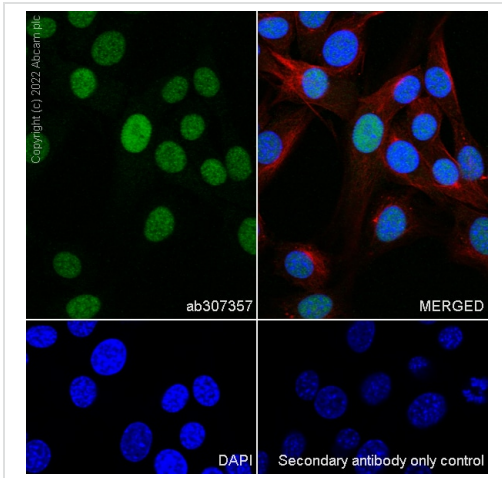
Exposure time: 15 seconds



Immunocytochemistry/ Immunofluorescence - Anti-ADK antibody [EPR27497-67] (ab307357)

Immunofluorescent analysis of 4% Paraformaldehyde-fixed, 0.1% TritonX-100 permeabilized ADK KO HAP1 (ADK knockout human chronic myelogenous leukemia near-haploid cell) cells labeling ADK with ab307357 at 1/50 dilution (10.64 µg/ml), followed by **ab150081** Goat Anti-Rabbit IgG H&L (Alexa Fluor® 488) preadsorbed antibody at 1/1000 dilution (2 µg/ml) (Green). Confocal image showing nuclear and weak cytoplasmic staining in wildtype HAP1 cells, and no staining in ADK knockout HAP1 cells. The image was taken with a confocal microscope (Leica-Microsystems, TCS SP8). **ab195889** Anti-alpha Tubulin mouse monoclonal antibody - Microtubule Marker (Alexa Fluor® 594) was used to counterstain tubulin at 1/200 dilution (2.5 µg/ml) (Red). Nuclear counterstain was DAPI (Blue).

Secondary antibody only control: Secondary antibody is **ab150081** Goat Anti-Rabbit IgG H&L (Alexa Fluor® 488) preadsorbed at 1/1000 dilution (2 µg/ml).

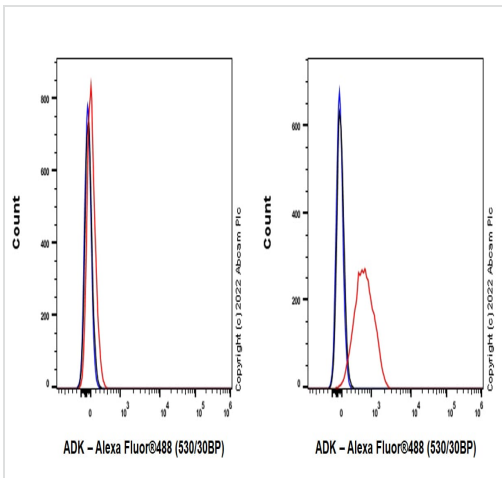


Immunocytochemistry/ Immunofluorescence - Anti-ADK antibody [EPR27497-67] (ab307357)

Immunofluorescent analysis of 4% Paraformaldehyde-fixed, 0.1% TritonX-100 permeabilized NIH/3T3 (mouse embryonic fibroblast) cells labeling ADK with ab307357 at 1/50 dilution (10.64 µg/ml), followed by **ab150081** Goat Anti-Rabbit IgG H&L (Alexa Fluor® 488) preadsorbed antibody at 1/1000 dilution (2 µg/ml) (Green). Confocal image showing nuclear and weak cytoplasmic staining in NIH/3T3 cells.

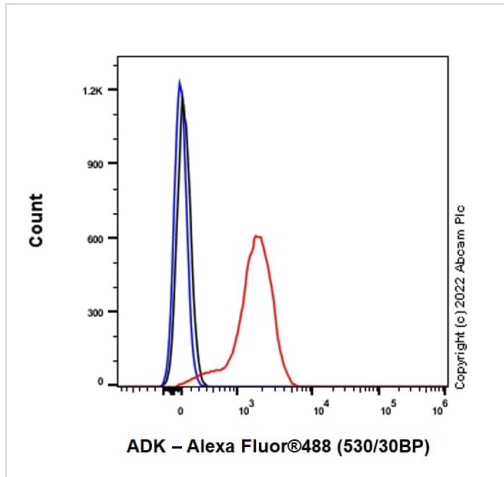
The image was taken with a confocal microscope (Leica-Microsystems, TCS SP8). **ab195889** Anti-alpha Tubulin mouse monoclonal antibody - Microtubule Marker (Alexa Fluor® 594) was used to counterstain tubulin at 1/200 dilution (2.5 µg/ml) (Red). Nuclear counterstain was DAPI (Blue).

