SANTA CRUZ BIOTECHNOLOGY, INC.

IL-17E (V-18): sc-20595



BACKGROUND

The proinflammatory cytokine Interleukin 17 (IL-17) is produced by activated T cells to elicit potent cellular responses. IL-17 is secreted as a disulfidelinked homodimeric glycoprotein. A human IL-17 homolog IL-17E is a ligand for EV127/IL-17BR, which is also known as IL-17 receptor homolog 1. IL-17E mRNA is detected at very low levels in several peripheral tissues. IL-17E induces the activation of NF κ B and stimulates the production of the proinflammatory chemokine IL-8. In addition, IL-17E has catabolic activity on human articular cartilage. IL-17E is a unique pleiotropic cytokine that may be an important mediator of inflammatory and immune responses. Another homolog of IL-17, IL-17F, is a secreted cytokine expressed only in activated CD⁴⁺ T cells and activated monocytes. IL-17F stimulates the production of other cytokines such as IL-6, IL-8 and granulocyte colony-stimulating factor, and regulates cartilage matrix turnover.

REFERENCES

- Fossiez, F., et al. 1996. T cell interleukin-17 induces stromal cells to produce proinflammatory and hematopoietic cytokines. J. Exp. Med. 183: 2593-2603.
- Hymowitz, S.G., et al. 2001. IL-17s adopt a cystine knot fold: structure and activity of a novel cytokine, IL-17F, and implications for receptor binding. EMBO J. 20: 5332-5341.
- 3. Lee, J., et al. 2001. IL-17E, a novel proinflammatory ligand for the IL-17 receptor homolog IL-17Rh1. J. Biol. Chem. 276: 1660-1664.
- Starnes, T., et al. 2001. Cutting edge: IL-17F, a novel cytokine selectively expressed in activated T cells and monocytes, regulates angiogenesis and endothelial cell cytokine production. J. Immunol. 167: 4137-4140.
- Pan, G., et al. 2001. Forced expression of murine IL-17E induces growth retardation, jaundice, a Th2-biased response, and multiorgan inflammation in mice. J. Immunol. 167: 6559-6567.

CHROMOSOMAL LOCATION

Genetic locus: IL25 (human) mapping to 14q11.2; II25 (mouse) mapping to 14 C3.

SOURCE

IL-17E (V-18) is an affinity purified goat polyclonal antibody raised against a peptide mapping within an internal region of IL-17E of human origin.

PRODUCT

Each vial contains 200 μg lgG in 1.0 ml of PBS with < 0.1% sodium azide and 0.1% gelatin.

Blocking peptide available for competition studies, sc-20595 P, (100 μ g peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

STORAGE

Store at 4° C, **D0 NOT FREEZE**. Stable for one year from the date of shipment. Non-hazardous. No MSDS required.

APPLICATIONS

IL-17E (V-18) is recommended for detection of IL-17E of mouse, rat and human 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).

IL-17E (V-18) is also recommended for detection of IL-17E in additional species, including canine, bovine and porcine.

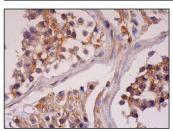
Suitable for use as control antibody for IL-17E siRNA (h): sc-39654, IL-17E siRNA (m): sc-39655, IL-17E shRNA Plasmid (h): sc-39654-SH, IL-17E shRNA Plasmid (m): sc-39655-SH, IL-17E shRNA (h) Lentiviral Particles: sc-39654-V and IL-17E shRNA (m) Lentiviral Particles: sc-39655-V.

Molecular Weight of IL-17E: 25 kDa.

RECOMMENDED SECONDARY REAGENTS

To ensure optimal results, the following support (secondary) reagents are recommended: 1) Western Blotting: use donkey anti-goat IgG-HRP: sc-2020 (dilution range: 1:2000-1:100,000) or Cruz Marker™ compatible donkey anti-goat IgG-HRP: sc-2033 (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) Immunofluo-rescence: use donkey anti-goat IgG-FITC: sc-2024 (dilution range: 1:100-1:400) or donkey anti-goat IgG-TR: sc-2783 (dilution range: 1:100-1:400) with UltraCruz™ Mounting Medium: sc-24941. 3) Immunohistochemistry: use ImmunoCruz™: sc-2053 or ABC: sc-2023 goat IgG Staining Systems.

DATA



IL-17E (V-18): sc-20595. Immunoperoxidase staining of formalin fixed, paraffin-embedded human testis tissue showing cytoplasmic and membrane staining of cells in seminiferous ducts and cytoplasmic staining of Leydig cells.

RESEARCH USE

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

