

Anti-EID1 antibody, mouse monoclonal (clone 26)

71-185 100 µg

EID1 (EP300 interacting inhibitor of differentiation 1) encodes a 21 kDa protein, which interacts with RB1 and EP300 and acts as a repressor of MYOD1 transcription. EID1 inhibits EP300 and CBP histone acetyltransferase activity. It may be involved in coupling cell cycle exit to the transcription of genes required for cellular differentiation.

Applications

1) Western blotting (~1 ug/ml) 2) Immunofluorescence staining (1~5 ug/ml) 3) ELISA

Other applications have not been tested.

Antigen: Synthetic peptide containing amino acids 159-187 of human DIE1 protein

Specificity: Reacts with human, mouse and rat EID1 proteins

Isotype: Mouse IgG2a (κ)

Product: This antibody was purified by our propriety chromatography under mild conditions as IgG fraction from serum-free growth medium of mouse hybridoma clone #26.

Form: Purified IgG 1mg/ml in PBS (pH 7.4), 50% glycerol, sterilized by filtration. Azide- and carrier-free

Storage: Shipped at 4°C or -20°C, and upon arrival, spin-down and store at -20°C.

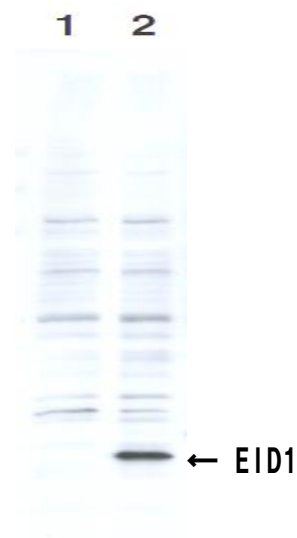
Data Link UniProtKB/Swiss-Prot [Q9Y6B2](#) (EID1_HUMAN)

References

1. MacLellan WR *et al* "A novel Rb- and p300-binding protein inhibits transactivation by MyoD" *Mol Cell Biol* **20**:8903-8915 (2000) PMID: [11073990](#)
2. Nguyen DX *et al* "Acetylation regulates the differentiation-specific functions of the retinoblastoma protein" *EMBO J* **23**: 1609-1618 (2004) PMID: [15044952](#)

Figure Identification of the EID1 protein by the monoclonal antibody clone #26 by Western blotting.

Crude cell extracts of MCF7 cells (breast cancer cell line) transfected with control vector pCMV1 (lane 1) or the EID1 expression vector pcDNA3/EID1 (lane 2) were analyzed by Western blotting using anti-EID1 antibody clone #26 as the primary antibody and HRP-conjugated-mouse IgG as the secondary antibody. The EID1 protein was identified as a 21 kDa protein band as shown by an arrow.



Related Product [#71-190](#) anti-EID1 antibody, monoclonal (# 2)

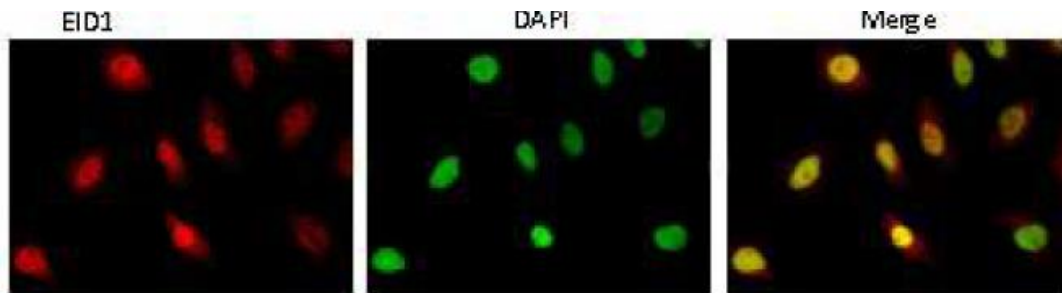


Fig. 2. Indirect immunofluorescence staining of EID1 protein by anti-EID1 antibody (clone 26) in HeLa cell.

Hela cells grown

Fixation of the cells in 4% paraformaldehyde over night

Permeabilization in 0.25% Triton X-100/PBS for 10 min

Blocking in 1.5% BSA/PBS for 30 min

Incubation over night in anti-EID1 (clone 26) antibody diluted 1/1,000 by blocking buffer

Incubation for 60min in 2nd antibody, Goat anti-rabbit IgG conjugated with Alex 488 (1:1000 dilution)

Nuclei were stained with DAPI

The images show that majority of EID1 detected by this antibody is localized in nucleus and subfraction may be localized in cytoplasm, and that it may shuttle between them as described in some literatures.

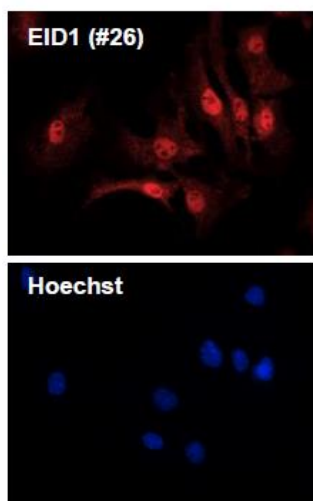


Fig.3 Immunofluorescence staining of EID1 protein in mouse embryonic fibroblast cells with anti-EID1 antibody (clone 26)

MEFs from E14.5 mouse embryos were fixed with 10% formalin at room temperature for 10 min and permeabilized with ice-cold methanol on ice for 10 min. Cells were blocked with 3% BSA/PBS at room temperature for 30 min and incubated with EID1 (1:200, #26) antibodies at 4 ° C overnight, and treated with Cyanine 3-cojugated anti-mouse IgG (1:500 for EID-1) at room temperature for 1hr.

Chromosomal DNA was detected with 3.3 μM Hoechst 33342 (Sigma-Aldrich). The Images were observed with a fluorescence microscope

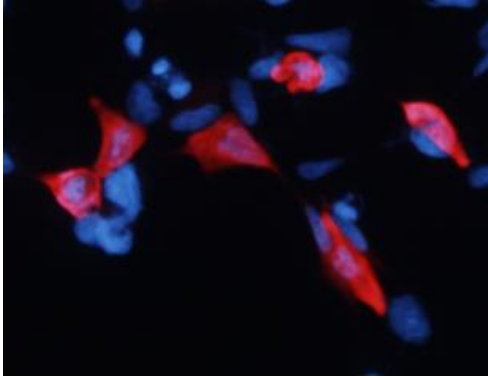


Fig.4 Immunofluorescence staining of EID1 in HEK293 cells transfected with plasmid overexpressing EID1 by using anti-EID1 antibody (clone 26)

Anti-EID1 antibody was used at 1/1,000 dilution and nuclear DNA was stained with Haechst 33342 (blue)