

## **MURC Antibody (N-term)**

Affinity Purified Rabbit Polyclonal Antibody (Pab) Catalog # AP5646a

### **Specification**

# **MURC Antibody (N-term) - Product Information**

Application WB, IHC-P,E Primary Accession O5BKX8

Other Accession NP\_001018126.1

Reactivity
Human
Host
Clonality
Polyclonal
Isotype
Antigen Region
Rabbit IgG
87-116

### MURC Antibody (N-term) - Additional Information

#### **Gene ID 347273**

### **Other Names**

Muscle-related coiled-coil protein, Muscle-restricted coiled-coil protein, MURC

# **Target/Specificity**

This MURC antibody is generated from rabbits immunized with a KLH conjugated synthetic peptide between 87-116 amino acids from the N-terminal region of human MURC.

#### **Dilution**

WB~~1:1000 IHC-P~~1:50~100

## **Format**

Purified polyclonal antibody supplied in PBS with 0.09% (W/V) sodium azide. This antibody is purified through a protein A column, followed by peptide affinity purification.

### Storage

Maintain refrigerated at 2-8°C for up to 2 weeks. For long term storage store at -20°C in small aliquots to prevent freeze-thaw cycles.

#### **Precautions**

MURC Antibody (N-term) is for research use only and not for use in diagnostic or therapeutic procedures.

# MURC Antibody (N-term) - Protein Information

Name CAVIN4 (HGNC:33742)

**Synonyms MURC** 



**Function** Modulates the morphology of formed caveolae in cardiomyocytes, but is not required for caveolar formation. Facilitates the recruitment of MAPK1/3 to caveolae within cardiomyocytes and regulates alpha-1 adrenergic receptor-induced hypertrophic responses in cardiomyocytes through MAPK1/3 activation. Contributes to proper membrane localization and stabilization of caveolin-3 (CAV3) in cardiomyocytes (By similarity). Induces RHOA activation and activates NPPA transcription and myofibrillar organization through the Rho/ROCK signaling pathway (PubMed:18332105).

# **Cellular Location**

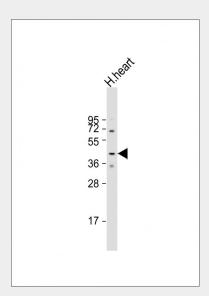
Cytoplasm, myofibril, sarcomere {ECO:0000250|UniProtKB:A2AMM0}. Cytoplasm {ECO:0000250|UniProtKB:A2AMM0}. Cytoplasm, cytosol {ECO:0000250|UniProtKB:A2AMM0}. Cell membrane, sarcolemma {ECO:0000250|UniProtKB:A2AMM0}. Membrane, caveola. Cell membrane. Note=In cardiomyocytes, accumulates in the Z-line of the sarcomere. In vascular smooth muscle cells, detected diffusely throughout the cytoplasm. Localizes in the caveolae in a caveolin-dependent manner. {ECO:0000250|UniProtKB:A2AMM0}

# MURC Antibody (N-term) - Protocols

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

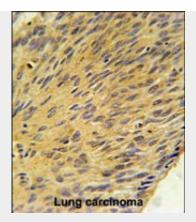
- Western Blot
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- <u>Immunoprecipitation</u>
- Flow Cytomety
- Cell Culture

### MURC Antibody (N-term) - Images



Anti-MURC Antibody (N-term) at 1:1000 dilution + human heart lysate Lysates/proteins at 20  $\mu$ g per lane. Secondary Goat Anti-Rabbit IgG, (H+L), Peroxidase conjugated at 1/10000 dilution. Predicted band size : 42 kDa Blocking/Dilution buffer: 5% NFDM/TBST.





MURC Antibody (N-term) (Cat. #AP5646a) immunohistochemistry analysis in formalin fixed and paraffin embedded human lung carcinoma followed by peroxidase conjugation of the secondary antibody and DAB staining. This data demonstrates the use of the MURC Antibody (N-term) for immunohistochemistry. Clinical relevance has not been evaluated.

### MURC Antibody (N-term) - Background

MURC induces RHOA activation and activates NPPA transcription and myofibrillar organization through the Rho/ROCK signaling pathway.

# **MURC Antibody (N-term) - References**

Tagawa, M., et al. Am. J. Physiol., Cell Physiol. 295 (2), C490-C498 (2008): Ogata, T., et al. Mol. Cell. Biol. 28(10):3424-3436(2008)