

MAGI1 Polyclonal Antibody

Purified Rabbit Polyclonal Antibody (Pab) Catalog # AP54467

Product Information

Application WB, IHC-P, IHC-F, IF, ICC, E

Primary Accession Q96QZ7

Reactivity Rat, Pig, Dog, Bovine

Host Rabbit
Clonality Polyclonal
Calculated MW 164581
Physical State Liquid

Immunogen KLH conjugated synthetic peptide derived from human MAGI1

Epitope Specificity 161-260/1491

Isotype IgG

Purity affinity purified by Protein A

Buffer 0.01M TBS (pH7.4) with 1% BSA, 0.02% Proclin300 and 50% Glycerol.

SUBCELLULAR LOCATION Cell junction; cell membrane; tight junction; peripheral membrane protein.

Localizes to epithelial cells tight junctions.

SIMILARITY Contains 1 guanylate kinase-like domain. Contains 6 PDZ (DHR) domains.

Contains 2 WW domains.

SUBUNIT Interacts through its WW 2 domain with SYNPO and through its PDZ 5 domain

with ACTN4. Interacts with cytoplasmic domain of BAI1. Interacts via its WW domains with DRPLA. Interacts with ESAM, LRP2 and CXADR. May interact with

CTNNB1. Interacts through its PDZ 1 domain with NET1 (By similarity). Interacts with ASIC3 and AMOT. Interacts with FCHSD2. Interacts with IGSF5/JAM4 and through its PDZ 2 and 3 domains with NPHS1 forming a

tripartite complex (By similarity). Interacts with DDN.

Important Note This product as supplied is intended for research use only, not for use in

human, therapeutic or diagnostic applications.

Background Descriptions The membrane-associated guanylate kinase (MAGUK) proteins are

concentrated at the membrane-cytoskeletal interface where they facilitate the assembly of multiprotein complexes on the inner surface of the plasma membrane. Three protein-protein interaction modules characteristically define MAGUK related proteins: the PDZ domain, the SH3 domain and the guanylate kinase (GuK) domain. The closely related MAGUK proteins, MAGI-1, MAGI-2 and MAGI-3 (membrane associated guanylate kinase inverted-1 and 2), likewise contain the GuK domain and five PDZ domains; however, the SH3 domain is replaced with a WW domain. The transcripts of MAGI-1 are alternatively spliced to produce three distinct proteins having unique C-terminals. Two variants, MAGI-1a and MAGI-1b, are associated with the membrane and cytosolic fractions and are primarily expressed in the brain. The third isoform, MAGI-1c, encodes for a nuclear localization signal that localizes MAGI-1c to the nucleus, and it is primarily expressed in the liver and kidney. MAGI-2 and MAGI-3 are localized to the plasma membrane, and they contribute to protein scaffolding by associating with the protein phosphatase

Additional Information

Gene ID 9223

Other Names Membrane-associated guanylate kinase, WW and PDZ domain-containing

protein 1, Atrophin-1-interacting protein 3, AIP-3, BAI1-associated protein 1,

BAP-1, Membrane-associated guanylate kinase inverted 1, MAGI-1, Trinucleotide repeat-containing gene 19 protein, WW domain-containing

protein 3, WWP3, MAGI1, AIP3, BAIAP1, BAP1, TNRC19

Target/Specificity Widely expressed with the exception of skeletal muscle. Isoform 1, isoform 2

and isoform 6 are highly expressed in colon, kidney, lung, liver, and pancreas. Isoform 5 is predominantly expressed in brain and heart. Isoform 3 and

isoform 4 are highly expressed in pancreas and brain.

Dilution WB=1:500-2000,IHC-P=1:100-500,IHC-F=1:100-500,ICC=1:100-500,IF=1:100-50

0,ELISA=1:5000-10000

Format 0.01M TBS(pH7.4) with 1% BSA, 0.09% (W/V) sodium azide and 50% Glyce

Storage Store at -20 °C for one year. Avoid repeated freeze/thaw cycles. 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.

Protein Information

Name MAGI1

Synonyms AIP3, BAIAP1, BAP1, TNRC19

Function Plays a role in coupling actin fibers to cell junctions in endothelial cells, via

its interaction with AMOTL2 and CDH5 (By similarity). May regulate

acid-induced ASIC3 currents by modulating its expression at the cell surface

(By similarity).

Cell junction, tight junction. Cell membrane; Peripheral membrane protein.

Note=Localizes to epithelial cells tight junctions

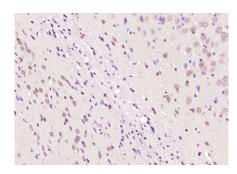
Tissue Location Widely expressed with the exception of skeletal muscle. Isoform 1, isoform 2

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Images



Paraformaldehyde-fixed, paraffin embedded (rat brain); Antigen retrieval by boiling in sodium citrate buffer (pH6.0) for 15min; Block endogenous peroxidase by 3% hydrogen peroxide for 20 minutes; Blocking buffer (normal goat serum) at 37°C for 30min; Antibody incubation with (MAGI1) Polyclonal Antibody, Unconjugated (AP54467) at 1:200 overnight at 4°C, followed by operating according to SP Kit(Rabbit) (sp-0023) instructions and DAB staining.

Please note: All products are 'FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC OR THERAPEUTIC PROCEDURES'.