

DARC Antibody

Rabbit mAb Catalog # AP91914

Product Information

Application WB, IHC, IF, FC, ICC, IP, IHF

Primary Accession <u>Q16570</u>

Reactivity Human, Mouse **Clonality** Monoclonal

Other Names CCBP1; CD234; DARC; Dfy; FY; GPD; GpFy; WBCQ1;

IsotypeRabbit IgGHostRabbitCalculated MW35553

Additional Information

Dilution WB 1:500~1:2000 IHC 1:50~1:200 ICC/IF 1:50~1:200 IP 1:50 FC 1:100

Purification Affinity-chromatography

Immunogen A synthesized peptide derived from human DARC

DescriptionNon-specific receptor for many chemokines such as IL-8, GRO, RANTES,

MCP-1 and TARC. It is also the receptor for the human malaria parasites

Plasmodium vivax and Plasmodium knowlesi.

Storage Condition and Buffer Rabbit IgG in phosphate buffered saline , pH 7.4, 150mM NaCl, 0.02% sodium

azide and 50% glycerol. Store at +4°C short term. Store at -20°C long term.

Avoid freeze / thaw cycle.

Protein Information

Name ACKR1

Function Atypical chemokine receptor that controls chemokine levels and localization

via high-affinity chemokine binding that is uncoupled from classic

ligand-driven signal transduction cascades, resulting instead in chemokine sequestration, degradation, or transcytosis. Also known as interceptor (internalizing receptor) or chemokine-scavenging receptor or chemokine decoy receptor. Has a promiscuous chemokine- binding profile, interacting with inflammatory chemokines of both the CXC and the CC subfamilies but not with homeostatic chemokines. Acts as a receptor for chemokines including CCL2, CCL5, CCL7, CCL11, CCL13, CCL14, CCL17, CXCL5, CXCL6, IL8/CXCL8, CXCL11, GRO, RANTES, MCP-1 and TARC. May regulate chemokine bioavailability and, consequently, leukocyte recruitment through two distinct mechanisms: when expressed in endothelial cells, it sustains the abluminal to luminal transcytosis of tissue-derived chemokines and their subsequent presentation to circulating leukocytes; when expressed in erythrocytes, serves as blood reservoir of cognate chemokines but also as a chemokine sink, buffering potential surges in plasma chemokine levels. (Microbial infection)

Acts as a receptor for the malaria parasite Plasmodium knowlesi.

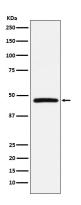
Cellular Location

Early endosome. Recycling endosome. Membrane; Multi-pass membrane protein. Note=Predominantly localizes to endocytic vesicles, and upon stimulation by the ligand is internalized via caveolae. Once internalized, the ligand dissociates from the receptor, and is targeted to degradation while the receptor is recycled back to the cell membrane

Tissue Location

Found in adult kidney, adult spleen, bone marrow and fetal liver. In particular, it is expressed along postcapillary venules throughout the body, except in the adult liver. Erythroid cells and postcapillary venule endothelium are the principle tissues expressing duffy. Fy(-A-B) individuals do not express duffy in the bone marrow, however they do, in postcapillary venule endothelium

Images



Western blot analysis of DARC expression in Human fetal liver lysate.

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