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IGHA1 Antibody (C-term)

Purified Rabbit Polyclonal Antibody (Pab)
Catalog # AP7456b

Product Information

Application	WB, IHC-P, FC, E
Primary Accession	P01876
Other Accession	P01877
Reactivity	Human
Host	Rabbit
Clonality	Polyclonal
Isotype	Rabbit IgG
Clone Names	RB18272
Calculated MW	42849
Antigen Region	257-286

Additional Information

Other Names	Ig alpha-1 chain C region, IGHA1
Target/Specificity	This IGHA1 antibody is generated from rabbits immunized with a KLH conjugated synthetic peptide between 257-286 amino acids from the C-terminal region of human IGHA1.
Dilution	WB~~1:1000 IHC-P~~1:100~500 FC~~1:10~50 E~~Use at an assay dependent concentration.
Format	Purified polyclonal antibody supplied in PBS with 0.09% (W/V) sodium azide. This antibody is prepared by Saturated Ammonium Sulfate (SAS) precipitation 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	IGHA1 Antibody (C-term) is for research use only and not for use in diagnostic or therapeutic procedures.

Protein Information

Name	IGHA1 {ECO:0000303|PubMed:11340299, ECO:0000303|Ref.13}
Function	Constant region of immunoglobulin heavy chains. Immunoglobulins, also known as antibodies, are membrane-bound or secreted glycoproteins produced by B lymphocytes. In the recognition phase of humoral immunity, the membrane-bound immunoglobulins serve as receptors which, upon binding of a specific antigen, trigger the clonal expansion and differentiation

of B lymphocytes into immunoglobulins- secreting plasma cells. Secreted immunoglobulins mediate the effector phase of humoral immunity, which results in the elimination of bound antigens (PubMed:20176268, PubMed:22158414). The antigen binding site is formed by the variable domain of one heavy chain, together with that of its associated light chain. Thus, each immunoglobulin has two antigen binding sites with remarkable affinity for a particular antigen. The variable domains are assembled by a process called V-(D)-J rearrangement and can then be subjected to somatic hypermutations which, after exposure to antigen and selection, allow affinity maturation for a particular antigen (PubMed:17576170, PubMed:20176268). Ig alpha is the major immunoglobulin class in body secretions (PubMed:2241915).

Cellular Location [Isoform 1]: Secreted

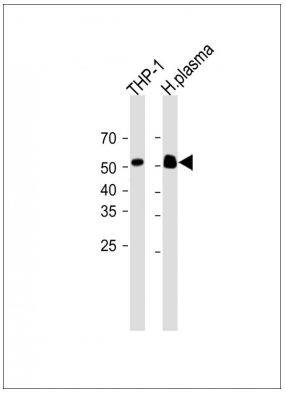
Background

Ig alpha is the major immunoglobulin class in body secretions. The protein may serve both to defend against local infection and to prevent access of foreign antigens to the general immunologic system.

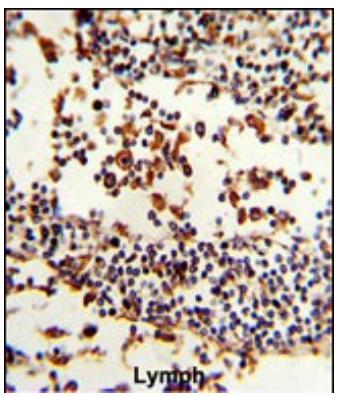
References

Flanagan J.G., Lefranc M.-P.Cell 36:681-688(1984)
Putnam F.W., Liu Y.-S.V.J. Biol. Chem. 254:2865-2874(1979)
Hatzivassiliou G., Miller I.Immunity 14:277-289(2001)

Images

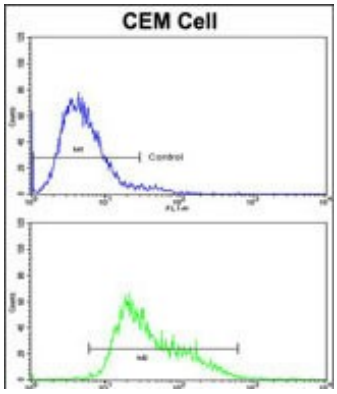


All lanes: Anti-IGHA1 Antibody (C-term) at 1:2000 dilution Lane 1: THP-1 whole cell lysate Lane 2: Human plasma lysate Lysates/proteins at 20 µg per lane. Secondary: Goat Anti-Rabbit IgG, (H+L), Peroxidase conjugated (ASP1615) at 1/15000 dilution. Observed band size: 55 KDa Blocking/Dilution buffer: 5% NFDM/TBST.



Formalin-fixed and paraffin-embedded human Lymph reacted with IGHA1 Antibody (C-term), which was peroxidase-conjugated to the secondary antibody, followed by DAB staining. This data demonstrates the use of this antibody for immunohistochemistry; clinical relevance has not been evaluated.

Flow cytometric analysis of CEM cells using IGHA1 Antibody (C-term)(bottom histogram) compared to a negative control cell (top histogram). FITC-conjugated



goat-anti-rabbit secondary antibodies were used for the analysis.

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