SANTA CRUZ BIOTECHNOLOGY, INC.

eotaxin (FL-97): sc-28878



BACKGROUND

Eotaxin is a member of the C-C or β family of chemokines which is characterized by a pair of adjacent cysteine residues. Eotaxin was first purified from the bronchoalveolar lavage fluid of guinea pigs challenged with an aerosol allergen, and serves as a potent chemo-attractant for eosinophils. Eosinophilia is a prominent feature of several allergic conditions and is thought to be a central event in maladies such as bronchial asthma, dermatitis, conjunctivitis and possibly inflammatory bowel disease. The cognate eotaxin receptor has been identified. Originally described as mouse orphan receptor (MIP-1 α receptor-like 2), CKR-3 has been shown to not only serve as the high affinity receptor for eotaxin, but also for RANTES and MCP-3 . The 45-55 kDa CKR-3 is expressed on the cell surface of primary eosinophils and does not bind to other members of the C-C or C-X-C family of chemokines. Of note, CKR-3 also serves as a "coreceptor" for a restricted subset of viruses.

REFERENCES

- Jose, P.J., et al. 1994. Eotaxin: a potent eosinophil chemoattractant cytokine detected in a guinea pig model of allergic airways inflammation. J. Exp. Med. 179: 881-887.
- Jose, P.J., et al. 1994. Eotaxin: cloning of an eosinophil chemoattractant cytokine and increased mRNA expression in allergen-challenged guineapig lungs. Biochem. Biophys. Res. Comm. 205: 788-794.
- Ponath, P.D., et al. 1996. Cloning of the human eosinophil chemoattractant, eotaxin. Expression, receptor binding, and functional properties suggest a mechanism for the selective recruitment of eosinophils. J. Clin. Invest. 97: 604-612.
- Carcia-Zepeda, E.A., et al. 1996. Human eotaxin is a specific chemoattractant for eosinophil cells and provides a new machanism to explain tissue eosinophilia. Nat. Med. 2: 449-456.
- Kitaura, M., et al. 1996. Molecular cloning of human eotaxin, an eosinophil-selective CC chemokine, and identification of a specific eosinophil eotaxin receptor, CC chemokine receptor 3. J. Biol. Chem. 271: 7725-7730.
- Choe, H., et al. 1996. The beta-chemokine receptors CCR3 and CCR5 facilitate infection by primary HIV-1 isolates. Cell 85: 1135-1148.

SOURCE

eotaxin (FL-97) is a rabbit polyclonal antibody raised against amino acids 1-97 representing full length eotaxin of mouse origin.

PRODUCT

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

STORAGE

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

APPLICATIONS

eotaxin (FL-97) is recommended for detection of eotaxin of mouse and rat 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) and solid phase ELISA (starting dilution 1:30, dilution range 1:30-1:3000).

Suitable for use as control antibody for eotaxin siRNA (m): sc-63310.

Molecular Weight of eotaxin: 8.4 kDa.

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.

RESEARCH USE

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

PROTOCOLS

See our web site at www.scbt.com or our catalog for detailed protocols and support products.