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AK2 antibody - N-terminal region
Rabbit Polyclonal Antibody
Catalog # AI12650

Specification

AK2 antibody - N-terminal region - Product Information

Application	**WB**
Primary Accession	P54819
Other Accession	NM_001625, NP_001616
Reactivity	**Human, Mouse, Rat, Rabbit, Zebrafish, Horse, Bovine, Guinea Pig, Dog**
Predicted	**Human, Mouse, Chicken, Dog**
Host	**Rabbit**
Clonality	**Polyclonal**
Calculated MW	**26kDa KDa**

AK2 antibody - N-terminal region - Additional Information

Gene ID 204

Alias Symbol	**ADK2, AK 2**

Other Names
Adenylate kinase 2, mitochondrial {ECO:0000255|HAMAP-Rule:MF_03168}, AK 2 {ECO:0000255|HAMAP-Rule:MF_03168}, 2.7.4.3 {ECO:0000255|HAMAP-Rule:MF_03168}, ATP-AMP transphosphorylase 2 {ECO:0000255|HAMAP-Rule:MF_03168}, ATP:AMP phosphotransferase {ECO:0000255|HAMAP-Rule:MF_03168}, Adenylate monophosphate kinase {ECO:0000255|HAMAP-Rule:MF_03168}, Adenylate kinase 2, mitochondrial, N-terminally processed {ECO:0000255|HAMAP-Rule:MF_03168}, AK2 {ECO:0000255|HAMAP-Rule:MF_03168}, ADK2

Format
Liquid. Purified antibody supplied in 1x PBS buffer with 0.09% (w/v) sodium azide and 2% sucrose.

Reconstitution & Storage
Add 100 ul of distilled water. Final anti-AK2 antibody concentration is 1 mg/ml in PBS buffer with 2% sucrose. For longer periods of storage, store at 20°C. Avoid repeat freeze-thaw cycles.

Precautions
AK2 antibody - N-terminal region is for research use only and not for use in diagnostic or therapeutic procedures.

AK2 antibody - N-terminal region - Protein Information

Name AK2 {ECO:0000255|HAMAP-Rule:MF_03168}

Synonyms ADK2

Function

Catalyzes the reversible transfer of the terminal phosphate group between ATP and AMP. Plays an important role in cellular energy homeostasis and in adenine nucleotide metabolism. Adenylate kinase activity is critical for regulation of the phosphate utilization and the AMP de novo biosynthesis pathways. Plays a key role in hematopoiesis.

Cellular Location
Mitochondrion intermembrane space {ECO:0000255|HAMAP-Rule:MF_03168}

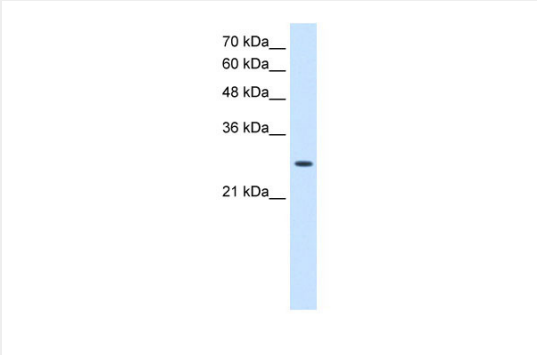
Tissue Location
Present in most tissues. Present at high level in heart, liver and kidney, and at low level in brain, skeletal muscle and skin. Present in thrombocytes but not in erythrocytes, which lack mitochondria. Present in all nucleated cell populations from blood, while AK1 is mostly absent. In spleen and lymph nodes, mononuclear cells lack AK1, whereas AK2 is readily detectable. These results indicate that leukocytes may be susceptible to defects caused by the lack of AK2, as they do not express AK1 in sufficient amounts to compensate for the AK2 functional deficits (at protein level)

AK2 antibody - N-terminal region - Protocols

Provided below are standard protocols that you may find useful for product applications.

- Western Blot
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- Cell Culture

AK2 antibody - N-terminal region - Images



WB Suggested Anti-AK2 Antibody Titration: 2.5µg/ml
Positive Control: HepG2 cell lysate
There is BioGPS gene expression data showing that AK2 is expressed in HepG2

AK2 antibody - N-terminal region - References

Kohler,C.,(1999)FEBSLett.447(1),10-12ReconstitutionandStorage:Forshorttermuse,storeat2-8Cupto 1week.Forlongtermstorage,storeat-20Cinsmallaliquotstopreventfreeze-thawcycles.