

(Mouse) Pdx1 Antibody (Center)
Purified Rabbit Polyclonal Antibody (Pab)
Catalog # AP21086a

Specification

(Mouse) Pdx1 Antibody (Center) - Product Information

Application	IF, WB,E
Primary Accession	P52946
Reactivity	Mouse
Host	Rabbit
Clonality	Polyclonal
Isotype	Rabbit IgG
Calculated MW	30999

(Mouse) Pdx1 Antibody (Center) - Additional Information

Gene ID 18609

Other Names

Pancreas/duodenum homeobox protein 1, Insulin promoter factor 1, IPF-1, Islet/duodenum homeobox 1, IDX-1, Somatostatin-transactivating factor 1, STF-1, Pdx1, Ipf1

Target/Specificity

This Mouse Pdx1 antibody is generated from a rabbit immunized with a KLH conjugated synthetic peptide between 136-169 amino acids from the Central region of Mouse Pdx1.

Dilution

IF~~1:25

WB~~1:1000

Format

Purified polyclonal antibody supplied in PBS with 0.09% (W/V) sodium azide. This antibody is purified through a protein A column, followed by peptide affinity purification.

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

(Mouse) Pdx1 Antibody (Center) is for research use only and not for use in diagnostic or therapeutic procedures.

(Mouse) Pdx1 Antibody (Center) - Protein Information

Name Pdx1

Synonyms Ipf1

Function Activates insulin and somatostatin gene transcription. Key regulator of islet peptide hormone expression but also responsible for the development of the pancreas, most probably by determining maturation and differentiation of common pancreatic precursor cells in the developing gut. As part of a PDX1:PBX1b:MEIS2b complex in pancreatic acinar cells is involved in the transcriptional activation of the ELA1 enhancer; the complex binds to the enhancer B element and cooperates with the transcription factor 1 complex (PTF1) bound to the enhancer A element. Binds the DNA sequence 5'-CC[CT]TAATGGG-3'.

Cellular Location

Nucleus {ECO:0000255|PROSITE-ProRule:PRU00108, ECO:0000269|PubMed:17052199}.
Cytoplasm, cytosol

Tissue Location

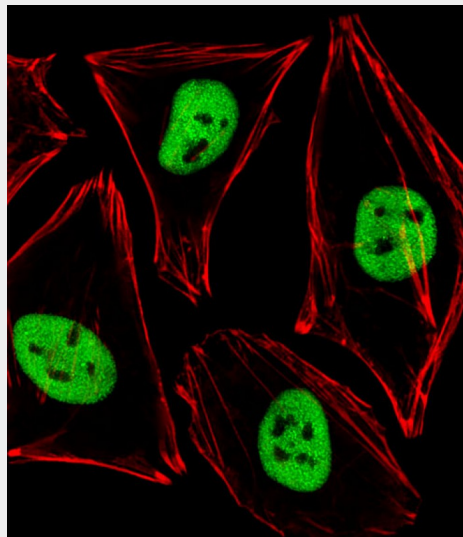
Duodenum and pancreas (Langerhans islet beta cells and small subsets of endocrine non-beta-cells, at low levels in acinar cells)

(Mouse) Pdx1 Antibody (Center) - Protocols

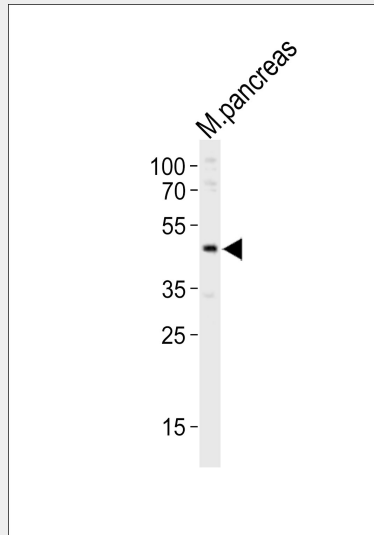
Provided below are standard protocols that you may find useful for product applications.

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

(Mouse) Pdx1 Antibody (Center) - Images



Immunofluorescent analysis of 4% paraformaldehyde-fixed, 0.1% Triton X-100 permeabilized HeLa (Human Cervical epithelial adenocarcinoma cell line) cells labeling Pdx1 with AP21086a at 1/25 dilution, followed by Alexa Fluor 488-conjugated goat anti-rabbit IgG (1583138) secondary antibody at 1/400 dilution (green). Confocal image showing nuclear staining on HeLa cell line. Cytoplasmic actin is detected with Alexa Fluor® 555 conjugated with Phalloidin (OB16636430) at 1/100 dilution (red).



Western blot analysis of lysate from mouse pancreas tissue lysate, using Pdx1 Antibody (Center)(Cat. #AP21086a). AP21086a was diluted at 1:1000. A goat anti-rabbit IgG H&L(HRP) at 1:10000 dilution was used as the secondary antibody. Lysate at 20ug.

(Mouse) Pdx1 Antibody (Center) - Background

Activates insulin and somatostatin gene transcription. Key regulator of islet peptide hormone expression but also responsible for the development of the pancreas, most probably by determining maturation and differentiation of common pancreatic precursor cells in the developing gut. As part of a PDX1:PBX1b:MEIS2b complex in pancreatic acinar cells is involved in the transcriptional activation of the ELA1 enhancer; the complex binds to the enhancer B element and cooperates with the transcription factor 1 complex (PTF1) bound to the enhancer A element. Binds the DNA sequence 5'-CC[CT]TAATGGG-3'.

(Mouse) Pdx1 Antibody (Center) - References

- Ohlsson H.,et al.EMBO J. 12:4251-4259(1993).
- Carninci P.,et al.Science 309:1559-1563(2005).
- Swift G.H.,et al.Mol. Cell. Biol. 18:5109-5120(1998).
- Liu Y.,et al.J. Biol. Chem. 276:17985-17993(2001).
- Liu A.,et al.Mol. Cell. Biol. 24:4372-4383(2004).