

DNAxPAb

Hard-to-Find
Antibody

GUCA1A DNAxPab

Catalog # H00002978-W01P

Size 200 ug

Specification

Product Description	Rabbit polyclonal antibody raised against a full-length human GUCA1A DNA using DNAx™ Immune technology.
Technology	DNAx™ Immune
Immunogen	Full-length human DNA
Sequence	MGNVMEGKSVEELSSTECHQWYKKFMTECPSGQLTYEFRQFFGLKNLSPSASQYVEQMFETF DFNKDGYIDFMEYVAALSLVLKGKVEQKLRWYFKLYVDVGNGCIDRDELLTIQAIRAINPCSDTTMT AEEFTD TVFSKIDVNGDGELSLEEFIEGVQKDQMLLDLTRSLDLTRVRRRLQNGEQDEEGADEAA EAAG
Host	Rabbit
Reactivity	Human
Purification	Protein A
Quality Control Testing	Antibody reactive against mammalian transfected lysate.
Storage Buffer	In 1x PBS, pH 7.4
Storage Instruction	Store at -20°C or lower. Aliquot to avoid repeated freezing and thawing.

Applications

- Western Blot (Transfected lysate)

[Protocol Download](#)

- Immunofluorescence (Transfected cell)

- Flow Cytometry (Transfected cell)

Gene Info — GUCA1A

Entrez GeneID [2978](#)

GeneBank Accession# [NM_000409.2](#)

Protein Accession# [NP_000400.2](#)

Gene Name GUCA1A

Gene Alias COD3, GCAP, GCAP1, GUCA, GUCA1

Gene Description guanylate cyclase activator 1A (retina)

Omim ID [600364 602093](#)

Gene Ontology [Hyperlink](#)

Gene Summary

This gene plays a role in the recovery of retinal photoreceptors from photobleaching. In the recovery phase, the phototransduction messenger cGMP is replenished by retinal guanylyl cyclase-1 (GC1). GC1 is activated by decreasing Ca^{2+} concentrations following photobleaching. The protein encoded by this gene, guanylyl cyclase activating protein 1 (GCAP1), mediates the sensitivity of GC1 to Ca^{2+} concentrations. GCAP1 promotes activity of GC1 at low Ca^{2+} concentrations and inhibits GC1 activity at high Ca^{2+} concentrations. Mutations in this gene cause autosomal dominant cone dystrophy (COD3); a disease characterized by reduced visual acuity associated with progressive loss of color vision. Mutations in this gene prohibit the inactivation of RetGC1 at high Ca^{2+} concentrations; causing the constitutive activation of RetGC1 and, presumably, increased cell death. This gene is expressed in retina and spermatagonia. [provided by RefSeq]

Other Designations OTTHUMP00000016397|OTTHUMP00000196466

Pathway

- [Olfactory transduction](#)

Disease

- [Retinal Degeneration](#)
- [Retinal Diseases](#)