# SANTA CRUZ BIOTECHNOLOGY, INC.

# CCNJL (N-12): sc-136618



## BACKGROUND

Cyclin J belongs to the cyclin family and contains one cyclin N-terminal domain. A cyclin forms a complex with its partner cyclin-dependent kinase (Cdk), which activates the protein kinase function of the Cdk. Cyclins are so named because their concentration varies in a cyclical fashion during the cell cycle. They are produced or degraded as needed in order to drive the cell through the different stages of the cell cycle. When its concentrations in the cell are low, the cyclin detaches from the Cdk, inhibiting the activity of the enzyme, probably by causing a protein chain to block the enzymatic site. Cyclin J-associated kinase activity is required for the early embryonic division cycles. CCNJL (Cyclin-J-like protein) is a 435 amino acid protein that contains one cyclin N-terminal domain and belongs to the cyclin J subfamily. There are two isoforms of CCNJL that are produced as a result of alternative splicing events.

## REFERENCES

- 1. Bai, C., et al. 1994. Human cyclin F. EMBO J. 13: 6087-6098.
- Kong, M., et al. 2000. Cyclin F regulates the nuclear localization of cyclin B1 through a cyclin-cyclin interaction. EMBO J. 19: 1378-1388.
- Kolonin, M.G. 2000. A role for cyclin J in the rapid nuclear division cycles of early *Drosophila* embryogenesis. Dev. Biol. 227: 661-672.
- 4. Ota, T., et al. 2004. Complete sequencing and characterization of 21,243 full-length human cDNAs. Nat. Genet. 36: 40-45.
- Fung, T.K. and Poon, R.Y. 2005. A roller coaster ride with the mitotic cyclins. Semin. Cell Dev. Biol. 16: 335-342.
- Makrantonaki, E. and Zouboulis, C.C. 2007. Molecular mechanisms of skin aging: state of the art. Ann. N.Y. Acad. Sci. 1119: 40-50.

## CHROMOSOMAL LOCATION

Genetic locus: CCNJL (human) mapping to 5q33.3.

## SOURCE

CCNJL (N-12) is an affinity purified goat polyclonal antibody raised against a peptide mapping near the N-terminus of CCNJL 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-136618 P, (100  $\mu$ g peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

## **STORAGE**

Store at 4° C, \*\*D0 NOT FREEZE\*\*. Stable for one year from the date of shipment. Non-hazardous. No MSDS required.

## PROTOCOLS

See our web site at www.scbt.com or our catalog for detailed protocols and support products.

#### **APPLICATIONS**

CCNJL (N-12) is recommended for detection of CCNJL isoforms 1 and 2 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) and solid phase ELISA (starting dilution 1:30, dilution range 1:30-1:3000).

Suitable for use as control antibody for CCNJL siRNA (h): sc-91827, CCNJL shRNA Plasmid (h): sc-91827-SH and CCNJL shRNA (h) Lentiviral Particles: sc-91827-V.

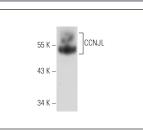
Molecular Weight of CCNJL: 48 kDa.

Positive Controls: HL-60 whole cell lysate: sc-2209.

## **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™ compatible donkey anti-goat IgG-HRP: sc-2033 (dilution range: 1:2000-1:5000), Cruz Marker™ 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™ Mounting Medium: sc-24941.

## DATA



CCNJL (N-12): sc-136618. Western blot analysis of CCNJL expression in HL-60 whole cell lysate.

## **RESEARCH USE**

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

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MONOS Satisfation Guaranteed Try CCNJL (B-1): sc-376075, our highly recommended