



ENOB Monoclonal Antibody

Catalog No	YP-mAb-05379
Isotype	IgG
Reactivity	Human;Mouse;Rat
Applications	WB
Gene Name	ENO3
Protein Name	Beta-enolase (EC 4.2.1.11) (2-phospho-D-glycerate hydro-lyase) (Enolase 3) (Muscle-specific enolase) (MSE) (Skeletal muscle enolase)
Immunogen	Synthesized peptide derived from part region of human protein
Specificity	ENOB Monoclonal Antibody detects endogenous levels of protein.
Formulation	Liquid in PBS containing 50% glycerol, and 0.02% sodium azide.
Source	Monoclonal, Mouse,IgG
Purification	The antibody was affinity-purified from mouse antiserum by affinity-chromatography using epitope-specific immunogen.
Dilution	WB 1:500-1:2000
Concentration	1 mg/ml
Purity	≥90%
Storage Stability	-20°C/1 year
Synonyms	
Observed Band	47kD
Cell Pathway	Cytoplasm. Localized to the Z line. Some colocalization with CKM at M-band (By similarity).
Tissue Specificity	The alpha/alpha homodimer is expressed in embryo and in most adult tissues. The alpha/beta heterodimer and the beta/beta homodimer are found in striated muscle, and the alpha/gamma heterodimer and the gamma/gamma homodimer in neurons.
Function	catalytic activity:2-phospho-D-glycerate = phosphoenolpyruvate + H(2)O.,cofactor:Magnesium. Required for catalysis and for stabilizing the dimer.,developmental stage:During ontogenesis, there is a transition from the alpha/alpha homodimer to the alpha/beta heterodimer in striated muscle cells, and to the alpha/gamma heterodimer in nerve cells.,disease:Defects in ENO3 are the cause of muscle-specific enolase-beta deficiency (glycogenesis type XIII) [MIM:131370]. It is a glycogen storage myopathy which results in exercise-induced myalgias, generalized muscle weakness and fatigability. Dramatically reduced protein levels with focal sarcoplasmic accumulation of glycogen-beta particles are detected in patients.,function:Appears to have a function in striated muscle development and regeneration.,pathway:Carbohydrate degradation; glycolysis; pyruvate from D-glyceraldehyde 3-phosphate: step 4/5.



Background

enolase 3(ENO3) Homo sapiens This gene encodes one of the three enolase isoenzymes found in mammals. This isoenzyme is found in skeletal muscle cells in the adult where it may play a role in muscle development and regeneration. A switch from alpha enolase to beta enolase occurs in muscle tissue during development in rodents. Mutations in this gene have be associated glycogen storage disease. Alternatively spliced transcript variants encoding different isoforms have been described.[provided by RefSeq, Jul 2010],

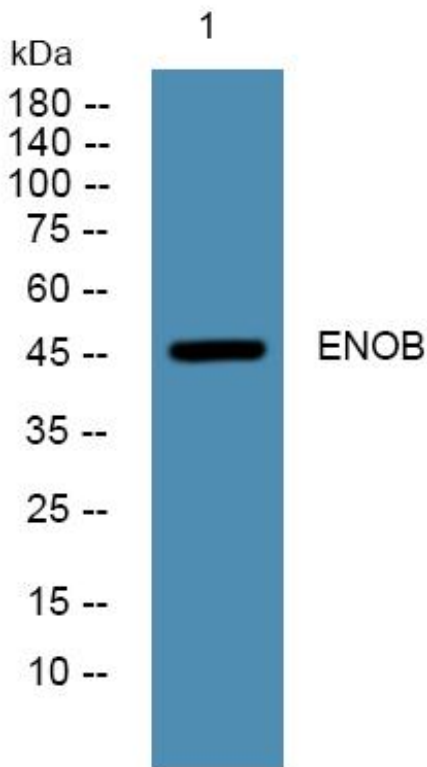
matters needing attention

Avoid repeated freezing and thawing!

Usage suggestions

This product can be used in immunological reaction related experiments. For more information, please consult technical personnel.

Products Images



Western Blot analysis of various cells using ENOB Monoclonal Antibody