10320 Camino Santa Fe, Suite G
San Diego, CA 92121
Tel: 858.875.1900 Fax: 858.875.1999

RAB31 Antibody

Purified Rabbit Polyclonal Antibody (Pab)
Catalog # AP51839

Product Information

Application	WB, ICC
Primary Accession	Q13636
Reactivity	Human, Mouse, Rat
Host	Rabbit
Clonality	Polyclonal
Calculated MW	21700

Additional Information

Gene ID	11031
Other Names	Ras-related protein Rab-31, Ras-related protein Rab-22B, RAB31, RAB22B
Target/Specificity	KLH-conjugated synthetic peptide encompassing a sequence within the center region of human RAB31. The exact sequence is proprietary.
Dilution	WB~~1:1000 ICC~~N/A
Format	0.01M PBS, pH 7.2, 0.09% (W/V) Sodium azide, Glycerol 50%
Storage	Store at -20 °C.Stable for 12 months from date of receipt

Protein Information

Name	RAB31 (HGNC:9771)
Synonyms	RAB22B
Function	The small GTPases Rab are key regulators of intracellular membrane trafficking, from the formation of transport vesicles to their fusion with membranes (PubMed:11784320). Rabs cycle between an inactive GDP-bound form and an active GTP-bound form that is able to recruit to membranes different set of downstream effectors directly responsible for vesicle formation, movement, tethering and fusion. Required for the integrity and for normal function of the Golgi apparatus and the trans- Golgi network. Plays a role in insulin-stimulated translocation of GLUT4 to the cell membrane. Plays a role in M6PR transport from the trans-Golgi network to endosomes. Plays a role in the internalization of EGFR from the cell membrane into endosomes. Plays a role in the maturation of phagosomes that engulf pathogens, such as S.aureus and M.tuberculosis.
Cellular Location	Golgi apparatus, trans-Golgi network. Golgi apparatus, trans-Golgi network

	membrane; Lipid-anchor; Cytoplasmic side. Early endosome. Cytoplasmic vesicle, phagosome. Cytoplasmic vesicle, phagosome membrane; Lipid-anchor; Cytoplasmic side. Note=Rapidly recruited to phagosomes containing S.aureus or M.tuberculosis (PubMed:21255211)
Tissue Location	Highest expression in placenta and brain with lower levels in heart and lung. Not detected in liver, skeletal muscle, kidney or pancreas.

Background

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 set of downstream effectors directly responsible for vesicle formation, movement, tethering and fusion. Required for the integrity and for normal function of the Golgi apparatus and the trans-Golgi network. Plays a role in insulin-stimulated translocation of GLUT4 to the cell membrane. Plays a role in M6PR transport from the trans-Golgi network to endosomes. Plays a role in the internalization of EGFR from the cell membrane into endosomes. Plays a role in the maturation of phagosomes that engulf pathogens, such as S.aureus and M.tuberculosis.

References

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Bao X.,et al.Eur. J. Biochem. 269:259-271(2002).
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