

CAMK2N2 Antibody (N-term) Blocking peptide
Synthetic peptide
Catalog # BP11140a**Specification**

CAMK2N2 Antibody (N-term) Blocking peptide - Product InformationPrimary Accession [Q96S95](#)**CAMK2N2 Antibody (N-term) Blocking peptide - Additional Information****Gene ID** 94032**Other Names**

Calcium/calmodulin-dependent protein kinase II inhibitor 2, CaM-KII inhibitory protein, CaM-KIIN, CAMK2N2

Format

Peptides are lyophilized in a solid powder format. Peptides can be reconstituted in solution using the appropriate buffer as needed.

Storage

Maintain refrigerated at 2-8°C for up to 6 months. For long term storage store at -20°C.

Precautions

This product is for research use only. Not for use in diagnostic or therapeutic procedures.

CAMK2N2 Antibody (N-term) Blocking peptide - Protein Information**Name** CAMK2N2**Function**

Potent and specific cellular inhibitor of CaM-kinase II (CAMK2) (PubMed:11444830). Traps Ca(2+)/calmodulin on CAMK2 (By similarity).

Cellular Location

Nucleus {ECO:0000250|UniProtKB:Q9Z2N6}. Cytoplasm, cytosol {ECO:0000250|UniProtKB:Q9Z2N6}. Synapse {ECO:0000250|UniProtKB:Q78WH7}. Note=Excluded from nucleus when coexpressed with activated CAMK2. {ECO:0000250|UniProtKB:Q9Z2N6}

Tissue Location

Highly Expressed in keyhole limpet hemocyanin- stimulated dendritic cell (DC) and weakly expressed in unstimulated mature and immature DC (PubMed:11444830). Highly expressed in kidney and liver (PubMed:11444830). Moderately expressed in heart, skeletal muscle, and placenta (PubMed:11444830). Weakly expressed in the small intestine (PubMed:11444830).

CAMK2N2 Antibody (N-term) Blocking peptide - Protocols

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

- [Blocking Peptides](#)

CAMK2N2 Antibody (N-term) Blocking peptide - Images**CAMK2N2 Antibody (N-term) Blocking peptide - Background**

This gene encodes a protein that is highly similar to the rat CaM-KII inhibitory protein, an inhibitor of calcium/calmodulin-dependent protein kinase II (CAMKII). CAMKII regulates numerous physiological functions, including neuronal synaptic plasticity through the phosphorylation of α -amino-3-hydroxy-5-methyl-4-isoxazolepropionic acid-type glutamate (AMPA) receptors. Studies of the similar protein in rats suggest that this protein may function as a negative regulator of CaM-KII and may act to inhibit the phosphorylation of AMPA receptors.

CAMK2N2 Antibody (N-term) Blocking peptide - References

Ma, S., et al. J. Biol. Chem. 284(37):24773-24782(2009) Okabe, T., et al. J. Biol. Chem. 278(11):9920-9927(2003) Zhang, J., et al. Biochem. Biophys. Res. Commun. 285(2):229-234(2001) Chang, B.H., et al. Proc. Natl. Acad. Sci. U.S.A. 95(18):10890-10895(1998)