

CD55 Antibody

Mouse Monoclonal Antibody (Mab)

Catalog # AM2092b

Product Information

Application	WB, E
Primary Accession	P08174
Other Accession	NP_001108224.1
Reactivity	Human
Host	Mouse
Clonality	Monoclonal
Isotype	IgG1
Clone Names	561CT5.5.5
Calculated MW	41400
Antigen Region	51-79

Additional Information

Gene ID	1604
Other Names	Complement decay-accelerating factor, CD55, CD55, CR, DAF
Target/Specificity	This CD55 antibody is generated from mice immunized with a KLH conjugated synthetic peptide between 51-79 amino acids from human CD55.
Dilution	WB~~1:2000 E~~Use at an assay dependent concentration.
Format	Purified monoclonal antibody supplied in PBS with 0.09% (W/V) sodium azide. This antibody is purified through a protein G column, followed by dialysis against PBS.
Storage	Maintain refrigerated at 2-8°C for up to 2 weeks. For long term storage store at -20°C in small aliquots to prevent freeze-thaw cycles.
Precautions	CD55 Antibody is for research use only and not for use in diagnostic or therapeutic procedures.

Protein Information

Name	CD55
Synonyms	CR, DAF
Function	This protein recognizes C4b and C3b fragments that condense with cell-surface hydroxyl or amino groups when nascent C4b and C3b are locally generated during C4 and c3 activation. Interaction of daf with cell-associated

C4b and C3b polypeptides interferes with their ability to catalyze the conversion of C2 and factor B to enzymatically active C2a and Bb and thereby prevents the formation of C4b2a and C3bBb, the amplification convertases of the complement cascade (PubMed:[7525274](#)). Inhibits complement activation by destabilizing and preventing the formation of C3 and C5 convertases, which prevents complement damage (PubMed:[28657829](#)).

Cellular Location

[Isoform 1]: Cell membrane; Single-pass type I membrane protein [Isoform 3]: Secreted [Isoform 5]: Secreted [Isoform 7]: Cell membrane; Lipid-anchor, GPI-anchor

Tissue Location

Expressed on the plasma membranes of all cell types that are in intimate contact with plasma complement proteins. It is also found on the surfaces of epithelial cells lining extracellular compartments, and variants of the molecule are present in body fluids and in extracellular matrix

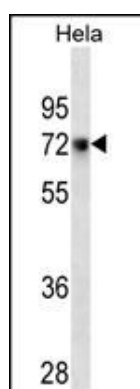
Background

This gene encodes a protein involved in the regulation of the complement cascade. The encoded glycoprotein is also known as the decay-accelerating factor (DAF); binding of DAF to complement proteins accelerates their decay, disrupting the cascade and preventing damage to host cells. Antigens present on the DAF glycoprotein constitute the Cromer blood group system (CROM). Two alternatively spliced transcripts encoding different proteins have been identified. The predominant transcript encodes a membrane-bound protein expressed on cells exposed to plasma component proteins but an alternatively spliced transcript produces a soluble protein present at much lower levels. Additional, alternatively spliced transcript variants have been described, but their biological validity has not been determined. [provided by RefSeq].

References

Romero, R., et al. Am. J. Obstet. Gynecol. 203 (4), 361 (2010) :
Gustafsson, D.J., et al. Virology 405(2):474-482(2010)
Alegretti, A.P., et al. Cell. Immunol. 265(2):127-132(2010)
Kim, Y., et al. Ann. Clin. Lab. Sci. 40(3):226-232(2010)
Storry, J.R., et al. Transfusion 43(3):340-344(2003)

Images



CD55 Antibody(Cat. #AM2092b) western blot analysis in HeLa cell line lysates (35µg/lane).This demonstrates the CD55 antibody detected the CD55 protein (arrow).

Please note: All products are 'FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC OR THERAPEUTIC PROCEDURES'.