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ALS2 Antibody (monoclonal) (M01)

Mouse monoclonal antibody raised against a partial recombinant ALS2.
Catalog # AT1126a

Product Information

Application	WB, E
Primary Accession	Q96Q42
Other Accession	BC029174
Reactivity	Human
Host	mouse
Clonality	monoclonal
Isotype	IgG1 Kappa
Clone Names	4F9
Calculated MW	183634

Additional Information

Gene ID	57679
Other Names	Alsin, Amyotrophic lateral sclerosis 2 chromosomal region candidate gene 6 protein, Amyotrophic lateral sclerosis 2 protein, ALS2, ALS2CR6, KIAA1563
Target/Specificity	ALS2 (AAH29174, 221 a.a. ~ 320 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	ALS2 Antibody (monoclonal) (M01) is for research use only and not for use in diagnostic or therapeutic procedures.

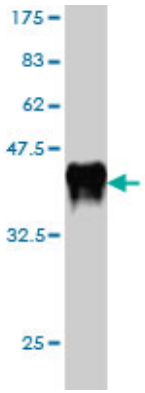
Background

The protein encoded by this gene contains an ATS1/RCC1-like domain, a RhoGEF domain, and a vacuolar protein sorting 9 (VPS9) domain, all of which are guanine-nucleotide exchange factors that activate members of the Ras superfamily of GTPases. The protein functions as a guanine nucleotide exchange factor for the small GTPase RAB5. The protein localizes with RAB5 on early endosomal compartments, and functions as a modulator for endosomal dynamics. Mutations in this gene result in several forms of juvenile lateral sclerosis and infantile-onset ascending spastic paralysis. Multiple transcript variants encoding different isoforms have been found for this gene.

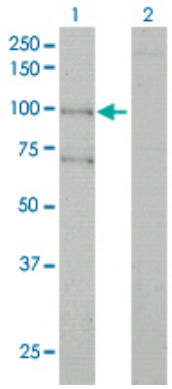
References

Personalized smoking cessation: interactions between nicotine dose, dependence and quit-success genotype score. Rose JE, et al. Mol Med, 2010 Jul-Aug. PMID 20379614.A novel ALS2 splice-site mutation in a Cypriot juvenile-onset primary lateral sclerosis family. Mintchev N, et al. Neurology, 2009 Jan 6. PMID 19122027.An interrupted beta-propeller and protein disorder: structural bioinformatics insights into the N-terminus of alsin. Soares DC, et al. J Mol Model, 2009 Feb. PMID 19023603.Maternal uniparental heterodisomy with partial isodisomy of a chromosome 2 carrying a splice acceptor site mutation (IVS9-2A>T) in ALS2 causes infantile-onset ascending spastic paralysis (IAHSP). Herzfeld T, et al. Neurogenetics, 2009 Feb. PMID 18810511.Novel homozygous ALS2 nonsense mutation (p.Gln715X) in sibs with infantile-onset ascending spastic paralysis: the first cases from northwestern Europe. Verschuuren-Bemelmans CC, et al. Eur J Hum Genet, 2008 Nov. PMID 18523452.

Images

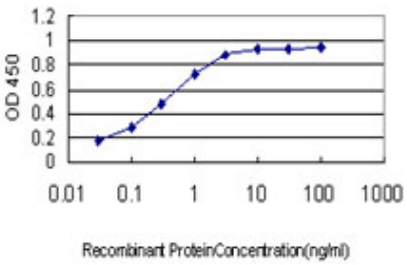


Antibody Reactive Against Recombinant Protein.Western Blot detection against Immunogen (36.74 KDa) .



Western Blot analysis of ALS2 expression in transfected 293T cell line by ALS2 monoclonal antibody (M01), clone 4F9.

Lane 1: ALS2 transfected lysate(184 KDa).
Lane 2: Non-transfected lysate.



Detection limit for recombinant GST tagged ALS2 is approximately 0.03ng/ml as a capture antibody.