

# DUSP12 (T-16): sc-69166

## BACKGROUND

Dual specificity phosphatases (DSPs) are a subclass of the protein tyrosine phosphatase (PTP) gene superfamily, which are selective for dephosphorylating critical phosphothreonine and phosphotyrosine residues within MAP kinases. DSP gene expression is induced by a host of growth factors and/or cellular stresses, thereby negatively regulating MAP kinase superfamily members. DUSP12 (dual specificity phosphatase 12), also known as YVH1, is a 340 amino acid protein that localizes to the nucleus and contains one tyrosine-protein phosphatase domain. Expressed ubiquitously with highest expression in ovary, testis, spleen and blood leukocytes, DUSP12 uses zinc as a cofactor to catalyze the conversion of a protein tyrosine phosphate to a protein tyrosine and a free phosphate, possibly playing a role in cellular proliferation and differentiation.

## REFERENCES

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## CHROMOSOMAL LOCATION

Genetic locus: DUSP12 (human) mapping to 1q23.3; Dusp12 (mouse) mapping to 1 H3.

## STORAGE

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

## SOURCE

DUSP12 (T-16) is an affinity purified goat polyclonal antibody raised against a peptide mapping within an internal region of DUSP12 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-69166 P, (100 µg peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

## APPLICATIONS

DUSP12 (T-16) is recommended for detection of DUSP12 of mouse, rat and human origin by Western Blotting (starting dilution 1:200, dilution range 1:100-1:1000), immunoprecipitation [1-2 µg per 100-500 µg 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).

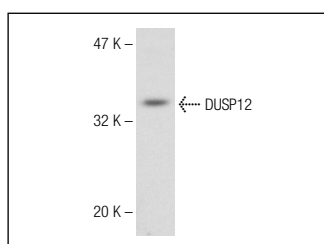
DUSP12 (T-16) is also recommended for detection of DUSP12 in additional species, including equine, canine, bovine and porcine.

Suitable for use as control antibody for DUSP12 siRNA (h): sc-77196, DUSP12 siRNA (m): sc-77197, DUSP12 shRNA Plasmid (h): sc-77196-SH, DUSP12 shRNA Plasmid (m): sc-77197-SH, DUSP12 shRNA (h) Lentiviral Particles: sc-77196-V and DUSP12 shRNA (m) Lentiviral Particles: sc-77197-V.

Molecular Weight of DUSP12: 38 kDa.

Positive Controls: mouse testis extract: sc-2405.

## DATA



DUSP12 (T-16): sc-69166. Western blot analysis of DUSP12 expression in mouse testis tissue extract.

## 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.