SunLong Biotech Co.,LTD
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**[ Primary Antibody ]**

# Rabbit Anti-CD209/DC-SIGN antibody

**Catalog Number: SL2239R**

**FOR RESEARCH USE ONLY**

**[ DATASHEET ]**

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| **Host:** | Rabbit |
| **Isotype:** | IgG |
| **Clonality:** | Polyclonal |
| **Target:** | CD209/DC-SIGN |
| **Immunogen:** | KLH conjugated synthetic peptide derived from mouse DC-SIGN/CD209: 81-180/238 <Extracellular> |
| **Purification:** | affinity purified by Protein A |
| **Concentration:** | 1mg/ml |
| **Storage:** | 0.01M TBS (pH7.4) with 1% BSA, 0.02% Proclin300 and 50% Glycerol. Shipped at 4℃. Store at -20 °C for one year. Avoid repeated freeze/thaw cycles. |
| **Applications:** | WB=1:500-2000<br>not yet tested in other applications.<br>optimal dilutions/concentrations should be determined by the end user. |
| **Reactivity:** | Human,Mouse,Rat |
| **Predicted MW.:** | 45kDa |
| **Subcellular Location:** | The cell membrane Secretory protein |
| **Background:** | This gene encodes a transmembrane receptor and is often referred to as L-SIGN because of its expression in the endothelial cells of the lymph nodes and liver. The encoded protein is involved in the innate immune system and recognizes numerous evolutionarily divergent pathogens ranging from parasites to viruses, with a large impact on public health. The protein is organized into three distinct domains: an N-terminal transmembrane domain, a tandem-repeat neck domain and C-type lectin carbohydrate recognition domain.<br>The extracellular region consisting of the C-type lectin and neck domains has a dual function as a pathogen recognition receptor and a cell adhesion receptor by binding carbohydrate ligands on the surface of microbes and endogenous cells. The neck region is important for homo-oligomerization which allows the receptor to bind multivalent ligands with high avidity. Variations in the number of 23 amino acid repeats in the neck domain of this protein are |

Important Note: This product as supplied is intended for research use only, not for use in human, therapeutic or diagnostic applications.

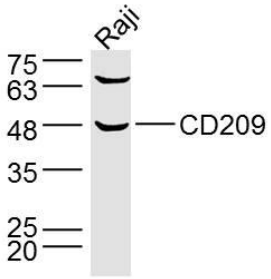
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| | common and have a significant impact on ligand binding ability.<br>This gene is closely related in terms of both sequence and function to a neighboring gene (GeneID 30835; often referred to as DC-SIGN or CD209). DC-SIGN and L-SIGN differ in their ligand-binding properties and distribution. Alternative splicing results in multiple variants.[provided by RefSeq, Feb 2009]<br>**Function:** Pathogen-recognition receptor expressed on the surface of immature dendritic cells (DCs) and involved in initiation of primary immune response. Thought to mediate the endocytosis of pathogens which are subsequently degraded in lysosomal compartments. The receptor returns to the cell membrane surface and the pathogen-derived antigens are presented to resting T-cells via MHC class II proteins to initiate the adaptive immune response.<br>Probably recognizes in a calcium-dependent manner high mannose N-linked oligosaccharides in a variety of pathogen antigens, including HIV-1 gp120, HIV-2 gp120, SIV gp120, ebolavirus glycoproteins, cytomegalovirus gB, HCV E2, dengue virus gE, Leishmania pifanoi LPG, Lewis-x antigen in Helicobacter pylori LPS, mannose in Klebsiella pneumonae LPS, di-mannose and tri-mannose in Mycobacterium tuberculosis ManLAM and Lewis-x antigen in Schistosoma mansoni SEA.<br>On DCs it is a high affinity receptor for ICAM2 and ICAM3 by binding to mannose-like carbohydrates. May act as a DC rolling receptor that mediates transendothelial migration of DC presursors from blood to tissues by binding endothelial ICAM2. Seems to regulate DC-induced T-cell proliferation by binding to ICAM3 on T-cells in the immunological synapse formed between DC and T-cells.<br>**Subunit:** Homotetramer. Binds to many viral surface glycoproteins such as HIV-1 gp120, HIV-2 gp120, SIV gp120, ebolavirus envelope glycoproteins, cytomegalovirus gB, HCV E2 and dengue virus major envelope protein E.<br>**Subcellular Location:** Isoform 1, 2, 3, 4, 5, : Cell membrane; Single-pass type II membrane protein (Probable). Isoform 6, 7, 8, 9, 10, 11, 12: Secreted (Probable).<br>**Tissue Specificity:** Predominantly expressed in dendritic cells and in DC-residing tissues. Also found in placental macrophages, endothelial cells of placental vascular channels, peripheral blood mononuclear cells, and THP-1 monocytes.<br>**Similarity:** Contains 1 C-type lectin domain.<br>**Database links:**<br>**Entrez Gene:** 30835 Human<br>**Entrez Gene:** 574211 Rhesus monkey |

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| | **Entrez Gene:** 170786 Mouse<br>Omim: 604672 Human<br>**SwissProt:** Q9NNX6 Human<br>**SwissProt:** Q8CJ91 Mouse<br>**SwissProt:** Q91ZX1 Mouse<br>**SwissProt:** Q95J96 Rhesus monkey<br>**Unigene:** 278694 Human<br>**Unigene:** 32510 Mouse |

## [ VALIDATION IMAGES ]




Sample:Raji Cell (Human) Lysate at 40 ug
Primary: Anti-CD209 (SL2239R) at 1/300 dilution
Secondary: IRDye800CW Goat Anti-Rabbit IgG at 1/20000 dilution
Predicted band size: 45kD
Observed band size: 47kD

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