10320 Camino Santa Fe, Suite G
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Anti-δ1-Catenin (Tyr-228), Phosphospecific Antibody

Catalog # AN1684

Specification

Anti-δ1-Catenin (Tyr-228), Phosphospecific Antibody - Product Information

Application	**WB**
Primary Accession	O60716
Reactivity	**Bovine**
Host	**Mouse**
Clonality	**Mouse Monoclonal**
Isotype	**IgG1**
Calculated MW	**108170**

Anti-δ1-Catenin (Tyr-228), Phosphospecific Antibody - Additional Information

Gene ID	**1500**

Other Names
pp120 Src substrate, p120

Target/Specificity
Catenins have emerged as molecular sensors that integrate cell-cell junctions and cytoskeletal dynamics with signaling pathways that control morphogenesis and cell to cell communication. δ1-Catenin (p120 catenin) is a catenin family member which contains an N-terminal coiled-coil domain, a regulatory domain containing multiple phosphorylation sites, and a central Armadillo repeat domain. δ1-Catenin regulates E-cadherin turnover, and has both positive and negative effects on cadherin-mediated adhesion. Actin dynamics are also regulated by δ1-Catenin, which can modulate RhoA, Rac and cdc42 activity. δ1-Catenin is phosphorylated at multiple tyrosine, serine and threonine sites both in vitro and in vivo. High levels of δ1-Catenin phosphorylated at Tyr-228 are commonly seen in several carcinoma cell lines and after EGFR activation. Many other tyrosine sites are also phosphorylated in the N-terminal region including Tyr-96, Tyr-112, Tyr-280, and Tyr-302. In addition, Thr-310 and Thr-916 are constituitively phosphorylated in many cell types, however this phosphorylation may occur only in δ1-Catenin associated with the plasma membrane.

Dilution
WB~~1:1000

Format
Protein A Purified

Storage
Maintain refrigerated at 2-8°C for up to 6 months. For long term storage store at -20°C in small aliquots to prevent freeze-thaw cycles.

Precautions
Anti-δ1-Catenin (Tyr-228), Phosphospecific Antibody is for research use only and not for use in diagnostic or therapeutic procedures.

Shipping
Blue Ice

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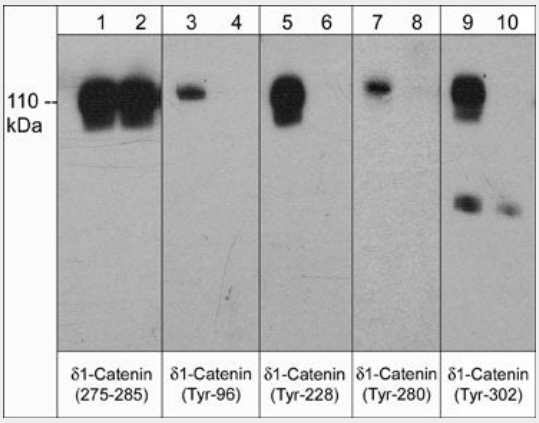
Anti-δ1-Catenin (Tyr-228), Phosphospecific Antibody - Protocols

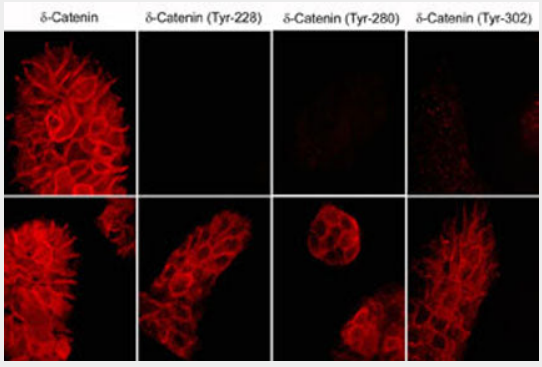
Provided below are standard protocols that you may find useful for product applications.

- Western Blot
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- Cell Culture

Anti-δ1-Catenin (Tyr-228), Phosphospecific Antibody - Images



Western blot analysis of δ1-Catenin phosphorylation in A431 cells stimulated with pervanadate (1 mM) for 30 min. (lanes 1,3,5,7,9). The blot was then treated with alkaline phosphatase (lanes 2,4,6,8,10). Blots were probed with anti-δ1-Catenin (a.a. 275-285) (lanes 1 & 2), anti-δ1-Catenin (Tyr-96) (lanes 3 & 4), anti-δ1-Catenin (Tyr-228) (lanes 5 & 6), anti-δ1-Catenin (Tyr-280) (lanes 7 & 8) or anti-δ1-Catenin (Tyr-302) (lanes 9 & 10).



Immunocytochemical labeling of δ1-Catenin in untreated (Top) or pervanadate-treated (bottom) A431 cells. The cells were labeled with mouse monoclonal δ1-Catenin (a.a. 275-285), δ1-Catenin (Tyr-228), δ1-Catenin (Tyr-280), or δ1-Catenin (Tyr-302) antibodies. The antibodies were detected using donkey anti-mouse secondary antibodies conjugated to Cy3.

Anti-δ1-Catenin (Tyr-228), Phosphospecific Antibody - Background

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dynamics with signaling pathways that control morphogenesis and cell to cell communication. δ1-Catenin (p120 catenin) is a catenin family member which contains an N-terminal coiled-coil domain, a regulatory domain containing multiple phosphorylation sites, and a central Armadillo repeat domain. δ1-Catenin regulates E-cadherin turnover, and has both positive and negative effects on cadherin-mediated adhesion. Actin dynamics are also regulated by δ1-Catenin, which can modulate RhoA, Rac and cdc42 activity. δ1-Catenin is phosphorylated at multiple tyrosine, serine and threonine sites both in vitro and in vivo. High levels of δ1-Catenin phosphorylated at Tyr-228 are commonly seen in several carcinoma cell lines and after EGFR activation. Many other tyrosine sites are also phosphorylated in the N-terminal region including Tyr-96, Tyr-112, Tyr-280, and Tyr-302. In addition, Thr-310 and Thr-916 are constituitively phosphorylated in many cell types, however this phosphorylation may occur only in δ1-Catenin associated with the plasma membrane.