

IQGAP1 Antibody (N-term)

Affinity Purified Rabbit Polyclonal Antibody (Pab) Catalog # AP16889A

Specification

IQGAP1 Antibody (N-term) - Product Information

Application	WB,E
Primary Accession	<u>P46940</u>
Other Accession	<u>NP_003861.1</u>
Reactivity	Human
Host	Rabbit
Clonality	Polyclonal
Isotype	Rabbit IgG
Calculated MW	189252
Antigen Region	256-285

IQGAP1 Antibody (N-term) - Additional Information

Gene ID 8826

Other Names Ras GTPase-activating-like protein IQGAP1, p195, IQGAP1, KIAA0051

Target/Specificity

This IQGAP1 antibody is generated from rabbits immunized with a KLH conjugated synthetic peptide between 256-285 amino acids from the N-terminal region of human IQGAP1.

Dilution WB~~1:1000 E~~Use at an assay dependent concentration.

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

IQGAP1 Antibody (N-term) is for research use only and not for use in diagnostic or therapeutic procedures.

IQGAP1 Antibody (N-term) - Protein Information

Name IQGAP1

Synonyms KIAA0051



Function Plays a crucial role in regulating the dynamics and assembly of the actin cytoskeleton. Recruited to the cell cortex by interaction with ILK which allows it to cooperate with its effector DIAPH1 to locally stabilize microtubules and allow stable insertion of caveolae into the plasma membrane (By similarity). Binds to activated CDC42 but does not stimulate its GTPase activity. Associates with calmodulin. May promote neurite outgrowth (PubMed:<u>15695813</u>). May play a possible role in cell cycle regulation by contributing to cell cycle progression after DNA replication arrest (PubMed:<u>20883816</u>).

Cellular Location

Cell membrane. Nucleus. Cytoplasm. Cytoplasm, cell cortex {ECO:0000250|UniProtKB:Q9JKF1}. Apical cell membrane. Basolateral cell membrane {ECO:0000250|UniProtKB:Q9JKF1}. Note=Subcellular distribution is regulated by the cell cycle, nuclear levels increase at G1/S phase (PubMed:20883816).

Tissue Location

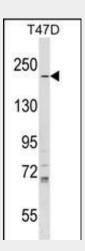
Expressed in the placenta, lung, and kidney (PubMed:8051149). A lower level expression is seen in the heart, liver, skeletal muscle and pancreas (PubMed:8051149)

IQGAP1 Antibody (N-term) - Protocols

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

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

IQGAP1 Antibody (N-term) - Images



IQGAP1 Antibody (N-term) (Cat. #AP16889a) western blot analysis in T47D cell line lysates (35ug/lane).This demonstrates the IQGAP1 antibody detected the IQGAP1 protein (arrow).

IQGAP1 Antibody (N-term) - Background

This gene encodes a member of the IQGAP family. The protein contains four IQ domains, one calponin homology domain, one



Ras-GAP domain and one WW domain. It interacts with components of the cytoskeleton, with cell adhesion molecules, and with several signaling molecules to regulate cell morphology and motility. Expression of the protein is upregulated by gene amplification in two gastric cancer cell lines.

IQGAP1 Antibody (N-term) - References

Hayashi, H., et al. Int. J. Cancer 126(11):2563-2574(2010) Liang, S., et al. Proteomics 10(7):1474-1483(2010) Nakhaei-Nejad, M., et al. Eur. J. Immunol. 40(1):204-213(2010) Wang, J.B., et al. J. Cell. Sci. 122 (PT 12), 2024-2033 (2009) : Usatyuk, P.V., et al. J. Biol. Chem. 284(22):15339-15352(2009)