

TFIID (TBP) (N-12): sc-204

BACKGROUND

In eukaryotic systems, initiation of transcription from protein-coding genes is a complex process requiring RNA polymerase II and broad families of auxiliary transcription factors. Such factors can be divided into two major functional classes: the basal factors that are required for transcription of all Pol II genes, including TFIIA, TFIIB, TFIID, TFIIE, TFIIIF and TFIIH; and sequence-specific factors that regulate gene expression. The basal transcription factors and Pol II form a specific multiprotein complex near the transcription start site by interacting with core promoter elements such as the TATA box generally located 25-30 base pairs upstream of the transcription start site. Binding of TFIID to the TATA element initiates assembly of the other factors into a pre-initiation complex. The TATA-binding subunit of TFIID (designated TFIIDt or TBP) from higher eukaryotes contains a highly conserved 180 amino acid C-terminal domain.

CHROMOSOMAL LOCATION

Genetic locus: TBP (human) mapping to 6q27; Tbp (mouse) mapping to 17 A2.

SOURCE

TFIID (TBP) (N-12) is an affinity purified rabbit polyclonal antibody raised against a peptide mapping at the N-terminus of TFIID 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-204 P, (100 µg peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

Available as TransCruz reagent for Gel Supershift and ChIP applications, sc-204 X, 200 µg/0.1 ml.

APPLICATIONS

TFIID (TBP) (N-12) is recommended for detection of TFIID (TBP) p36 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), 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).

TFIID (TBP) (N-12) is also recommended for detection of TFIID (TBP) p36 in additional species, including equine, canine, bovine and avian.

Suitable for use as control antibody for TFIID siRNA (h): sc-29503, TFIID siRNA (m): sc-36648, TFIID shRNA Plasmid (h): sc-29503-SH, TFIID shRNA Plasmid (m): sc-36648-SH, TFIID shRNA (h) Lentiviral Particles: sc-29503-V and TFIID shRNA (m) Lentiviral Particles: sc-36648-V.

TFIID (TBP) (N-12) X TransCruz antibody is recommended for Gel Supershift and ChIP applications.

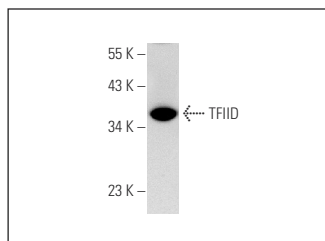
Molecular Weight of TFIID: 36 kDa.

Positive Controls: F9 cell lysate: sc-2245, mouse testis extract: sc-2405 or rat testis extract: sc-2400.

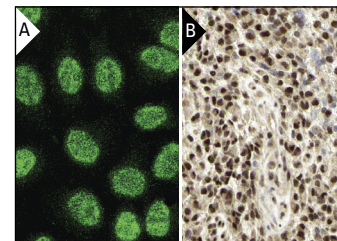
STORAGE

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

DATA



TFIID (TBP) (N-12): sc-204. Western blot analysis of TFIID expression in F9 whole cell lysate.



TFIID (TBP) (N-12): sc-204. Immunofluorescence staining of methanol-fixed HeLa cells showing nuclear localization (A). Immunoperoxidase staining of formalin fixed, paraffin-embedded human malignant glioma tissue showing nuclear staining of tumor cells. Kindly provided by The Swedish Human Protein Atlas (HPA) program (B).

SELECT PRODUCT CITATIONS

- Perkins, N.D., et al. 1997. Regulation of NFκB by cyclin dependent kinases associated with the p300 coactivator. *Science* 275: 523-527.
- Müller, C., et al. 2010. Nucleolar retention of a translational C/EBPα isoform stimulates rDNA transcription and cell size. *EMBO J.* 29: 897-909.
- Mancuso, J.J., et al. 2010. Distribution of RGS9-2 in neurons of the mouse striatum. *J. Neurochem.* 112: 651-661.
- Matilainen, J.M., et al. 2010. The number of vitamin D receptor binding sites defines the different vitamin D responsiveness of the CYP24 gene in malignant and normal mammary cells. *J. Biol. Chem.* 285: 24174-24183.
- Evans, E.L., et al. 2011. Dimer formation and conformational flexibility ensure cytoplasmic stability and nuclear accumulation of Elk-1. *Nucleic Acids Res.* 39: 6390-6402.
- Zhang, Y., et al. 2011. Identification of DHX33 as a mediator of rRNA synthesis and cell growth. *Mol. Cell. Biol.* 31: 4676-4691.
- Lee, L.C., et al. 2012. Role of the CCAAT-binding protein NFY in SCA17 pathogenesis. *PLoS ONE* 7: e35302.

RESEARCH USE

For research use only, not for use in diagnostic procedures.



Try **TFIID (TBP) (58C9): sc-421** or **TFIID (1TB18): sc-56794**, our highly recommended monoclonal alternatives to TFIID (TBP) (N-12). Also, for AC, HRP, FITC, PE, Alexa Fluor[®] 488 and Alexa Fluor[®] 647 conjugates, see **TFIID (TBP) (58C9): sc-421**.