

# Cofilin Antibody

- Small 100 µl (10 western blots)
- Large 300 µl (30 western blots)

**Orders** ■ 877-616-CELL (2355)  
orders@cellsignal.com

**Support** ■ 877-678-TECH (8324)  
info@cellsignal.com

**Web** ■ www.cellsignal.com

rev. 02/02/10

This product is intended for research purposes only. This product is not intended to be used for therapeutic or diagnostic purposes in humans or animals.

Entrez-Gene ID #1072  
Swiss-Prot Acc. #P23528

Applications	Species Cross-Reactivity*	Molecular Wt.	Source
W Endogenous	H, M, R, Mk, Hm, B, (Pg)	19 kDa	Rabbit**

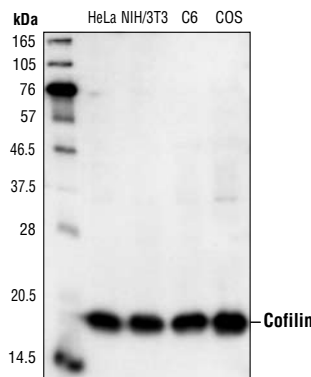
**Background:** Cofilin and ADF (actin-depolymerization factor) are members of a family of essential conserved small actin-binding proteins that play pivotal roles in cytokinesis, endocytosis, embryonic development, stress response and tissue regeneration (1). In response to stimuli, cofilin promotes the regeneration of actin filaments by severing preexisting filaments (2). The severing activity of cofilin is inhibited by LIMK or TESK phosphorylation at Ser3 of cofilin (3-5). Phosphorylation at Ser3 also regulates cofilin translocation from the nucleus to the cytoplasm (6).

**Specificity/Sensitivity:** Cofilin Antibody detects endogenous levels of total cofilin protein. The antibody may also recognize cofilin 2, the muscle isoform.

**Source/Purification:** Polyclonal antibodies are produced by immunizing rabbits with a synthetic peptide (KLH-coupled) corresponding to residues surrounding Ser3 of human cofilin. Antibodies are purified by protein A.

**Background References:**

- (1) Carlier, M. et al. (1999) *J. Biol. Chem.* 274, 33827-33830.
- (2) Condeelis, J. (2001) *Trends Cell Biol.* 11, 288-293.
- (3) Arber, S. et al. (1998) *Nature* 393, 805-809.
- (4) Yang, N. et al. (1998) *Nature* 393, 809-812.
- (5) Toshima, J. et al. (2001) *J. Biol. Chem.* 276, 31449-31458.
- (6) Nebel, G. et al. (1996) *J. Biol. Chem.* 271, 26276-26280.



Western blot analysis of extracts from HeLa, NIH/3T3, C6 and COS cells using Cofilin Antibody.

**Storage:** Supplied in 10 mM sodium HEPES (pH 7.5), 150 mM NaCl, 100 µg/ml BSA and 50% glycerol. Store at -20°C. Do not aliquot the antibody.

\*Species cross-reactivity is determined by western blot.

\*\*Anti-rabbit secondary antibodies must be used to detect this antibody.

**Recommended Antibody Dilutions:**

Western Blotting 1:1000

For application specific protocols please see the web page for this product at [www.cellsignal.com](http://www.cellsignal.com).

Please visit [www.cellsignal.com](http://www.cellsignal.com) for a complete listing of recommended companion products.

**IMPORTANT: For Western blots, incubate membrane with diluted antibody in 5% w/v BSA, 1X TBS, 0.1% Tween-20 at 4°C with gentle shaking, overnight.**