

Anti-PAX6 Picoband Antibody

Catalog # ABO12454

Product Information

Application	WB, IHC-P
Primary Accession	P26367
Host	Rabbit
Reactivity	Human, Mouse, Rat
Clonality	Polyclonal
Format	Lyophilized
Description	Rabbit IgG polyclonal antibody for Paired box protein Pax-6(PAX6) detection. Tested with WB, IHC-P in Human;Mouse;Rat.
Reconstitution	Add 0.2ml of distilled water will yield a concentration of 500ug/ml.

Additional Information

Gene ID	5080
Other Names	Paired box protein Pax-6, Aniridia type II protein, Oculorhombin, PAX6, AN2
Calculated MW	46683
Application Details	Immunohistochemistry(Paraffin-embedded Section), 0.5-1 µg/ml, Human, Mouse, Rat, By Heat Western blot, 0.1-0.5 µg/ml, Human, Mouse, Rat
Subcellular Localization	Nucleus.
Tissue Specificity	Fetal eye, brain, spinal cord and olfactory epithelium. Isoform 5a is less abundant than the PAX6 shorter form.
Source	Eukaryota
Protein Name	Paired box protein Pax-6
Contents	Each vial contains 5mg BSA, 0.9mg NaCl, 0.2mg Na ₂ HPO ₄ , 0.05mg Na ₃ .
Immunogen	A synthetic peptide corresponding to a sequence in the middle region of human PAX6 (195-233aa EDSDEAQMRLQLKRKLQRNRTSFTQEIEALEKEFERTH), identical to the related mouse and rat sequences.
Purification	Immunogen affinity purified.
Cross Reactivity	No cross reactivity with other proteins.

Storage At -20 °C for one year. After reconstitution, at 4 °C for one month. It can also be aliquotted and stored frozen at -20 °C for a longer time. Avoid repeated freezing and thawing.

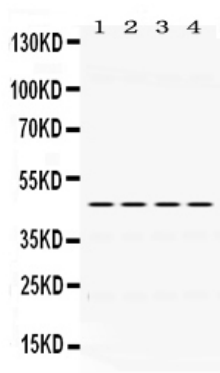
Protein Information

Name	PAX6
Synonyms	AN2
Function	Transcription factor with important functions in the development of the eye, nose, central nervous system and pancreas. Required for the differentiation of pancreatic islet alpha cells (By similarity). Competes with PAX4 in binding to a common element in the glucagon, insulin and somatostatin promoters. Regulates specification of the ventral neuron subtypes by establishing the correct progenitor domains (By similarity). Acts as a transcriptional repressor of NFATC1- mediated gene expression (By similarity).
Cellular Location	Nucleus {ECO:0000250 UniProtKB:P63015}. [Isoform 5a]: Nucleus {ECO:0000250 UniProtKB:P63016}
Tissue Location	[Isoform 1]: Expressed in lymphoblasts.

Background

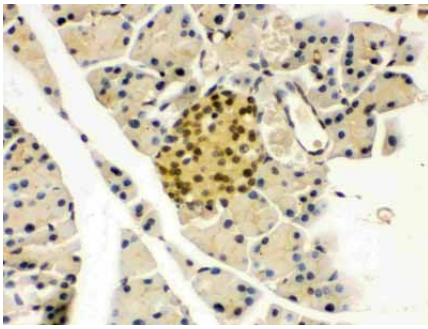
Paired box protein Pax-6, also known as aniridia type II protein (AN2) or oculorhombin, is a protein that in humans is encoded by the PAX6 gene. This gene encodes a homeobox and paired domain-containing protein that binds DNA and functions as a regulator of transcription. Activity of this protein is key in the development of neural tissues, particularly the eye. In addition, this gene is regulated by multiple enhancers located up to hundreds of kilobases distant from this locus. Mutations in this gene or in the enhancer regions can cause ocular disorders such as aniridia and Peter's anomaly. Use of alternate promoters and alternative splicing result in multiple transcript variants encoding different isoforms.

Images

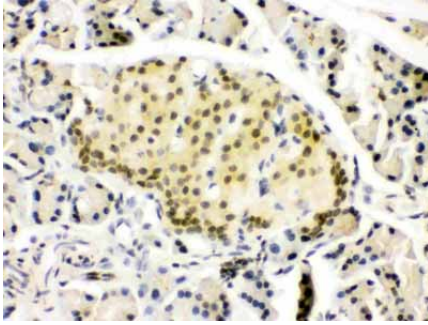


Anti- PAX6 Picoband antibody, ABO12454, Western blotting
All lanes: Anti PAX6 (ABO12454) at 0.5ug/ml
Lane 1: Rat Brain Tissue Lysate at 50ug
Lane 2: Mouse Brain Tissue Lysate at 50ug
Lane 3: U87 Whole Cell Lysate at 40ug
Lane 4: HELA Whole Cell Lysate at 40ug
Predicted bind size: 47KD
Observed bind size: 47KD

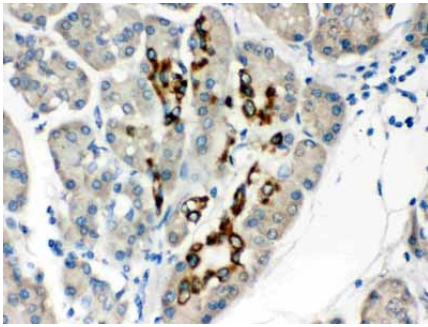
Anti- PAX6 Picoband antibody, ABO12454, IHC(P)
IHC(P): Mouse Pancreas Tissue



Anti- PAX6 Picoband antibody, ABO12454, IHC(P)IHC(P):
Rat Pancreas Tissue



Anti- PAX6 Picoband antibody, ABO12454, IHC(P)IHC(P):
Human Pancreatic Cancer Tissue



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