

# **CAPN2** Antibody

Purified Mouse Monoclonal Antibody (Mab) Catalog # AW5279

#### **Product Information**

**Application** IHC-P, FC, WB **Primary Accession** P17655 Reactivity Human, Rat **Predicted** Mouse Host Mouse Clonality monoclonal **Calculated MW** 79995 Isotype IgG2b **Antigen Source HUMAN** 

## **Additional Information**

Gene ID 824

Other Names Calpain-2 catalytic subunit, Calcium-activated neutral proteinase 2, CANP 2,

Calpain M-type, Calpain large polypeptide L2, Calpain-2 large subunit,

Millimolar-calpain, M-calpain, CAPN2, CANPL2

**Dilution** IHC-P~~1:100~500 FC~~1:100 WB~~1:1000

**Target/Specificity** This CAPN2 antibody is generated from a mouse immunized with a KLH

conjugated synthetic peptide between amino acids from the human region of

human CAPN2.

**Format** Purified monoclonal antibody supplied in PBS with 0.09% (W/V) sodium azide.

This antibody is purified through a protein G column, followed by dialysis

against PBS.

**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** CAPN2 Antibody is for research use only and not for use in diagnostic or

therapeutic procedures.

#### **Protein Information**

Name CAPN2

Synonyms CANPL2

**Function** Calcium-regulated non-lysosomal thiol-protease which catalyzes limited

proteolysis of substrates involved in cytoskeletal remodeling and signal transduction. Proteolytically cleaves MYOC at 'Arg-226' (PubMed:<u>17650508</u>). Proteolytically cleaves CPEB3 following neuronal stimulation which abolishes CPEB3 translational repressor activity, leading to translation of CPEB3 target mRNAs (By similarity).

**Cellular Location** Cytoplasm. Cell membrane. Note=Translocates to the plasma membrane

upon Ca(2+) binding

Tissue Location Ubiquitous.

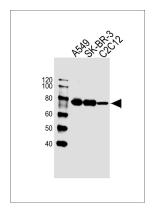
## **Background**

Calcium-regulated non-lysosomal thiol-protease which catalyze limited proteolysis of substrates involved in cytoskeletal remodeling and signal transduction.

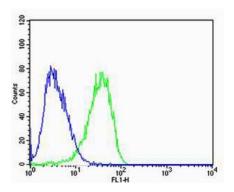
## References

Imajoh S.,et al.Biochemistry 27:8122-8128(1988). Ye Z.,et al.Biochem. Biophys. Res. Commun. 275:223-227(2000). Ota T.,et al.Nat. Genet. 36:40-45(2004). Gregory S.G.,et al.Nature 441:315-321(2006). Hata A.,et al.J. Biol. Chem. 264:6404-6411(1989).

# **Images**

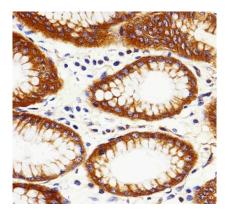


Western blot analysis of lysates from A549,SK-BR-3,mouse C2C12 cell line (from left to right), using CAPN2 Antibody(cat. #AW5279). AW5279 was diluted at 1:1000 at each lane. A goat anti-mouse IgG H&L(HRP) at 1:10000 dilution was used as the secondary antibody.



Flow cytometric analysis of U-87 MG cells using CAPN2 Antibody(green, Cat#AW5279) compared to an isotype control of mouse IgG2b(blue). AP20600c was diluted at 1:100 dilution. An Alexa Fluor® 488 goat anti-mouse IgG at 1:400 dilution was used as the secondary antibody.

Immunohistochemical analysis of paraffin-embedded H.stomach section using CAPN2 Antibody(Cat#AW5279). AW5279 was diluted at 1:25 dilution. A peroxidase-conjugated goat anti-mouse IgG at 1:400 dilution was used as the secondary antibody, followed by DAB staining.



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