## SANTA CRUZ BIOTECHNOLOGY, INC.

# DRAK2 (H-117): sc-292771



## BACKGROUND

DAP (death associated protein) kinase and ZIP kinase are members of a novel protein kinase family, the members of which have the capacity to mediate apoptosis through their catalytic activities. DAP kinase contains a "death domain" and has been shown to mediate  $\gamma$  interferon-induced apoptosis. The introduction of DAP kinase into highly metastatic carcinoma clones lacking DAP kinase expression was shown to result in the suppression of metastasis, thus linking suppression of apoptosis to metastasis. ZIP kinase contains a leucine zipper domain, which is necessary for homodimerization and for interaction with other leucine zipper proteins. ZIP kinase dimerizes with ATF-4, an ATF/CREB transcription factor family member that contains a leucine zipper. DRAK1 (DAP kinase-related apoptosis-inducing protein kinase 1) and DRAK2 are DAP kinase related proteins. DRAK1 and DRAK2 are localized to the nucleus, and overexpression of both DRAK proteins in NIH/3T3 cells induces morphological changes associated with apoptosis.

## CHROMOSOMAL LOCATION

Genetic locus: STK17B (human) mapping to 2q32.3; Stk17b (mouse) mapping to 1 C1.1.

### SOURCE

DRAK2 (H-117) is a rabbit polyclonal antibody raised against amino acids 256-372 mapping at the C-terminus of DRAK2 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.

### **STORAGE**

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

### **APPLICATIONS**

DRAK2 (H-117) is recommended for detection of DRAK2 of mouse, rat and human origin by Western Blotting (starting dilution 1:200, dilution range 1:100-1:1000), immunoprecipitation [1-2  $\mu$ g per 100-500  $\mu$ g 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).

DRAK2 (H-117) is also recommended for detection of DRAK2 in additional species, including equine, canine, bovine and porcine.

Suitable for use as control antibody for DRAK2 siRNA (h): sc-38981, DRAK2 siRNA (m): sc-38982, DRAK2 shRNA Plasmid (h): sc-38981-SH, DRAK2 shRNA Plasmid (m): sc-38982-SH, DRAK2 shRNA (h) Lentiviral Particles: sc-38981-V and DRAK2 shRNA (m) Lentiviral Particles: sc-38982-V.

Molecular Weight of DRAK2: 42 kDa.

Positive Controls: Jurkat whole cell lysate: sc-2204, Ramos cell lysate: sc-2216 or MOLT-4 cell lysate: sc-2233.

#### **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<sup>™</sup> compatible goat anti-rabbit IgG-HRP: sc-2030 (dilution range: 1:2000-1:5000), Cruz Marker<sup>™</sup> 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 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<sup>™</sup> Mounting Medium: sc-24941.

#### DATA



DRAK2 (n=117), sc-292771, western blot analysis of DRAK2 expression in Jurkat (**A**), Ramos (**B**) and MOLT-4 (**C**) nuclear extracts and Raji whole cell lysate (**D**).

#### **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 Satisfation Guaranteed

Try DRAK2 (C-2): sc-398324 or DRAK2 (4Y-5): sc-100370, our highly recommended monoclonal

alternatives to DRAK2 (H-117).