

### AGAP2 / PIKE Antibody (aa1-836)

Rabbit Polyclonal Antibody Catalog # ALS11306

# **Specification**

### AGAP2 / PIKE Antibody (aa1-836) - Product Information

Application
Primary Accession
Reactivity
Host
Clonality
Calculated MW
Dilution

Q99490
Human, Mouse
Rabbit
Polyclonal
125kDa KDa
WB~~1:1000
IHC-P~~N/A
IF~~1:50~200
E~~N/A

WB, IHC-P, IF, E

# AGAP2 / PIKE Antibody (aa1-836) - Additional Information

### **Gene ID** 116986

#### **Other Names**

Arf-GAP with GTPase, ANK repeat and PH domain-containing protein 2, AGAP-2, Centaurin-gamma-1, Cnt-g1, GTP-binding and GTPase-activating protein 2, GGAP2, Phosphatidylinositol 3-kinase enhancer, PIKE, AGAP2, CENTG1, KIAA0167

### Target/Specificity

Amino acids 1-836 of human AGAP2 protein.

#### **Reconstitution & Storage**

+4°C or -20°C, Avoid repeated freezing and thawing.

#### **Precautions**

AGAP2 / PIKE Antibody (aa1-836) is for research use only and not for use in diagnostic or therapeutic procedures.

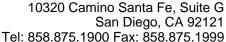
### AGAP2 / PIKE Antibody (aa1-836) - Protein Information

#### Name AGAP2

Synonyms CENTG1, KIAA0167

#### **Function**

GTPase-activating protein (GAP) for ARF1 and ARF5, which also shows strong GTPase activity. Isoform 1 participates in the prevention of neuronal apoptosis by enhancing PI3 kinase activity. It aids the coupling of metabotropic glutamate receptor 1 (GRM1) to cytoplasmic PI3 kinase by interacting with Homer scaffolding proteins, and also seems to mediate anti-apoptotic effects of NGF by activating nuclear PI3 kinase. Isoform 2 does not stimulate PI3 kinase but may protect cells





from apoptosis by stimulating Akt. It also regulates the adapter protein 1 (AP-1)-dependent trafficking of proteins in the endosomal system. It seems to be oncogenic. It is overexpressed in cancer cells, prevents apoptosis and promotes cancer cell invasion.

#### **Cellular Location**

[Isoform 1]: Cytoplasm. Nucleus.

#### **Tissue Location**

Isoform 1 is brain-specific. Isoform 2 is ubiquitously expressed, with highest levels in brain and

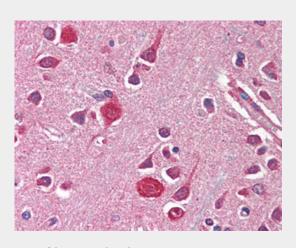
**Volume** 50 µl

### AGAP2 / PIKE Antibody (aa1-836) - Protocols

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

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

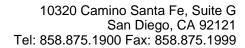
### AGAP2 / PIKE Antibody (aa1-836) - Images



Anti-AGAP2 / PIKE antibody IHC of human brain, cortex.

### AGAP2 / PIKE Antibody (aa1-836) - Background

GTPase-activating protein (GAP) for ARF1 and ARF5, which also shows strong GTPase activity. Isoform 1 participates in the prevention of neuronal apoptosis by enhancing PI3 kinase activity. It aids the coupling of metabotropic glutamate receptor 1 (GRM1) to cytoplasmic PI3 kinase by interacting with Homer scaffolding proteins, and also seems to mediate anti-apoptotic effects of NGF by activating nuclear PI3 kinase. Isoform 2 does not stimulate PI3 kinase but may protect cells from apoptosis by stimulating Akt. It also regulates the adapter protein 1 (AP-1)-dependent trafficking of proteins in the endosomal system. It seems to be oncogenic. It is overexpressed in cancer cells, prevents apoptosis and promotes cancer cell invasion.





# AGAP2 / PIKE Antibody (aa1-836) - References

Elkahloun A.G.,et al.Genomics 42:295-301(1997).

Roe B.,et al.Submitted (JAN-2002) to the EMBL/GenBank/DDBJ databases.

Xia C.,et al.Mol. Cell. Biol. 23:2476-2488(2003).

Rong R.,et al.Nat. Neurosci. 6:1153-1161(2003).

Hong W.,et al.Submitted (AUG-2001) to the EMBL/GenBank/DDBJ databases.