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CA3 Antibody (N-term)

Purified Rabbit Polyclonal Antibody (Pab)
Catalog # AP7633a

Product Information

Application	WB, E
Primary Accession	P07451
Other Accession	P14141
Reactivity	Human, Mouse
Predicted	Rat, Canine, Rabbit
Host	Rabbit
Clonality	Polyclonal
Isotype	Rabbit IgG
Clone Names	RB18370
Calculated MW	29557
Antigen Region	17-46

Additional Information

Gene ID	761
Other Names	Carbonic anhydrase 3, Carbonate dehydratase III, Carbonic anhydrase III, CA-III, CA3
Target/Specificity	This CA3 antibody is generated from rabbits immunized with a KLH conjugated synthetic peptide between 17-46 amino acids from the N-terminal region of human CA3.
Dilution	WB~~1:1000 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	CA3 Antibody (N-term) is for research use only and not for use in diagnostic or therapeutic procedures.

Protein Information

Name	CA3 {ECO:0000303|PubMed:9651514, ECO:0000312|HGNC:HGNC:1374}
Function	Reversible hydration of carbon dioxide.

Cellular Location Cytoplasm.

Tissue Location Muscle specific.

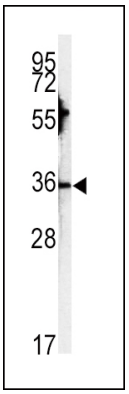
Background

Carbonic anhydrase III (CAIII) is a member of carbonic anhydrase isozymes. These carbonic anhydrases are a class of metalloenzymes that catalyze the reversible hydration of carbon dioxide and are differentially expressed in a number of cell types. The expression of the CA3 gene is strictly tissue specific and present at high levels in skeletal muscle and much lower levels in cardiac and smooth muscle. A proportion of carriers of Duchenne muscle dystrophy have a higher CA3 level than normal.

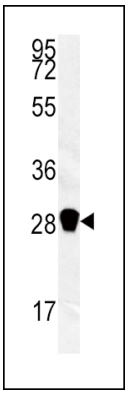
References

Du,A.L., Autoimmunity 42 (3), 209-215 (2009)
Dai,H.Y., Mol. Carcinog. 47 (12), 956-963 (2008)
Gailly,P., Kidney Int. 74 (1), 52-61 (2008)

Images



Western blot analysis of CA3 antibody (N-term)(Cat.#AP7633a) in HepG2 cell line lysates (35ug/lane). CA3 (arrow) was detected using the purified Pab.



Western blot analysis of CA3 antibody (N-term)(Cat.#AP7633a) in mouse kidney tissue lysates (35ug/lane). CA3 (arrow) was detected using the purified Pab.

Citations

- Mitochondrial proteomic profiling reveals increased carbonic anhydrase II in aging and neurodegeneration.

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