

CTNA1 Antibody (N-term) Blocking Peptide

Synthetic peptide Catalog # BP6582a

Specification

CTNA1 Antibody (N-term) Blocking Peptide - Product Information

Primary Accession <u>P35221</u>

CTNA1 Antibody (N-term) Blocking Peptide - Additional Information

Gene ID 1495

Other Names

Catenin alpha-1, Alpha E-catenin, Cadherin-associated protein, Renal carcinoma antigen NY-REN-13, CTNNA1

Target/Specificity

The synthetic peptide sequence used to generate the antibody AP6582a was selected from the N-term region of human CTNA1. A 10 to 100 fold molar excess to antibody is recommended. Precise conditions should be optimized for a particular assay.

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.

CTNA1 Antibody (N-term) Blocking Peptide - Protein Information

Name CTNNA1

CTNA1 Antibody (N-term) Blocking Peptide - Background

CTNA1 associates with the cytoplasmic domain of a variety of cadherins. The association of catenins to cadherins produces a complex which is linked to the actin filament network, and which seems to be of primary importance for cadherins cell-adhesion properties. The protein may play a crucial role in cell differentiation.

CTNA1 Antibody (N-term) Blocking Peptide - References

Inge,L.J., Mol. Cancer Ther. 7 (6), 1386-1397 (2008)Merdek,K.D., Biochem. Biophys. Res. Commun. 366 (3), 717-723 (2008)



Function

Associates with the cytoplasmic domain of a variety of cadherins. The association of catenins to cadherins produces a complex which is linked to the actin filament network, and which seems to be of primary importance for cadherins cell-adhesion properties. Can associate with both E- and N-cadherins. Originally believed to be a stable component of E-cadherin/catenin adhesion complexes and to mediate the linkage of cadherins to the actin cytoskeleton at adherens junctions. In contrast, cortical actin was found to be much more dynamic than E-cadherin/catenin complexes and CTNNA1 was shown not to bind to F-actin when assembled in the complex suggesting a different linkage between actin and adherens junctions components. The homodimeric form may regulate actin filament assembly and inhibit actin branching by competing with the Arp2/3 complex for binding to actin filaments. Involved in the regulation of WWTR1/TAZ, YAP1 and TGFB1- dependent SMAD2 and SMAD3 nuclear accumulation (By similarity). May play a crucial role in cell differentiation.

Cellular Location

[Isoform 1]: Cytoplasm, cytoskeleton. Cell junction, adherens junction. Cell membrane; Peripheral membrane protein; Cytoplasmic side. Cell junction. Note=Found at cell-cell boundaries and probably at cell-matrix boundaries

Tissue Location

Expressed ubiquitously in normal tissues.

CTNA1 Antibody (N-term) Blocking Peptide - Protocols

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

• Blocking Peptides