For Research Use Only

Carbonic anhydrase 1/CA1 Polyclonal antibody

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Catalog Number: 13198-2-AP

Featured Product

10 Publications

Basic Information

Catalog Number: 13198-2-AP

GenBank Accession Number:

Purification Method: Antigen affinity purification

Size:

GeneID (NCBI):

Recommended Dilutions:

150ul, Concentration: 1000 ug/ml by 759

WB 1:500-1:3000

Nanodrop and 440 ug/ml by Bradford UNIPROT ID:

BC027890

IP 0.5-4.0 ug for 1.0-3.0 mg of total

method using BSA as the standard;

P00915 Full Name: protein lysate IHC 1:50-1:500

Source: Rabbit Isotype

carbonic anhydrase I

Calculated MW: 261 aa, 29 kDa

Immunogen Catalog Number:

Observed MW:

29 kDa

Applications

Tested Applications:

WB, IHC, IP, ELISA

Cited Applications:

WB, IHC, IF, IP

Species Specificity: human, mouse, rat

Cited Species:

human, mouse, rat

Positive Controls:

WB: mouse spleen tissue, Jurkat cells, rat spleen

tissue

IP: K-562 cells,

IHC: human breast cancer tissue, human colon cancer

tissue

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

CA1(Carbonic anhydrase 1) is also named as CAB and belongs to the alpha-carbonic anhydrase family, which may reside in cytoplasm, in mitochondria, or in secretory granules, or associate with membranes in cell. It forms a large family of genes encoding zinc metalloenzymes of great physiologic importance. Extracellular CA1 mediates hemorrhagic retinal and cerebral vascular permeability through prekallikrein activation (PMID:17259996).

Notable Publications

Author	Pubmed ID	Journal	Application
Jianming Yang	36114582	Microbiome	IF
Kazuhiro Tange	36289244	Sci Rep	WB,IHC,IP
Meili Lu	30364197	Front Pharmacol	WB

Storage

Storage:

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

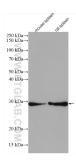
Storage Buffer

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

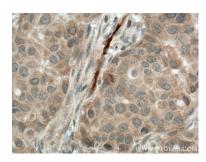
Selected Validation Data



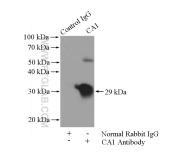
Various lysates were subjected to SDS PAGE followed by western blot with 13198-2-AP (CA1 antibody) at dilution of 1:1500 incubated at room temperature for 1.5 hours.



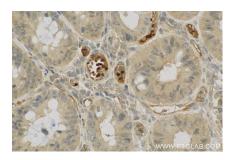
Immunohistochemical analysis of paraffinembedded human breast cancer tissue slide using 13198-2-AP (CA1 antibody) at dilution of 1:200 (under 10x lens. Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



Immunohistochemical analysis of paraffinembedded human breast cancer tissue slide using 13198-2-AP (CA1 antibody) at dilution of 1:200 (under 40x lens. Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



IP result of anti-CA1 (IP:13198-2-AP, 4ug; Detection:13198-2-AP 1:500) with K-562 cells lysate 1200ug.



Immunohistochemical analysis of paraffinembedded Colorectal cancer slide using 13198-2-AP (CA1 antibody) at dilution of 1:300 (under 40x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).