

C1QC
Purified Mouse Monoclonal Antibody
Catalog # AO2538a**Specification**

C1QC - Product Information

Application	WB, IHC, ICC, E
Primary Accession	P02747
Reactivity	Human
Host	Mouse
Clonality	Monoclonal
Isotype	Mouse IgG1
Calculated MW	25.7kDa KDa

Immunogen

Purified recombinant fragment of human C1QC (AA: 115-245) expressed in E. Coli.

Formulation

Purified antibody in PBS with 0.05% sodium azide

C1QC - Additional Information

Gene ID 714

Other Names

C1QG; C1Q-C

Dilution

WB~~ 1/500 - 1/2000

IHC~~1:100~500

ICC~~N/A

E~~ 1/10000

Storage

Maintain refrigerated at 2-8°C for up to 6 months. For long term storage store at -20°C in small aliquots to prevent freeze-thaw cycles.

Precautions

C1QC is for research use only and not for use in diagnostic or therapeutic procedures.

C1QC - Protein Information

Name C1QC {ECO:0000303|PubMed:1706597, ECO:0000312|HGNC:HGNC:1245}

Function

Core component of the complement C1 complex, a multiprotein complex that initiates the classical pathway of the complement system, a cascade of proteins that leads to phagocytosis and breakdown of pathogens and signaling that strengthens the adaptive immune system (PubMed:12847249, PubMed:19006321, PubMed:24626930, PubMed:29449492, PubMed:3258649, PubMed:34155115, PubMed:6249812, PubMed:6776418). The classical complement pathway is initiated by the C1q subcomplex of the C1 complex, which specifically binds IgG or IgM immunoglobulins complexed with antigens, forming antigen-antibody complexes on the surface of pathogens: C1QA, together with C1QB and C1QC, specifically recognizes and binds the Fc regions of IgG or IgM via its C1q domain (PubMed:12847249, PubMed:19006321, PubMed:24626930, PubMed:29449492, PubMed:3258649, PubMed:6776418). Immunoglobulin-binding activates the proenzyme C1R, which cleaves C1S, initiating the proteolytic cascade of the complement system (PubMed:29449492). The C1Q subcomplex is activated by a hexamer of IgG complexed with antigens, while it is activated by a pentameric IgM (PubMed:19706439, PubMed:24626930, PubMed:29449492). The C1Q subcomplex also recognizes and binds phosphatidylserine exposed on the surface of cells undergoing programmed cell death, possibly promoting activation of the complement system (PubMed:18250442).

Cellular Location

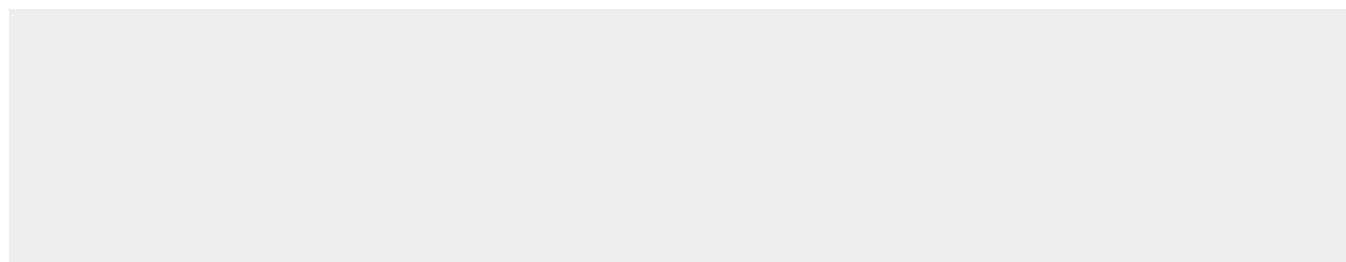
Secreted. Cell surface. Note=Specifically binds IgG or IgM immunoglobulins complexed with antigens, forming antigen-antibody complexes on the surface of pathogens.

C1QC - Protocols

Provided below are standard protocols that you may find useful for product applications.

- [Western Blot](#)
- [Blocking Peptides](#)
- [Dot Blot](#)
- [Immunohistochemistry](#)
- [Immunofluorescence](#)
- [Immunoprecipitation](#)
- [Flow Cytometry](#)
- [Cell Culture](#)

C1QC - Images



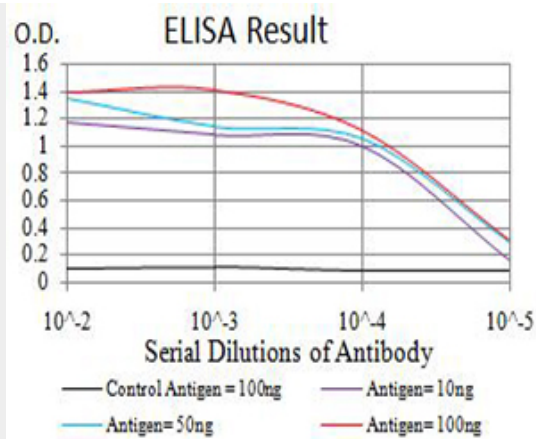


Figure 1: Black line: Control Antigen (100 ng); Purple line: Antigen (10ng); Blue line: Antigen (50 ng); Red line: Antigen (100 ng)

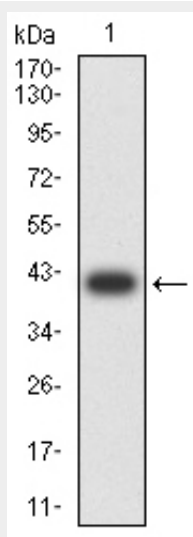


Figure 2: Western blot analysis using C1QC mAb against human C1QC (AA: 115-245) recombinant protein. (Expected MW is 40 kDa)

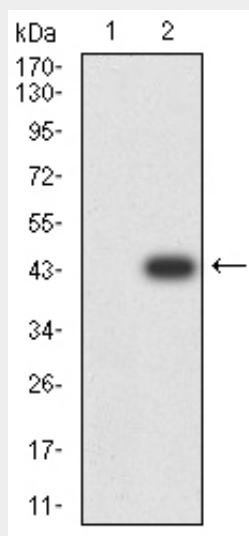


Figure 3: Western blot analysis using C1QC mAb against HEK293 (1) and C1QC (AA: 115-245)-hlgGfC transfected HEK293 (2) cell lysate.

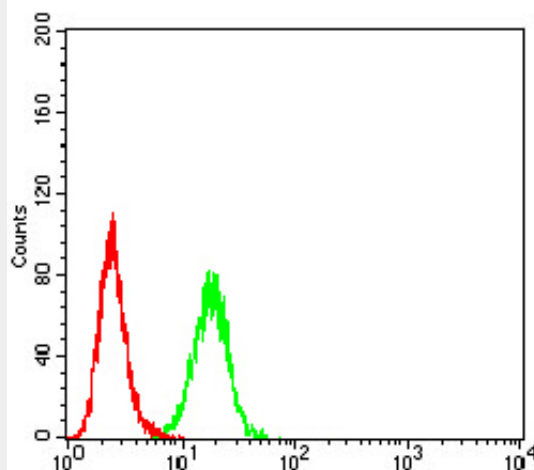


Figure 4:Flow cytometric analysis of HeLa cells using C1QC mouse mAb (green) and negative control (red).

C1QC - References

1.J Invest Dermatol. 2014 Apr;134(4):1152-4.2.BMC Pharmacol. 2004 Sep 7;4:19.