

APC4 (C-18): sc-21414

BACKGROUND

The anaphase-promoting complex (APC) is composed of more than ten subunits, including APC1, APC2, APC4, APC5, APC7, APC8, APC10, and APC11. The APC acts in a cell-cycle dependent manner to promote the separation of sister chromatids during the transition between metaphase and anaphase in mitosis. APC, or cyclosome, accomplishes this progression through the ubiquitination of mitotic cyclins and other regulatory proteins that are targeted for destruction during cell division. APC is phosphorylated, and thus activated, by protein kinases Cdk1/cyclin B and polo-like kinase (Plk). APC is under tight control by a number of regulatory factors, including CDC20, CDH1 and MAD2. Specifically, CDC20 and CDH1 directly bind to and activate the cyclin-ubiquitination activity of APCs. In contrast, MAD2 inhibits APC by forming a ternary complex with CDC20 and APC, thus preventing APC activation. APC4, also known as ANAPC4, is an 808 amino acid component of the APC.

CHROMOSOMAL LOCATION

Genetic locus: ANAPC4 (human) mapping to 4p15.2; Anapc4 (mouse) mapping to 5 C1.

SOURCE

APC4 (C-18) is an affinity purified goat polyclonal antibody raised against a peptide mapping near the C-terminus of APC4 of human origin.

PRODUCT

Each vial contains 200 µg IgG in 1.0 ml of PBS with < 0.1% sodium azide and 0.1% gelatin.

Blocking peptide available for competition studies, sc-21414 P, (100 µg peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

STORAGE

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

APPLICATIONS

APC4 (C-18) is recommended for detection of APC4 of mouse, rat and human origin by Western Blotting (starting dilution 1:200, dilution range 1:100-1:1000), immunoprecipitation [1-2 µg per 100-500 µg 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).

APC4 (C-18) is also recommended for detection of APC4 in additional species, including equine and canine.

Suitable for use as control antibody for APC4 siRNA (h): sc-29704, APC4 siRNA (m): sc-29705, APC4 shRNA Plasmid (h): sc-29704-SH, APC4 shRNA Plasmid (m): sc-29705-SH, APC4 shRNA (h) Lentiviral Particles: sc-29704-V and APC4 shRNA (m) Lentiviral Particles: sc-29705-V.

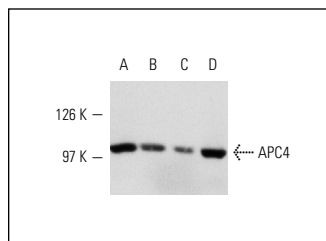
Molecular Weight of APC4: 100 kDa.

Positive Controls: MCF7 whole cell lysate: sc-2206, HeLa whole cell lysate: sc-2200 or NIH/3T3 whole cell lysate: sc-2210.

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



APC4 (C-18): sc-21414. Western blot analysis of APC4 expression in MCF7 (A), HeLa (B), NIH/3T3 (C) and SK-N-SH (D) whole cell lysates.

RESEARCH USE

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

PROTOCOLS

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

MONOS
Satisfaction
Guaranteed

Try **APC4 (B-11): sc-514895** or **APC4 (G-1): sc-374173**, our highly recommended monoclonal alternatives to APC4 (C-18).