

FAM107A Polyclonal Antibody

Purified Rabbit Polyclonal Antibody (Pab) Catalog # AP58428

Product Information

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

Primary Accession 095990

Reactivity Rat, Pig, Dog, Bovine

Host Rabbit
Clonality Polyclonal
Calculated MW 17455
Physical State Liquid

Immunogen KLH conjugated synthetic peptide derived from human FAM107A

Epitope Specificity 11-110/144

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 Nucleus

SIMILARITY Belongs to the FAM107 family.

SUBUNIT Nucleus.

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

human, therapeutic or diagnostic applications.

Background Descriptions When transfected into cell lines in which it is not expressed, suppresses cell

growth. May play a role in tumor development.

Additional Information

Gene ID 11170

Other Names Actin-associated protein FAM107A, Down-regulated in renal cell carcinoma 1,

Protein TU3A, FAM107A (<u>HGNC:30827</u>)

Target/Specificity Widely expressed in normal tissues. Expression is reduced or absent in a

number of cancer cell lines.

Dilution IHC-P=1:100-500,IHC-F=1:100-500,IF=1:100-500,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

FAM107A (HGNC:30827)

Function

Stress-inducible actin-binding protein that plays a role in synaptic and cognitive functions by modulating actin filamentous (F- actin) dynamics. Mediates polymerization of globular actin to F-actin. Also binds to, stabilizes and bundles F-actin. Involved in synaptic function by regulating neurite outgrowth in an actin-dependent manner and for the acquisition of hippocampus-dependent cognitive function, such as learning and long-term memory (By similarity). Plays a role in the actin and microtubule cytoskeleton organization; negatively regulates focal adhesion (FA) assembly promoting malignant glial cell migration in an actin-, microtubule- and MAP1A-dependent manner (PubMed:20543869). Also involved in neuroblastoma G1/S phase cell cycle progression and cell proliferation inhibition by stimulating ubiquitination of NF-kappa-B subunit RELA and NF-kappa-B degradation in a COMMD1- and actin-dependent manner (PubMed:10564580, PubMed:28604741). May play a role in tumor development (PubMed:10564580).

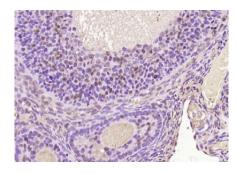
Cellular Location

Nucleus. Cytoplasm, cytoskeleton, stress fiber. Cell junction, focal adhesion. Cell projection, ruffle membrane. Synapse {ECO:0000250|UniProtKB:Q78TU8}. Note=Colocalizes with F-actin and COMMD1 in the nucleus (PubMed:28604741). Colocalizes with MAP1A along actin stress fibers and membrane ruffles (PubMed:20543869)

Tissue Location

Widely expressed (PubMed:10564580). Expressed in neurons (PubMed:20543869). Expressed in malignant glial tumors (PubMed:20543869). Expression is reduced or absent in a number of cancer cell lines (PubMed:10564580).

Images



Paraformaldehyde-fixed, paraffin embedded (rat ovary tissue); 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 (FAM107A) Polyclonal Antibody, Unconjugated (AP58428) 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'.