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CCND1 Antibody (C-term T286)

Affinity Purified Rabbit Polyclonal Antibody (Pab)
Catalog # AW5109

Specification

CCND1 Antibody (C-term T286) - Product Information

Application	**WB,E**
Primary Accession	P24385
Other Accession	Q2KI22, Q6FI00
Reactivity	**Human, Rat**
Predicted	**Bovine**
Host	**Rabbit**
Clonality	**Polyclonal**
Calculated MW	**H=34 ;M=33;Rat=33 KDa**
Isotype	**Rabbit IgG**
Antigen Source	**Human**

CCND1 Antibody (C-term T286) - Additional Information

Gene ID 595

Antigen Region
264-292

Other Names
CCND1;BCL1; PRAD1; G1/S-specific cyclin-D1; G1/S-specific cyclin-D1; B-cell lymphoma 1 protein; G1/S-specific cyclin-D1; BCL-1 oncogene; G1/S-specific cyclin-D1; PRAD1 oncogene

Dilution
WB~~1:1000

Target/Specificity
This CCND1 antibody is generated from rabbits immunized with a KLH conjugated synthetic peptide between 264-292 amino acids from the C-terminal region of human CCND1.

Format
Purified polyclonal antibody supplied in PBS with 0.09% (W/V) sodium azide. This antibody is purified through a protein A column, followed by peptide affinity purification.

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

Precautions
CCND1 Antibody (C-term T286) is for research use only and not for use in diagnostic or therapeutic procedures.

CCND1 Antibody (C-term T286) - Protein Information

Name CCND1 {ECO:0000303|PubMed:8204893, ECO:0000312|HGNC:HGNC:1582}

Function
Regulatory component of the cyclin D1-CDK4 (DC) complex that phosphorylates and inhibits members of the retinoblastoma (RB) protein family including RB1 and regulates the cell-cycle during G(1)/S transition (PubMed:1827756, PubMed:1833066, PubMed:19412162, PubMed:33854235, PubMed:8114739, PubMed:8302605). Phosphorylation of RB1 allows dissociation of the transcription factor E2F from the RB/E2F complex and the subsequent transcription of E2F target genes which are responsible for the progression through the G(1) phase (PubMed:1827756, PubMed:1833066, PubMed:19412162, PubMed:8114739, PubMed:8302605). Hypophosphorylates RB1 in early G(1) phase (PubMed:1827756, PubMed:1833066, PubMed:19412162, PubMed:8114739, PubMed:8302605). Cyclin D-CDK4 complexes are major integrators of various mitogenenic and antimitogenic signals (PubMed:1827756, PubMed:1833066, PubMed:19412162, PubMed:8302605). Also a substrate for SMAD3, phosphorylating SMAD3 in a cell-cycle-dependent manner and repressing its transcriptional activity (PubMed:15241418). Component of the ternary complex, cyclin D1/CDK4/CDKN1B, required for nuclear translocation and activity of the cyclin D-CDK4 complex (PubMed:9106657). Exhibits transcriptional corepressor activity with INSM1 on the NEUROD1 and INS promoters in a cell cycle-independent manner (PubMed:16569215, PubMed:18417529).

Cellular Location
Nucleus. Cytoplasm Nucleus membrane. Note=Cyclin D-CDK4 complexes accumulate at the nuclear membrane and are then translocated to the nucleus through interaction with KIP/CIP family members

CCND1 Antibody (C-term T286) - Protocols

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

- Western Blot
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation

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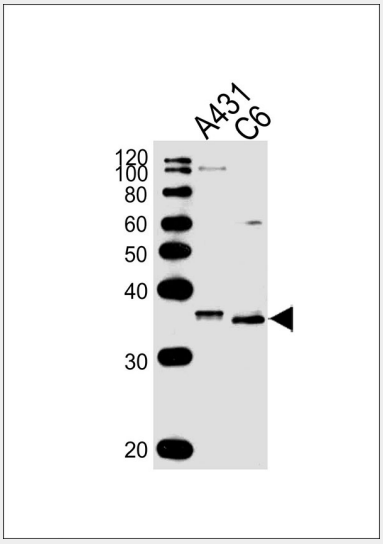
- Flow Cytomety
- Cell Culture

CCND1 Antibody (C-term T286) - Images



Western blot analysis of lysates from A431,rat C6 cell line (from left to right), using Phospho-CCND1 Antibody (T286) (Cat. #AW5109). AW5109 was diluted at 1:1000 at each lane. A goat anti-rabbit IgG H&L(HRP) at 1:10000 dilution was used as the secondary antibody.Lysates at 20ug per lane.

CCND1 Antibody (C-term T286) - Background

Regulatory component of the cyclin D1-CDK4 (DC) complex that phosphorylates and inhibits members of the retinoblastoma (RB) protein family including RB1 and regulates the cell-cycle during G(1)/S transition. Phosphorylation of RB1 allows dissociation of the transcription factor E2F from the RB/E2F complex and the subsequent transcription of E2F target genes which are responsible for the progression through the G(1) phase. Hypophosphorylates RB1 in early G(1) phase. Cyclin D-CDK4 complexes are major integrators of various mitogenenic and antimitogenic signals. Also substrate for SMAD3, phosphorylating SMAD3 in a cell-cycle-dependent manner and repressing its transcriptional activity. Component of the ternary complex, cyclin D1/CDK4/CDKN1B, required for nuclear translocation and activity of the cyclin D-CDK4 complex.