SANTA CRUZ BIOTECHNOLOGY, INC.

TRAP150 (A-11): sc-133249

BACKGROUND

In mammalian cells, transcription is regulated in part by high molecular weight coactivating complexes that mediate signaling between transcriptional activators and initiation factors. These complexes include the thyroid hormone receptor-associated protein (TRAP) complex, which interacts with thyroid receptors (TR), vitamin D receptors and other steroid receptors to facilitate hormone induced transcriptional activation. The TRAP complex consists of numerous proteins ranging in size including TRAP95, TRAP100, TRAP150, TRAP220 and TRAP230, that are characterized by the presence of a nuclear receptor recognition motif which mediates the ligand-dependent binding of TRAP proteins to the nuclear receptors. TRAP220 and TRAP100 are widely expressed and most abundantly detected in skeletal muscle, heart and placenta. TRAP95, TRAP150 and TRAP230 facilitate TR induced transcription by associating with an additional transcriptional coactivating complex SMCC (SRB and MED protein cofactor complex), which consists of various subunits that share homology with several components of the yeast transcriptional mediator complexes.

CHROMOSOMAL LOCATION

Genetic locus: THRAP3 (human) mapping to 1p34.3; Thrap3 (mouse) mapping to 4 D2.2.

SOURCE

TRAP150 (A-11) is a mouse monoclonal antibody raised against amino acids 191-490 mapping within an internal region of TRAP150 of human origin.

PRODUCT

Each vial contains 200 µg IgG_{2b} kappa light chain in 1.0 ml of PBS with < 0.1% sodium azide and 0.1% gelatin. Also available as TransCruz reagent for Gel Supershift and ChIP applications, sc-133249 X, 200 µg/0.1 ml.

APPLICATIONS

TRAP150 (A-11) is recommended for detection of TRAP150 of mouse, rat and human origin by Western Blotting (starting dilution 1:100, 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), immunohistochemistry (including paraffin-embedded sections) (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 TRAP150 siRNA (h): sc-38591, TRAP150 siRNA (m): sc-38592, TRAP150 shRNA Plasmid (h): sc-38591-SH, TRAP150 shRNA Plasmid (m): sc-38592-SH, TRAP150 shRNA (h) Lentiviral Particles: sc-38591-V and TRAP150 shRNA (m) Lentiviral Particles: sc-38592-V.

TRAP150 (A-11) X TransCruz antibody is recommended for Gel Supershift and ChIP applications.

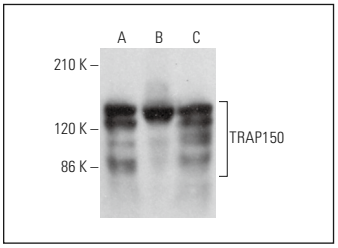
Molecular Weight of TRAP150: 150 kDa.

Positive Controls: HeLa whole cell lysate: sc-2200, K-562 whole cell lysate: sc-2203 or HEL 92.1.7 cell lysate: sc-2270.

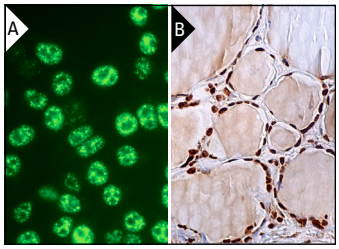
RECOMMENDED SUPPORT REAGENTS

To ensure optimal results, the following support reagents are recommended: 1) Western Blotting: use m-IgGκ BP-HRP: sc-516102 or m-IgGκ BP-HRP (Cruz Marker): sc-516102-CM (dilution range: 1:1000-1:10000), Cruz Marker™ Molecular Weight Standards: sc-2035, UltraCruz® Blocking Reagent: sc-516214 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 m-IgGκ BP-FITC: sc-516140 or m-IgGκ BP-PE: sc-516141 (dilution range: 1:50-1:200) with UltraCruz® Mounting Medium: sc-24941 or UltraCruz® Hard-set Mounting Medium: sc-359850. 4) Immunohistochemistry: use m-IgGκ BP-HRP: sc-516102 with DAB, 50X: sc-24982 and Immunohistomount: sc-45086, or Organo/Limonene Mount: sc-45087.

DATA



TRAP150 (A-11): sc-133249. Western blot analysis of TRAP150 expression in K-562 (**A**), HeLa (**B**) and HEL 92.1.7 (**C**) whole cell lysates.



TRAP150 (A-11): sc-133249. Immunofluorescence staining of methanol-fixed HeLa cells showing nuclear localization (**A**). Immunoperoxidase staining of formalin fixed, paraffin-embedded human thyroid tissue showing nuclear staining of glandular cells (**B**).

SELECT PRODUCT CITATIONS

1. Jang, H.J., et al. 2023. Thrap3 promotes nonalcoholic fatty liver disease by suppressing AMPK-mediated autophagy. Exp. Mol. Med. 55: 1720-1733.
2. Wang, X., et al. 2023. Species-deconvolved proteomics for *in situ* investigation of tumor-stroma interactions after treatment of pancreatic cancer patient-derived xenografts with combined gemcitabine and paclitaxel. J. Proteome Res. 22: 2436-2449.

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 for detailed protocols and support products.