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GAD1 Antibody (monoclonal) (M02)

Mouse monoclonal antibody raised against a full length recombinant GAD1.
Catalog # AT2144a

Product Information

Application	WB
Primary Accession	Q99259
Other Accession	BC037780
Reactivity	Human
Host	mouse
Clonality	monoclonal
Isotype	IgG2a Kappa
Clone Names	5E12
Calculated MW	66897

Additional Information

Gene ID	2571
Other Names	Glutamate decarboxylase 1, 67 kDa glutamic acid decarboxylase, GAD-67, Glutamate decarboxylase 67 kDa isoform, GAD1, GAD, GAD67
Target/Specificity	GAD1 (AAH37780, 1 a.a. ~ 594 a.a) full-length recombinant protein with GST tag. MW of the GST tag alone is 26 KDa.
Dilution	WB~~1:500~1000
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	GAD1 Antibody (monoclonal) (M02) is for research use only and not for use in diagnostic or therapeutic procedures.

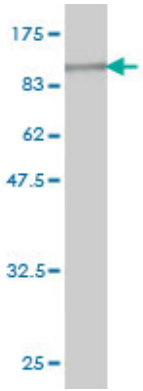
Background

This gene encodes one of several forms of glutamic acid decarboxylase, identified as a major autoantigen in insulin-dependent diabetes. The enzyme encoded is responsible for catalyzing the production of gamma-aminobutyric acid from L-glutamic acid. A pathogenic role for this enzyme has been identified in the human pancreas since it has been identified as an autoantigen and an autoreactive T cell target in insulin-dependent diabetes. This gene may also play a role in the stiff man syndrome. Deficiency in this enzyme has been shown to lead to pyridoxine dependency with seizures. Alternative splicing of this gene results in two products, the predominant 67-kD form and a less-frequent 25-kD form.

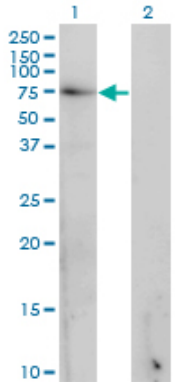
References

Common variants conferring risk of schizophrenia: a pathway analysis of GWAS data. Jia P, et al. Schizophr Res, 2010 Sep. PMID 20659789.Maternal genes and facial clefts in offspring: a comprehensive search for genetic associations in two population-based cleft studies from Scandinavia. Jugessur A, et al. PLoS One, 2010 Jul 9. PMID 20634891.Physiogenomic analysis of statin-treated patients: domain-specific counter effects within the ACACB gene on low-density lipoprotein cholesterol? Rua?o G, et al. Pharmacogenomics, 2010 Jul. PMID 20602615.Alcohol dependence and glutamate decarboxylase gene polymorphisms in an Italian male population. Terranova C, et al. Alcohol, 2010 Aug. PMID 20598486.Genetic modulation of GABA levels in the anterior cingulate cortex by GAD1 and COMT. Marenco S, et al. Neuropsychopharmacology, 2010 Jul. PMID 20357758.

Images



Antibody Reactive Against Recombinant Protein.Western Blot detection against Immunogen (91.08 KDa) .



Western Blot analysis of GAD1 expression in transfected 293T cell line by GAD1 monoclonal antibody (M02), clone 5E11.

Lane 1: GAD1 transfected lysate(66.9 KDa).
Lane 2: Non-transfected lysate.

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