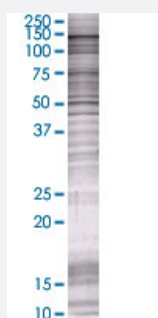


MYLK 293T Cell Transient Overexpression Lysate(Denatured)

Catalog # H00004638-T01

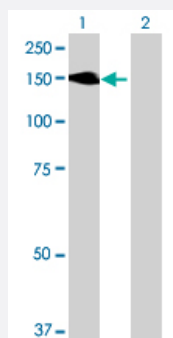
Size 100 uL

Applications



SDS-PAGE Gel

MYLK transfected lysate.



Western Blot

Lane 1: MYLK transfected lysate (109.23 KDa)

Lane 2: Non-transfected lysate.

Specification

Transfected Cell Line 293T

Plasmid pCMV-MYLK full-length

Host Human

Theoretical MW (kDa) 109.23

Quality Control Testing Transient overexpression cell lysate was tested with Anti-MYLK antibody ([H00004638-B01](#)) by Western Blots.
 SDS-PAGE Gel
 MYLK transfected lysate.
 Western Blot
 Lane 1: MYLK transfected lysate (109.23 KDa)
 Lane 2: Non-transfected lysate.

Storage Buffer

1X Sample Buffer (50 mM Tris-HCl, 2% SDS, 10% glycerol, 300 mM 2-mercaptoethanol, 0.01% Bromophenol blue)

Storage Instruction

Store at -80°C. Aliquot to avoid repeated freezing and thawing.

Applications

- Western Blot

Gene Info — MYLK

Entrez GeneID[4638](#)**GeneBank Accession#**[NM_053030.2](#)**Protein Accession#**[ENSP00000355024](#)**Gene Name**

MYLK

Gene Alias

DKFZp686I10125, FLJ12216, KRP, MLCK, MLCK1, MLCK108, MLCK210, MSTP083, MYLK1, smMLCK

Gene Description

myosin light chain kinase

Omim ID[600922](#)**Gene Ontology**[Hyperlink](#)**Gene Summary**

This gene, a muscle member of the immunoglobulin gene superfamily, encodes myosin light chain kinase which is a calcium/calmodulin dependent enzyme. This kinase phosphorylates myosin regulatory light chains to facilitate myosin interaction with actin filaments to produce contractile activity. This gene encodes both smooth muscle and nonmuscle isoforms. In addition, using a separate promoter in an intron in the 3' region, it encodes telokin, a small protein identical in sequence to the C-terminus of myosin light chain kinase, that is independently expressed in smooth muscle and functions to stabilize unphosphorylated myosin filaments. A pseudogene is located on the p arm of chromosome 3. Four transcript variants that produce four isoforms of the calcium/calmodulin dependent enzyme have been identified as well as two transcripts that produce two isoforms of telokin. Additional variants have been identified but lack full length transcripts. [provided by RefSeq]

Other Designations

OTTHUMP00000180642|OTTHUMP00000180643|myosin, light polypeptide kinase|smooth muscle myosin light chain kinase

Pathway

- [Calcium signaling pathway](#)
- [Focal adhesion](#)
- [Regulation of actin cytoskeleton](#)
- [Vascular smooth muscle contraction](#)

Disease

- [Asthma](#)
- [Cardiovascular Diseases](#)
- [Coronary Artery Disease](#)
- [Critical Illness](#)
- [Diabetes Mellitus](#)
- [Edema](#)
- [Genetic Predisposition to Disease](#)
- [Heart Defects](#)
- [Hypertension](#)
- [Kidney Failure](#)
- [Puerperal Disorders](#)
- [Respiratory Distress Syndrome](#)
- [Rhabdomyolysis](#)
- [Sepsis](#)
- [Streptococcal Infections](#)
- [Wounds and Injuries](#)