

# PPP3CC Antibody (N-term)

Purified Rabbit Polyclonal Antibody (Pab) Catalog # AP8465a

## **Specification**

# PPP3CC Antibody (N-term) - Product Information

**Application** IHC-P, WB,E **Primary Accession** P48454 Other Accession PPP3CC Reactivity Human Host **Rabbit** Clonality **Polyclonal** Isotype Rabbit IgG Calculated MW 58129 Antigen Region 18-47

## PPP3CC Antibody (N-term) - Additional Information

#### **Gene ID 5533**

#### **Other Names**

Serine/threonine-protein phosphatase 2B catalytic subunit gamma isoform, CAM-PRP catalytic subunit, Calcineurin, testis-specific catalytic subunit, Calmodulin-dependent calcineurin A subunit gamma isoform, PPP3CC, CALNA3, CNA3

## Target/Specificity

This PPP3CC antibody is generated from rabbits immunized with a KLH conjugated synthetic peptide between 18-47 amino acids from the N-terminal region of human PPP3CC.

#### **Dilution**

IHC-P~~1:50~100 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 prepared by Saturated Ammonium Sulfate (SAS) precipitation followed by dialysis against PBS.

#### Storage

Maintain refrigerated at  $2-8^{\circ}$ C for up to 2 weeks. For long term storage store at  $-20^{\circ}$ C in small aliquots to prevent freeze-thaw cycles.

## **Precautions**

PPP3CC Antibody (N-term) is for research use only and not for use in diagnostic or therapeutic procedures.

#### PPP3CC Antibody (N-term) - Protein Information



## Name PPP3CC

## Synonyms CALNA3, CNA3

**Function** Calcium-dependent, calmodulin-stimulated protein phosphatase which plays an essential role in the transduction of intracellular Ca(2+)-mediated signals. Dephosphorylates and activates transcription factor NFATC1. Dephosphorylates and inactivates transcription factor ELK1. Dephosphorylates DARPP32.

# **Cellular Location**

Mitochondrion {ECO:0000250|UniProtKB:P48455}. Note=Localizes in the mitochondria in a SPATA33-dependent manner {ECO:0000250|UniProtKB:P48455}

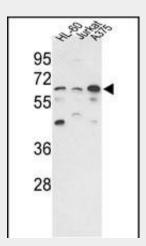
**Tissue Location Testis...** 

## PPP3CC Antibody (N-term) - Protocols

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

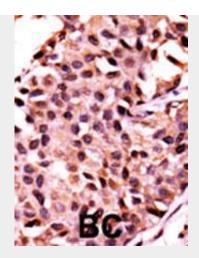
- Western Blot
- Blocking Peptides
- Dot Blot
- <u>Immunohistochemistry</u>
- Immunofluorescence
- <u>Immunoprecipitation</u>
- Flow Cytomety
- Cell Culture

# PPP3CC Antibody (N-term) - Images



Western blot analysis of hPPP3CC-E33 (Cat. #AP8465a) in HL-60, Jurkat, A375 cell line lysates (35ug/lane). PPP3CC (arrow) was detected using the purified Pab.





Formalin-fixed and paraffin-embedded human cancer tissue reacted with the primary antibody, which was peroxidase-conjugated to the secondary antibody, followed by AEC staining. This data demonstrates the use of this antibody for immunohistochemistry; clinical relevance has not been evaluated. BC = breast carcinoma; HC = hepatocarcinoma.

## PPP3CC Antibody (N-term) - Background

Calmodulin-dependent protein phosphatase, calcineurin, is involved in a wide range of biologic activities, acting as a Ca(2+)-dependent modifier of phosphorylation status. In testis, the motility of the sperm is thought to be controlled by cAMP-dependent phosphorylation and a unique form of calcineurin appears to be associated with the flagellum. The calcineurin holoenzyme is composed of catalytic and regulatory subunits of 60 and 18 kD, respectively. At least 3 genes, calcineurin A-alpha, calcineurin A-beta, and calcineurin A-gamma (CALNA3), have been cloned for the catalytic subunit. These genes have been identified in humans, mice, and rats, and are highly conserved between species (90 to 95% amino acid identity).

## PPP3CC Antibody (N-term) - References

Eastwood, S.L., et al., Biol. Psychiatry 57(7):702-710 (2005). Gerber, D.J., et al., Proc. Natl. Acad. Sci. U.S.A. 100(15):8993-8998 (2003). Bennasser, Y., et al., Virology 303(1):174-180 (2002). Esau, C., et al., J. Exp. Med. 194(10):1449-1459 (2001). Muramatsu, T., et al., Biochem. Biophys. Res. Commun. 188(1):265-271 (1992).