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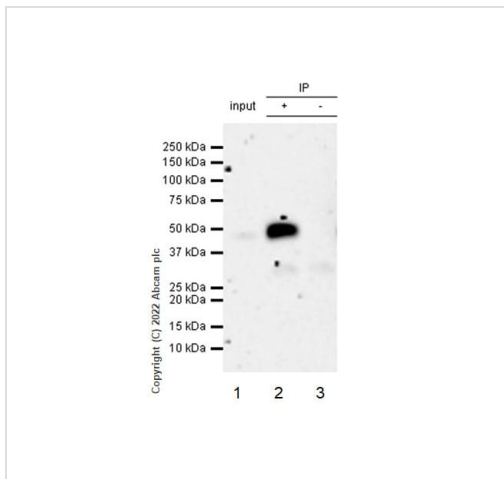
Flow Cytometry (Intracellular) - Anti-ADK antibody [EPR27497-67] (ab307357)

Flow cytometric analysis of 4% paraformaldehyde fixed 90% methanol permeabilized wild-type HAP1 (human chronic myelogenous leukemia near-haploid cell) (Right) / ADK knockout HAP1 (Left) cells labeling ADK with ab307357 at 1/50 dilution (1 µg) (Red) compared with a Rabbit monoclonal IgG (**ab172730**) (Black) isotype control and an unlabeled control (cells without incubation with primary antibody and secondary antibody) (Blue). A Goat anti-Rabbit IgG (Alexa Fluor® 647, **ab150083**) at 1/2000 dilution was used as the secondary antibody.



Flow Cytometry (Intracellular) - Anti-ADK antibody
[EPR27497-67] (ab307357)

Flow cytometric analysis of 4% paraformaldehyde fixed 90% methanol permeabilized NIH/3T3 (mouse embryonic fibroblast) cells labeling ADK with ab307357 at 1/50 dilution (1µg) (Red) compared with a Rabbit monoclonal IgG (**ab172730**) (Black) isotype control and an unlabeled control (cells without incubation with primary antibody and secondary antibody) (Blue). A Goat anti-Rabbit IgG (Alexa Fluor® 647, **ab150083**) at 1/2000 dilution was used as the secondary antibody.



Immunoprecipitation - Anti-ADK antibody
[EPR27497-67] (ab307357)

ADK was immunoprecipitated from 0.35 mg RAW264.7 (mouse Abelson murine leukemia virus-induced tumor macrophage) whole cell lysate 10 µg with ab307357 at 1/30 dilution (2µg in 0.35mg lysates). Western blot was performed on the immunoprecipitate using ab307357 at 1/1000 dilution. VeriBlot for IP secondary antibody(HRP)(**ab131366**) was used at 1/5000 dilution.

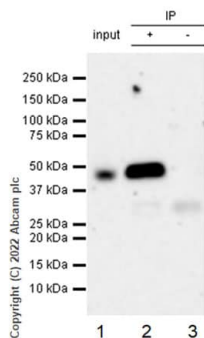
Lane 1: RAW264.7 whole cell lysate 10 µg

Lane 2: ab307357 IP in RAW264.7 whole cell lysate

Lane 3: Rabbit monoclonal IgG (**ab172730**) instead of ab307357 in RAW264.7 whole cell lysate

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

Exposure time: 128 seconds



Immunoprecipitation - Anti-ADK antibody
[EPR27497-67] (ab307357)

ADK was immunoprecipitated from 0.35 mg C6 (rat glial tumor glial cell) whole cell lysate 10 µg with ab307357 at 1/30 dilution (2µg in 0.35mg lysates). Western blot was performed on the immunoprecipitate using ab307357 at 1/1000 dilution. VeriBlot for IP secondary antibody(HRP)([ab131366](#)) was used at 1/5000 dilution.

Lane 1: C6 whole cell lysate 10 µg

Lane 2: ab307357 IP in C6 whole cell lysate

Lane 3: Rabbit monoclonal IgG ([ab172730](#)) instead of ab307357 in C6 whole cell lysate

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

Exposure time: 128 seconds.

Why choose a recombinant antibody?



Research with confidence
Consistent and reproducible results



Long-term and scalable supply
Recombinant technology



Success from the first experiment
Confirmed specificity



Ethical standards compliant
Animal-free production

Anti-ADK antibody [EPR27497-67] (ab307357)

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

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