

Product datasheet for **AM31204AF-N**

CXCR4 Mouse Monoclonal Antibody [Clone ID: B-R24]

Product data:

Product Type:	Primary Antibodies
Clone Name:	B-R24
Applications:	FC, FN
Recommended Dilution:	Flow Cytometry.
	Functional Assay: Inhibits HIV infection.
Reactivity:	Human
Host:	Mouse
Isotype:	IgG1
Clonality:	Monoclonal
Immunogen:	CXCR4 transfected CHO cell line. Hybridoma: Myeloma X63/AG.8653 x Balb/c spleen cells.
Specificity:	Recognizes the soluble antigen. Recognizes the CXCR4 antigen, a 39.7 kDa protein.
Formulation:	Phosphate-buffered saline without Carrier and preservatives. This product is sterile-filtered through 0.22 µm and treated to remove Endotoxins. State: Azide Free State: Liquid purified IgG fraction
Concentration:	lot specific
Purification:	Ion Exchange Chromatography
Conjugation:	Unconjugated
Storage:	Store the antibody undiluted at 2-8°C.
Stability:	Shelf life: one year from despatch.
Gene Name:	C-X-C motif chemokine receptor 4
Database Link:	Entrez Gene 7852 Human P61073



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Background:

CXCR4 (fusin, LESTR or HUMSTR) is a principal coreceptor for T cell tropic strains of HIV1 fusion and entry of human white blood cells. CXCR4 is also required for the infection by dual tropic strains of HIV1 and mediates CD4 independent infection by HIV2. The chemokine SDF1 is the ligand for CXCR4 and prevents infection by T tropic HIV1. CXCR4 associates with the surface CD4-gp120 complex before HIV enters target cells. CXCR4 messenger RNA levels correlated with HIV1 permissiveness in diverse human cell types. Antibodies to CXCR4 block HIV1 and HIV2 fusion and infection of human target cells. The amino terminal domain and the second extracellular loop of CXCR4 serve as HIV binding sites. CXCR4 is highly expressed in brain and heart, and in white blood cells, vascular endothelial cells, and umbilical cord endothelial cells.

Synonyms:

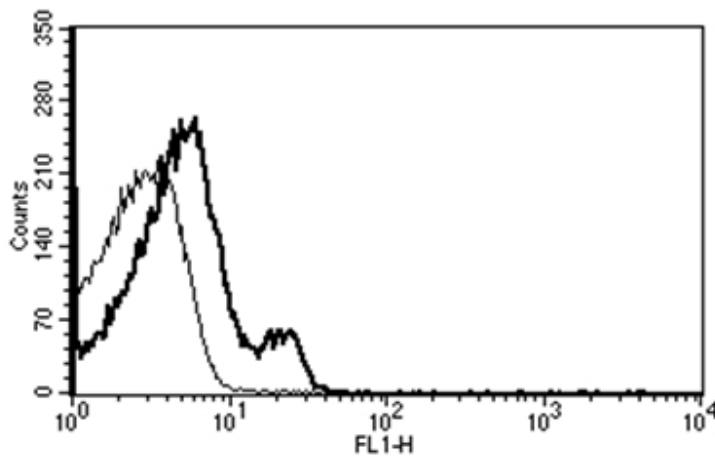
CXC-R4, CXCR-4, Fusin, LCR1, FB22, NPYRL, HM89, SDF1 receptor, LESTR

Protein Families:

Druggable Genome, ES Cell Differentiation/IPS, GPCR, Transmembrane

Protein Pathways:

Axon guidance, Chemokine signaling pathway, Cytokine-cytokine receptor interaction, Endocytosis, Leukocyte transendothelial migration

Product images:

A typical staining pattern with the B-R24 monoclonal antibody of lymphocytes.