



Cyclin D1 Rabbit mAb

Catalog No	YP-rAb-18023
Isotype	IgG
Reactivity	Human,Mouse,Rat,Rabbit,Pig,Geese
Applications	WB,IHC,IF,IP,ELISA
Gene Name	CCND1
Protein Name	G1/S-specific cyclin-D1
Purification Process	Protein A
Specificity	Endogenous
Formulation	PBS, 50% glycerol, 0.05% Proclin 300, 0.05%BSA
Source	Monoclonal, Rabbit,IgG
Dilution	IHC 1:200-1:1000; WB 1:1000-1:5000; IF 1:200-1:1000; ELISA 1:5000-1:20000; IP 1:50-1:200, Note: For IHC, we suggest antigen retrieval with TE buffer pH 9.0
Concentration	0.5 mg/ml
Purity	≥90%
Storage Stability	-15 ° C to -25 ° C/1 year(Do not lower than -25 ° C)
Synonyms	Cyclin D1;G1/S-specific cyclin-D1;CCND1 ; BCL1 ; PRAD1 ; G1/S-specific cyclin-D1 ; B-cell lymphoma 1 protein ; BCL-1 ; BCL-1 oncogene ; PRAD1 oncogene;CCND1
Observed Band	36kD
Calculated Molecular Weight	34kD
Cell Pathway	Nucleus
Tissue Specificity	Brain,Placenta,Tongue,
Function	Disease:A chromosomal aberration involving CCND1 may be a cause of B-lymphocytic malignancy, particularly mantle-cell lymphoma (MCL) . Translocation t(11;14)(q13;q32) with immunoglobulin gene regions. A ctivation of CCND1 may be oncogenic by directly altering progression through the cell cycle.,Disease:A chromosomal aberration involving CCND1 may be a cause of multiple myeloma [MIM:254500]. Translocation t(11;14)(q13;q32) with the IgH locus.,Disease:A chromosomal aberration involving CCND1 may be a cause of parathyroid adenomas [MIM:168461]. Translocation t(11;11)(q13;p15) with the parathyroid hormone enhancer.,Function:Essential for the control of the cell cycle at the G1/S (start) transition.,online information:The Singapore human mutation and polymorphism database,PTM:Following DNA damage it is ubiquitinated by some SCF (SKP1-cullin-F-box) protein ligase complex containing



FBXO31. Ubiquitination leads to its degradation and G1 arrest.,PTM:Phosphorylation at Thr-286 by MAP kinases is required for ubiquitination and degradation following DNA damage. It probably plays an essential role for recognition by the FBXO31 component of SCF (SKP1-cullin-F-box) protein ligase complex.,similarity:Belongs to the cyclin family.,similarity:Belongs to the cyclin family. Cyclin D subfamily.,subunit:Interacts with the CDK4 and CDK6 protein kinases to form a serine/threonine kinase holoenzyme complex. The cyclin subunit imparts substrate specificity to the complex.,

Background

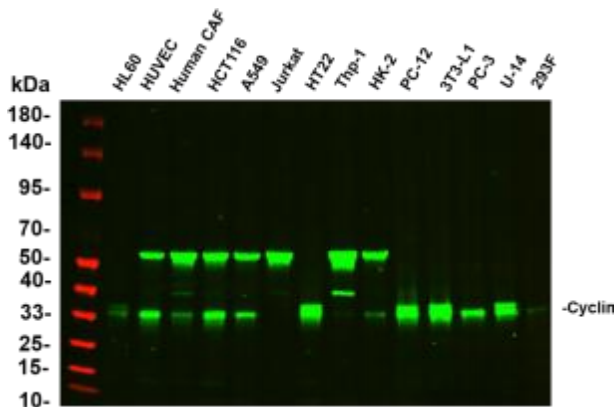
The protein encoded by this gene belongs to the highly conserved cyclin family, whose members are characterized by a dramatic periodicity in protein abundance throughout the cell cycle. Cyclins function as regulators of CDK kinases. Different cyclins exhibit distinct expression and degradation patterns which contribute to the temporal coordination of each mitotic event. This cyclin forms a complex with and functions as a regulatory subunit of CDK4 or CDK6, whose activity is required for cell cycle G1/S transition. This protein has been shown to interact with tumor suppressor protein Rb and the expression of this gene is regulated positively by Rb. Mutations, amplification and overexpression of this gene, which alters cell cycle progression, are observed frequently in a variety of tumors and may contribute to tumorigenesis. [provided by RefSeq, Jul 2008],

matters needing attention

Avoid repeated freezing and thawing!

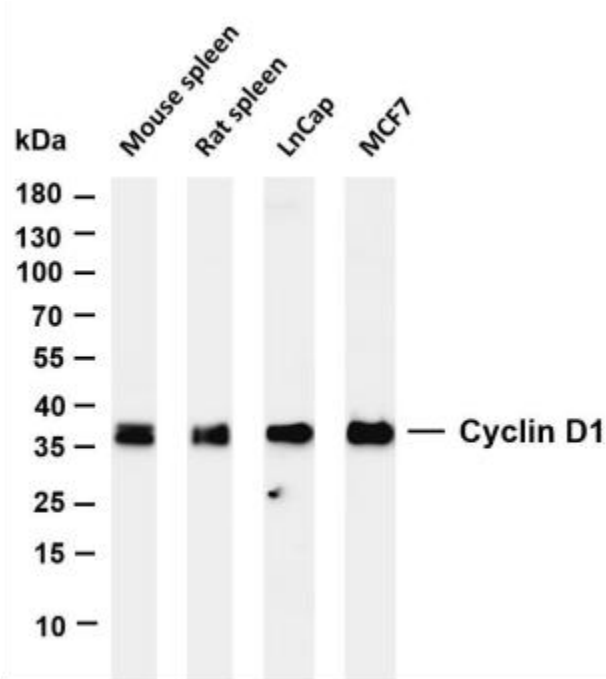
Usage suggestions

This product can be used in immunological reaction related experiments. For more information, please consult technical personnel.

