

**CFD Antibody (N-term)**  
**Affinity Purified Rabbit Polyclonal Antibody (Pab)**  
**Catalog # AP12089a****Specification**

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**CFD Antibody (N-term) - Product Information**

Application	WB, IHC-P,E
Primary Accession	<a href="#">P00746</a>
Other Accession	<a href="#">P51779</a> , <a href="#">Q3T0A3</a> , <a href="#">NP_001919.2</a>
Reactivity	Human
Predicted	Bovine, Pig
Host	Rabbit
Clonality	Polyclonal
Isotype	Rabbit IgG
Antigen Region	68-99

**CFD Antibody (N-term) - Additional Information****Gene ID** 1675**Other Names**

Complement factor D, Adipsin, C3 convertase activator, Properdin factor D, CFD, DF, PFD

**Target/Specificity**

This CFD antibody is generated from rabbits immunized with a KLH conjugated synthetic peptide between 68-99 amino acids from the N-terminal region of human CFD.

**Dilution**

WB~~1:2000

IHC-P~~1:50~100

E~~Use at an assay dependent concentration.

**Format**

Purified polyclonal antibody supplied in PBS with 0.09% (W/V) sodium azide. This antibody is purified through a protein A column, followed by peptide affinity purification.

**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**

CFD Antibody (N-term) is for research use only and not for use in diagnostic or therapeutic procedures.

**CFD Antibody (N-term) - Protein Information****Name** CFD ([HGNC:2771](#))

## Synonyms DF, PFD

**Function** Serine protease that initiates the alternative 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:[21205667](#), PubMed:[22362762](#), PubMed:[6769474](#), PubMed:[874324](#), PubMed:[9748277](#)). In contrast to other complement pathways (classical, lectin and GZMK) that are directly activated by pathogens or antigen-antibody complexes, the alternative complement pathway is initiated by the spontaneous hydrolysis of complement C3 (PubMed:[21205667](#), PubMed:[22362762](#), PubMed:[6769474](#), PubMed:[874324](#)). The alternative complement pathway acts as an amplification loop that enhances complement activation by mediating the formation of C3 and C5 convertases (PubMed:[21205667](#), PubMed:[22362762](#), PubMed:[6769474](#), PubMed:[874324](#)). Activated CFD cleaves factor B (CFB) when the latter is complexed with complement C3b, activating the C3 convertase of the alternative pathway (PubMed:[21205667](#), PubMed:[6769474](#), PubMed:[874324](#), PubMed:[9748277](#)).

## Cellular Location

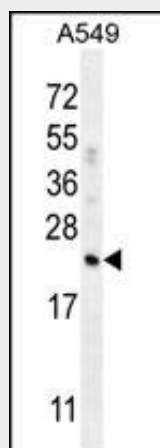
Secreted

## CFD Antibody (N-term) - Protocols

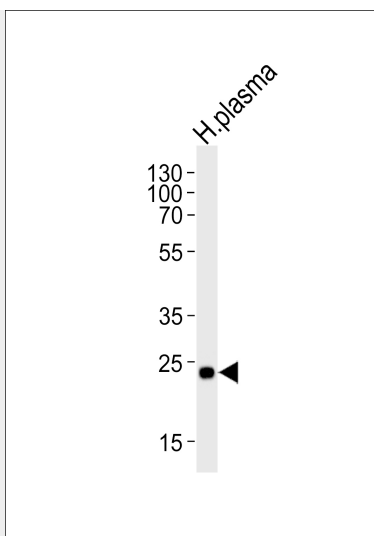
Provided below are standard protocols that you may find useful for product applications.

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

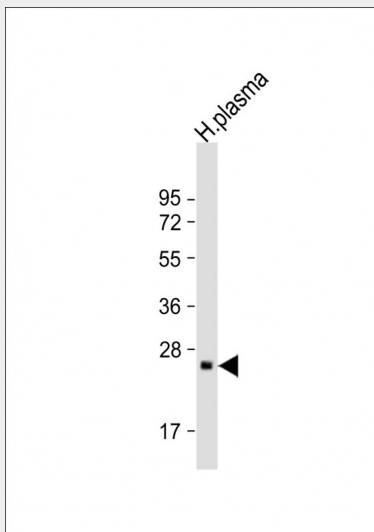
## CFD Antibody (N-term) - Images



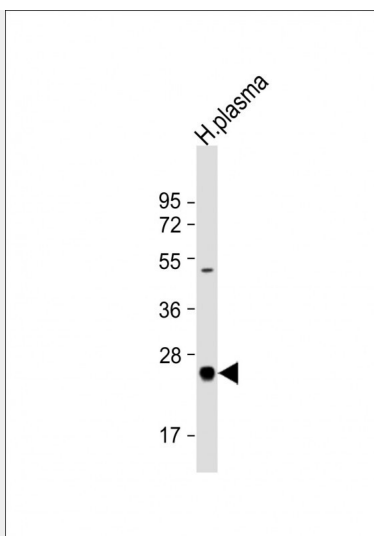
CFD Antibody (N-term) (Cat. #AP12089a) western blot analysis in A549 cell line lysates (35ug/lane). This demonstrates the CFD antibody detected the CFD protein (arrow).



