

CXCL16 (h): 293T Lysate: sc-115964

BACKGROUND

CXCL16, also known as SR-PSOX (scavenger receptor for phosphatidylserine and oxidized lipoprotein), binds to CXCR6/Bonzo/STRL33, induces a strong chemotactic response and induces calcium mobilization. CXCL16, an α (CXC) chemokine, also has characteristics of CC chemokines and a structure similar to fractalkine (neurotactin) in having a transmembrane region and a chemokine domain suspended by a mucin-like stalk. Northern blot analysis of mouse and human tissues detect a 2.2-kb CXCL16 transcript in spleen, lymph nodes, Peyer patches, lung, kidney, small intestine and thymus, with weak expression in heart and liver and no expression in brain and bone marrow. Flow cytometry and Western blot analysis demonstrate expression of a glycosylated cell-surface protein and a cell supernatant soluble protein.

REFERENCES

1. Matloubian, M., et al. 2000. A transmembrane CXC chemokine is a ligand for HIV-co-receptor Bonzo. *Nat. Immunol.* 1: 298-304.
2. Wilbanks, A., et al. 2001. Expression cloning of the STRL33/BONZO/TYMSTR ligand reveals elements of CC, CXC, and CX3C chemokines. *J. Immunol.* 166: 5145-5154.
3. Kume, N. 2002. New oxidized LDL receptors and their functions in atherogenesis. *Nippon Ronen Igakkai Zasshi* 39: 264-267.
4. Nakayama, T., et al. 2003. Cutting edge: profile of chemokine receptor expression on human plasma cells accounts for their efficient recruitment to target tissues. *J. Immunol.* 170: 1136-1140.
5. Shashkin, P., et al. 2003. Expression of CXCL16 in human T cells. *Arterioscler. Thromb. Vasc. Biol.* 23: 148-149.
6. Yamauchi, R., et al. 2004. Upregulation of SR-PSOX/CXCL16 and recruitment of CD8⁺ T cells in cardiac valves during inflammatory valvular heart disease. *Arterioscler. Thromb. Vasc. Biol.* 24: 282-287.
7. Wuttge, D.M., et al. 2004. CXCL16/SR-PSOX is an interferon- γ -regulated chemokine and scavenger receptor expressed in atherosclerotic lesions. *Arterioscler. Thromb. Vasc. Biol.* 24: 750-755.
8. Chandrasekar, B., et al. 2004. CXCL16 signals via G_i, phosphatidylinositol 3-kinase, Akt, I κ B kinase, and nuclear factor κ B and induces cell-cell adhesion and aortic smooth muscle cell proliferation. *J. Biol. Chem.* 279: 3188-3196.
9. SWISS-PROT/TrEMBL (Q9H2A7). World Wide Web URL: <http://www.expasy.ch/sprot/sprot-top.html>

CHROMOSOMAL LOCATION

Genetic locus: CXCL16 (human) mapping to 17p13.2.

PRODUCT

CXCL16 (h): 293T Lysate represents a lysate of human CXCL16 transfected 293T cells and is provided as 100 μ g protein in 200 μ l SDS-PAGE buffer.

RESEARCH USE

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

APPLICATIONS

CXCL16 (h): 293T Lysate is suitable as a Western Blotting positive control for human reactive CXCL16 antibodies. Recommended use: 10-20 μ l per lane.

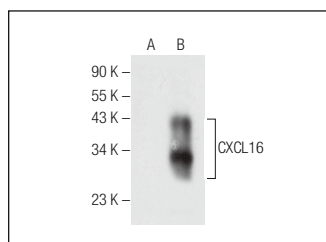
Control 293T Lysate: sc-117752 is available as a Western Blotting negative control lysate derived from non-transfected 293T cells.

CXCL16 (D-6): sc-376395 is recommended as a positive control antibody for Western Blot analysis of enhanced human CXCL16 expression in CXCL16 transfected 293T cells (starting dilution 1:100, dilution range 1:100-1:1,000).

RECOMMENDED SUPPORT REAGENTS

To ensure optimal results, the following support reagents are recommended:
1) Western Blotting: use m-IgG κ BP-HRP: sc-516102 or m-IgG κ BP-HRP (Cruz Marker): sc-516102-CM (dilution range: 1:1000-1:10000), Cruz Marker™ Molecular Weight Standards: sc-2035, UltraCruz® Blocking Reagent: sc-516214 and Western Blotting Luminol Reagent: sc-2048.

DATA



CXCL16 (D-6): sc-376395. Western blot analysis of CXCL16 expression in non-transfected: sc-117752 (A) and human CXCL16 transfected: sc-115964 (B) 293T whole cell lysates.

STORAGE

Store at -20° C. Repeated freezing and thawing should be minimized. Sample vial should be boiled once prior to use. Non-hazardous. No MSDS required.

PROTOCOLS

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