

ARHGAP8 (K-14): sc-86299

BACKGROUND

ARHGAP8 (Rho GTPase activating protein 8), also known as PP610 or BPGAP1, is a 464 amino acid protein that contains one Rho GAP domain and one CRALTRIO domain. Expressed at high levels in placenta and kidney, and at lower levels in testis, stomach, colon, small intestine and skeletal muscle, ARHGAP8 functions as a negative regulator of Rho-type GTPases, specifically catalyzing the conversion of the target GTPase to an inactive, GDP-bound state. Via its catalytic activity, ARHGAP8 is thought to play a role in signaling pathways and cytoskeletal changes throughout the cell. ARHGAP8 is overexpressed in colorectal and breast tumors, suggesting a role for ARHGAP8 in carcinogenesis. Human ARHGAP8 shares 80% homology with its mouse counterpart, suggesting a conserved role between species. Multiple isoforms of ARHGAP8 exist due to alternative splicing events.

REFERENCES

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RESEARCH USE

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

CHROMOSOMAL LOCATION

Genetic locus: ARHGAP8 (human) mapping to 22q13.31; Arhgap8 (mouse) mapping to 15 E2.

SOURCE

ARHGAP8 (K-14) is an affinity purified rabbit polyclonal antibody raised against a peptide mapping within an internal region of ARHGAP8 of human origin.

PRODUCT

Each vial contains 100 µg IgG in 1.0 ml of PBS with < 0.1% sodium azide and 0.1% gelatin.

Blocking peptide available for competition studies, sc-86299 P, (100 µg peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

APPLICATIONS

ARHGAP8 (K-14) is recommended for detection of ARHGAP8 of mouse, rat and human origin by Western Blotting (starting dilution 1:200, dilution range 1:100-1:1000), 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); non cross-reactive with family member ARHGAP28.

ARHGAP8 (K-14) is also recommended for detection of ARHGAP8 in additional species, including canine.

Suitable for use as control antibody for ARHGAP8 siRNA (m): sc-141219, ARHGAP8 shRNA Plasmid (m): sc-141219-SH and ARHGAP8 shRNA (m) Lentiviral Particles: sc-141219-V.

Molecular Weight of ARHGAP8: 54 kDa.

RECOMMENDED SECONDARY REAGENTS

To ensure optimal results, the following support (secondary) reagents are recommended: 1) Western Blotting: use goat anti-rabbit IgG-HRP: sc-2004 (dilution range: 1:2000-1:100,000) or Cruz Marker™ compatible goat anti-rabbit IgG-HRP: sc-2030 (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) Immunofluorescence: use goat anti-rabbit IgG-FITC: sc-2012 (dilution range: 1:100-1:400) or goat anti-rabbit IgG-TR: sc-2780 (dilution range: 1:100-1:400) with UltraCruz™ Mounting Medium: sc-24941.

STORAGE

Store at 4° C, **DO 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.