

**GOLPH3 Antibody (C-term)**  
**Mouse Monoclonal Antibody (Mab)**  
**Catalog # AM2219b**

**Specification**

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**GOLPH3 Antibody (C-term) - Product Information**

Application	<b>WB,E</b>
Primary Accession	<a href="#">O9H4A6</a>
Reactivity	<b>Human</b>
Host	<b>Mouse</b>
Clonality	<b>Monoclonal</b>
Isotype	<b>IgG1</b>

**GOLPH3 Antibody (C-term) - Additional Information**

**Gene ID** 64083

**Other Names**

Golgi phosphoprotein 3, Coat protein GPP34, Mitochondrial DNA absence factor, MIDAS, GOLPH3, GPP34

**Target/Specificity**

Purified His-tagged GOLPH3 protein was used to produced this monoclonal antibody.

**Dilution**

WB~~1:1000

**Format**

Purified monoclonal antibody supplied in PBS with 0.09% (W/V) sodium azide. This antibody is purified through a protein G column, followed by dialysis against PBS.

**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**

GOLPH3 Antibody (C-term) is for research use only and not for use in diagnostic or therapeutic procedures.

**GOLPH3 Antibody (C-term) - Protein Information**

**Name** GOLPH3

**Synonyms** GPP34

**Function** Phosphatidylinositol-4-phosphate-binding protein that links Golgi membranes to the cytoskeleton and may participate in the tensile force required for vesicle budding from the Golgi. Thereby, may play a role in Golgi membrane trafficking and could indirectly give its flattened

shape to the Golgi apparatus. May also bind to the coatmer to regulate Golgi membrane trafficking. May play a role in anterograde transport from the Golgi to the plasma membrane and regulate secretion. Has also been involved in the control of the localization of Golgi enzymes through interaction with their cytoplasmic part. May play an indirect role in cell migration. Has also been involved in the modulation of mTOR signaling. May also be involved in the regulation of mitochondrial lipids biosynthesis.

#### Cellular Location

Golgi apparatus, Golgi stack membrane; Peripheral membrane protein; Cytoplasmic side. Golgi apparatus, trans-Golgi network membrane; Peripheral membrane protein; Cytoplasmic side Mitochondrion intermembrane space. Cell membrane Endosome. Note=Phosphatidylinositol 4-phosphate-binding and oligomerization participate in the recruitment onto Golgi membranes.

#### Tissue Location

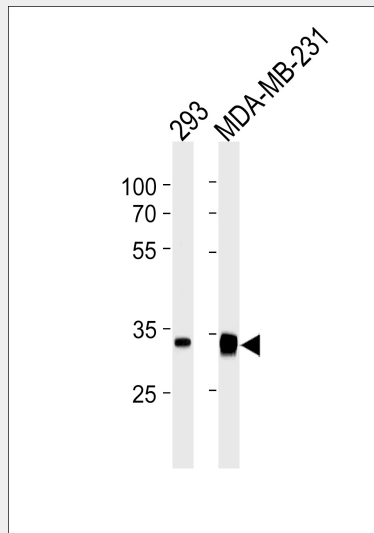
Detected in muscle fibers of patients with mitochondrial diseases; not detected in normal muscle fibers

### GOLPH3 Antibody (C-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](#)

### GOLPH3 Antibody (C-term) - Images



GOLPH3 Antibody (C-term)(Cat. #AM2219b) western blot analysis in 293,MDA-MB-231 cell line lysates (35µg/lane).This demonstrates the GOLPH3 antibody detected the GOLPH3 protein (arrow).

### GOLPH3 Antibody (C-term) - Background

Mediates the cis and medial Golgi localization of mannosyltransferases through direct binding of their cytosolic domains. Involved in modulation of mTOR signaling. Involved in the regulation of mitochondrial lipids, leading to increase of mitochondrial mass. Potential oncogene.

### **GOLPH3 Antibody (C-term) - References**

- Bell A.W., et al. J. Biol. Chem. 276:5152-5165(2001).  
Ota T., et al. Nat. Genet. 36:40-45(2004).  
Gregory S.G., et al. Nature 441:315-321(2006).  
Bechtel S., et al. BMC Genomics 8:399-399(2007).  
Nakashima-Kamimura N., et al. J. Cell Sci. 118:5357-5367(2005).