

Unc5a Polyclonal Antibody
Purified Rabbit Polyclonal Antibody (Pab)
Catalog # AP54522

Specification

Unc5a Polyclonal Antibody - Product Information

| | |
|----------------------------------|---|
| Application | IHC-P, IHC-F, IF, ICC, E |
| Primary Accession | Q6ZN44 |
| Reactivity | Rat, Pig, Dog, Bovine |
| Host | Rabbit |
| Clonality | Polyclonal |
| Calculated MW | 90 KDa |
| Physical State | Liquid |
| Immunogen | KLH conjugated synthetic peptide derived from human Unc5a |
| Epitope Specificity | 125-220/842 |
| 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 membrane. The interaction with PRKCABP regulates its surface expression and leads to its removal from surface of neurons and growth cones. |
| SIMILARITY | Belongs to the unc-5 family. Contains 1 death domain. Contains 1 Ig-like (immunoglobulin-like) domain. Contains 1 Ig-like C2-type (immunoglobulin-like) domain. Contains 1 TSP type-1 domain. Contains 1 ZU5 domain. |
| SUBUNIT | Interacts with the cytoplasmic part of DCC. Interacts with MAGED1. Interacts with PRKCABP, possibly mediating some interaction with PKC |
| Post-translational modifications | Phosphorylated on cytoplasmic tyrosine residues. Phosphorylated by PKC in vitro. Proteolytically cleaved by caspases during apoptosis. The cleavage does not take place when the receptor is associated with netrin ligand. Its cleavage by caspases is required to induce apoptosis. |
| Important Note | This product as supplied is intended for research use only, not for use in human, therapeutic or diagnostic applications. |

Background Descriptions

The UNC5H family of proteins act as transmembrane receptors for netrin-1 and play a crucial role in axon guidance and migration of neural cells. Additionally, when cleaved by a caspase to produce an intracellular fragment containing a death domain, UNC5H receptors induce apoptosis. This activity is blocked by the binding of netrin-1. In the absence of netrin-1, UNC5H receptors act

as tumor suppressors by inhibiting anchorage-independent growth and invasion, but mutation of these receptors provides a potential mechanism for tumorigenicity. The expression of UNC5H receptors is downregulated in multiple carcinomas, including colorectal, breast, ovary, uterus, stomach, lung and kidney cancers. UNC5H1, also known as UNC5HA (unc-5 homolog A), is a member of the UNC5H family of proteins and is localized to the cell membrane. Three isoforms of UNC5H1 exist due to alternative splicing events.

Unc5a Polyclonal Antibody - Additional Information

Gene ID 90249

Other Names

Netrin receptor UNC5A, Protein unc-5 homolog 1, Protein unc-5 homolog A, UNC5A, KIAA1976, UNC5H1

Dilution

IHC-P~~N/A
IHC-F~~N/A
IF~~1:50~200
ICC~~N/A
E~~N/A

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.

Unc5a Polyclonal Antibody - Protein Information

Name UNC5A

Synonyms KIAA1976, UNC5H1

Function

Receptor for netrin required for axon guidance. Functions in the netrin signaling pathway and promotes neurite outgrowth in response to NTN1. Mediates axon repulsion of neuronal growth cones in the developing nervous system in response to netrin. Axon repulsion in growth cones may be mediated by its association with DCC that may trigger signaling for repulsion. It also acts as a dependence receptor required for apoptosis induction when not associated with netrin ligand.

Cellular Location

Cell membrane {ECO:0000250|UniProtKB:O08721}; Single-pass type I membrane protein {ECO:0000250|UniProtKB:O08721} Membrane raft {ECO:0000250|UniProtKB:O08721}. Cell projection, neuron projection {ECO:0000250|UniProtKB:O08721}. Note=The interaction with PRKCABP regulates its surface expression and leads to its removal from the surface of neurons and growth cones {ECO:0000250|UniProtKB:O08721}

Unc5a Polyclonal Antibody - Protocols

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

- [Western Blot](#)
- [Blocking Peptides](#)

- [Dot Blot](#)
- [Immunohistochemistry](#)
- [Immunofluorescence](#)
- [Immunoprecipitation](#)
- [Flow Cytometry](#)
- [Cell Culture](#)

Unc5a Polyclonal Antibody - Images