

Recombinant CD55/DAF Monoclonal Antibody

catalog number: AN300521P

Note: Centrifuge before opening to ensure complete recovery of vial contents.

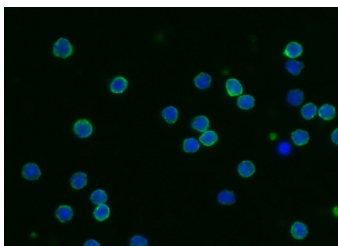
Description

Reactivity	Mouse
Immunogen	Recombinant Mouse CD55/DAF Protein
Host	Rabbit
Isotype	IgG
Clone	9A9
Purification	Protein A
Buffer	0.2 µm filtered solution in PBS

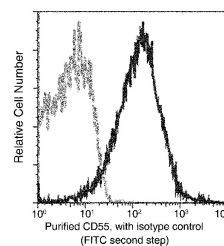
Applications Recommended Dilution

ICC/IF	1:20-1:100
FCM	1:25-1:100

Data



Immunofluorescence analysis of Mouse CD55 in mouse splenocytes. Cells were fixed with 4% PFA, blocked with 10% serum, and incubated with rabbit anti-mouse CD55 monoclonal antibody (1:60) at 4°C overnight. Then cells were stained with the Alexa Fluor® 488-conjugated Goat Anti-rabbit IgG secondary antibody (green) and counterstained with DAPI (blue).



Flow cytometric analysis of Mouse CD55 expression on BABL/c splenocytes. Cells were stained with purified anti-Mouse CD55, then a FITC-conjugated second step antibody. The fluorescence histograms were derived from gated events with the forward and side light-scatter characteristics of intact cells.

Preparation & Storage

Storage	This antibody can be stored at 2°C-8°C for one month without detectable loss of activity. Antibody products are stable for twelve months from date of receipt when stored at -20°C to -80°C. Preservative-Free. Avoid repeated freeze-thaw cycles.
Shipping	Ice bag

Background

For Research Use Only

CD55, also well known as decay-accelerating factor (DAF), is a member of the RCA (regulators of complement activation) family characterized by four to 30 SCRs (short consensus repeats) in their plasma-exposed regions. It is a major regulator of the alternative and classical pathways of complement activation and is expressed on all serum-exposed cells. CD55 is physiologically acting as an inhibitor of the complement system, but is also broadly expressed in malignant tumours. DAF seems to exert different functions beyond its immunological role such as promotion of tumorigenesis, decrease of complement mediated tumor cell lysis, autocrine loops for cell rescue and evasion of apoptosis, neoangiogenesis, invasiveness, cell motility. It is commonly hijacked by invading pathogens, including many enteroviruses and uropathogenic *Escherichia coli*, to promote cellular attachment prior to infection. This 70-75 kDa glycoprotein CD55 containing four SCR modules is involved in the regulation of the complement cascade. It inhibits complement activation by suppressing the function of C3/C5 convertases, thereby limiting local generation or deposition of C3a/C5a and membrane attack complex (MAC or C5b-9) production. DAF has been identified as a ligand for an activation-associated, seven-transmembrane lymphocyte receptor, CD97, which is a receptor mediating attachment and infection of several viruses and bacteria. In addition, it has been shown that DAF regulates the interplay between complement and T cell immunity in vivo, and thus may be implicated in immune and tumor biology.