# SANTA CRUZ BIOTECHNOLOGY, INC.

# SDE2 (D-15): sc-245651



#### BACKGROUND

Telomeres are DNA-protein structures that protect the ends of linear chromosomes and help maintain genomic stability and cell phenotype. Telomere maintenance involves the cooperation of several telomeric factors, including telomerase. Protein SDE2 of *Schizosaccharomyces pombe* is a nuclear protein that is suggested to be critical for telomeric silencing and genomic stability by interacting with telomere regulators. SDE2 (SDE2 telomere maintenance homolog *(S. pombe))*, also known as C1orf55 or dJ671D7.1, is a 451 amino acid coil-coil domain containing protein that belongs to the SDE2 family and exists as 3 alternatively spliced isoforms. SDE2 is encoded by a gene that is located on human chromosome 1q42.12. Human chromosome 1 is the largest chromosome and spans about 260 million base pairs and makes up 8% of the human genome. There are about 3,000 genes on chromosome 1, and considering the great number of genes there are also a large number of diseases associated with chromosome 1.

# REFERENCES

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- Nakayama, J., et al. 1997. TLP1: a gene encoding a protein component of mammalian telomerase is a novel member of WD repeats family. Cell 88: 875-884.
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## CHROMOSOMAL LOCATION

Genetic locus: SDE2 (human) mapping to 1q42.12.

### SOURCE

SDE2 (D-15) is an affinity purified goat polyclonal antibody raised against a peptide mapping within an internal region of SDE2 of human origin.

#### PRODUCT

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

Blocking peptide available for competition studies, sc-245651 P, (100  $\mu$ g peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

## **APPLICATIONS**

SDE2 (D-15) is recommended for detection of SDE2 of 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).

Suitable for use as control antibody for SDE2 siRNA (h): sc-88617, SDE2 shRNA Plasmid (h): sc-88617-SH and SDE2 shRNA (h) Lentiviral Particles: sc-88617-V.

Molecular Weight of SDE2: 50/49/39 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) Immunofluo-rescence: 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, \*\*D0 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 or our catalog for detailed protocols and support products.