

CDP (M-222): sc-13024

BACKGROUND

CDP (for CCAAT displacement protein) was identified as a repressor for transcription of developmentally regulated genes. It is a homeodomain protein that appears to compete with transcriptional activating proteins for binding to the promoter regions of various genes. CDP contains three cut repeats which function as DNA binding domains. It has been demonstrated that cut repeat domains have the capacity to bind to DNA in conjunction with or independently of homeodomain DNA binding. CDP has been shown to be the DNA-binding subunit of the HiNF-D complex, which contains cyclin A, Cdc2 and an Rb-related protein in addition to CDP. Histone expression is required for the transition to S phase in the cell cycle. The HiNF-D complex regulates the transcription of histone H4, H3 and H1 genes, allowing cells to progress from G₁ to S phase.

CHROMOSOMAL LOCATION

Genetic locus: CUX1 (human) mapping to 7q22.1; Cutl1 (mouse) mapping to 5 G2.

SOURCE

CDP (M-222) is a rabbit polyclonal antibody raised against amino acids 1111-1332 of CDP of mouse origin.

PRODUCT

Each vial contains 200 µg IgG 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-13024 X, 200 µg/0.1 ml.

APPLICATIONS

CDP (M-222) is recommended for detection of CDP 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).

CDP (M-222) is also recommended for detection of CDP in additional species, including canine, bovine and avian.

Suitable for use as control antibody for CDP siRNA (h): sc-35051, CDP siRNA (m): sc-35052, CDP shRNA Plasmid (h): sc-35051-SH, CDP shRNA Plasmid (m): sc-35052-SH, CDP shRNA (h) Lentiviral Particles: sc-35051-V and CDP shRNA (m) Lentiviral Particles: sc-35052-V.

CDP (C-20) X TransCruz antibody is recommended for Gel Supershift and ChIP applications.

Molecular Weight of CDP: 180 kDa.

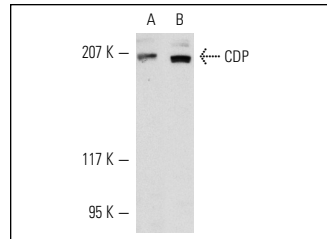
STORAGE

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

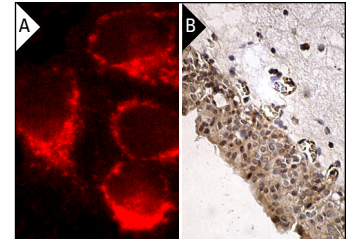
RESEARCH USE

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

DATA



CDP (M-222): sc-13024. Western blot analysis of CDP expression in K-562 (A) and BJAB (B) nuclear extracts.



CDP (M-222): sc-13024. Immunofluorescence staining of methanol-fixed HeLa cells showing cytoplasmic localization (A). Immunoperoxidase staining of formalin fixed, paraffin-embedded human urinary bladder tissue showing nuclear and cytoplasmic staining of urothelial cells (B).

SELECT PRODUCT CITATIONS

- Sharma, M., et al. 2004. Coexpression of Cux-1 and Notch signaling pathway components during kidney development. *Dev. Dyn.* 231: 828-838.
- Valiente, M., et al. 2011. Focal adhesion kinase modulates radial glia-dependent neuronal migration through connexin-26. *J. Neurosci.* 31: 11678-11691.
- Tury, A., et al. 2011. The cyclin-dependent kinase inhibitor p57^{Kip2} regulates cell cycle exit, differentiation, and migration of embryonic cerebral cortical precursors. *Cereb. Cortex* 21: 1840-1856.
- Teissier, A., et al. 2012. Tangentially migrating transient glutamatergic neurons control neurogenesis and maintenance of cerebral cortical progenitor pools. *Cereb. Cortex* 22: 403-416.
- Ma, T., et al. 2012. A subpopulation of dorsal lateral/caudal ganglionic eminence-derived neocortical interneurons expresses the transcription factor Sp8. *Cereb. Cortex* 22: 2120-2130.
- Sato, H., et al. 2012. Thalamus-derived molecules promote survival and dendritic growth of developing cortical neurons. *J. Neurosci.* 32: 15388-15402.
- Denham, M., et al. 2012. Neurons derived from human embryonic stem cells extend long-distance axonal projections through growth along host white matter tracts after intra-cerebral transplantation. *Front. Cell. Neurosci.* 6: 11.


 MONOS
Satisfaction
Guaranteed

Try **CDP (B-10): sc-514008** or **CDP (SS9): sc-101003**, our highly recommended monoclonal alternatives to CDP (M-222). Also, for AC, HRP, FITC, PE, Alexa Fluor® 488 and Alexa Fluor® 647 conjugates, see **CDP (B-10): sc-514008**.