# IL-8RA (B-1): sc-7303



The Power to Question

# **BACKGROUND**

IL-8 has been shown to function as a potent neutrophil chemostatic and activating peptide and is an important mediator of inflammatory diseases. Two distinct human IL-8 receptors, designated IL-8RA and IL-8RB, have been characterized. Both are expressed at a high level on neutrophils, and to a lesser extent on monocytes and myeloid cell lines. In addition, the IL-8RA subunit is expressed in T cells such as the Jurkat cell line. Both IL-8Rs are members of the seven-transmembrane domain rhodopsin superfamily of receptors and as such, couple G proteins for signal transduction. The two receptors share 77% amino acid identity. IL-8RA exhibits high-affinity binding for IL-8 and low-affinity MGSA binding, whereas IL-8RB has high-affinity binding for both IL-8 and MGSA.

# **CHROMOSOMAL LOCATION**

Genetic locus: CXCR1 (human) mapping to 2q35.

# **SOURCE**

IL-8RA (B-1) is a mouse monoclonal antibody epitope mapping at the N-terminus of IL-8RA of human origin.

#### **PRODUCT**

Each vial contains 200  $\mu g \ lgG_1$  kappa light chain in 1.0 ml of PBS with < 0.1% sodium azide and 0.1% gelatin.

IL-8RA (B-1) is available conjugated to agarose (sc-7303 AC), 500 μg/0.25 ml agarose in 1 ml, for IP; to HRP (sc-7303 HRP), 200 μg/ml, for WB, IHC(P) and ELISA; to either phycoerythrin (sc-7303 PE), fluorescein (sc-7303 FITC), Alexa Fluor\* 488 (sc-7303 AF488), Alexa Fluor\* 546 (sc-7303 AF546), Alexa Fluor\* 594 (sc-7303 AF594) or Alexa Fluor\* 647 (sc-7303 AF647), 200 μg/ml, for WB (RGB), IF, IHC(P) and FCM; and to either Alexa Fluor\* 680 (sc-7303 AF680) or Alexa Fluor\* 790 (sc-7303 AF790), 200 μg/ml, for Near-Infrared (NIR) WB, IF and FCM.

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# **APPLICATIONS**

IL-8RA (B-1) is recommended for detection of IL-8RA of human and hamster origin by Western Blotting (starting dilution 1:200, dilution range 1:100-1:1000), immunoprecipitation [1-2 µg per 100-500 µg 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-8RA siRNA (h): sc-40026, IL-8RA shRNA Plasmid (h): sc-40026-SH and IL-8RA shRNA (h) Lentiviral Particles: sc-40026-V.

Molecular Weight of IL-8RA: 70 kDa.

Positive Controls: IL-8RA (h3): 293T Lysate: sc-176056.

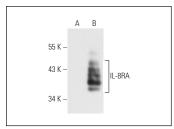
#### **RESEARCH USE**

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

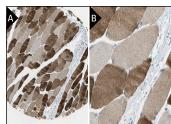
# **STORAGE**

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

# DATA



IL-8RA (B-1): sc-7303. Western blot analysis of IL-8RA expression in non-transfected: sc-117752 (A) and human IL-8RA transfected: sc-176056 (B) 293T whole cell Ivsates



IL-8RA (B-1): sc-7303. Immunoperoxidase staining of formalin fixed, paraffin-embedded human skeletal muscle tissue showing cytoplasmic staining of myocytes at low (A) and high (B) magnification. Kindly provided by The Swedish Human Protein Atlas (HPA) program.

# **SELECT PRODUCT CITATIONS**

- 1. Masood, R., et al. 2001. Interleukin 8 is an autocrine growth factor and a surrogate marker for Kaposi's sarcoma. Clin. Cancer Res. 7: 2693-2702.
- Bates, R.C., et al. 2004. The epithelial-mesenchymal transition of colon carcinoma involves expression of IL-8 and CXCR-1-mediated chemotaxis. Exp. Cell Res. 299: 315-324.
- Gatla, H.R., et al. 2017. Histone deacetylase (HDAC) inhibition induces IκB kinase (IKK)-dependent interleukin-8/CXCL8 expression in ovarian cancer cells. J. Biol. Chem. 292: 5043-5054.
- Uddin, M.M., et al. 2018. Proteasome inhibition induces IKK-dependent interleukin-8 expression in triple negative breast cancer cells: opportunity for combination therapy. PLoS ONE 13: e0201858.
- Takemori, T., et al. 2018. Transcutaneous carbon dioxide application suppresses bone destruction caused by breast cancer metastasis. Oncol. Rep. 40: 2079-2087.
- Blandinières, A., et al. 2021. Interleukin-8 receptors CXCR1 and CXCR2 are not expressed by endothelial colony-forming cells. Stem Cell Rev. Rep. 17: 628-638.
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- 8. Hamshaw, I., et al. 2024. The role of PKC and PKD in CXCL12 and CXCL13 directed malignant melanoma and acute monocytic leukemic cancer cell migration. Cell. Signal. 113: 110966.
- 9. Kurniyati, K., et al. 2025. A bipartite bacterial virulence factor targets the complement system and neutrophil activation. EMBO J. 44: 1154-1184.

# **PROTOCOLS**

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