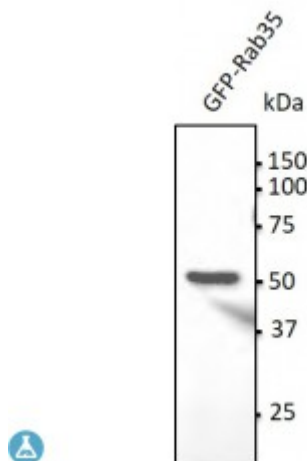


Anti-Rab35 antibody



Description

RAB35 belongs to the large RAB family of low molecular weight GTPases that are involved in intracellular membrane trafficking. Rab35 is restricted to the plasma membrane and endocytic compartments and controls a fast endocytic-recycling pathway.

Model	STJ140106
Host	Goat
Reactivity	Avian, Bovine, Canine, Donkey, Feline, Goat, Guinea Pig, Hamster, Horse, Human, Mouse, Other, Porcine, Rabbit, Rat, Sheep, Simian
Applications	WB
Immunogen	Purified recombinant peptide derived from within residues 110 aa to the C-terminus of mouse Rab35 produced in E. coli.
Immunogen Region	C-Term
Gene ID	11021
Gene Symbol	RAB35
Dilution range	Western blot 1:250-1:2,000 Immunofluorescence ND Immunohistochemistry (paraffin) ND Immunohistochemistry (frozen) ND
Specificity	Detects Rab35 in cell lysates and transfected cells by Western blot.
Purification	This antibody is epitope-affinity purified from goat antiserum.
Note	For research use only (RUO).
Protein Name	Ras-related protein Rab-35 (GTP-binding protein RAY) (Ras-related protein Rab-1C)

Molecular Weight	24 kDa
Clonality	Polyclonal
Conjugation	Unconjugated
Isotype	IgG
Formulation	PBS, 20% glycerol and 0.05% sodium azide.
Concentration	4 mg/mL
Storage Instruction	Store at -20°, and avoid repeated freeze-thaw cycles.
Database Links	HGNC:9774OMIM:604199
Alternative Names	Ras-related protein Rab-35 (GTP-binding protein RAY) (Ras-related protein Rab-1C)
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. That Rab is involved in the process of endocytosis and is an essential rate-limiting regulator of the fast recycling pathway back to the plasma membrane. During cytokinesis, required for the postfurlowing terminal steps, namely for intercellular bridge stability and abscission, possibly by controlling phosphatidylinositol 4,5-bis phosphate (PIP2) and SEPT2 localization at the intercellular bridge. May indirectly regulate neurite outgrowth. Together with TBC1D13 may be involved in regulation of insulin-induced glucose transporter SLC2A4/GLUT4 translocation to the plasma membrane in adipocytes.
Cellular Localization	Cell membrane Membrane, clathrin-coated pit Cytoplasmic vesicle, clathrin-coated vesicle Endosome Melanosome. Present on sorting endosomes and recycling endosome tubules . Tends to be enriched in PIP2-positive cell membrane domains . During mitosis, associated with the plasma membrane and present at the ingressing furrow during early cytokinesis as well as at the intercellular bridge later during cytokinesis . Identified in stage I to stage IV melanosomes .
Post-translational Modifications	AMPylation at Tyr-77 by L.pneumophila DrrA occurs in the switch 2 region and leads to moderate inactivation of the GTPase activity. It appears to prolong the lifetime of the GTP state of RAB1B by restricting access of GTPase effectors to switch 2 and blocking effector-stimulated GTP hydrolysis, thereby rendering RAB35 constitutively active. Phosphocholinated by L.pneumophila AnkX. Both GDP-bound and GTP-bound forms can be phosphocholinated. Phosphocholination inhibits the GEF activity of DENND1A.