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PLAG1 Antibody (N-term)

Affinity Purified Rabbit Polyclonal Antibody (Pab)
Catalog # AP11647a

Product Information

Application	WB, E
Primary Accession	Q6DJT9
Other Accession	Q58NQ5, NP_001108106.1, NP_002646.2
Reactivity	Human, Rat, Mouse
Predicted	Chicken
Host	Rabbit
Clonality	Polyclonal
Isotype	Rabbit IgG
Clone Names	RB31388
Calculated MW	55909
Antigen Region	8-35

Additional Information

Gene ID	5324
Other Names	Zinc finger protein PLAG1, Pleiomorphic adenoma gene 1 protein, PLAG1
Target/Specificity	This PLAG1 antibody is generated from rabbits immunized with a KLH conjugated synthetic peptide between 8-35 amino acids from the N-terminal region of human PLAG1.
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	PLAG1 Antibody (N-term) is for research use only and not for use in diagnostic or therapeutic procedures.

Protein Information

Name	PLAG1
Function	Transcription factor whose activation results in up- regulation of target genes, such as IGFII, leading to uncontrolled cell proliferation: when overexpressed in cultured cells, higher proliferation rate and transformation

	are observed. Other target genes such as CRLF1, CRABP2, CRIP2, PIGF are strongly induced in cells with PLAG1 induction. Proto-oncogene whose ectopic expression can trigger the development of pleomorphic adenomas of the salivary gland and lipoblastomas. Overexpression is associated with up-regulation of IGFII, is frequently observed in hepatoblastoma, common primary liver tumor in childhood. Cooperates with CBFB-MYH11, a fusion gene important for myeloid leukemia.
Cellular Location	Nucleus. Note=Strong nucleolar localization when sumoylation is inhibited
Tissue Location	Expressed in fetal tissues such as lung, liver and kidney. Not detected or weak detection in normal adult tissues, but highly expressed in salivary gland with benign or malignant pleiomorphic adenomas with or without 8q12 aberrations, with preferential occurrence in benign tumors.

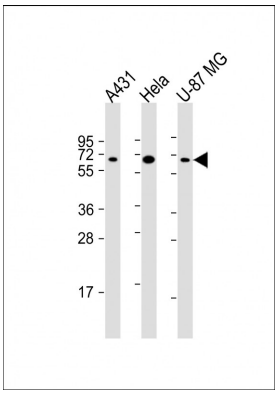
Background

Pleomorphic adenoma gene 1 encodes a zinc finger protein with 2 putative nuclear localization signals. PLAG1, which is developmentally regulated, has been shown to be consistently rearranged in pleomorphic adenomas of the salivary glands. PLAG1 is activated by the reciprocal chromosomal translocations involving 8q12 in a subset of salivary gland pleomorphic adenomas. Three transcript variants encoding two different isoforms have been found for this gene.

References

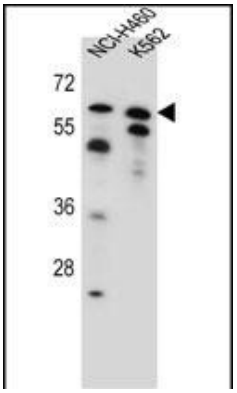
Patz, M., et al. Leuk. Lymphoma 51(8):1379-1381(2010)
Declercq, J., et al. Diabetes 59(8):1957-1965(2010)
Okada, Y., et al. Hum. Mol. Genet. 19(11):2303-2312(2010)
Kim, J.J., et al. J. Hum. Genet. 55(1):27-31(2010)
Zhao, J., et al. BMC Med. Genet. 11, 96 (2010) :

Images



All lanes : Anti-PLAG1 Antibody (N-term) at 1:2000 dilution Lane 1: A431 whole cell lysate Lane 2: Hela whole cell lysate Lane 3: U-87 MG whole cell lysate Lysates/proteins at 20 µg per lane. Secondary Goat Anti-Rabbit IgG, (H+L), Peroxidase conjugated at 1/10000 dilution. Predicted band size : 56 kDa Blocking/Dilution buffer: 5% NFDM/TBST.

PLAG1 Antibody (N-term) (Cat. #AP11647a) western blot analysis in NCI-H460,K562 cell line lysates (35ug/lane).This demonstrates the PLAG1 antibody detected the PLAG1 protein (arrow).



Please note: All products are 'FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC OR THERAPEUTIC PROCEDURES'.