# PPPDE2 (C-13): sc-86402



The Power to Question

#### **BACKGROUND**

PPPDE2 (PPPDE peptidase domain-containing protein 2), also known as FAM152B, is a 168 amino acid protein that exists as a homodimer and belongs to the DeSI family. Localizing to the nucleus and cytoplasm, PPPDE2 deconjugates SUM01, SUM02 and SUM03 and has isopeptidase but not SUM0-processing activity. PPPDE2 is post-translationally phosphorylated at serine 25 and is encoded by a gene that maps to human chromosome 22. Chromosome 22 houses over 500 genes and is the second smallest human chromosome. Mutations in several of the genes that map to chromosome 22 are involved in the development of Phelan-McDermid syndrome, Neurofibromatosis type 2, autism and schizophrenia. Additionally, translocations between chromosomes 9 and 22 may lead to the formation of the Philadelphia Chromosome and the subsequent production of the novel fusion protein Bcr-Abl, a potent cell proliferation activator found in several types of leukemias.

# **REFERENCES**

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# **CHROMOSOMAL LOCATION**

Genetic locus: DESI1 (human) mapping to 22q13.2; Pppde2 (mouse) mapping to 15 E1.

# SOURCE

PPPDE2 (C-13) is an affinity purified rabbit polyclonal antibody raised against a peptide mapping at the C-terminus of PPPDE2 of human origin.

# **PRODUCT**

Each vial contains 100  $\mu g$  lgG in 1.0 ml of PBS with < 0.1% sodium azide and 0.1% gelatin.

Blocking peptide available for competition studies, sc-86402 P, (100  $\mu$ g peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

#### **APPLICATIONS**

PPPDE2 (C-13) is recommended for detection of PPPDE2 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).

PPPDE2 (C-13) is also recommended for detection of PPPDE2 in additional species, including bovine.

Suitable for use as control antibody for PPPDE2 siRNA (h): sc-77087, PPPDE2 siRNA (m): sc-142791, PPPDE2 shRNA Plasmid (h): sc-77087-SH, PPPDE2 shRNA Plasmid (m): sc-142791-SH, PPPDE2 shRNA (h) Lentiviral Particles: sc-77087-V and PPPDE2 shRNA (m) Lentiviral Particles: sc-142791-V.

Molecular Weight of PPPDE2: 18 kDa.

Positice Controls: 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 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) 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 or our catalog for detailed protocols and support products.

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