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

# PREPL Antibody (C-term)

Affinity Purified Rabbit Polyclonal Antibody (Pab)
Catalog # AP5565b

## Product Information

| | |
|---|---|
| **Application** | WB, IHC-P, E |
| **Primary Accession** | Q4J6C6 |
| **Other Accession** | Q5HZA6, Q8C167, A5LFV8, NP_006027.2 |
| **Reactivity** | Human, Hamster, Mouse |
| **Predicted** | Monkey, Rat, Bovine, Canine, Rabbit, Chicken |
| **Host** | Rabbit |
| **Clonality** | Polyclonal |
| **Isotype** | Rabbit IgG |
| **Clone Names** | RB26878 |
| **Calculated MW** | 83927 |
| **Antigen Region** | 624-652 |

## Additional Information

| | |
|---|---|
| **Gene ID** | 9581 |
| **Other Names** | Prolyl endopeptidase-like, 3421-, Prolylendopeptidase-like, PREPL, KIAA0436 |
| **Target/Specificity** | This PREPL antibody is generated from rabbits immunized with a KLH conjugated synthetic peptide between 624-652 amino acids from the C-terminal region of human PREPL. |
| **Dilution** | WB~~1:1000 IHC-P~~1:100~500 E~~Use at an assay dependent concentration. |
| **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** | PREPL Antibody (C-term) is for research use only and not for use in diagnostic or therapeutic procedures. |

## Protein Information

| | |
|---|---|
| **Name** | PREPL |
| **Synonyms** | KIAA0436 |
| **Function** | Serine peptidase whose precise substrate specificity remains unclear |

| | |
|---|---|
| | (PubMed:16143824, PubMed:16385448, PubMed:28726805). Does not cleave peptides after a arginine or lysine residue (PubMed:16143824). Regulates trans-Golgi network morphology and sorting by regulating the membrane binding of the AP-1 complex (PubMed:23321636). May play a role in the regulation of synaptic vesicle exocytosis (PubMed:24610330). |
| **Cellular Location** | Cytoplasm, cytosol. Golgi apparatus, trans-Golgi network {ECO:0000250\|UniProtKB:Q8C167}. Cytoplasm, cytoskeleton {ECO:0000250\|UniProtKB:Q8C167}. Golgi apparatus {ECO:0000250\|UniProtKB:Q8C167}. Nucleus Note=Co-localizes with AP-1 in the trans-Golgi network (By similarity) Co-localizes with MAP2 and ACTB on the cytoskeleton (By similarity) Co-localizes with STX6 and GOSR2 at the Golgi apparatus (By similarity). {ECO:0000250\|UniProtKB:Q8C167} |
| **Tissue Location** | Expressed in pyramidal neurons of the temporal cortex and neocortex (at protein level) (PubMed:23485813). Widely expressed (PubMed:15913950, PubMed:16385448). Expressed at higher level in brain, skeletal muscle, heart and kidney (PubMed:15913950, PubMed:16385448). Expressed at the endplates in the neuromuscular junction (PubMed:24610330). |

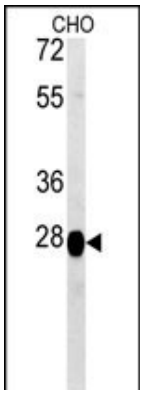
## Background

The protein encoded by this gene belongs to the prolyl oligopeptidase subfamily of serine peptidases. Mutations in this gene have been associated with hypotonia-cystinuria syndrome, also known as the 2p21 deletion syndrome.

## References

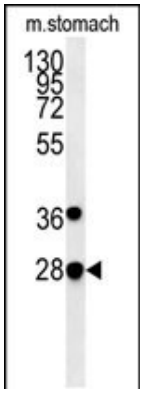

Parvari, R., et al. Genomics 86(2):195-211(2005)
Kim, D.K., et al. Biochim. Biophys. Acta 1565(1):112-121(2002)
Parvari, R., et al. Am. J. Hum. Genet. 69(4):869-875(2001)
Robertson, N.G., et al. Genomics 23(1):42-50(1994)

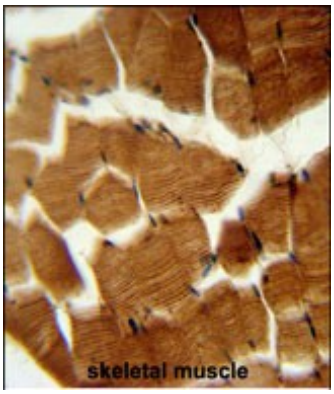

## Images




PREPL Antibody (C-term) (Cat. #AP5565b) western blot analysis in CHO cell line lysates (15ug/lane).This demonstrates the PREPL antibody detected the PREPL protein (arrow).

PREPL Antibody (C-term) (Cat. #AP5565b) western blot analysis in mouse stomach tissue lysates (15ug/lane).This demonstrates the PREPL antibody detected the PREPL protein (arrow).




PREPL Antibody (C-term) (Cat. #AP5565b) immunohistochemistry analysis in formalin fixed and paraffin embedded human skeletal muscle followed by peroxidase conjugation of the secondary antibody and DAB staining. This data demonstrates the use of the PREPL Antibody (C-term) for immunohistochemistry. Clinical relevance has not been evaluated.

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