

# KLHL28 (K-14): sc-131971

## BACKGROUND

KLHL28, also known as kelch-like protein 28 or BTB/POZ domain-containing protein 5, is a 571 amino acid protein similar to the *Drosophila* kelch protein. KLHL26 contains six kelch repeats and one BTB (POZ) domain. The BTB (broad complex, tramtrack and bric-a-brac) domain, also known as the POZ (poxvirus and zinc finger) domain, is an N-terminal homodimerization domain that contains multiple copies of kelch repeats and/or C<sub>2</sub>H<sub>2</sub>-type zinc fingers. Proteins that contain BTB domains are thought to be involved in transcriptional regulation via control of chromatin structure and function. KLHL28 is expressed as two isoforms produced by alternative splicing.

## REFERENCES

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3. Melnick, A., Ahmad, K.F., Arai, S., Polinger, A., Ball, H., Borden, K.L., Carlile, G.W., Prive, G.G. and Licht, J.D. 2000. In-depth mutational analysis of the promyelocytic leukemia zinc finger BTB/POZ domain reveals motifs and residues required for biological and transcriptional functions. *Mol. Cell. Biol.* 20: 6550-6567.
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6. Geyer, R., Wee, S., Anderson, S., Yates, J. and Wolf, D.A. 2003. BTB/POZ domain proteins are putative substrate adaptors for cullin 3 ubiquitin ligases. *Mol. Cell* 12: 783-790.
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## CHROMOSOMAL LOCATION

Genetic locus: KLHL28 (human) mapping to 14q21.2; Klhl28 (mouse) mapping to 12 C1.

## SOURCE

KLHL28 (K-14) is an affinity purified goat polyclonal antibody raised against a peptide mapping within an internal region of KLHL28 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-131971 P, (100 µg peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

## APPLICATIONS

KLHL28 (K-14) is recommended for detection of KLHL28 isoforms 1 and 2 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 other KLHL family members.

KLHL28 (K-14) is also recommended for detection of KLHL28 isoforms 1 and 2 in additional species, including equine, canine, bovine and avian.

Suitable for use as control antibody for KLHL28 siRNA (h): sc-92122, KLHL28 siRNA (m): sc-146527, KLHL28 shRNA Plasmid (h): sc-92122-SH, KLHL28 shRNA Plasmid (m): sc-146527-SH, KLHL28 shRNA (h) Lentiviral Particles: sc-92122-V and KLHL28 shRNA (m) Lentiviral Particles: sc-146527-V.

Molecular Weight of KLHL28: 64 kDa.

## 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) 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.

## 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.