

SRC8 Antibody (N-term)

Affinity Purified Rabbit Polyclonal Antibody (Pab) Catalog # AP9247a

Product Information

Application WB, IHC-P, E **Primary Accession** Q14247

Other Accession <u>060598</u>, <u>001406</u>

Reactivity Human

Predicted Chicken, Mouse

Host Rabbit
Clonality Polyclonal
Isotype Rabbit IgG
Clone Names RB24340
Calculated MW 61586
Antigen Region 9-38

Additional Information

Gene ID 2017

Other Names Src substrate cortactin, Amplaxin, Oncogene EMS1, CTTN, EMS1

Target/Specificity This SRC8 antibody is generated from rabbits immunized with a KLH

conjugated synthetic peptide between 9-38 amino acids from the N-terminal

region of human SRC8.

Dilution WB~~1:1000 IHC-P~~1:100~500 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 SRC8 Antibody (N-term) is for research use only and not for use in diagnostic

or therapeutic procedures.

Protein Information

Name CTTN

Synonyms EMS1

Function Contributes to the organization of the actin cytoskeleton and cell shape

(PubMed: 21296879). Plays a role in the formation of lamellipodia and in cell migration. Plays a role in the regulation of neuron morphology, axon growth and formation of neuronal growth cones (By similarity). Through its interaction with CTTNBP2, involved in the regulation of neuronal spine density (By similarity). Plays a role in focal adhesion assembly and turnover (By similarity). In complex with ABL1 and MYLK regulates cortical actin-based cytoskeletal rearrangement critical to sphingosine 1-phosphate (S1P)-mediated endothelial cell (EC) barrier enhancement (PubMed: 20861316). Plays a role in intracellular protein transport and endocytosis, and in modulating the levels of potassium channels present at the cell membrane (PubMed: 17959782). Plays a role in receptor-mediated endocytosis via clathrin-coated pits (By similarity). Required for stabilization of KCNH1 channels at the cell membrane (PubMed: 23144454). Plays a role in the invasiveness of cancer cells, and the formation of metastases (PubMed: 16636290).

Cellular Location

Cytoplasm, cytoskeleton. Cell projection, lamellipodium. Cell projection, ruffle. Cell projection, dendrite. Cell projection {ECO:0000250|UniProtKB:Q66HL2}. Cell membrane; Peripheral membrane protein; Cytoplasmic side. Cell projection, podosome {ECO:0000250 | UniProtKB:Q01406}. Cell junction {ECO:0000250|UniProtKB:Q66HL2}. Cell junction, focal adhesion {ECO:0000250|UniProtKB:Q66HL2}. Membrane, clathrin-coated pit {ECO:0000250|UniProtKB:Q66HL2}. Cell projection, dendritic spine. Cytoplasm, cell cortex Endoplasmic reticulum {ECO:0000250|UniProtKB:Q01406}. Note=Colocalizes transiently with PTK2/FAK1 at focal adhesions (By similarity) Associated with membrane ruffles and lamellipodia. In the presence of CTTNBP2NL, colocalizes with stress fibers (By similarity). In the presence of CTTNBP2, localizes at the cell cortex (By similarity). In response to neuronal activation by glutamate, redistributes from dendritic spines to the dendritic shaft (By similarity). Colocalizes with DNM2 at the basis of filopodia in hippocampus neuron growth zones (By similarity). {ECO:0000250 | UniProtKB:Q60598, ECO:0000250 | UniProtKB:Q66HL2}

Background

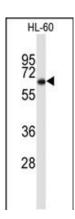
SRC8 is overexpressed in breast cancer and squamous cell carcinomas of the head and neck. The encoded protein is localized in the cytoplasm and in areas of the cell-substratum contacts. This protein has two roles: (1) regulating the interactions between components of adherens-type junctions and (2) organizing the cytoskeleton and cell adhesion structures of epithelia and carcinoma cells. During apoptosis, the encoded protein is degraded in a caspase-dependent manner. The aberrant regulation of this protein contributes to tumor cell invasion and metastasis.

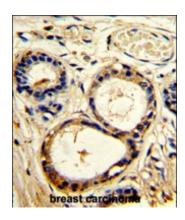
References

Xu,X.Z., et.al, Mod. Pathol. 23 (2), 187-196 (2010) Saitoh,Y., et.al, Int. J. Oncol. 35 (6), 1277-1288 (2009)

Images

Western blot analysis of SRC8 Antibody (N-term) (Cat. #AP9247a) in HL-60 cell line lysates (35ug/lane). SRC8 (arrow) was detected using the purified Pab.





Formalin-fixed and paraffin-embedded human breast carcinoma with SRC8 Antibody (N-term), which was peroxidase-conjugated to the secondary antibody, followed by DAB staining. This data demonstrates the use of this antibody for immunohistochemistry; clinical relevance has not been evaluated.

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