IL-17E (N-13): sc-20594



The Power to Question

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 disulfide-linked 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, as well as regulating 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.
- 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.
- 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.

CHROMOSOMAL LOCATION

Genetic locus: IL17E (human) mapping to 14q11.2; II17e (mouse) mapping to 14 C3.

SOURCE

IL-17E (N-13) 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-20594 P, (100 μ g peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

STORAGE

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

APPLICATIONS

IL-17E (N-13) 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), immunoprecipitation [1-2 μ g per 100-500 μ g 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).

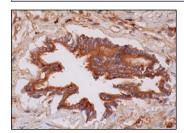
Suitable for use as control antibody for IL-17E siRNA (h): sc-39654, IL-17E siRNA (m): sc-39655, IL-17E shRNA Plasmid (h): sc-39654-SH, IL-17E shRNA Plasmid (m): sc-39655-SH, IL-17E shRNA (h) Lentiviral Particles: sc-39654-V and IL-17E shRNA (m) Lentiviral Particles: sc-39655-V.

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) Immunoprecipitation: use Protein A/G PLUS-Agarose: sc-2003 (0.5 ml agarose/2.0 ml). 3) Immunofluorescence: 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. 4) Immunohistochemistry: use ImmunoCruz™: sc-2053 or ABC: sc-2023 goat IgG Staining Systems.

DATA



IL-17E (N-13): sc-20594. Immunoperoxidase staining of formalin fixed, paraffin-embedded human bronchus tissue showing cytoplasmic staining of respiratory epithelial cells.

RESEARCH USE

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



Try IL-17E (30479): sc-74175, our highly recommended monoclonal alternative to IL-17E (N-13).