

HK2 (Hexokinase II) Antibody
Purified Mouse Monoclonal Antibody (Mab)
Catalog # AM8606b

Specification

HK2 (Hexokinase II) Antibody - Product Information

Application	IHC, WB,E
Primary Accession	P52789
Reactivity	Human
Host	Mouse
Clonality	monoclonal
Isotype	IgG1,k
Calculated MW	102380

HK2 (Hexokinase II) Antibody - Additional Information

Gene ID 3099

Other Names

Hexokinase-2, 2.7.1.1, Hexokinase type II, HK II, Muscle form hexokinase, HK2

Target/Specificity

This HK2 (Hexokinase II) antibody is generated from a mouse immunized with a recombinant protein between 1-170 amino acids from human HK2 (Hexokinase II).

Dilution

IHC~~1:400

WB~~1:500-1:1000

Format

Purified monoclonal antibody supplied in PBS with 0.09% (W/V) sodium azide. This antibody is purified through a protein G column, followed by dialysis against PBS.

Storage

Maintain refrigerated at 2-8°C for up to 2 weeks. For long term storage store at -20°C in small aliquots to prevent freeze-thaw cycles.

Precautions

HK2 (Hexokinase II) Antibody is for research use only and not for use in diagnostic or therapeutic procedures.

HK2 (Hexokinase II) Antibody - Protein Information

Name HK2 ([HGNC:4923](#))

Function Catalyzes the phosphorylation of hexose, such as D-glucose and D-fructose, to hexose 6-phosphate (D-glucose 6-phosphate and D-fructose 6-phosphate, respectively) (PubMed:[23185017](#), PubMed:[26985301](#), PubMed:[29298880](#)). Mediates the initial step of glycolysis

by catalyzing phosphorylation of D-glucose to D-glucose 6-phosphate (PubMed:[29298880](#)). Plays a key role in maintaining the integrity of the outer mitochondrial membrane by preventing the release of apoptogenic molecules from the intermembrane space and subsequent apoptosis (PubMed:[18350175](#)).

Cellular Location

Mitochondrion outer membrane; Peripheral membrane protein. Cytoplasm, cytosol Note=The mitochondrial-binding peptide (MBP) region promotes association with the mitochondrial outer membrane (PubMed:29298880) The interaction with the mitochondrial outer membrane via the mitochondrial-binding peptide (MBP) region promotes higher stability of the protein (PubMed:29298880). Release from the mitochondrial outer membrane into the cytosol induces permeability transition pore (PTP) opening and apoptosis (PubMed:18350175).

Tissue Location

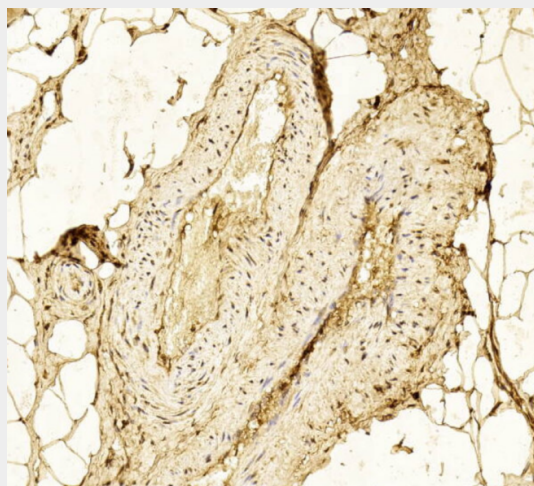
Predominant hexokinase isozyme expressed in insulin-responsive tissues such as skeletal muscle

HK2 (Hexokinase II) Antibody - Protocols

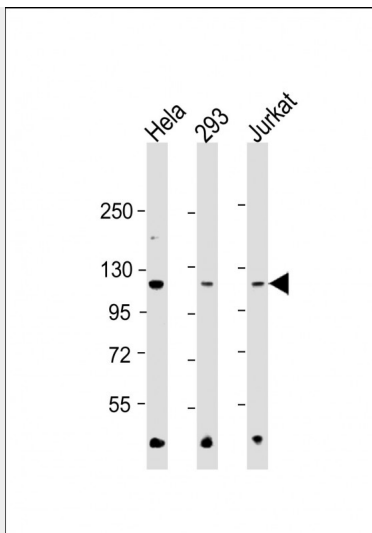
Provided below are standard protocols that you may find useful for product applications.

- [Western Blot](#)
- [Blocking Peptides](#)
- [Dot Blot](#)
- [Immunohistochemistry](#)
- [Immunofluorescence](#)
- [Immunoprecipitation](#)
- [Flow Cytometry](#)
- [Cell Culture](#)

HK2 (Hexokinase II) Antibody - Images



Immunohistochemical analysis of paraffin-embedded Human Skeletal muscle section using Pink1(Cat#AM8606b). AM8606b was diluted at 1:400 dilution. A undiluted biotinylated goat polyvalent antibody was used as the secondary, followed by DAB staining.



All lanes : Anti-HK2 (Hexokinase II) Antibody at 1:500-1:1000 dilution Lane 1: HeLa whole cell lysate Lane 2: 293 whole cell lysate Lane 3: Jurkat whole cell lysate Lysates/proteins at 20 µg per lane. Secondary Goat Anti-mouse IgG, (H+L), Peroxidase conjugated at 1/10000 dilution. Predicted band size : 102 kDa Blocking/Dilution buffer: 5% NFDM/TBST.

HK2 (Hexokinase II) Antibody - References

Deeb S.S.,et al.Biochem. Biophys. Res. Commun. 197:68-74(1993).
Lehto M.,et al.Diabetologia 38:1466-1474(1995).
Malkki M.,et al.Submitted (MAY-1999) to the EMBL/GenBank/DDBJ databases.
Mural R.J.,et al.Submitted (SEP-2005) to the EMBL/GenBank/DDBJ databases.
Shinohara Y.,et al.Cancer Lett. 82:27-32(1994).

HK2 (Hexokinase II) Antibody - Citations

- [Dickkopf-related protein 3 alters aerobic glycolysis in pancreatic cancer BxPC-3 cells, promoting CD4 T-cell activation and function.](#)