

# TRAPPC4 (YY-1): sc-101311

## BACKGROUND

TRAPPC4 (trafficking protein particle complex 4), also known as SBDN, TRS23, PTD009, CGI-104, HSPC172 (hematopoietic stem/progenitor cell protein 172) or SYNBINDIN, is a postsynaptic protein belonging to the TRAPPC4 subfamily of the TRAPP small subunits family of proteins. Expressed in neurons and localizing to the Golgi apparatus, TRAPPC4 is believed to be involved in vesicular transport from the endoplasmic reticulum (ER) to the Golgi, functioning as a component of the multisubunit transport protein particle (TRAPP) complex. Similar to other proteins involved in vesicular transport or synaptic function, TRAPPC4 contains a nonclassical PDZ domain, a TRAPPC1-like domain and a C-terminus that is similar to a short segment of RyR. Via its nonclassical PDZ domain, TRAPPC4 binds to the C-terminal EFYA motif of Syndecan-2, suggesting that TRAPPC4 may play an important role in dendritic spine morphogenesis through membrane-trafficking.

## REFERENCES

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- Simons, M. and Horowitz, A. 2001. Syndecan-4-mediated signalling. *Cell Signal.* 13: 855-862.
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## CHROMOSOMAL LOCATION

Genetic locus: TRAPPC4 (human) mapping to 11q23.3; Trappc4 (mouse) mapping to 9 A5.2.

## SOURCE

TRAPPC4 (YY-1) is a mouse monoclonal antibody raised against recombinant TRAPPC4 of human origin.

## PRODUCT

Each vial contains 100 µg IgG<sub>1</sub> in 1.0 ml 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

TRAPPC4 (YY-1) is recommended for detection of TRAPPC4 of mouse 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).

Suitable for use as control antibody for TRAPPC4 siRNA (h): sc-96374, TRAPPC4 siRNA (m): sc-154587, TRAPPC4 shRNA Plasmid (h): sc-96374-SH, TRAPPC4 shRNA Plasmid (m): sc-154587-SH, TRAPPC4 shRNA (h) Lentiviral Particles: sc-96374-V and TRAPPC4 shRNA (m) Lentiviral Particles: sc-154587-V.

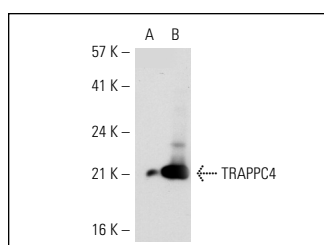
Molecular Weight of TRAPPC4: 24 kDa.

Positive Controls: TRAPPC4 (h): 293 Lysate: sc-111193, HeLa whole cell lysate: sc-2200 or HL-60 whole cell lysate: sc-2209.

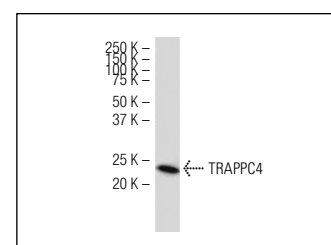
## RECOMMENDED SECONDARY REAGENTS

To ensure optimal results, the following support (secondary) reagents are recommended: 1) Western Blotting: use goat anti-mouse IgG-HRP: sc-2005 (dilution range: 1:2000-1:32,000) or Cruz Marker™ compatible goat anti-mouse IgG-HRP: sc-2031 (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) Immunoprecipitation: use Protein A/G PLUS-Agarose: sc-2003 (0.5 ml agarose/2.0 ml). 3) Immunofluorescence: use goat anti-mouse IgG-FITC: sc-2010 (dilution range: 1:100-1:400) or goat anti-mouse IgG-TR: sc-2781 (dilution range: 1:100-1:400) with UltraCruz™ Mounting Medium: sc-24941.

## DATA



TRAPPC4 (YY-1): sc-101311. Western blot analysis of TRAPPC4 expression in non-transfected: sc-110760 (A) and human TRAPPC4 transfected: sc-111193 (B) 293 whole cell lysates.



TRAPPC4 (YY-1): sc-101311. Western blot analysis of TRAPPC4 expression in HeLa whole cell lysate.

## 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.