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Anti-UPF3B/RENT3B Picoband Antibody

Catalog # ABO12529

Specification

Anti-UPF3B/RENT3B Picoband Antibody - Product Information

Application	**WB, IHC-P**
Primary Accession	Q9BZI7
Host	**Rabbit**
Reactivity	**Human, Mouse, Rat**
Clonality	**Polyclonal**
Format	**Lyophilized**

Description
Rabbit IgG polyclonal antibody for Regulator of nonsense transcripts 3B(UPF3B) 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-UPF3B/RENT3B Picoband Antibody - Additional Information

Gene ID 65109

Other Names
Regulator of nonsense transcripts 3B, Nonsense mRNA reducing factor 3B, Up-frameshift suppressor 3 homolog B, hUpf3B, Up-frameshift suppressor 3 homolog on chromosome X, hUpf3p-X, UPF3B, RENT3B, UPF3X

Calculated MW
57762 MW KDa

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, Rat

Subcellular Localization
Nucleus. Cytoplasm. Shuttling between the nucleus and the cytoplasm.

Tissue Specificity
Expressed in testis, uterus, prostate, heart, muscle, brain, spinal cord and placenta. .

Protein Name
Regulator of nonsense transcripts 3B

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 C-terminus of human UPF3B /RENT3B (416-452aa SEKTEKKEEVVKRDRIRNKDRPAMQLYQPGARSRNRL).

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-UPF3B/RENT3B Picoband Antibody - Protein Information

Name UPF3B (HGNC:20439)

Function
Involved in nonsense-mediated decay (NMD) of mRNAs containing premature stop codons by associating with the nuclear exon junction complex (EJC) and serving as link between the EJC core and NMD machinery. Recruits UPF2 at the cytoplasmic side of the nuclear envelope and the subsequent formation of an UPF1-UPF2-UPF3 surveillance complex (including UPF1 bound to release factors at the stalled ribosome) is believed to activate NMD. In cooperation with UPF2 stimulates both ATPase and RNA helicase activities of UPF1. Binds spliced mRNA upstream of exon-exon junctions. In vitro, stimulates translation; the function is independent of association with UPF2 and components of the EJC core.

Cellular Location
Nucleus. Cytoplasm Note=Shuttling between the nucleus and the cytoplasm

Tissue Location
Expressed in testis, uterus, prostate, heart, muscle, brain, spinal cord and placenta.

Anti-UPF3B/RENT3B 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-UPF3B/RENT3B Picoband Antibody - Images

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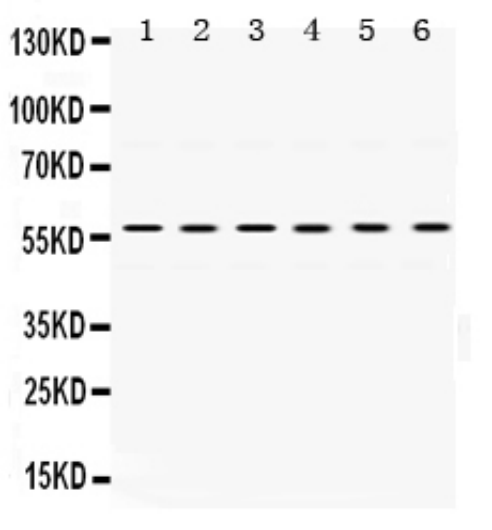
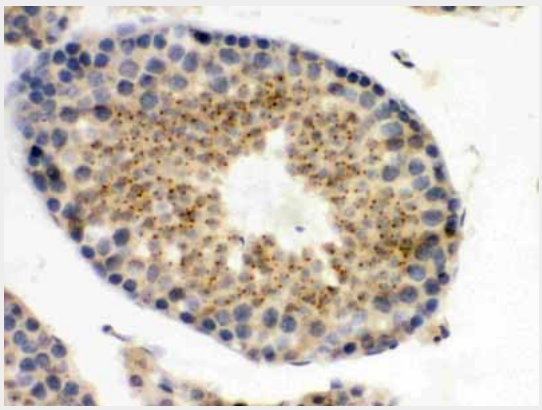
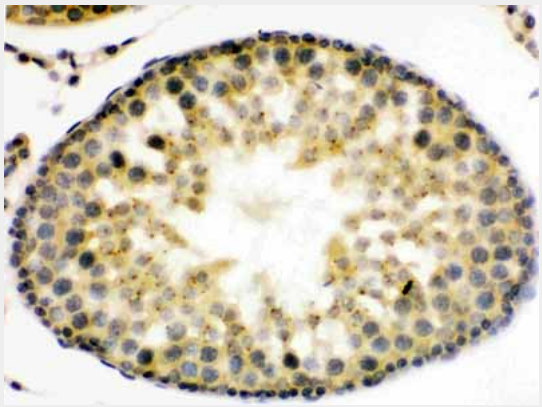


Anti- UPF3B/RENT3B Picoband antibody, ABO12529, Western blottingAll lanes: Anti UPF3B/RENT3B (ABO12529) at 0.5ug/mlLane 1: Rat Cardiac Muscle Tissue Lysate at 50ugLane 2: Rat Brain Tissue Lysate at 50ugLane 3: HELA Whole Cell Lysate at 40ugLane 4: 22RV1 Whole Cell Lysate at 40ugLane 5: U87 Whole Cell Lysate at 40ugLane 6: JURKAT Whole Cell Lysate at 40ugPredicted bind size: 58KDObserved bind size: 58KD



Anti- UPF3B/RENT3B Picoband antibody, ABO12529, IHC(P)IHC(P): Mouse Testis Tissue



Anti- UPF3B/RENT3B Picoband antibody, ABO12529, IHC(P)IHC(P): Rat Testis Tissue

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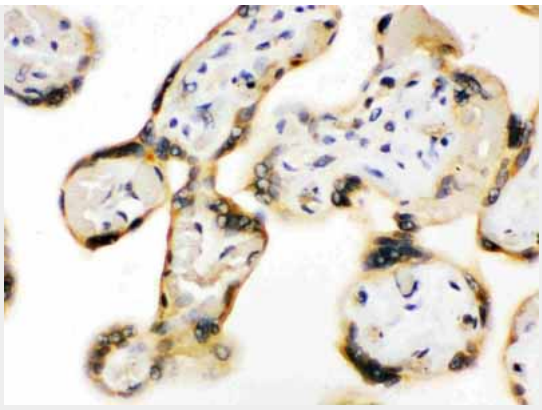

Anti- UPF3B/RENT3B Picoband antibody, ABO12529, IHC(P)IHC(P): Human Placenta Tissue

Anti-UPF3B/RENT3B Picoband Antibody - Background

Regulator of nonsense transcripts 3B is a protein that in humans is encoded by the UPF3B gene. This gene encodes a protein that is part of a post-splicing multiprotein complex involved in both mRNA nuclear export and mRNA surveillance. The encoded protein is one of two functional homologs to yeast Upf3p. mRNA surveillance detects exported mRNAs with truncated open reading frames and initiates nonsense-mediated mRNA decay (NMD). When translation ends upstream from the last exon-exon junction, this triggers NMD to degrade mRNAs containing premature stop codons. This protein binds to the mRNA and remains bound after nuclear export, acting as a nucleocytoplasmic shuttling protein. It forms with Y14 a complex that binds specifically 20 nt upstream of exon-exon junctions. This gene is located on the long arm of chromosome X. Two splice variants encoding different isoforms have been found for this gene.