For Research Use Only

ACTC1-specific Monoclonal antibody

Catalog Number:66125-1-lg 9 Publications



Basic Information

Catalog Number: 66125-1-lg Concentration: 747 ug/ml

Source: Mouse Isotype: IgG1

Calculated MW: 42 kDa Observed MW:

42 kDa

NM_005159

UNIPROT ID:

Full Name:

P68032

GeneID (NCBI):

GenBank Accession Number:

actin, alpha, cardiac muscle 1

Purification Method:

Protein A purification CloneNo.:

1F2B9

Recommended Dilutions: WB 1:2500-1:10000 IHC 1:100-1:400 IF-P 1:200-1:800 IF-Fro 1:400-1:1600

Applications

Tested Applications:

WB, IHC, IF-P, IF-Fro, FC (Intra), ELISA

Cited Applications: WB, IHC, IF Species Specificity: human, mouse, rat, pig

Cited Species:

human, mouse, rat, rabbit

Note-IHC: suggested antigen retrieval with TE buffer pH 9.0; (*) Alternatively, antigen retrieval may be performed with citrate buffer pH 6.0

Positive Controls:

WB: human heart tissue, pig heart tissue, rat heart tissue, mouse heart tissue

IHC: human heart tissue, human heart and human

IF-P: mouse heart tissue,
IF-Fro: mouse heart tissue,

skeletal muscle tissue

Background Information

Actins are highly conserved proteins that are involved in various types of cell motility and are ubiquitously expressed in all eukaryotic cells. The ACTC1 gene encodes cardiac muscle alpha-actin, the predominant actin isoform in adult heart, which interacts with a variety of proteins to produce the force for muscle contraction. This antibody is specific to the ACTC1. It does not cross-react with other actin isoforms.

Notable Publications

Author	Pubmed ID	Journal	Application
Jiang Yan	36087696	Eur J Pharmacol	WB,IF
Muyao Ye	34642907	Immunol Res	WB
Eric E Abrahamson	36411500	Amyloid	IF

Storage

Storage

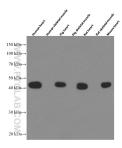
Store at -20°C. Stable for one year after shipment.

Storage Buffer

PBS with 0.02% sodium azide and 50% glycerol, pH7.3 $\,$

Aliquoting is unnecessary for -20°C storage

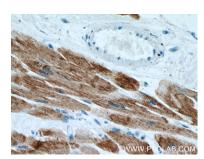
Selected Validation Data



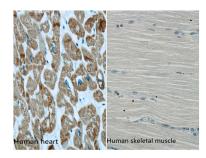
Various lysates were subjected to SDS PAGE followed by western blot with 66125-1-lg (ACTC 1-specific antibody) at dilution of 1:100000 incubated at room temperature for 1.5 hours.



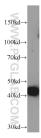
Immunohistochemical analysis of paraffinembedded human heart using 66125-1-Ig(ACTC1-specific antibody) at dilution of 1:200 (under 10x lens)



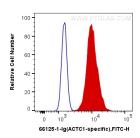
Immunohistochemical analysis of paraffinembedded human heart using 66125-1-Ig(ACTC1-specific antibody) at dilution of 1:200 (under 40x Loss)



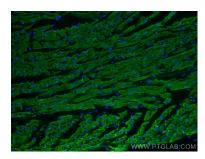
Immunohistochemical analysis of paraffinembedded human heart and human skeletal muscle using 66125-1-1g (ACTC1 specific antibody) at dilution 1:500. (under 40x lens).



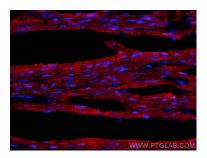
human heart tissue were subjected to SDS PAGE followed by western blot with 66125-1-Ig (ACTC1-specific antibody) at dilution of 1:5000 incubated at room temperature for 1.5 hours.



1X10^6 C2C12 cells were intracellularly stained with 0.4 ug Anti-Human ACTC1-specific (66125-1-lg, Clone:1F2B9) and Coralite® 488-Conjugated AffiniPure Goat Anti-Mouse IgG(H+L) at dilution 1:1000 (red), or 0.4 ug Control Antibody. Cells were fixed with 4% PFA and permeabilized with Flow Cytometry Perm Buffer (PF00011-C).



Immunofluorescent analysis of (4% PFA) fixed mouse heart tissue using ACTC1-specific antibody (66125-1-1g, Clone: 1F2B9) at dilution of 1:400 and CoraLite® 488-Conjugated AffiniPure Goat Anti-Mouse IgG(H+L).



Immunofluorescent analysis of (4% PFA) fixed frozen OCT-embedded mouse heart tissue using ACTC1-specific antibody (66125-1-1g, Clone: 1F2B9) at dilution of 1:800 and Multi-rAb CoraLite ® Plus 594-Goat Anti-Mouse Recombinant Secondary Antibody (H+L) (RGAM004).