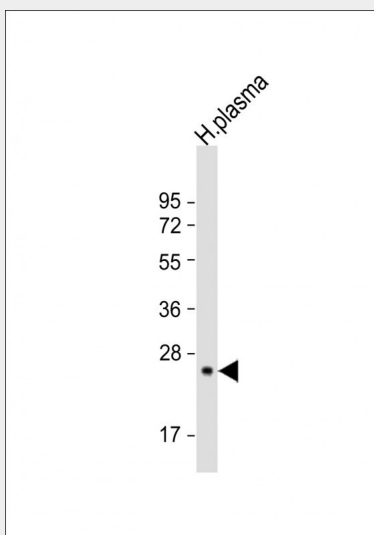
Western blot analysis of lysate from human plasma tissue lysate, using CFD Antibody (N-term)(Cat. #AP12089a). AP12089a was diluted at 1:1000. A goat anti-rabbit IgG H&L(HRP) at 1:5000 dilution was used as the secondary antibody. Lysate at 35ug.



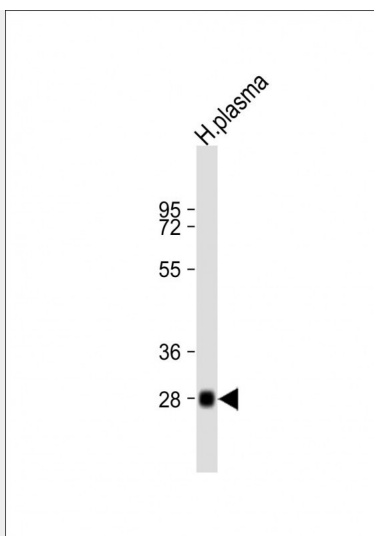
Anti-CFD Antibody (N-term)at 1:2000 dilution + human plasma lysates Lysates/proteins at 20 µg per lane. Secondary Goat Anti-Rabbit IgG, (H+L), Peroxidase conjugated at 1/10000 dilution. Predicted band size : 27 kDa Blocking/Dilution buffer: 5% NFDM/TBST.



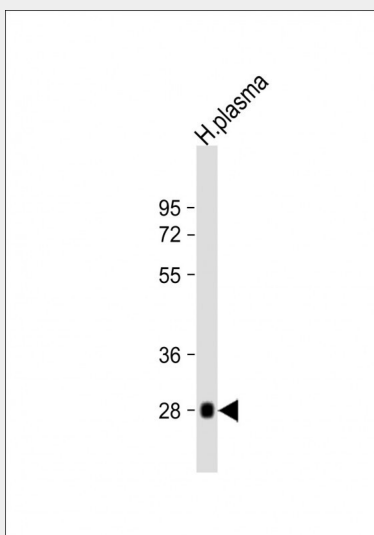
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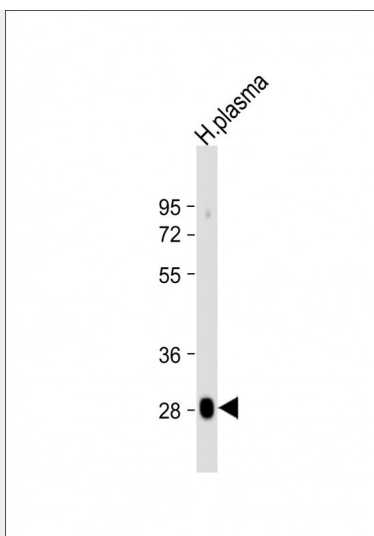
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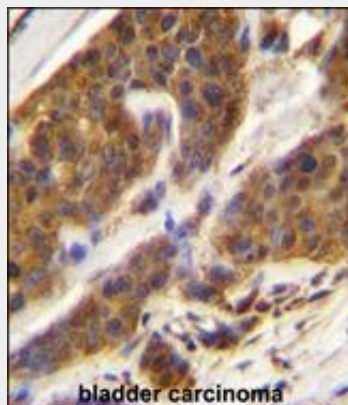
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CFD Antibody (N-term) (Cat. #AP12089a) immunohistochemistry analysis in formalin fixed and paraffin embedded human bladder carcinoma followed by peroxidase conjugation of the secondary antibody and DAB staining. This data demonstrates the use of CFD Antibody (N-term) for immunohistochemistry. Clinical relevance has not been evaluated.

### CFD Antibody (N-term) - Background

The protein encoded by this gene is a member of the trypsin family of peptidases. The encoded protein is a component of the alternative complement pathway best known for its role in humoral suppression of infectious agents. This protein is also a serine protease that is secreted by adipocytes into the bloodstream. Finally, the encoded protein has a high level of expression in fat, suggesting a role for adipose tissue in immune system biology.

### CFD Antibody (N-term) - References

Bailey, S.D., et al. Diabetes Care (2010) In press :  
Hietaharju, A., et al. Eur. J. Neurol. 17(2):332-334(2010)  
Talmud, P.J., et al. Am. J. Hum. Genet. 85(5):628-642(2009)  
Ciprandi, G., et al. Int. Immunopharmacol. 9(12):1460-1463(2009)

Cerhan, J.R., et al. Br. J. Haematol. 145(5):614-623(2009)