

CKR-6 (C-20): sc-9697

BACKGROUND

C-C or β chemokine family members are characterized by a pair of adjacent cysteine residues and serve as potent chemoattractants and activators of monocytes and T cells. C-C chemokine receptor family members include CKR-1, CKR-2A, CKR-2B, CKR-3, CKR-4, CKR-5, CKR-6, CKR-7, CKR-8, CKR-9, CKR-10 and the Duffy blood group antigen. Each of these receptors are G protein-coupled, seven pass transmembrane domain proteins whose major physiological role is to function in the chemotaxis of T cells and phagocytic cells to areas of inflammation. However, this receptor family has also been shown to facilitate viral infection. CKR-6 (C-C chemokine receptor type 6), also known as CCR6, CKRL3, CMKBR6, GPR29 or STRL22, is a 374 amino acid multi-pass membrane protein that belongs to the C-C chemokine receptor family. Expressed in appendix, spleen, lymph nodes and fetal liver, CKR-6 functions as a receptor for a variety of proteins, including MCP-3 α , thereby influencing intracellular calcium levels and affecting signal transduction throughout the cell.

REFERENCES

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- Deng, H., et al. 1996. Identification of a major co-receptor for primary isolates of HIV-1. *Nature* 381: 661-666.
- Dragic, T., et al. 1996. HIV-1 entry into CD4⁺ cells is mediated by the chemokine receptor CC-CKR-5. *Nature* 381: 667-673.
- Feng, Y., et al. 1996. HIV-1 entry co-factor: functional cDNA cloning of a seven-transmembrane, G protein-coupled receptor. *Science* 272: 872-877.
- Alkhatib, G., et al. 1996. C-C CKR5: a RANTES, MIP-1 α , MIP-1 β receptor as a fusion co-factor for macrophage-tropic HIV-1. *Science* 272: 1955-1958.
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- Doranz, B.J., et al. 1996. A dual-tropic primary HIV-1 isolate that uses fusin and the β -chemokine receptors CKR-5, CKR-3, and CKR-2B as fusion co-factors. *Cell* 85: 1149-1158.

CHROMOSOMAL LOCATION

Genetic locus: CCR6 (human) mapping to 6q27; Ccr6 (mouse) mapping to 17 A1.

SOURCE

CKR-6 (C-20) is an affinity purified goat polyclonal antibody raised against a peptide mapping at the C-terminus of CKR-6 of human origin.

STORAGE

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

PRODUCT

Each vial contains 200 μ g IgG in 1.0 ml of PBS with < 0.1% sodium azide and 0.1% gelatin.

Blocking peptide available for competition studies, sc-9697 P, (100 μ g peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

APPLICATIONS

CKR-6 (C-20) is recommended for detection of CKR-6 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) and solid phase ELISA (starting dilution 1:30, dilution range 1:30-1:3000).

CKR-6 (C-20) is also recommended for detection of CKR-6 in additional species, including equine and canine.

Suitable for use as control antibody for CKR-6 siRNA (h): sc-35064, CKR-6 siRNA (m): sc-35065, CKR-6 shRNA Plasmid (h): sc-35064-SH, CKR-6 shRNA Plasmid (m): sc-35065-SH, CKR-6 shRNA (h) Lentiviral Particles: sc-35064-V and CKR-6 shRNA (m) Lentiviral Particles: sc-35065-V.

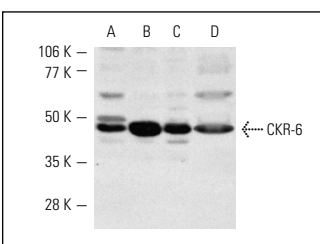
Molecular Weight of CKR-6: 46 kDa.

Positive Controls: BYDP whole cell lysate: sc-364368, THP-1 cell lysate: sc-2238 or CCRF-CEM cell lysate: sc-2225.

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.

DATA



CKR-6 (C-20): sc-9697. Western blot analysis of CKR-6 expression in BYDP (A), THP-1 (B), CCRF-CEM (C) and NAMALWA (D) whole cell lysates.

RESEARCH USE

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