

CA8 Antibody (monoclonal) (M01)

Mouse monoclonal antibody raised against a partial recombinant CA8. Catalog # AT1359a

Specification

CA8 Antibody (monoclonal) (M01) - Product Information

Application	WB, E
Primary Accession	<u>P35219</u>
Other Accession	<u>NM_004056</u>
Reactivity	Human
Host	mouse
Clonality	Monoclonal
Isotype	lgG3 Kappa
Calculated MW	32973

CA8 Antibody (monoclonal) (M01) - Additional Information

Gene ID 767

Other Names Carbonic anhydrase-related protein, CARP, Carbonic anhydrase VIII, CA-VIII, CA8, CALS

Target/Specificity CA8 (NP_004047, 40 a.a. ~ 139 a.a) partial recombinant protein with GST tag. MW of the GST tag alone is 26 KDa.

Dilution WB~~1:500~1000 E~~N/A

Format Clear, colorless solution in phosphate buffered saline, pH 7.2 .

Storage Store at -20°C or lower. Aliquot to avoid repeated freezing and thawing.

Precautions CA8 Antibody (monoclonal) (M01) is for research use only and not for use in diagnostic or therapeutic procedures.

CA8 Antibody (monoclonal) (M01) - Protocols

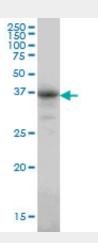
Provided below are standard protocols that you may find useful for product applications.

- <u>Western Blot</u>
- Blocking Peptides
- Dot Blot

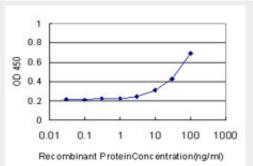


- Immunohistochemistry
- <u>Immunofluorescence</u>
- Immunoprecipitation
- Flow Cytomety
- <u>Cell Culture</u>

CA8 Antibody (monoclonal) (M01) - Images



CA8 monoclonal antibody (M01), clone 1F7 Western Blot analysis of CA8 expression in A-549 (Cat # L025V1).



Detection limit for recombinant GST tagged CA8 is approximately 3ng/ml as a capture antibody.

CA8 Antibody (monoclonal) (M01) - Background

The protein encoded by this gene was initially named CA-related protein because of sequence similarity to other known carbonic anhydrase genes. However, the gene product lacks carbonic anhydrase activity (i.e., the reversible hydration of carbon dioxide). The gene product continues to carry a carbonic anhydrase designation based on clear sequence identity to other members of the carbonic anhydrase gene family. The absence of CA8 gene transcription in the cerebellum of the lurcher mutant in mice with a neurologic defect suggests an important role for this acatalytic form.

CA8 Antibody (monoclonal) (M01) - References

CA8 mutations cause a novel syndrome characterized by ataxia and mild mental retardation with predisposition to quadrupedal gait. T?rkmen S, et al. PLoS Genet, 2009 May. PMID 19461874.Crystal structure of human carbonic anhydrase-related protein VIII reveals the basis for catalytic silencing. Picaud SS, et al. Proteins, 2009 Aug 1. PMID 19360879.Nucleotide variations in genes encoding carbonic anhydrase 8 and 10 associated with femoral bone mineral density in Japanese female with osteoporosis. Mori S, et al. J Bone Miner Metab, 2009. PMID 19172221.Carbonic anhydrase-related protein VIII promotes colon cancer cell growth. Nishikata M, et al. Mol Carcinog, 2007 Mar. PMID 17219437.A human protein-protein interaction network: a resource for annotating the proteome.



Stelzl U, et al. Cell, 2005 Sep 23. PMID 16169070.