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GCSH Antibody (monoclonal) (M01)

Mouse monoclonal antibody raised against a full length recombinant GCSH.
Catalog # AT2183a

Product Information

Application	WB, E
Primary Accession	P23434
Other Accession	BC000790
Reactivity	Human
Host	mouse
Clonality	monoclonal
Isotype	IgG1 kappa
Clone Names	3D8-A12
Calculated MW	18885

Additional Information

Gene ID	2653
Other Names	Glycine cleavage system H protein, mitochondrial, Lipoic acid-containing protein, GCSH
Target/Specificity	GCSH (AAH00790.1, 1 a.a. ~ 173 a.a) full-length 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	GCSH Antibody (monoclonal) (M01) is for research use only and not for use in diagnostic or therapeutic procedures.

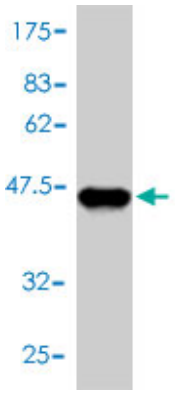
Background

Degradation of glycine is brought about by the glycine cleavage system, which is composed of four mitochondrial protein components: P protein (a pyridoxal phosphate-dependent glycine decarboxylase), H protein (a lipoic acid-containing protein), T protein (a tetrahydrofolate-requiring enzyme), and L protein (a lipoamide dehydrogenase). The protein encoded by this gene is the H protein, which transfers the methylamine group of glycine from the P protein to the T protein. Defects in this gene are a cause of nonketotic hyperglycinemia (NKH). Two transcript variants, one protein-coding and the other probably not protein-coding,have been found for this gene. Also, several transcribed and non-transcribed pseudogenes of this gene exist throughout the genome.

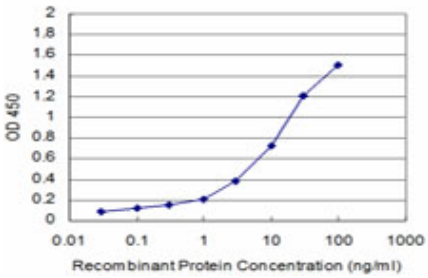
References

Fine mapping and association studies of a high-density lipoprotein cholesterol linkage region on chromosome 16 in French-Canadian subjects. Dastani Z, et al. Eur J Hum Genet, 2010 Mar. PMID 19844255.Atypical glycine encephalopathy in an extremely low birth weight infant: description of a new mutation and clinical and electroencephalographic analysis. Pardal-Fern?ndez JM, et al. Epileptic Disord, 2009 Mar. PMID 19299230.Comprehensive mutation analysis of GLDC, AMT, and GCSH in nonketotic hyperglycinemia. Kure S, et al. Hum Mutat, 2006 Apr. PMID 16450403.Towards a proteome-scale map of the human protein-protein interaction network. Rual JF, et al. Nature, 2005 Oct 20. PMID 16189514.A human protein-protein interaction network: a resource for annotating the proteome. Stelzl U, et al. Cell, 2005 Sep 23. PMID 16169070.

Images



Antibody Reactive Against Recombinant Protein.Western Blot detection against Immunogen (44.77 KDa) .



Detection limit for recombinant GST tagged GCSH is approximately 0.1ng/ml as a capture antibody.