

# cyclin L1 (C-19): sc-33429

## BACKGROUND

Cell proliferation is controlled at specific stages of the cell cycle by distinct protein kinase complexes. These complexes consist of a catalytic subunit associating with a specific regulatory subunit to form the active kinase. The cyclins, which include cyclin A, B, C, D, E, F, G, H, I, K, L, T and their related proteins, including Dbf4, comprise the regulatory subunits of these kinase complexes. The controlled activation of the kinase complexes at various intervals of the cell cycle is regulated by the availability of the cyclins to the catalytic subunit. Unlike the catalytic subunit, which is expressed continually, the expression and stability of the regulatory subunit fluctuates depending on the stage of the cell cycle and, thereby, regulates the kinase activity.

## REFERENCES

1. Dickinson, L.A., et al. 2002. Cyclin L is an RS domain protein involved in pre-mRNA splicing. *J. Biol. Chem.* 277: 25465-25473.
2. Redon, R., et al. 2002. Amplicon mapping and transcriptional analysis pinpoint cyclin L as a candidate oncogene in head and neck cancer. *Cancer Res.* 62: 6211-6217.

## CHROMOSOMAL LOCATION

Genetic locus: CCNL1 (human) mapping to 3q25.31.

## SOURCE

cyclin L1 (C-19) is an affinity purified goat polyclonal antibody raised against a peptide mapping near the C-terminus of cyclin L1 $\beta$  of human origin.

## PRODUCT

Each vial contains 200  $\mu$ g IgG in 1.0 ml of PBS with < 0.1% sodium azide and 0.1% gelatin.

Blocking peptide available for competition studies, sc-33429 P, (100  $\mu$ g peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

## APPLICATIONS

cyclin L1 (C-19) is recommended for detection of cyclin L1 $\beta$  and cyclin L1 $\alpha$  of human origin by Western Blotting (starting dilution 1:200, dilution range 1:100-1:1000), immunoprecipitation [1-2  $\mu$ g per 100-500  $\mu$ g of total protein (1 ml of cell lysate)], immunofluorescence (starting dilution 1:50, dilution range 1:50-1:500), immunohistochemistry (including paraffin-embedded sections) (starting dilution 1:50, dilution range 1:50-1:500) and solid phase ELISA (starting dilution 1:30, dilution range 1:30-1:3000); non cross-reactive with cyclin L1 $\gamma$ .

cyclin L1 (C-19) is also recommended for detection of cyclin L1 $\beta$  and cyclin L1 $\alpha$  in additional species, including equine, canine, bovine, porcine and avian.

Suitable for use as control antibody for cyclin L1 siRNA (h): sc-44902, cyclin L1 shRNA Plasmid (h): sc-44902-SH and cyclin L1 shRNA (h) Lentiviral Particles: sc-44902-V.

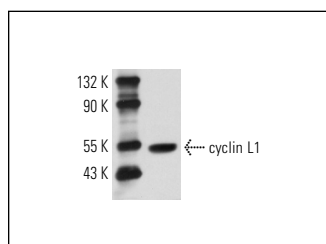
Molecular Weight of cyclin L1: 55 kDa.

Positive Controls: MCF7 nuclear extract: sc-2149.

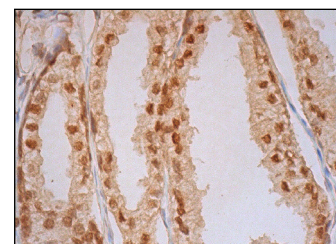
## RECOMMENDED SECONDARY REAGENTS

To ensure optimal results, the following support (secondary) reagents are recommended: 1) Western Blotting: use donkey anti-goat IgG-HRP: sc-2020 (dilution range: 1:2000-1:100,000) or Cruz Marker<sup>™</sup> compatible donkey anti-goat IgG-HRP: sc-2033 (dilution range: 1:2000-1:5000), Cruz Marker<sup>™</sup> Molecular Weight Standards: sc-2035, TBS Blotto A Blocking Reagent: sc-2333 and Western Blotting Luminol Reagent: sc-2048. 2) Immunoprecipitation: use Protein A/G PLUS-Agarose: sc-2003 (0.5 ml agarose/2.0 ml). 3) Immunofluorescence: use donkey anti-goat IgG-FITC: sc-2024 (dilution range: 1:100-1:400) or donkey anti-goat IgG-TR: sc-2783 (dilution range: 1:100-1:400) with UltraCruz<sup>™</sup> Mounting Medium: sc-24941. 4) Immunohistochemistry: use ImmunoCruz<sup>™</sup>: sc-2053 or ABC: sc-2023 goat IgG Staining Systems.

## DATA



cyclin L1 (C-19): sc-33429. Western blot analysis of cyclin L1 expression in MCF7 nuclear extract.



cyclin L1 (C-19): sc-33429. Immunoperoxidase staining of formalin fixed, paraffin-embedded human prostate tissue showing nuclear and cytoplasmic staining of glandular cells.

## STORAGE

Store at 4° C, **\*\*DO NOT FREEZE\*\***. Stable for one year from the date of shipment. Non-hazardous. No MSDS required.

## RESEARCH USE

For research use only, not for use in diagnostic procedures.

## PROTOCOLS

See our web site at [www.scbt.com](http://www.scbt.com) or our catalog for detailed protocols and support products.



Try **cyclin L1 (Q-1): sc-81843**, our highly recommended monoclonal alternative to cyclin L1 (C-19).