

RHOG Antibody

Catalog # ASC11858

Specification

RHOG Antibody - Product Information

Application Primary Accession Other Accession Reactivity Host Clonality Isotype Calculated MW

Application Notes

WB, IHC <u>P84095</u> <u>NP_001656</u>, <u>46249393</u> Human, Mouse, Rat Rabbit Polyclonal IgG Predicted: 21 kDa

Observed: 23 kDa KDa RHOG antibody can be used for detection of RHOG by Western blot at 1 - 2 μ g/ml. Antibody can also be used for immunohistochemistry starting at 5 μ g/mL.

RHOG Antibody - Additional Information

Gene ID 391 Target/Specificity RHOG; RHOG antibody is human, mouse and rat reactive.

Reconstitution & Storage RHOG antibody can be stored at 4°C for three months and -20°C, stable for up to one year.

Precautions

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

RHOG Antibody - Protein Information

Name RHOG

Synonyms ARHG

Function

Plays a role in immunological synaptic F-actin density and architecture organization (PubMed:33513601). Regulates actin reorganization in lymphocytes, possibly through the modulation of Rac1 activity (PubMed:33513601). Regulates thref="http://www.uniprot.org/citations/33513601" target="_blank">33513601). Regulates actin reorganization in lymphocytes, possibly through the modulation of Rac1 activity (PubMed:33513601). Required for the formation of membrane ruffles during macropinocytosis (PubMed:15133129). Plays a role

in cell migration and is required for the formation of cup-like structures during trans-endothelial migration of leukocytes (PubMed:<a href="http://www.uniprot.org/citations/17875742"



target="_blank">17875742). Binds phospholipids in an activation-dependent manner; thereby acting as an anchor for other proteins to the plasma membrane (PM) (PubMed:33513601). Plays a role in exocytosis of cytotoxic granules (CG) by lymphocytes/Component of the exocytosis machinery in natural killer (NK) and CD8+ T cells (PubMed:33513601). Promotes the docking of cytotoxic granules (CG) to the plasma membrane through the interaction with UNC13D (PubMed:33513601). Involved in the cytotoxic activity of lymphocytes/primary CD8+ T cells (PubMed:33513601).

Cellular Location

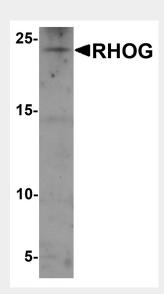
Cell membrane; Lipid-anchor; Cytoplasmic side

RHOG Antibody - Protocols

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

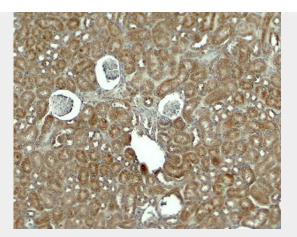
- <u>Western Blot</u>
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- <u>Cell Culture</u>

RHOG Antibody - Images



Western blot analysis of RHOG in human kidney tissue lysate with RHOG antibody at 1 μ g/ml.





Immunohistochemistry of RHOG in mouse kidney tissue with RHOG antibody at 5 µg/ml.

RHOG Antibody - Background

The ras homolog family member G (RHOG), also known as rho-related GTP-binding protein, is a member of the Rho family of small GTPases, which cycle between inactive GDP-bound and active GTP-bound states and function as molecular switches in signal transduction cascades (1). RHOG controls a pathway that requires the microtubule network and activates Rac1 and Cdc42Hs independently of their growth factor signaling pathway (2). RHOG is also involved in the transcriptional regulation of interferon-gamma and nuclear factor of activated T cells (NFAT) and the regulation of the actin skeleton in lymphocytes (3).

RHOG Antibody - References

Vincent S, Janteur P, and Fort P. Growth-regulated of rhoG, a new member of the ras homolog family. Mol. Cell Biol. 1992; 12:3138-48.

Gauthier-Rouviere C, Vignal E, Meriane M, et al. RhoG GTPase controls a pathway that independently activates Rac1 and Cdc42Hs. Mol. Biol. Cell 1998; 9:1379-94. Vigorito E, Billadeu DD, Savoy D, et al. RhoG regulates gene expression and the actin skeleton in lymphocytes. Oncogene 2003; 22:330-42.