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PDXK Antibody (N-term)

Purified Mouse Monoclonal Antibody (Mab)
Catalog # AM8616b

Product Information

Application	WB, IHC-P, E
Primary Accession	O00764
Reactivity	Human
Predicted	Mouse, Rat, Bovine, Canine, Rabbit, Chicken
Host	Mouse
Clonality	monoclonal
Isotype	IgG1,k
Clone Names	1007CT2.1.1
Calculated MW	35102

Additional Information

Gene ID	8566
Other Names	Pyridoxal kinase, 2.7.1.35, Pyridoxine kinase, PDXK, C21orf124, C21orf97, PKH, PNK
Target/Specificity	This PDXK antibody is generated from a mouse immunized with a recombinant protein between 1-312 amino acids from human PDXK.
Dilution	WB~~1:4000 IHC-P~~1:100~500 E~~Use at an assay dependent concentration.
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	PDXK Antibody (N-term) is for research use only and not for use in diagnostic or therapeutic procedures.

Protein Information

Name	PDXK (HGNC:8819)
Function	Catalyzes the phosphorylation of the dietary vitamin B6 vitamers pyridoxal (PL), pyridoxine (PN) and pyridoxamine (PM) to form pyridoxal 5'-phosphate (PLP), pyridoxine 5'-phosphate (PNP) and pyridoxamine 5'-phosphate (PMP), respectively (Probable) (PubMed:10987144, PubMed:17766369, PubMed:19351586, PubMed:31187503, PubMed:9099727). PLP is the active

	form of vitamin B6, and acts as a cofactor for over 140 different enzymatic reactions.
Cellular Location	Cytoplasm, cytosol.
Tissue Location	Ubiquitous (PubMed:31187503, PubMed:9099727). Highly expressed in testis (PubMed:9099727)

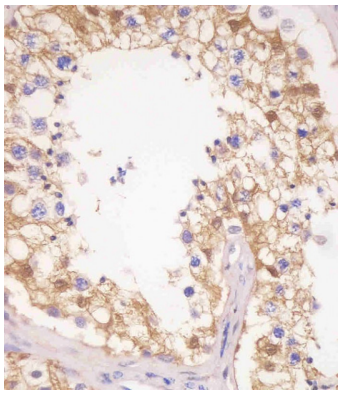
Background

Required for synthesis of pyridoxal-5-phosphate from vitamin B6.

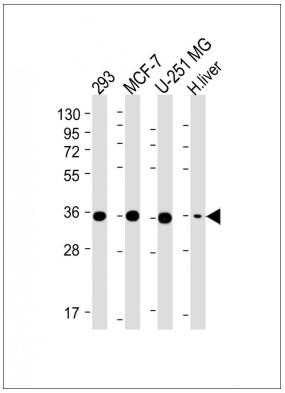
References

Hanna M.C.,et al.J. Biol. Chem. 272:10756-10760(1997).
Fang X.,et al.Asian J. Androl. 6:83-91(2004).
Hattori M.,et al.Nature 405:311-319(2000).
Lee H.-S.,et al.Mol. Cells 10:452-459(2000).
Daub H.,et al.Mol. Cell 31:438-448(2008).

Images



AM8616b staining PDXK in human testis tissue sections by Immunohistochemistry (IHC-P - paraformaldehyde-fixed, paraffin-embedded sections). Tissue was fixed with formaldehyde and blocked with 3% BSA for 0. 5 hour at room temperature; antigen retrieval was by heat mediation with a citrate buffer (pH6). Samples were incubated with primary antibody (1/25) for 1 hours at 37°C. A undiluted biotinylated goat polyvalent antibody was used as the secondary antibody.



All lanes : Anti-PDXK Antibody (N-term) at 1:4000 dilution Lane 1: 293 whole cell lysate Lane 2: MCF-7 whole cell lysate Lane 3: U-251 MG whole cell lysate Lane 4: Human liver lysate Lysates/proteins at 20 µg per lane. Secondary Goat Anti-mouse IgG, (H+L), Peroxidase conjugated at 1/10000 dilution. Predicted band size : 35 kDa Blocking/Dilution buffer: 5% NFDM/TBST.

Please note: All products are 'FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC OR THERAPEUTIC PROCEDURES'.