10320 Camino Santa Fe, Suite G
San Diego, CA 92121
Tel: 858.875.1900 Fax: 858.875.1999

PDX1 Antibody (C-term)

Purified Rabbit Polyclonal Antibody (Pab)
Catalog # AP2034b

Product Information

Application	WB, E
Primary Accession	O00330
Reactivity	Human
Predicted	Mouse, Rat, Bovine, Canine, Rabbit
Host	Rabbit
Clonality	Polyclonal
Isotype	Rabbit IgG
Clone Names	RB02861-02862
Calculated MW	54122
Antigen Region	429-459

Additional Information

Gene ID	8050
Other Names	Pyruvate dehydrogenase protein X component, mitochondrial, Dihydrolipoamide dehydrogenase-binding protein of pyruvate dehydrogenase complex, E3-binding protein, E3BP, Lipoyl-containing pyruvate dehydrogenase complex component X, proX, PDHX, PDX1
Target/Specificity	This PDX1 antibody is generated from rabbits immunized with a KLH conjugated synthetic peptide between 429-459 amino acids from the C-terminal region of human PDX1.
Dilution	WB~~1:1000 E~~Use at an assay dependent concentration.
Format	Purified polyclonal antibody supplied in PBS with 0.09% (W/V) sodium azide. This antibody is prepared by Saturated Ammonium Sulfate (SAS) precipitation 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	PDX1 Antibody (C-term) is for research use only and not for use in diagnostic or therapeutic procedures.

Protein Information

Name	PDHX
Synonyms	PDX1

Function	Required for anchoring dihydrolipoamide dehydrogenase (E3) to the dihydrolipoamide transacetylase (E2) core of the pyruvate dehydrogenase complexes of eukaryotes. This specific binding is essential for a functional PDH complex.
Cellular Location	Mitochondrion matrix.

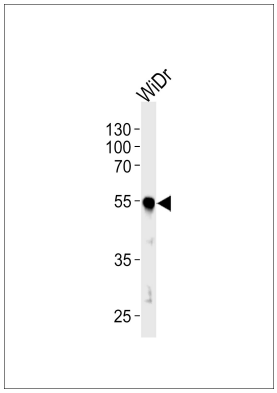
Background

PDX1, located in the mitochondrial matrix, is required for anchoring dihydrolipoamide dehydrogenase (E3) to the dihydrolipoamide transacetylase (E2) core of the pyruvate dehydrogenase complexes of eukaryotes. This specific binding is essential for a functional PDH complex. Eukaryotic pyruvate dehydrogenase complexes are organized about a core consisting of the oligomeric dihydrolipoamide acetyl-transferase, around which are arranged multiple copies of pyruvate dehydrogenase, dihydrolipoamide dehydrogenase and protein X bound by noncovalent bonds. Defects in PDHX are a cause of lacticacidemia. PDX1 belongs to the 2-oxoacid dehydrogenase family and contains 1 lipoyl-binding domain.

References

Ling, M., et al., Hum. Mol. Genet. 7(3):501-505 (1998). Harris, R.A., et al., J. Biol. Chem. 272(32):19746-19751 (1997). Murray, J., et al., FEBS Lett. 529 (2-3), 173-178 (2002).

Images



Western blot analysis of lysate from WiDr cell line, using hPDX1R444(Cat. #AP2034b). AP2034b was diluted at 1:1000 at each lane. A goat anti-rabbit IgG H&L(HRP) at 1:5000 dilution was used as the secondary antibody. Lysate at 35ug per lane.

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