

GABARAPL1 Antibody

Affinity Purified Rabbit Polyclonal Antibody (Pab) Catalog # AP9133a

Specification

GABARAPL1 Antibody - Product Information

Application Primary Accession Reactivity Host Clonality Isotype Calculated MW WB, IHC-P, FC,E <u>O9H0R8</u> Human Rabbit Polyclonal Rabbit IgG 14044

GABARAPL1 Antibody - Additional Information

Gene ID 23710

Other Names

Gamma-aminobutyric acid receptor-associated protein-like 1, Early estrogen-regulated protein, GABA(A) receptor-associated protein-like 1, Glandular epithelial cell protein 1, GEC-1, GABARAPL1, GEC1

Target/Specificity

This GABARAPL1 antibody is generated from rabbits immunized with human GABARAPL1 recombinant protein.

Dilution WB~~1:1000 IHC-P~~1:50~100 FC~~1:10~50 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

GABARAPL1 Antibody is for research use only and not for use in diagnostic or therapeutic procedures.

GABARAPL1 Antibody - Protein Information

Name GABARAPL1 (<u>HGNC:4068</u>)



Synonyms GEC1

Function Ubiquitin-like modifier that increases cell-surface expression of kappa-type opioid receptor through facilitating anterograde intracellular trafficking of the receptor (PubMed:<u>16431922</u>). Involved in formation of autophagosomal vacuoles (PubMed:<u>20404487</u>). While LC3s are involved in elongation of the phagophore membrane, the GABARAP/GATE-16 subfamily is essential for a later stage in autophagosome maturation (PubMed:<u>20404487</u>). Through its interaction with the reticulophagy receptor TEX264, participates in the remodeling of subdomains of the endoplasmic reticulum into autophagosomes upon nutrient stress, which then fuse with lysosomes for endoplasmic reticulum turnover (PubMed:<u>31006537</u>, PubMed:<u>31006538</u>).

Cellular Location

Cytoplasmic vesicle, autophagosome. Cytoplasmic vesicle membrane; Lipid-anchor. Cytoplasm, cytoskeleton {ECO:0000250|UniProtKB:Q0VGK0}. Endoplasmic reticulum {ECO:0000250|UniProtKB:Q0VGK0}. Golgi apparatus {ECO:0000250|UniProtKB:Q0VGK0}

Tissue Location

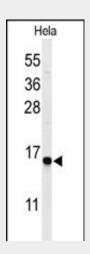
Ubiquitous. Expressed at very high levels in the brain, heart, peripheral blood leukocytes, liver, kidney, placenta and skeletal muscle. Expressed at very low levels in thymus and small intestine. In the brain, expression is particularly intense in motoneurons in the embryo and in neurons involved in somatomotor and neuroendocrine functions in the adult, particularly in the substantia nigra pars compacta.

GABARAPL1 Antibody - Protocols

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

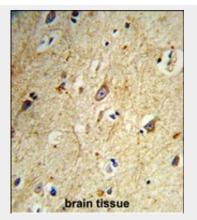
- Western Blot
- <u>Blocking Peptides</u>
- <u>Dot Blot</u>
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- <u>Cell Culture</u>

GABARAPL1 Antibody - Images

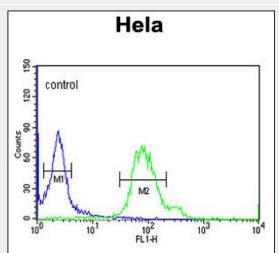


Western blot analysis of GABARAPL1 Antibody (Cat. #AP9133a) in Hela cell line lysates (35ug/lane). GABARAPL1 (arrow) was detected using the purified Pab.





Formalin-fixed and paraffin-embedded human brain tissue reacted with GABARAPL1 Antibody, 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.



GABARAPL1 Antibody (Cat. #AP9133a) flow cytometric analysis of Hela cells (right histogram) compared to a negative control cell (left histogram).FITC-conjugated goat-anti-rabbit secondary antibodies were used for the analysis.

GABARAPL1 Antibody - Background

Increases cell-surface expression of kappa-type opioid receptor through facilitating anterograde intracellular trafficking of the receptor.

GABARAPL1 Antibody - References

Chen C.,et.al., J. Biol. Chem. 281:7983-7993(2006). Ebert L., et.al., Submitted (JUN-2004) to the EMBL/GenBank/DDBJ databases.