



Rabbit Anti-Actin Regulatory Protein CAPG antibody

SL12445R

Product Name:	Actin Regulatory Protein CAPG
Chinese Name:	肌动蛋白调节蛋白CAPG抗体
Alias:	Actin capping protein GCAP39; Actin regulatory protein CAP G; Actin regulatory protein CAP-G; AFCP; CAPG; CAPG_HUMAN; Capping protein (actin filament) gelsolin like; Capping protein gelsolin like; gCap39; Gelsolin like capping protein; Macrophage capping protein; Macrophage-capping protein; mbh1; MCP; Myc basic motif homolog 1.
Organism Species:	Rabbit
Clonality:	Polyclonal
React Species:	Human,Mouse,Rat,Dog,Cow,Horse,Sheep,
Applications:	ELISA=1:500-1000IHC-P=1:400-800IHC-F=1:400-800ICC=1:100-500IF=1:100-500 (Paraffin sections need antigen repair) not yet tested in other applications. optimal dilutions/concentrations should be determined by the end user.
Molecular weight:	38kDa
Cellular localization:	The nucleuscytoplasmic
Form:	Lyophilized or Liquid
Concentration:	1mg/ml
immunogen:	KLH conjugated synthetic peptide derived from human Actin Regulatory Protein CAPG:251-348/348
Lsotype:	IgG
Purification:	affinity purified by Protein A
Storage Buffer:	0.01M TBS(pH7.4) with 1% BSA, 0.03% Proclin300 and 50% Glycerol.
Storage:	Store at -20 °C for one year. Avoid repeated freeze/thaw cycles. The lyophilized antibody is stable at room temperature for at least one month and for greater than a year when kept at -20°C. When reconstituted in sterile pH 7.4 0.01M PBS or diluent of antibody the antibody is stable for at least two weeks at 2-4 °C.
PubMed:	PubMed

Caldesmon, Filamin 1, Nebulin, Plastin, ADF, Gelsolin, CapG, Dematin and Cofilin are differentially expressed Actin-binding proteins. Both muscular (CDh) and non-muscular (CD1) forms of Caldesmon bind to Actin as well as to Calmodulin and Myosin. CDh is expressed predominantly on thin filaments in smooth muscle, whereas CD1 is widely expressed in non-muscle tissues and cells. CapG, also designated Actin-regulatory protein and macrophage-capping protein, is a macrophage-specific protein that reversibly blocks the barbed ends of Actin filaments, but does not sever preformed ones. The interactions of CapG with Actin may be important in the regulation of nuclear and cytoplasmic structures. CapG is a calcium-sensitive DNA-binding protein that plays a role in macrophage function. It is expressed in macrophages and macrophage-like cells and can localize both to the nucleus and the cytoplasm.

Function:

Calcium-sensitive protein which reversibly blocks the barbed ends of actin filaments but does not sever preformed actin filaments. May play an important role in macrophage function. May play a role in regulating cytoplasmic and/or nuclear structures through potential interactions with actin. May bind DNA.

Subcellular Location:

Cytoplasm. Nucleus. Melanosome. Identified by mass spectrometry in melanosome fractions from stage I to stage IV.

Tissue Specificity:

Macrophages and macrophage-like cells.

Post-translational modifications:

The N-terminus is blocked.

Similarity:

Belongs to the villin/gelsolin family.
Contains 3 gelsolin-like repeats.

SWISS:

P40121

Gene ID:

822

Database links:

[Entrez Gene: 353121](#)Cow

[Entrez Gene: 822](#)Human

[Entrez Gene: 12332](#)Mouse

Product Detail:

[Entrez Gene: 297339](#)Rat

[Omim: 153615](#)Human

[SwissProt: Q865V6](#)Cow

[SwissProt: P40121](#)Human

[SwissProt: P24452](#)Mouse

[SwissProt: Q6AYC4](#)Rat

[Unigene: 516155](#)Human

[Unigene: 18626](#)Mouse

[Unigene: 8945](#)Rat

Important Note:

This product as supplied is intended for research use only, not for use in human, therapeutic or diagnostic applications.