abcam

Product datasheet

Recombinant Human heavy chain Myosin/MYH3 protein ab114308

1 Image

Description

Product name	Recombinant Human heavy chain Myosin/MYH3 protein
Expression system	Wheat germ
Accession	P11055
Protein length	Protein fragment
Animal free	No
Nature	Recombinant
Species	Human
Sequence	SSDTEMEVFGIAAPFLRKSEKERIEAQNQPFDAKTYCFVV DSKEEYAKGK IKSSQDGKVTVETEDNRTLVVKPEDVYAMNPPKFDRIEDM AMLTHLNEP
Predicted molecular weight	37 kDa including tags
Amino acids	2 to 100

Specifications

Our **Abpromise guarantee** covers the use of **ab114308** in the following tested applications.

The application notes include recommended starting dilutions; optimal dilutions/concentrations should be determined by the end user.

Applications	SDS-PAGE ELISA Western blot
Form	Liquid
Additional notes	This product was previously labelled as heavy chain Myosin.

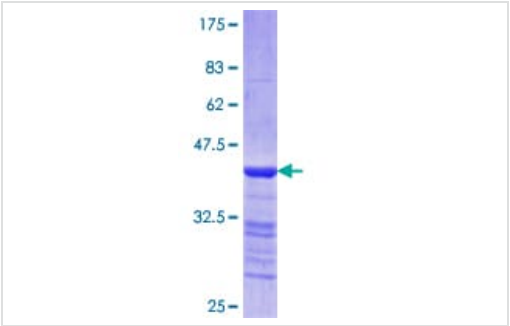
Preparation and Storage

Stability and Storage	Shipped on dry ice. Upon delivery aliquot and store at -80ºC. Avoid freeze / thaw cycles. pH: 8.00 Constituents: 0.3% Glutathione, 0.79% Tris HCl

General Info

Function	Muscle contraction.
Involvement in disease	Defects in MYH3 are the cause of distal arthrogryposis type 2A (DA2A) [MIM:193700]; also known as Freeman-Sheldon syndrome (FSS). Distal arthrogryposis is a clinically and genetically heterogeneous group of disorders characterized by bone anomalies and joint contractures of the hands and feet, causing medially overlapping fingers, clenched fists, ulnar deviation of fingers, camptodactyly and positional foot deformities. It is a disorder of primary limb malformation without primary neurologic or muscle disease. DA2A is the most severe form of distal arthrogryposis. Affected individuals have contractures of the orofacial muscles, characterized by microstomia with pouting lips, H-shaped dimpling of the chin, deep nasolabial folds, and blepharophimosis. Dysphagia, failure to thrive, growth deficit, and life-threatening respiratory complications (caused by structural anomalies of the oropharynx and upper airways) are frequent. Inheritance is autosomal dominant. Defects in MYH3 are the cause of distal arthrogryposis type 2B (DA2B) [MIM:601680]; also known as Sheldon-Hall syndrome (SHS) or arthrogryposis multiplex congenita distal type 2B (AMCD2B). DA2B is a form of inherited multiple congenital contractures. Affected individuals have vertical talus, ulnar deviation in the hands, severe camptodactyly, and a distinctive face characterized by a triangular shape, prominent nasolabial folds, small mouth and a prominent chin. DA2B is the most common of the distal arthrogryposis syndromes. It is similar to DA2A but the facial contractures are less dramatic.
Sequence similarities	Contains 1 IQ domain. Contains 1 myosin head-like domain.
Developmental stage	Abundantly present in fetal skeletal muscle and not present or barely detectable in heart and adult skeletal muscle.
Domain	The rodlike tail sequence is highly repetitive, showing cycles of a 28-residue repeat pattern composed of 4 heptapeptides, characteristic for alpha-helical coiled coils. Each myosin heavy chain can be split into 1 light meromyosin (LMM) and 1 heavy meromyosin (HMM). It can later be split further into 2 globular subfragments (S1) and 1 rod-shaped subfragment (S2).
Cellular localization	Cytoplasm > myofibril. Thick filaments of the myofibrils.

Images



SDS-PAGE - Recombinant Human heavy chain Myosin/MYH3 protein (ab114308)

SDS-PAGE analysis of ab114308 on a 12.5% gel stained with Coomassie Blue.

Please note: All products are "FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC PROCEDURES"

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