

ARG42601 anti-RAB1A antibody

Package: 50 µl
Store at: -20°C

Summary

Product Description	Rabbit Polyclonal antibody recognizes RAB1A
Tested Reactivity	Hu, Ms
Predict Reactivity	Cow, Rat, Dog, Goat, Gpig, Hrs, Rb, Zfsh
Tested Application	IHC-P, WB
Host	Rabbit
Clonality	Polyclonal
Isotype	IgG
Target Name	RAB1A
Species	Human
Immunogen	Synthetic peptide around the center region of Human RAB1A. (within the following region: AKNATNVEQSFMTMAAEIKKRMGPGATAGGAEKSNVKIQSTPQSGGGC)
Conjugation	Un-conjugated
Alternate Names	RAB1; YPT1-related protein; YPT1; Ras-related protein Rab-1A

Application Instructions

Predict Reactivity Note	Predicted Homology Based on Immunogen Sequence: Cow: 100%; Dog: 100%; Goat: 100%; Guinea pig: 100%; Horse: 100%; Rabbit: 100%; Rat: 100%; Zebrafish: 85%						
Application table	<table> <tr> <th>Application</th><th>Dilution</th></tr> <tr> <td>IHC-P</td><td>1:100</td></tr> <tr> <td>WB</td><td>0.2 - 2 µg/ml</td></tr> </table>	Application	Dilution	IHC-P	1:100	WB	0.2 - 2 µg/ml
Application	Dilution						
IHC-P	1:100						
WB	0.2 - 2 µg/ml						
Application Note	* The dilutions indicate recommended starting dilutions and the optimal dilutions or concentrations should be determined by the scientist.						
Positive Control	Human muscle and Mouse kidney						
Observed Size	~ 28 kDa						

Properties

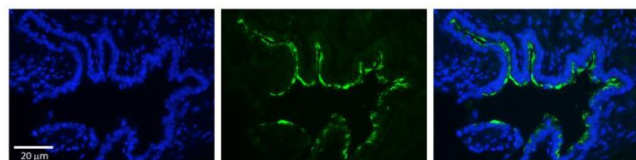
Form	Liquid
Purification	Affinity purified.
Buffer	PBS, 0.09% (w/v) Sodium azide and 2% Sucrose.
Preservative	0.09% (w/v) Sodium azide
Stabilizer	2% Sucrose

Concentration	Batch dependent: 0.5 - 1 mg/ml
Storage instruction	For continuous use, store undiluted antibody at 2-8°C for up to a week. For long-term storage, aliquot and store at -20°C or below. Storage in frost free freezers is not recommended. Avoid repeated freeze/thaw cycles. Suggest spin the vial prior to opening. The antibody solution should be gently mixed before use.
Note	For laboratory research only, not for drug, diagnostic or other use.

Bioinformation

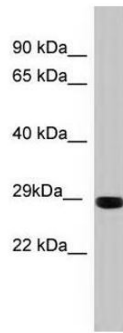
Gene Symbol	RAB1A
Gene Full Name	RAB1A, member RAS oncogene family
Background	This gene encodes a member of the Ras superfamily of GTPases. Members of the gene family cycle between inactive GDP-bound and active GTP-bound forms. This small GTPase controls vesicle traffic from the endoplasmic reticulum to the Golgi apparatus. Multiple alternatively spliced transcript variants have been identified for this gene which encode different protein isoforms. [provided by RefSeq, Oct 2008]
Function	The small GTPases Rab are key regulators of intracellular membrane trafficking, from the formation of transport vesicles to their fusion with membranes. Rabs cycle between an inactive GDP-bound form and an active GTP-bound form that is able to recruit to membranes different sets of downstream effectors directly responsible for vesicle formation, movement, tethering and fusion. RAB1A regulates vesicular protein transport from the endoplasmic reticulum (ER) to the Golgi compartment and on to the cell surface, and plays a role in IL-8 and growth hormone secretion. Regulates the level of CASR present at the cell membrane. Plays a role in cell adhesion and cell migration, via its role in protein trafficking. Plays a role in autophagosome assembly and cellular defense reactions against pathogenic bacteria. Plays a role in microtubule-dependent protein transport by early endosomes and in anterograde melanosome transport. [UniProt]
Calculated Mw	23 kDa
PTM	Phosphorylated by CDK1 kinase during mitosis. Phosphocholinated at Ser-79 by L.pneumophila AnkX, leading to displace GDP dissociation inhibitors (GDI). Both GDP-bound and GTP-bound forms can be phosphocholinated. Dephosphocholinated by L.pneumophila Lem3, restoring accessibility to L.pneumophila GTPase effector LepB. [UniProt]
Cellular Localization	Golgi apparatus. Endoplasmic reticulum. Early endosome. Cytoplasm, cytosol. Membrane. Melanosome. Note=Alternates between membrane-associated and cytosolic forms. [UniProt]

Images



ARG42601 anti-RAB1A antibody IHC-P image

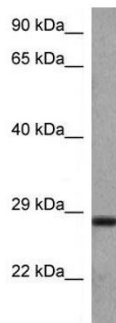
Immunohistochemistry: Formalin-fixed and paraffin-embedded Human bronchial epithelial tissue stained with ARG42601 anti-RAB1A antibody (green) at 1:100 dilution.



Human muscle

ARG42601 anti-RAB1A antibody WB image

Western blot: Human muscle lysate stained with ARG42601 anti-RAB1A antibody at 0.2 - 1 $\mu\text{g}/\text{ml}$ dilution.



Mouse kidney

ARG42601 anti-RAB1A antibody WB image

Western blot: Mouse kidney lysate stained with ARG42601 anti-RAB1A antibody at 1 $\mu\text{g}/\text{ml}$ dilution.