M5 β–Actin Rabbit Polyclonal Antibody 使用说明书

产品名称		单位	货号
M5 β-Actin Rabbit Polyclonal	Antibody	50μl	MF092-T
M5 β-Actin Rabbit Polyclonal	Antibody	100μl	MF092-01

【STORAGE】
Store the product at -20°C. Stable for one year from the date of shipment.

【BACKGROUND】
All eukaryotic cells express actin, which often constitutes as much as 50% of total cellular protein. Actin filaments can form both stable and labile structures and are crucial components of microvilli and the contractile apparatus of muscle cells. While lower eukaryotes, such as yeast, have only one actin gene, higher eukaryotes have several isoforms encoded by a family of genes. At least six types of actin are present in mammalian tissues and fall into three classes. -actin expression is limited to various types of muscle, whereas - and -actin are the principle constituents of filaments in other tissues. Members of the small GTPase family regulate the organization of the actin cytoskeleton. Rho controls the assembly of ctin stress fibers and focal adhesion, Rac regulates ctin filament accumulation at the plasma membrane and Cdc42 stimulates formation of filopodia.

【REFERENCES】
1. Lessard, J.L. 1988. Two monoclonal antibodies to Actin: one muscle selective and one generally reactive. Cell Motil. Cytoskeleton 10: 349-362.
2. Doolittle, R.F. 1995. The origins and evolution of eukaryotic proteins. Philos. Trans. R. Soc. Lond., B, Biol. Sci. 349: 235-240.
3. Maccioni, R.B. and Cambiazo, V. 1995. Role of microtubule-associated proteins in the control of microtubule assembly. Physiol. Rev. 75: 835-864.
4. Schutt, C.E., Rozycki, M.D., Myslik, J.C. and Lindberg, U. 1995. A discourse on modeling F-Actin. J. Struct. Biol. 115: 186-198.
5. Barkalow, K. and Hartwig, J.H. 1995. Actin cytoskeleton. Setting the pace of cell movement. Curr. Biol. 5: 1000-1002.
6. Nobes, C.D. and Hall, A. 1995. Rho, Rac, and Cdc42 GTPases regulate the assembly of multimolecular focal complexes associated with Actin stress fibers, lamellipodia, and filopodia. Cell 81: 53-62.
7. Graf, R., Neudeck, H., Gossrau, R. and Vetter, K. 1996. Elastic fibres are an essential component of human placental stem villous stroma and an integrated part of the perivascular contractile sheath. Cell Tissue Res. 283: 133-141.
8. Furumura, M. and Ishikawa, H. 1996. Actin bundles in human hair follicles as revealed by confocal laser microscopy. Cell Tissue. Res. 283: 425-434.

【SOURCE】
This polyclonal antibody is produced by immunizing animals with a synthetic peptide (KLH-coupled) corresponding to amino-terminal residues of human - ctin.

【SPECIFICITY】
β-Actin Antibody detects endogenous levels of total -actin protein.

【REACTIVITY】
Human, Mouse, Rat, Monkey, D. melanogaster

【ISOTYPE】
Rabbit IgG

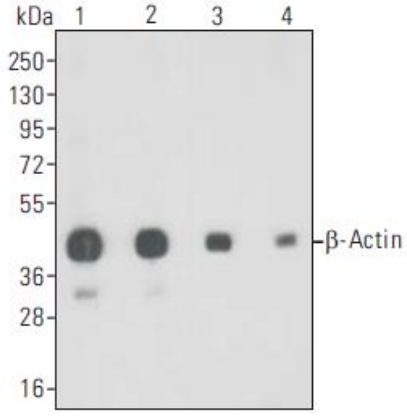
【ISOTYPE】
42kDa

【IMPORTANT】
Use an anti-RABBIT secondary antibody to detect the antibody.

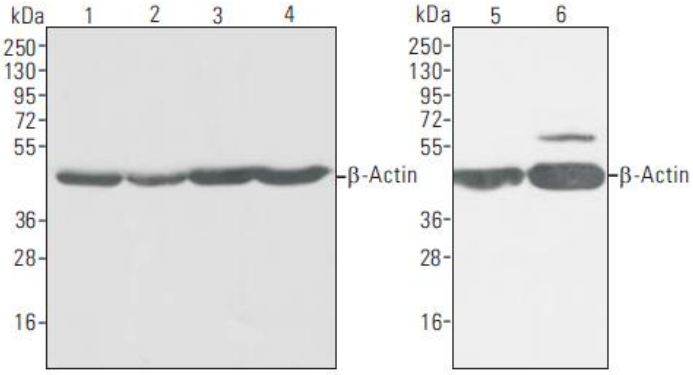
【RECOMMENDED ANTIBODY DILUTIONS】
Western blotting 1:2000

For Western blots,incubate membrane with diluted antibody in5％w/v nonfat dry milk,1XTBS,0.05％Tween-20 at 4℃ with gentle shaking,overnight.

【APPLICATION DATA】



Western blot analysis of Hela whole cell lysate usingβ –Actin Antibody. The dilutions are 1:1000 (lane1),1:2000 (lane2),1:5000 (lane3),1:10000 (lane4). Each lane was loaded with 20 μg of Hela cell lysate.



Western blot analysis of lysates from various cell lines/tissue usingβ -Actin Antibody (1:2000). Each lane was loaded with 20 μg (cell lysate) or 30μg (tissue) protein.
Lane 1: Hela; Lane 2: 293T; Lane 3: 3T3; Lane 4: COS7; Lane 5: Rat muscle; Lane 6: D.melanogaster.