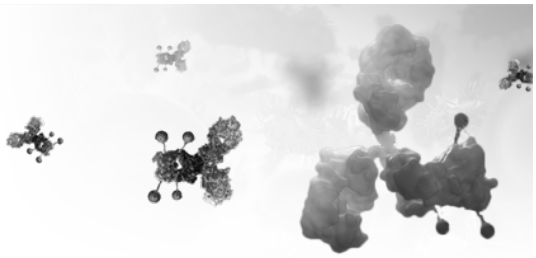

Anti-GAD1 (full length) polyclonal antibody (DPAB-DC1232)

This product is for research use only and is not intended for diagnostic use.

PRODUCT INFORMATION

Antigen Description	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.
Immunogen	GAD1 (AAH26349, 1 a.a. ~ 594 a.a) full-length recombinant protein with GST tag. The sequence is MASSTPSSSATSSNAGADPNTTNLRPTTYDTWCGVAHGCTRKLGLKICGFLQRTNSLEEK SRLVSAFKERQSSKNLLSCENSDRDARFRRTETDFSNLFARDLLPAKNGEEQTVQFLLEV VDILLNYVRKTFDRSTKVLDFHHPHQLLEGMEGFNLELSDHPESLEQILVDCRDTLKYGV RTGHPRFFNQLSTGLDIIGLAGEWLTSTANTNMFTYEIAPVFVLMEQITLKKMREIVGWS SKDGDGIFSPGGAISNMYSIMAARYKYFPEVKTKGMAAVPKLVLFTSEQSHYSIKKAGAA LGFGTDNVILIKCNERGKIIPADFEAKILEAKQKGYVPFYVNATAGTTVYGAFDPIQEIA DICEKYNLWLHVDAAWGGGLLMSRKHRHKLNGIERANSVTWNPH
Source/Host	Mouse
Species Reactivity	Human
Conjugate	Unconjugated
Applications	WB (Recombinant protein), ELISA,
Size	50 µl
Buffer	50 % glycerol

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Preservative	None
Storage	Store at -20°C or lower. Aliquot to avoid repeated freezing and thawing.

GENE INFORMATION

Gene Name	GAD1 glutamate decarboxylase 1 (brain, 67kDa) [Homo sapiens (human)]
Official Symbol	GAD1
Synonyms	GAD1; glutamate decarboxylase 1 (brain, 67kDa); GAD; SCP; CPSQ1; glutamate decarboxylase 1; GAD-67; 67 kDa glutamic acid decarboxylase; glutamate decarboxylase 67 kDa isoform;
Entrez Gene ID	2571
Protein Refseq	NP_000808
UniProt ID	Q8IVA8
Chromosome Location	2q31
Pathway	Alanine and aspartate metabolism; Alanine, aspartate and glutamate metabolism; Butanoate metabolism; GABA (gamma-Aminobutyrate) shunt
Function	glutamate binding; glutamate decarboxylase activity; protein N-terminus binding; protein binding

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