

CMKLR1 Blocking Peptide (C-term)

Synthetic peptide Catalog # BP20213b

Specification

CMKLR1 Blocking Peptide (C-term) - Product Information

Primary Accession Q99788

Other Accession <u>B1PHQ8</u>, <u>NP_004063.1</u>

CMKLR1 Blocking Peptide (C-term) - Additional Information

Gene ID 1240

Other Names

Chemokine-like receptor 1, G-protein coupled receptor ChemR23, G-protein coupled receptor DEZ, CMKLR1, CHEMR23, DEZ

Target/Specificity

The synthetic peptide sequence is selected from aa 320-333 of HUMAN CMKLR1

Format

Peptides are lyophilized in a solid powder format. Peptides can be reconstituted in solution using the appropriate buffer as needed.

Storage

Maintain refrigerated at 2-8°C for up to 6 months. For long term storage store at -20°C.

Precautions

This product is for research use only. Not for use in diagnostic or therapeutic procedures.

CMKLR1 Blocking Peptide (C-term) - Protein Information

Name CMKLR1 (HGNC:2121)

Synonyms CHEMR23, DEZ

Function

Receptor for the chemoattractant adipokine chemerin/RARRES2 and for the omega-3 fatty acid derived molecule resolvin E1. Interaction with RARRES2 initiates activation of G proteins G(i)/G(o) and beta-arrestin pathways inducing cellular responses via second messenger pathways such as intracellular calcium mobilization, phosphorylation of MAP kinases MAPK1/MAPK3 (ERK1/2), TYRO3, MAPK14/P38MAPK and PI3K leading to multifunctional effects, like reduction of immune responses, enhancing of adipogenesis and angionesis (PubMed:27716822). Resolvin E1 down-regulates cytokine production in macrophages by reducing the activation of MAPK1/3 (ERK1/2) and NF- kappa-B. Positively regulates adipogenesis and adipocyte metabolism.

Cellular Location



Cell membrane; Multi-pass membrane protein. Note=Internalizes efficiently in response to RARRES2.

Tissue Location

Prominently expressed in developing osseous and cartilaginous tissue. Also found in adult parathyroid glands. Expressed in cardiovascular system, brain, kidney, gastrointestinal tissues and myeloid tissues. Expressed in a broad array of tissues associated with hematopoietic and immune function including, spleen, thymus, appendix, lymph node, bone marrow and fetal liver. Among leukocyte populations abundant expression in monocyte-derived macrophage and immature dendritic cells (DCs). High expression in blood monocytes and low levels in polymorphonuclear cells and T-cells. Expressed on endothelial cells. Highly expressed in differentiating adipocytes

CMKLR1 Blocking Peptide (C-term) - Protocols

Provided below are standard protocols that you may find useful for product applications.

Blocking Peptides

CMKLR1 Blocking Peptide (C-term) - Images

CMKLR1 Blocking Peptide (C-term) - Background

Orphan receptor. Could be a chemotactic peptide receptor. May have a function in bone metabolism. Acts as a coreceptor for several SIV strains (SIVMAC316, SIVMAC239, SIVMACL7E-FR and SIVSM62A), as well as a primary HIV-1 strain (92UG024-2).

CMKLR1 Blocking Peptide (C-term) - References

Rose, J.E., et al. Mol. Med. 16 (7-8), 247-253 (2010):
Davila, S., et al. Genes Immun. 11(3):232-238(2010)
Ohira, T., et al. J. Biol. Chem. 285(5):3451-3461(2010)
Kaur, J., et al. Biochem. Biophys. Res. Commun. 391(4):1762-1768(2010)
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