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

Anti-PTP4A2 Picoband Antibody

Catalog # ABO12426

Specification

Anti-PTP4A2 Picoband Antibody - Product Information

Application	**WB, IHC**
Primary Accession	Q12974
Host	**Rabbit**
Reactivity	**Human, Mouse, Rat**
Clonality	**Polyclonal**
Format	**Lyophilized**

Description
Rabbit IgG polyclonal antibody for Protein tyrosine phosphatase type IVA 2(PTP4A2) detection. Tested with WB, IHC-P in Human;Mouse;Rat.

Reconstitution
Add 0.2ml of distilled water will yield a concentration of 500ug/ml.

Anti-PTP4A2 Picoband Antibody - Additional Information

Gene ID 8073

Other Names
Protein tyrosine phosphatase type IVA 2, 3.1.3.48, HU-PP-1, OV-1, PTP(CAAXII), Protein-tyrosine phosphatase 4a2, Protein-tyrosine phosphatase of regenerating liver 2, PRL-2, PTP4A2, PRL2, PTPCAAX2

Calculated MW
19127 MW KDa

Application Details
Immunohistochemistry(Paraffin-embedded Section), 0.5-1 µg/ml, Human, By Heat

Western blot, 0.1-0.5 µg/ml, Human, Mouse, Rat

Subcellular Localization
Cell membrane. Early endosome. Cytoplasm.

Tissue Specificity
Ubiquitously expressed, with highest levels in skeletal muscle, heart and thymus. Overexpressed in prostate tumor tissue. .

Protein Name
Protein tyrosine phosphatase type IVA 2

Contents
Each vial contains 5mg BSA, 0.9mg NaCl, 0.2mg Na2HPO4, 0.05mg NaN3.

Immunogen
A synthetic peptide corresponding to a sequence at the N-terminus of human PTP4A2 (40-69aa

TTLVRVCDATYDKAPVEKEGIHVLDWPFDD), 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 r˚Constitution, 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.**

Anti-PTP4A2 Picoband Antibody - Protein Information

Name PTP4A2

Synonyms PRL2, PTPCAAX2

Function
Protein tyrosine phosphatase which stimulates progression from G1 into S phase during mitosis. Promotes tumors. Inhibits geranylgeranyl transferase type II activity by blocking the association between RABGGTA and RABGGTB.

Cellular Location
Cell membrane. Early endosome. Cytoplasm.

Tissue Location
Ubiquitously expressed, with highest levels in skeletal muscle, heart and thymus. Overexpressed in prostate tumor tissue.

Anti-PTP4A2 Picoband 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 Cytomety
- Cell Culture

Anti-PTP4A2 Picoband Antibody - Images

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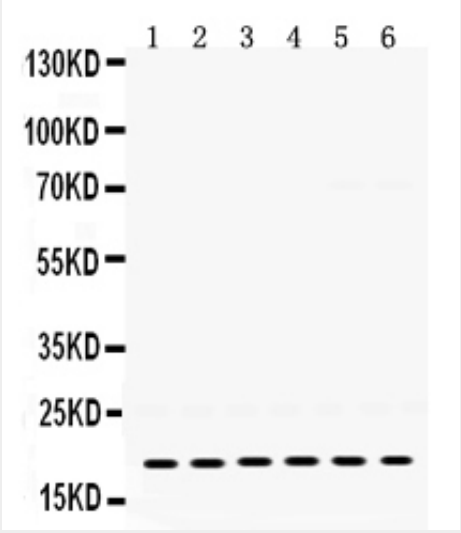
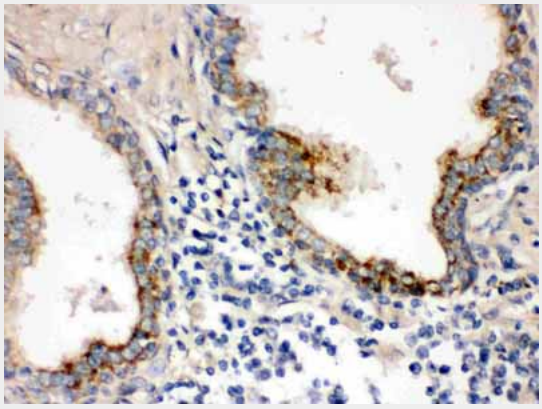


Anti- PTP4A2 Picoband antibody, ABO12426, Western blottingAll lanes: Anti PTP4A2 (ABO12426) at 0.5ug/mlLane 1: Rat Skeletal Muscle Tissue Lysate at 50ugLane 2: Rat Thymus Tissue Lysate at 50ugLane 3: Mouse Brain Tissue Lysate at 50ugLane 4: Mouse Thymus Tissue Lysate at 50ugLane 5: 22RV1 Whole Cell Lysate at 40ugLane 6: MCF-7 Whole Cell Lysate at 40ugPredicted bind size: 19KDObserved bind size: 19KD



Anti- PTP4A2 Picoband antibody, ABO12426, IHC(P)IHC(P): Human Prostatic Cancer Tissue

Anti-PTP4A2 Picoband Antibody - Background

Protein tyrosine phosphatase type IVA 2 is an enzyme that in humans is encoded by the PTP4A2 gene. The protein encoded by this gene belongs to a small class of the protein tyrosine phosphatase (PTP) family. PTPs are cell signaling molecules that play regulatory roles in a variety of cellular processes. PTPs in this class contain a protein tyrosine phosphatase catalytic domain and a characteristic C-terminal prenylation motif. This PTP has been shown to primarily associate with plasmic and endosomal membrane through its C-terminal prenylation. This PTP was found to interact with the beta-subunit of Rab geranylgeranyltransferase II (beta GGT II), and thus may function as a regulator of GGT II activity. Overexpression of this gene in mammalian cells conferred a transformed phenotype, which suggested its role in tumorigenesis. Alternatively spliced transcript variants have been described. Related pseudogenes exist on chromosomes 11, 12 and 17.