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RAP2B Antibody (Center)

Affinity Purified Rabbit Polyclonal Antibody (Pab)
Catalog # AP17426c

Product Information

Application	WB, E
Primary Accession	P61225
Other Accession	P61227, P61226, Q06AU2, NP_002877.2
Reactivity	Human
Predicted	Pig, Mouse, Rat
Host	Rabbit
Clonality	Polyclonal
Isotype	Rabbit IgG
Clone Names	RB37054
Calculated MW	20504
Antigen Region	102-129

Additional Information

Gene ID	5912
Other Names	Ras-related protein Rap-2b, RAP2B
Target/Specificity	This RAP2B antibody is generated from rabbits immunized with a KLH conjugated synthetic peptide between 102-129 amino acids from the Central region of human RAP2B.
Dilution	WB~~1:1000 E~~Use at an assay dependent concentration.
Format	Purified polyclonal antibody supplied in PBS with 0.09% (W/V) sodium azide. This antibody is purified through a protein A column, followed by peptide affinity purification.
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	RAP2B Antibody (Center) is for research use only and not for use in diagnostic or therapeutic procedures.

Protein Information

Name	RAP2B
Function	Small GTP-binding protein which cycles between a GDP-bound inactive and a GTP-bound active form. Involved in EGFR and CHRM3 signaling pathways through stimulation of PLCE1. May play a role in cytoskeletal rearrangements

	and regulate cell spreading through activation of the effector TNIK. May regulate membrane vesiculation in red blood cells.
Cellular Location	Recycling endosome membrane; Lipid-anchor; Cytoplasmic side. Note=Associated with red blood cells- released vesicles
Tissue Location	Expressed in red blood cells (at protein level).

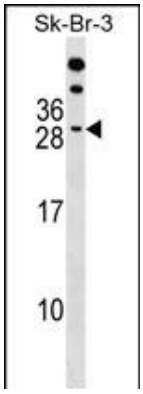
Background

This intronless gene belongs to a family of RAS-related genes. The proteins encoded by these genes share approximately 50% amino acid identity with the classical RAS proteins and have numerous structural features in common. The most striking difference between the RAP and RAS proteins resides in their 61st amino acid: glutamine in RAS is replaced by threonine in RAP proteins. Evidence suggests that this protein may be polyisoprenylated and palmitoylated.

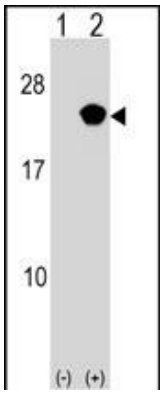
References

Bailey, S.D., et al. Diabetes Care 33(10):2250-2253(2010)
Martins-de-Souza, D., et al. J Psychiatr Res (2010) In press :
Talmud, P.J., et al. Am. J. Hum. Genet. 85(5):628-642(2009)
Canobbio, I., et al. Cell. Signal. 20(9):1662-1670(2008)
Liu, Y., et al. Lung Cancer 56(3):307-317(2007)

Images



RAP2B Antibody (Center) (Cat. #AP17426c) western blot analysis in SK-BR-3 cell line lysates (35ug/lane).This demonstrates the RAP2B antibody detected the RAP2B protein (arrow).



Western blot analysis of RAP2B (arrow) using rabbit polyclonal RAP2B Antibody (Center) (Cat. #AP17426c). 293 cell lysates (2 ug/lane) either nontransfected (Lane 1) or transiently transfected (Lane 2) with the RAP2B gene.