

Peg10 (H-160): sc-68899

BACKGROUND

Peg10 (paternally expressed gene 10), also known as EDR, KIAA1051, MAR2, MART2, MEF3L1 or RGAG3, is a 708 amino acid protein that localizes to both the nucleus and the cytoplasm and contains one CCHC-type zinc finger. Expressed in placenta, brain, kidney, liver, thymus, lung, ovary and spleen, Peg10 plays a role in cell growth promotion and apoptosis prevention and is, therefore, thought to be a potent factor in tumor formation and metastasis. Peg10 exists as two distinct isoforms, designated RF1 and RF1/RF2, which have distinctive active sites, but are both associated with cell growth and differentiation control. The gene encoding Peg10 maps to human chromosome 7, which houses over 1,000 genes and comprises nearly 5% of the human genome. Defects in some of the genes localized to chromosome 7 have been linked to *Osteogenesis imperfecta*, Williams-Beuren syndrome, Pendred syndrome, Lissencephaly, Citrullinemia and Shwachman-Diamond syndrome.

REFERENCES

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3. Li, C.M., et al. 2006. Peg10 is a c-Myc target gene in cancer cells. *Cancer Res.* 66: 665-672.
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7. Clark, M.B., et al. 2007. Mammalian gene Peg10 expresses two reading frames by high efficiency -1 frameshifting in embryonic-associated tissues. *J. Biol. Chem.* 282: 37359-37369.

CHROMOSOMAL LOCATION

Genetic locus: PEG10 (human) mapping to 7q21.3.

SOURCE

Peg10 (H-160) is a rabbit polyclonal antibody raised against amino acids 81-240 mapping near the N-terminus of Peg10 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.

RESEARCH USE

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

APPLICATIONS

Peg10 (H-160) is recommended for detection of Peg10 of 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) and solid phase ELISA (starting dilution 1:30, dilution range 1:30-1:3000); may cross-react with Myelin expression factor-3-like protein (mouse).

Suitable for use as control antibody for Peg10 siRNA (h): sc-89888, Peg10 shRNA Plasmid (h): sc-89888-SH and Peg10 shRNA (h) Lentiviral Particles: sc-89888-V.

Molecular Weight of human Peg10 isoforms RF1/RF2: 37/80 kDa.

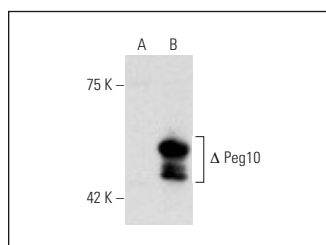
Molecular Weight of mouse Peg10 isoforms RF1/RF2: 42/110 kDa.

Positive Controls: Peg10 (h): 293T lysate: sc-116409.

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[™] compatible goat anti-rabbit IgG-HRP: sc-2030 (dilution range: 1:2000-1:5000), Cruz Marker[™] 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[™] Mounting Medium: sc-24941.

DATA



Peg10 (H-160): sc-68899. Western blot analysis of Peg10 expression in non-transfected: sc-117752 (A) and truncated human Peg10 transfected: sc-116409 (B) 293T whole cell lysates.

STORAGE

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

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Try **Peg10 (C-7): sc-365675**, our highly recommended monoclonal alternative to Peg10 (H-160).