# SANTA CRUZ BIOTECHNOLOGY, INC.

# WT1 (H-290): sc-68880



# BACKGROUND

Wilms' tumor (WT) is an embryonal malignancy of the kidney that affects 1 in 10,000 infants and, like retinoblastoma, is observed in both sporadic and inherited forms. The Wilms' tumor locus has been mapped at chromosome 11p13 as a tumor suppressor gene which encodes a DNA binding protein with four zinc fingers and a glutamine-proline rich amino-terminus. The Wilms' tumor protein binds the DNA sequence GCGGGGGCG, a recognition element common to the early growth response (Egr) family of Zn<sup>2+</sup> finger transcriptional activators. However, in contrast to Egr transcription factors, WT1 behaves as a transcriptional repressor in transient transfection assays with synthetic promotor constructs.

# CHROMOSOMAL LOCATION

Genetic locus: WT1 (human) mapping to 11p13; Wt1 (mouse) mapping to 2 E3.

#### SOURCE

WT1 (H-290) is a rabbit polyclonal antibody raised against amino acids 71-360 mapping within an internal region of WT1 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.

Available as TransCruz reagent for Gel Supershift and ChIP applications, sc-68880 X, 200  $\mu g/0.1$  ml.

# **STORAGE**

Store at 4° C, \*\*D0 NOT FREEZE\*\*. Stable for one year from the date of shipment. Non-hazardous. No MSDS required.

# **APPLICATIONS**

WT1 (H-290) is recommended for detection of WT1 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).

WT1 (H-290) is also recommended for detection of WT1 in additional species, including porcine.

Suitable for use as control antibody for WT1 siRNA (h): sc-36846, WT1 siRNA (m): sc-36845, WT1 shRNA Plasmid (h): sc-36846-SH, WT1 shRNA Plasmid (m): sc-36845-SH, WT1 shRNA (h) Lentiviral Particles: sc-36846-V and WT1 shRNA (m) Lentiviral Particles: sc-36845-V.

WT1 (H-290) X TransCruz antibody is recommended for Gel Supershift and ChIP applications.

Molecular Weight of WT1: 52 kDa.

Positive Controls: K-562 whole cell lysate: sc-2203, MCF7 whole cell lysate: sc-2206 or WT1 (h): 293T Lysate: sc-117178.

#### **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



WT1 (H-290): sc-68880. Western blot analysis of WT1 expression in non-transfected: sc-117752 (**A**) and truncated human WT1 transfected: sc-117178 (**B**) 293T whole cell lysates.

#### SELECT PRODUCT CITATIONS

 Theilig, F., et al. 2011. Tubular deficiency of von Hippel-Lindau attenuates renal disease progression in anti-GBM glomerulonephritis. Am. J. Pathol. 179: 2177-2188.

#### **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.

