

Anti-δ1-Catenin (Tyr-228), Phosphospecific Antibody Catalog # AN1684

Specification

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

Application	WB
Primary Accession	<u>O60716</u>
Reactivity	Bovine
Host	Mouse
Clonality	Mouse Monoclonal
Isotype	IgG1
Calculated MW	108170
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Anti-61-Catenin (Tyr-228), Phosphospecific Antibody - Additional Information

Gene ID Other Names pp120 Src substrate, p120 1500

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. δ 1-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. δ 1-Catenin regulates E-cadherin turnover, and has both positive and negative effects on cadherin-mediated adhesion. Actin dynamics are also regulated by δ 1-Catenin, which can modulate RhoA, Rac and cdc42 activity. δ 1-Catenin is phosphorylated at multiple tyrosine, serine and threonine sites both in vitro and in vivo. High levels of δ 1-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 δ 1-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

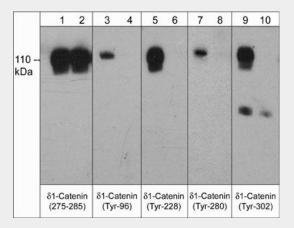


Anti-δ1-Catenin (Tyr-228), Phosphospecific Antibody - Protocols

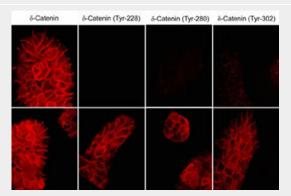
Provided below are standard protocols that you may find useful for product applications.

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

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



Western blot analysis of δ 1-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- δ 1-Catenin (a.a. 275-285) (lanes 1 & 2), anti- δ 1-Catenin (Tyr-96) (lanes 3 & 4), anti- δ 1-Catenin (Tyr-228) (lanes 5 & 6), anti- δ 1-Catenin (Tyr-280) (lanes 7 & 8) or anti- δ 1-Catenin (Tyr-302) (lanes 9 & 10).



Immunocytochemical labeling of δ 1-Catenin in untreated (Top) or pervanadate-treated (bottom) A431 cells. The cells were labeled with mouse monoclonal δ 1-Catenin (a.a. 275-285), δ 1-Catenin (Tyr-228), δ 1-Catenin (Tyr-280), or δ 1-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

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. δ 1-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. δ 1-Catenin regulates E-cadherin turnover, and has both positive and negative effects on cadherin-mediated adhesion. Actin dynamics are also regulated by δ 1-Catenin, which can modulate RhoA, Rac and cdc42 activity. δ 1-Catenin is phosphorylated at multiple tyrosine, serine and threonine sites both in vitro and in vivo. High levels of δ 1-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 δ 1-Catenin associated with the plasma membrane.