

MYL2 Antibody (clone AT3B2)

Mouse Monoclonal Antibody Catalog # ALS12845

Specification

MYL2 Antibody (clone AT3B2) - Product Information

Application IHC, WB Primary Accession P10916

Reactivity Human, Mouse, Rat

Host Mouse
Clonality Monoclonal
Calculated MW 19kDa KDa

MYL2 Antibody (clone AT3B2) - Additional Information

Gene ID 4633

Other Names

Myosin regulatory light chain 2, ventricular/cardiac muscle isoform, MLC-2, MLC-2v, MYL2

Target/Specificity

human MYL2 (1-166aa)

Reconstitution & Storage

Aliquot and store at -20°C. Minimize freezing and thawing.

Precautions

MYL2 Antibody (clone AT3B2) is for research use only and not for use in diagnostic or therapeutic procedures.

MYL2 Antibody (clone AT3B2) - Protein Information

Name MYL2 (HGNC:7583)

Function

Contractile protein that plays a role in heart development and function (PubMed:23365102, PubMed:32453731). Following phosphorylation, plays a role in cross-bridge cycling kinetics and cardiac muscle contraction by increasing myosin lever arm stiffness and promoting myosin head diffusion; as a consequence of the increase in maximum contraction force and calcium sensitivity of contraction force. These events altogether slow down myosin kinetics and prolong duty cycle resulting in accumulated myosins being cooperatively recruited to actin binding sites to sustain thin filament activation as a means to fine-tune myofilament calcium sensitivity to force (By similarity). During cardiogenesis plays an early role in cardiac contractility by promoting cardiac myofibril assembly (By similarity).

Cellular Location

Cytoplasm, myofibril, sarcomere, A band {ECO:0000250|UniProtKB:P08733}



Tissue LocationHighly expressed in type I muscle fibers.

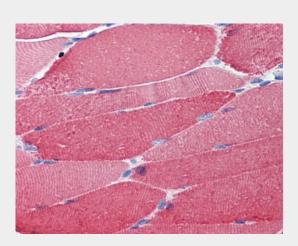
Volume 50 µl

MYL2 Antibody (clone AT3B2) - Protocols

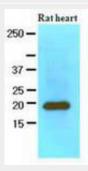
Provided below are standard protocols that you may find useful for product applications.

- Western Blot
- Blocking Peptides
- Dot Blot
- <u>Immunohistochemistry</u>
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- Cell Culture

MYL2 Antibody (clone AT3B2) - Images



Anti-MYL2 antibody IHC of human skeletal muscle.



Western analysis of rat heart extracts

MYL2 Antibody (clone AT3B2) - References

Libera L.D., et al. Nucleic Acids Res. 17:2360-2360(1989). Wu Q.L., et al. Submitted (MAR-1996) to the EMBL/GenBank/DDBJ databases. Margossian S.S., et al. Submitted (AUG-1997) to the EMBL/GenBank/DDBJ databases. Wadgaonkar R., et al. Cell. Mol. Biol. Res. 39:13-26(1993).





Kovalyov L.I., et al. Electrophoresis 16:1160-1169(1995).