

### Anti-Catenin alpha 1/2 Antibody

**Catalog # AP53662** 

# **Specification**

# Anti-Catenin alpha 1/2 Antibody - Product Information

Application WB, IHC
Primary Accession P35221
Other Accession P26232

Reactivity Human, Mouse, Rat

Host Rabbit
Clonality Polyclonal
Calculated MW 100071

#### Anti-Catenin alpha 1/2 Antibody - Additional Information

**Gene ID 1495** 

#### **Other Names**

CTNNA1; Catenin alpha-1; Alpha E-catenin; Cadherin-associated protein; Renal carcinoma antigen NY-REN-13; CTNNA2; CAPR; Catenin alpha-2; Alpha N-catenin; Alpha-catenin-related protein

### **Target/Specificity**

Recognizes endogenous levels of Catenin alpha 1/2 protein.

### **Dilution**

WB~~1/500 - 1/1000 IHC~~1:100~500

#### **Format**

Liquid in 0.42% Potassium phosphate, 0.87% Sodium chloride, pH 7.3, 30% glycerol, and 0.09% (W/V) sodium azide.

#### Storage

Store at -20 °C. Stable for 12 months from date of receipt

### Anti-Catenin alpha 1/2 Antibody - Protein Information

Name CTNNA1 (HGNC:2509)

#### **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**

Cytoplasm, cytoskeleton {ECO:0000250|UniProtKB:P26231}. Cell junction, adherens junction. Cell membrane {ECO:0000250|UniProtKB:P26231}; Peripheral membrane protein; Cytoplasmic side {ECO:0000250|UniProtKB:P26231}. Cell junction Cytoplasm {ECO:0000250|UniProtKB:Q9PVF8}. Nucleus. Note=Found at cell-cell boundaries and probably at cell-matrix boundaries. {ECO:0000250|UniProtKB:P26231}

#### **Tissue Location**

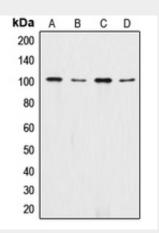
[Isoform 1]: Ubiquitously expressed in normal tissues.

# Anti-Catenin alpha 1/2 Antibody - Protocols

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

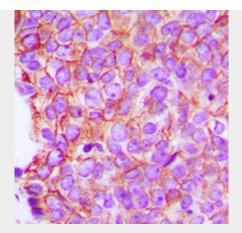
- Western Blot
- Blocking Peptides
- Dot Blot
- <u>Immunohistochemistry</u>
- Immunofluorescence
- <u>Immunoprecipitation</u>
- Flow Cytomety
- Cell Culture

### Anti-Catenin alpha 1/2 Antibody - Images



Western blot analysis of Catenin alpha 1/2 expression in MCF7 (A), A431 (B), SHSY5Y (C), PC12 (D) whole cell lysates.





Immunohistochemical analysis of Catenin alpha 1/2 staining in human breast cancer formalin fixed paraffin embedded tissue section. The section was pre-treated using heat mediated antigen retrieval with sodium citrate buffer (pH 6.0). The section was then incubated with the antibody at room temperature and detected using an HRP conjugated compact polymer system. DAB was used as the chromogen. The section was then counterstained with haematoxylin and mounted with DPX.

# Anti-Catenin alpha 1/2 Antibody - Background

Rabbit polyclonal antibody to Catenin alpha 1/2