

DICR/CLEC4A recombinant protein

DICR/CLEC4A Protein, Human, Recombinant (ECD, hFc Tag), HPLC-verified

CATALOG #
AAA259186

HOST
HEK293 Cells

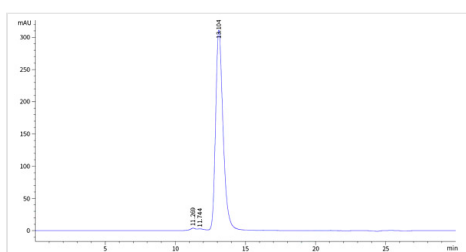
PRODUCT SYNONYMS

DICR/CLEC4A; DICR/CLEC4A Protein; Human; Recombinant (ECD; hFc Tag); HPLC-verified; C-type lectin domain family 4 member A; CD367 Protein; CLEC4A Protein; CLEC6 Protein; DCIR Protein; DDB27 Protein; HDCGC13P Protein; LLIR Protein; DICR/CLEC4A recombinant protein

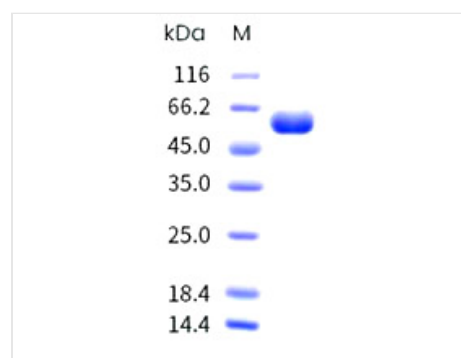
PRODUCT SPECIFICATIONS

Host	HEK293 Cells
Purity/Purification	>= 95% as determined by SDS-PAGE. = 95% as determined by SEC-HPLC.
Form/Format	Lyophilized from sterile PBS, 10% Trehalose, 10% Glycerol, 0.02% Tween 80, pH 7.4. Normally 5%-8% trehalose, mannitol and 0.01% Tween80 are added as protectants before lyophilization.
Species	Human
Predicted N Terminal	Gln 70
Endotoxin	<1.0 EU per ug protein as determined by the LAL method.
Protein Construction	A DNA sequence encoding the Human CLEC4A (NP_057268.1)(Gln70-Leu237) was expressed with the Fc region of human IgG1 at the C-terminus.
Preparation and Storage	Samples are stable for up to twelve months from date of receipt at -20 degree C to -80 degree C. Store it under sterile conditions at -20 degree C to -80 degree C. It is recommended that the protein be aliquoted for optimal storage. Avoid repeated freeze-thaw cycles.

IMAGES



Application Data



Application Data

ADDITIONAL INFORMATION

Related Product Information for DICR/CLEC4A recombinant protein	Dendritic cell immunoreceptor (DCIR), also known as C-type lectin domain family 4 member A (CLEC4A), C-type lectin superfamily member 6 (CLECSF6), is a single-pass type II C-type lectin receptor expressed mainly in dendritic cells (DCs), which is a negative regulator of DC expansion and has a crucial role in maintaining the homeostasis of the immune system. The Dectin-2 family of C-type lectins that includes Dectin-2, BDCA-2, DCIR, DCAR, Clecsf8 and Mincle. These type II receptors contain a single extracellular carbohydrate recognition domain and have diverse functions in both immunity and homeostasis. DCIR is the only member of the family which contains a cytoplasmic signalling motif and has been shown to act as an inhibitory receptor, while BDCA-2, Dectin-2, DCAR and Mincle all associate with FcRgamma chain to induce cellular activation, including phagocytosis and cytokine production. Dectin-2 and Mincle have been shown to act as pattern recognition receptors for fungi, while DCIR acts as an attachment factor for HIV. In addition to pathogen recognition, DCIR has been shown to be pivotal in preventing autoimmune disease by controlling dendritic cell proliferation. DCIR expressed on antigen presenting cells and granulocytes and acts as an inhibitory receptor via an intracellular immunoreceptor tyrosine-based inhibitory motif (ITIM). It may also be involved via its ITIM motif in the inhibition of B-cell-receptor-mediated calcium mobilization and protein tyrosine phosphorylation. Additionally, DCIR can participate in the capture of HIV-1 and promote infection in trans and in cis of autologous CD4(+) T cells from human immature monocyte-derived DCs. DCIR acts as a ligand for HIV-1 and is involved in events leading to productive virus infection.
References	Kanazawa N, et al. (2004) Signaling and immune regulatory role of the dendritic cell immunoreceptor (DCIR) family lectins: DCIR, DCAR, dectin-2 and BDCA-2. Immunobiology. 209(1-2): 179-90. Fujikado N, et al. (2008) Dcir deficiency causes development of autoimmune diseases in mice due to excess expansion of dendritic cells. Nat Med. 14(2): 176-80. Lambert AA, et al. (2008) The C-type lectin surface receptor DCIR acts as a new attachment factor for HIV-1 in dendritic cells and contributes to trans- and cis-infection pathways. Blood. 112(4): 1299-307. Graham LM, et al. (2009) The Dectin-2 family of C-type lectins in immunity and homeostasis. Cytokine. 48(1-2): 148-55.

NCBI AND UNIPROT INFORMATION

NCBI GI #	7705338
NCBI GeneID	50856
NCBI Accession #	NP_057268.1
NCBI GenBank Nucleotide #	NM_016184.3
UniProt Accession #	Q9UMR7; Q17R69; Q8WXW9; Q9H2Z9; Q9NS33; Q9UI34
NCBI Official Full Name	C-type lectin domain family 4 member A isoform 1
NCBI Official Synonym Full Names	C-type lectin domain family 4, member A
NCBI Official Symbol	CLEC4A
NCBI Official Synonym Symbols	DCIR; LLIR; DDB27; CLECSF6; HDCGC13P
NCBI Protein Information	C-type lectin domain family 4 member A; C-type lectin DDB27; lectin-like immunoreceptor; dendritic cell immunoreceptor; C-type lectin superfamily member 6; C-type (calcium dependent, carbohydrate-recognition domain) lectin, superfamily member 6
UniProt Protein Name	C-type lectin domain family 4 member A
UniProt Gene Name	CLEC4A
UniProt Synonym Gene Names	CLECSF6; DCIR; LLIR
UniProt Entry Name	CLC4A_HUMAN

For Research Use Only. Not for use in diagnostic or therapeutic procedures. Small volumes of product may become entrapped in the seal of the vial during shipment and storage; if necessary, briefly centrifuge the vial on a tabletop centrifuge to dislodge any liquid in the cap.