SANTA CRUZ BIOTECHNOLOGY, INC.

EIG121 (V-14): sc-160315

SANTA CRUZ BIOTECHNOLOGY

The Power to Question

BACKGROUND

EIG121 (estrogen-induced gene 121 protein), also known as KIAA1324, is a 1,013 amino acid single-pass transmembrane protein that, though expressed in normal endometrium, is overexpressed in endometriod tumors. This two to three fold upregulation seems to be in response to estrogen replacement therapy, therefore making EIG121 a biomarker for a hyperestrogenic state and estrogen-related type I endometrial carcinoma. As an evolutionarily conserved gene, EIG121 is also expressed during early *Xenopus* development, showing maximum expression at the gastrula stage. The gene encoding EIG121 maps to human chromosome 1, which is the largest human chromosome spanning about 260 million base pairs and making up 8% of the human genome. There are four isoforms of EIG121 that are produced as a result of alternative splicing events.

REFERENCES

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CHROMOSOMAL LOCATION

Genetic locus: KIAA1324 (human) mapping to 1p13.3; 5330417C22Rik (mouse) mapping to 3 F3.

SOURCE

EIG121 (V-14) is an affinity purified goat polyclonal antibody raised against a peptide mapping within an extracellular domain of EIG121 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-160315 P, (100 µg peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

APPLICATIONS

EIG121 (V-14) is recommended for detection of EIG121 of rat and human origin and 5330417C22Rik of mouse origin by Western Blotting (starting dilution 1:200, dilution range 1:100-1:1000), 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).

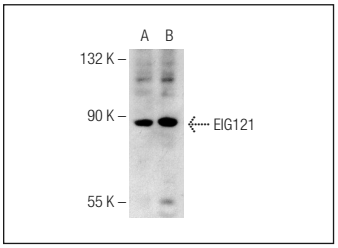
Suitable for use as control antibody for EIG121 siRNA (h): sc-88702, 5330417C22Rik siRNA (m): sc-140350, EIG121 shRNA Plasmid (h): sc-88702-SH, 5330417C22Rik shRNA Plasmid (m): sc-140350-SH, EIG121 shRNA (h) Lentiviral Particles: sc-88702-V and 5330417C22Rik shRNA (m) Lentiviral Particles: sc-140350-V.

Molecular Weight (predicted) of EIG121 isoforms: 111/110/102 kDa.

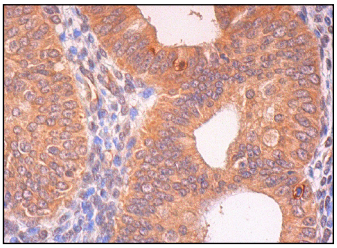
Molecular Weight (observed) of EIG121: 89 kDa.

Positive Controls: HeLa whole cell lysate: sc-2200, AN3 CA cell lysate: sc-24662 or MES-SA/Dx5 cell lysate: sc-2284.

DATA



EIG121 (V-14): sc-160315. Western blot analysis of EIG121 expression in AN3 CA (**A**) and MES-SA/Dx5 (**B**) whole cell lysates.



EIG121 (V-14): sc-160315. Immunoperoxidase staining of formalin fixed, paraffin-embedded human premenopausal uterus tissue showing cytoplasmic staining of glandular cells.

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.