

GNA11 Antibody(N-term)
Affinity Purified Rabbit Polyclonal Antibody (Pab)
Catalog # AP19441a**Specification**

GNA11 Antibody(N-term) - Product Information

Application	WB,E
Primary Accession	P29992
Other Accession	Q9JID2 , Q2XSV9 , P21278 , P38409 , NP_002058.2
Reactivity	Human
Predicted	Bovine, Mouse, Pig, Rat
Host	Rabbit
Clonality	Polyclonal
Isotype	Rabbit IgG
Antigen Region	1-30

GNA11 Antibody(N-term) - Additional Information**Gene ID** 2767**Other Names**

Guanine nucleotide-binding protein subunit alpha-11, G alpha-11, G-protein subunit alpha-11, Guanine nucleotide-binding protein G(y) subunit alpha, GNA11, GA11

Target/Specificity

This GNA11 antibody is generated from rabbits immunized with a KLH conjugated synthetic peptide between 1-30 amino acids from the N-terminal region of human GNA11.

Dilution

WB~~1:1000

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

GNA11 Antibody(N-term) is for research use only and not for use in diagnostic or therapeutic procedures.

GNA11 Antibody(N-term) - Protein Information**Name** GNA11

Synonyms GA11

Function Guanine nucleotide-binding proteins (G proteins) function as transducers downstream of G protein-coupled receptors (GPCRs) in numerous signaling cascades (PubMed:[31073061](#)). The alpha chain contains the guanine nucleotide binding site and alternates between an active, GTP-bound state and an inactive, GDP-bound state (PubMed:[31073061](#)). Signaling by an activated GPCR promotes GDP release and GTP binding (PubMed:[31073061](#)). The alpha subunit has a low GTPase activity that converts bound GTP to GDP, thereby terminating the signal (PubMed:[31073061](#)). Both GDP release and GTP hydrolysis are modulated by numerous regulatory proteins (PubMed:[31073061](#)). Signaling is mediated via phospholipase C-beta-dependent inositol lipid hydrolysis for signal propagation: activates phospholipase C-beta: following GPCR activation, GNA11 activates PLC-beta (PLCB1, PLCB2, PLCB3 or PLCB4), leading to production of diacylglycerol (DAG) and inositol 1,4,5-trisphosphate (IP3) (PubMed:[31073061](#)). Transduces FFAR4 signaling in response to long-chain fatty acids (LCFAs) (PubMed:[27852822](#)). Together with GNAQ, required for heart development (By similarity). In the respiratory epithelium, transmits OXGR1-dependent signals that lead to downstream intracellular Ca(2+) release and mucocilliary clearance of airborne pathogens.

Cellular Location

Cell membrane; Lipid-anchor. Cytoplasm. Note=In testicular cells, expressed exclusively in the cytoplasm.

Tissue Location

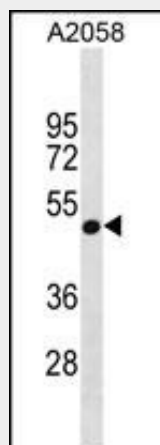
Expressed in testis..

GNA11 Antibody(N-term) - 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](#)

GNA11 Antibody(N-term) - Images



GNA11 Antibody (N-term) (Cat. #AP19441a) western blot analysis in A2058 cell line lysates (35ug/lane). This demonstrates the GNA11 antibody detected the GNA11 protein (arrow).

GNA11 Antibody(N-term) - Background

Guanine nucleotide-binding proteins (G proteins) are involved as modulators or transducers in various transmembrane signaling systems. Acts as an activator of phospholipase C.

GNA11 Antibody(N-term) - References

Shankaranarayanan, A., et al. J. Biol. Chem. 283(50):34923-34934(2008)

Gavard, J., et al. J. Biol. Chem. 283(44):29888-29896(2008)

Luttrell, L.M. Mol. Biotechnol. 39(3):239-264(2008)

Durchankova, D., et al. Physiol Res 57(2):195-203(2008)

Hildebrand, M.E., et al. J. Biol. Chem. 282(29):21043-21055(2007)

GNA11 Antibody(N-term) - Citations

- [G Protein \$\alpha\$ Subunit 14 Mediates Fibroblast Growth Factor 2-Induced Cellular Responses in Human Endothelial Cells.](#)
- [GNA11 differentially mediates fibroblast growth factor 2- and vascular endothelial growth factor A-induced cellular responses in human fetoplacental endothelial cells.](#)
- [Expression of G-protein subunit \$\alpha\$ -14 is increased in human placentas from preeclamptic pregnancies.](#)