### For Research Use Only

# C5aR Polyclonal antibody

Catalog Number: 21316-1-AP

**Featured Product** 

**27 Publications** 



**Purification Method:** 

**Basic Information** 

Catalog Number: GenBank Accession Number:

21316-1-AP BC008982 Antigen affinity purification

Size: Genel D (NCBI): Recommended Dilutions: 150ul , Concentration: 500 µg/ml by 728 WB 1:500-1:3000

Nanodrop; Full Name: IHC 1:200-1:800
Source: complement component 5a receptor 1 IF 1:10-1:100

Rabbit Calculated MW:
Isotype: 350 aa, 39 kDa
IgG Observed MW:

Immunogen Catalog Number: 45 kDa

AG15968

**Applications** 

Tested Applications: Positive Controls:

FC, IF, IHC, WB, ELISA WB : LO2 cells, PC-3 cells, U-937 cells

Cited Applications:
FC, IF, IHC, WB

IHC: human tonsillitis tissue, human lung tissue,

Species Specificity: human liver tissue

F: HepG2 cells,

Cited Species: human, pig

human

Note-IHC: suggested antigen retrieval with TE buffer pH 9.0; (\*) Alternatively, antigen retrieval may be performed with citrate buffer pH 6.0

# **Background Information**

C5aR, also named as CD88, is a G protein-coupled receptor for the anaphylatoxin C5a, a cleavage product of the complement cascade. The C5a ligand is a proinflammatory component of host defense. C5aR is activated upon binding of the C5a molecule. Receptor activation stimulates chemotaxis, granule enzyme release, intracellular calcium release and superoxide anion production. The deduced sequence of C5aR contains 350 amino acids, giving a calculated molecular weight of 39 kDa. C5aR has an N-linked glycosylation site in the N-terminal extracellular domain. The apparent molecular weight of C5aR is about 40-52 kDa (PMID: 1847994; 9136907; 9136907; 2007135).

#### **Notable Publications**

Author	Pubmed ID	Journal	Application
Shi-Tao He	34670452	J Invest Surg	WB
Kun Zhang	31695787	Theranostics	WB
Duo Xu	36192575	Clin Transl Oncol	WB

Storage

Storage:

Store at -20°C. Stable for one year after shipment.

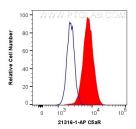
Storage Buffer

PBS with 0.02% sodium azide and 50% glycerol pH 7.3.

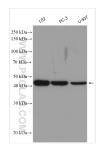
Aliquoting is unnecessary for -20°C storage

\*\*\* 20ul sizes contain 0.1% BSA

## **Selected Validation Data**



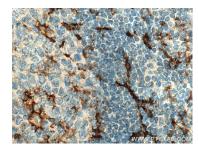
1X10^6 HepG2 cells were intracellularly stained with 0.4 ug Anti-Human C5aR (21316-1-AP) and CoraLite® 488-Conjugated Affini Pure Goat Anti-Rabbit 1gG(H+L) at dilution 1:1000 (red), or 0.4 ug Control Antibody. Cells were fixed with 4% PFA and permeabilized with Flow Cytometry Perm Buffer (PF00011-C).



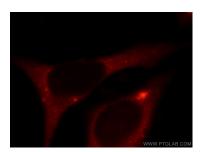
Various lysates were subjected to SDS PAGE followed by western blot with 21316-1-AP (C5aR antibody) at dilution of 1:1500 incubated at room temperature for 1.5 hours.



Immunohistochemical analysis of paraffinembedded human tonsillitis tissue slide using 21316-1-AP (C5aR antibody) at dilution of 1:400 (under 10x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



Immunohistochemical analysis of paraffinembedded human tonsillitis tissue slide using 21316-1-AP (C5aR antibody) at dilution of 1:400 (under 40x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



Immunofluorescent analysis of HepG2 cells, using C5AR1 antibody 21316-1-AP at 1:25 dilution and Rhodamine-labeled goat anti-rabbit IgG (red).