

Rabbit Anti-RAB3GAP2 antibody

SL11939R

Product Name:	RAB3GAP2
Chinese Name:	RAB3-GTP酶 激活蛋白催化 亚单位2抗体
Alias:	DKFZp434D245; FLJ14579; KIAA0839; p150; Rab3 GAP p150; Rab3 GAP regulatory subunit; Rab3 GAP150; Rab3 GTPase activating protein 150 kDa subunit; Rab3 GTPase activating protein non catalytic subunit; RAB3 GTPase activating protein subunit 2 (non catalytic); RAB3 GTPase activating protein subunit 2; RAB3GAP150; RGAP iso; RP11 568G11.1; RBGPR HUMAN.
Organism Species:	Rabbit
Clonality:	Polyclonal
React Species:	Human, Mouse, Rat, Dog, Cow, Horse, Rabbit, Sheep,
Applications:	ELISA=1:500-1000IHC-P=1:400-800IHC-F=1:400-800ICC=1:100-500IF=1:100-500 (Paraffin sections need antigen repair) not yet tested in other applications. optimal dilutions/concentrations should be determined by the end user.
Molecular weight:	156kDa
Cellular localization:	cytoplasmic
Form:	Lyophilized or Liquid
Concentration:	1 mg/ml
immunogen:	KLH conjugated synthetic peptide derived from human RAB3GAP2:741-850/1393
Lsotype:	IgG
Purification:	affinity purified by Protein A
Storage Buffer:	0.01M TBS(pH7.4) with 1% BSA, 0.03% Proclin300 and 50% Glycerol.
Storage:	Store at -20 °C for one year. Avoid repeated freeze/thaw cycles. The lyophilized antibody is stable at room temperature for at least one month and for greater than a year when kept at -20 °C. When reconstituted in sterile pH 7.4 0.01M PBS or diluent of antibody the antibody is stable for at least two weeks at 2-4 °C.
PubMed:	PubMed
Product Detail:	ab 3 GAP p150 is a ubiquitously expressed protein that contains 1,393 amino acids and belongs to the Rab3-GAP regulatory subunit family. Defects in Rab 3 GAP p150 are the cause of Martsolf and Warburg Micro syndrome. Both syndromes are characterized by

congenital cataracts, microphthalmia, postnatal microcephaly and developmental delay, and are inherited in an autosomal recessive manner. The Rab3 GTPase-activating complex is a heterodimer composed of RAB3GAP and Rab 3 GAP p150 that interacts with DMXL2. Existing as two alternatively spliced isoforms, the Rab 3 GAP p150 gene is conserved in chimpanzee, dog, cow, rat, chicken, zebrafish, fruit fly, mosquito, A.thaliana and rice. The Rab 3 GAP p150 gene contains 36 exons and maps to human chromosome 1q41.

Function:

RAB3GAP2 is a regulatory subunit of a GTPase activating protein that has specificity for Rab3 subfamily (RAB3A, RAB3B, RAB3C and RAB3D). Rab3 proteins are involved in regulated exocytosis of neurotransmitters and hormones. Rab3 GTPase-activating complex specifically converts active Rab3-GTP to the inactive form Rab3-GDP. It is required for normal eye and brain development and may participate in neurodevelopmental processes such as proliferation, migration and differentiation before synapse formation, and non-synaptic vesicular release of neurotransmitters.

Subunit:

The Rab3 GTPase-activating complex is a heterodimer composed of RAB3GAP and RAB3-GAP150. The Rab3 GTPase-activating complex interacts with DMXL2

Subcellular Location:

Cytoplasm. Note=In neurons, it is enriched in the synaptic soluble fraction.

Tissue Specificity:

Ubiquitous.

DISEASE:

efects in RAB3GAP2 are the cause of Martsolf syndrome (MARTS) [MIM:212720]. Martsolf syndrome is characterized by congenital cataracts, mental retardation, and hypogonadism. Inheritance is autosomal recessive.

Defects in RAB3GAP2 are the cause of Warburg micro syndrome type 2 (WARBM2) [MIM:614225]. WARBM2 is a rare syndrome characterized by microcephaly, microphthalmia, microcornia, congenital cataracts, optic atrophy, cortical dysplasia, in particular corpus callosum hypoplasia, severe mental retardation, spastic diplegia, and hypogonadism.

Similarity:

Belongs to the Rab3-GAP regulatory subunit family.

SWISS:

Q9H2M9

Gene ID:

25782

Database links:

Entrez Gene: 25782Human

Entrez Gene: 98732Mouse

Entrez Gene: 289350Rat

Omim: 609275Human

SwissProt: Q9H2M9Human

SwissProt: Q8BMG7Mouse

SwissProt: Q5U1Z0Rat

Important Note:

This product as supplied is intended for research use only, not for use in human, therapeutic or diagnostic applications.