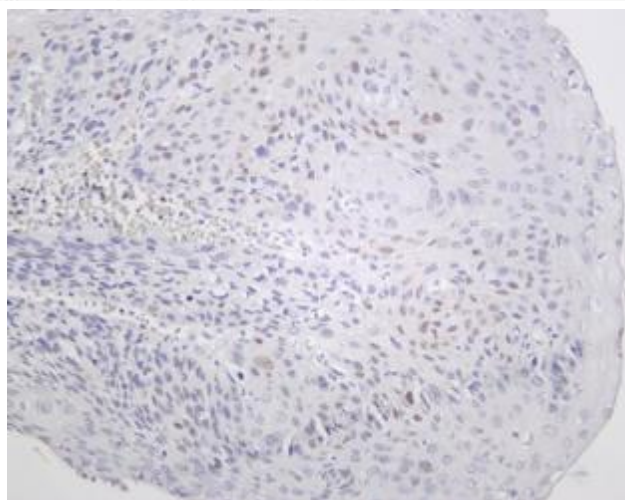


Various whole cell lysates were separated by 4-20% SDS-PAGE, and the primary antibody was used at 4°C, over night with a 1:5000 dilution. The Dylight 800-conjugated Goat anti-Rabbit antibody

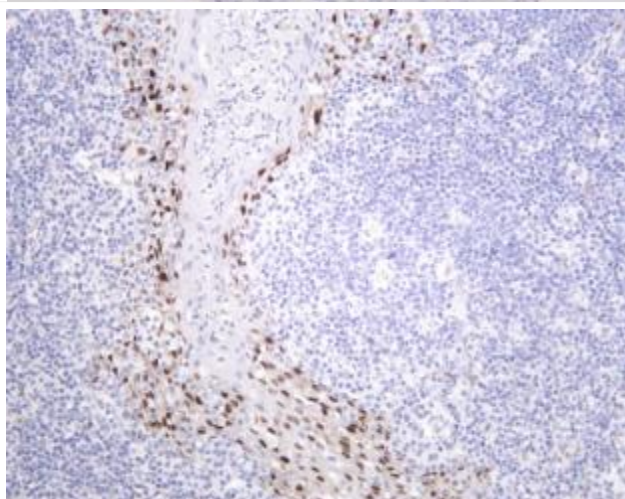




Various whole cell lysates were separated by 4-20% SDS-PAGE, and the membrane was blotted with anti-Cyclin D1 antibody. The HRP-conjugated Goat anti-Rabbit IgG(H + L) antibody was used to detect the antibody. Lane 1: Mouse spleen Lane 2: Rat spleen Lane 3: LnCap Lane 4: MCF7 Predicted band size: 34kDa Observed band size: 36kDa

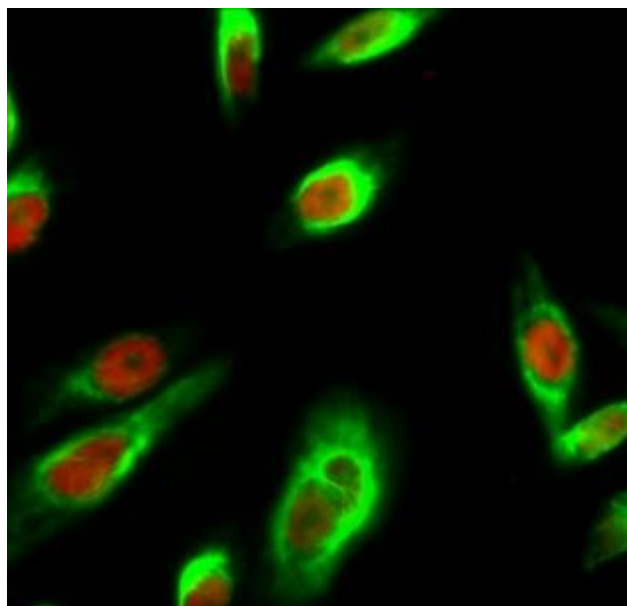


Human esophagus was stained with Anti-Cyclin D1 rabbit antibody



Human tonsil was stained with Anti-Cyclin D1 rabbit antibody





Immunofluorescence analysis of Hela cell. 1, Cyclin D1 Antibody (red) was diluted at 1:200 (4 ° overnight). GAPDH Monoclonal Antibody (2B8) (green) was diluted at 1:200 (4 ° overnight). 2, Goat Anti Rabbit Alexa Fluor 594 Catalog: RS3611 was diluted at 1:1000 (room temperature, 50min). Goat Anti Mouse Alexa Fluor 488 Catalog: RS3208 was diluted at 1:1000 (room temperature, 50min).

