

## **CAPN6 Antibody (Center)**

Affinity Purified Rabbit Polyclonal Antibody (Pab) Catalog # AP12546c

## Specification

# **CAPN6 Antibody (Center) - Product Information**

Application Primary Accession Other Accession Reactivity Predicted Host Clonality Isotype Calculated MW Antigen Region IHC-P, WB,E <u>O9Y6O1</u> <u>088501</u>, <u>035646</u>, <u>NP\_055104.2</u> Human Mouse, Rat Rabbit Polyclonal Rabbit IgG 74576 390-419

# **CAPN6 Antibody (Center) - Additional Information**

Gene ID 827

**Other Names** Calpain-6, Calpain-like protease X-linked, Calpamodulin, CalpM, CAPN6, CALPM, CANPX

#### Target/Specificity

This CAPN6 antibody is generated from rabbits immunized with a KLH conjugated synthetic peptide between 390-419 amino acids from the Central region of human CAPN6.

**Dilution** IHC-P~~1:10~50 WB~~1:1000 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

CAPN6 Antibody (Center) is for research use only and not for use in diagnostic or therapeutic procedures.

### CAPN6 Antibody (Center) - Protein Information

Name CAPN6



# Synonyms CALPM, CANPX

**Function** Microtubule-stabilizing protein that may be involved in the regulation of microtubule dynamics and cytoskeletal organization. May act as a regulator of RAC1 activity through interaction with ARHGEF2 to control lamellipodial formation and cell mobility. Does not seem to have protease activity as it has lost the active site residues (By similarity).

### **Cellular Location**

Cytoplasm, perinuclear region. Cytoplasm, cytoskeleton, spindle. Note=During mitose associated with the mitotic spindle. At telophase colocalized to the midbody spindle

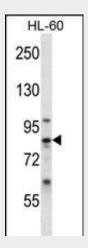
**Tissue Location** Expressed only in placenta.

# **CAPN6 Antibody (Center) - Protocols**

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

- <u>Western Blot</u>
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- <u>Immunofluorescence</u>
- Immunoprecipitation
- Flow Cytomety
- <u>Cell Culture</u>

CAPN6 Antibody (Center) - Images



CAPN6 Antibody (Center) (Cat. #AP12546c) western blot analysis in HL-60 cell line lysates (35ug/lane). This demonstrates the CAPN6 antibody detected the CAPN6 protein (arrow).





CAPN6 Antibody (Center) (Cat. #AP12546c)immunohistochemistry analysis in formalin fixed and paraffin embedded human placenta tissue followed by peroxidase conjugation of the secondary antibody and DAB staining. This data demonstrates the use of CAPN6 Antibody (Center) for immunohistochemistry. Clinical relevance has not been evaluated.

# CAPN6 Antibody (Center) - Background

Calpains are ubiquitous, well-conserved family of calcium-dependent, cysteine proteases. The calpain proteins are heterodimers consisting of an invariant small subunit and variable large subunits. The large subunit possesses a cysteine protease domain, and both subunits possess calcium-binding domains. Calpains have been implicated in neurodegenerative processes, as their activation can be triggered by calcium influx and oxidative stress. The protein encoded by this gene is highly expressed in the placenta. Its C-terminal region lacks any homology to the calmodulin-like domain of other calpains. The protein lacks critical active site residues and thus is suggested to be proteolytically inactive. The protein may play a role in tumor formation by inhibiting apoptosis and promoting angiogenesis.

# **CAPN6 Antibody (Center) - References**

Bailey, S.D., et al. Diabetes Care 33(10):2250-2253(2010) Secolin, R., et al. Psychiatr. Genet. 20(3):126-129(2010) Talmud, P.J., et al. Am. J. Hum. Genet. 85(5):628-642(2009) Rho, S.B., et al. Cancer Lett. 271(2):306-313(2008) Rojas, F.J., et al. Mol. Hum. Reprod. 5(6):520-526(1999)