

For Research Use Only

DNMT3A Polyclonal antibody

Catalog Number: 19366-1-AP

Featured Product

9 Publications



Basic Information

Catalog Number: 19366-1-AP	GenBank Accession Number: BC043617	Purification Method: Antigen affinity purification
Size: 150ul, Concentration: 450 µg/ml by Nanodrop and 327 µg/ml by Bradford method using BSA as the standard;	GeneID (NCBI): 1788	Recommended Dilutions: IHC 1:50-1:500
Source: Rabbit	UNIPROT ID: Q9Y6K1	
Isotype: IgG	Full Name: DNA (cytosine-5-)-methyltransferase 3 alpha	
Immunogen Catalog Number: AG7015	Calculated MW: 912 aa, 102 kDa	

Applications

Tested Applications:

IHC, ELISA

Cited Applications:

WB, IHC, IF

Species Specificity:

human, mouse

Cited Species:

human, mouse, pig

Note-IHC: suggested antigen retrieval with TE buffer pH 9.0; (*) Alternatively, antigen retrieval may be performed with citrate buffer pH 6.0

Positive Controls:

IHC : human kidney tissue, human lung cancer tissue, mouse heart tissue, human heart tissue

Background Information

DNA methylation in vertebrate animals is an epigenetic modification that is important for embryonic development, imprinting, and the inactivation of X chromosomes. DNA methylation is catalyzed by a family of DNA methyltransferases (DNMTs) that include the maintenance enzyme DNMT1 and de novo methyltransferases DNMT3a and DNMT3b. The overexpression of DNMT1, DNMT3a, and DNMT3b has been reported in various malignancies, including gastric, urothelial, and lung cancers, and may be related to tumorigenesis, tumor progression, and poor survival. Two isoforms of DNMT3a exist: the full-length DNMT3a, and the shorter form DNMT3a2 which lacks the N-terminal fragment. DNMT3a is expressed ubiquitously at low levels, while DNMT3a2 is specially expressed at high levels in embryonic stem cells and shows restricted expression in tissues known to undergo de novo methylation including testis and ovary. This antibody was raised against the N-terminal region of human DNMT3a. It is expected to detect the 120-130 kDa DNMT3a but not 72-100 kDa DNMT3a2.

Notable Publications

Author	Pubmed ID	Journal	Application
Hua Zhang	36178098	Development	WB
Diyu Chen	31652420	Aging (Albany NY)	WB
Ying-Ying Zhang	26178269	J Appl Toxicol	WB

Storage

Storage:

Store at -20°C. Stable for one year after shipment.

Storage Buffer:

PBS with 0.02% sodium azide and 50% glycerol pH 7.3.

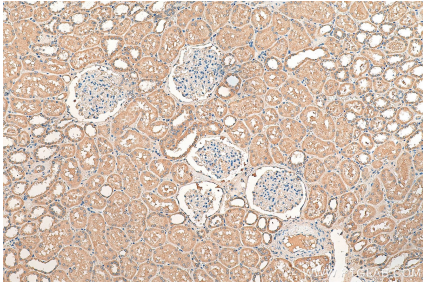
Aliquoting is unnecessary for -20°C storage

*** 20ul sizes contain 0.1% BSA

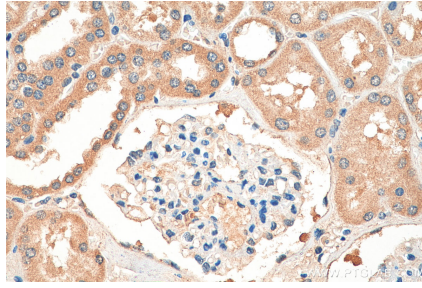
For technical support and original validation data for this product please contact:
T: 1 (888) 4PTGLAB (1-888-478-4522) (toll free in USA), or 1(312) 455-8498 (outside USA)
E: proteintech@ptglab.com
W: ptglab.com

This product is exclusively available under Proteintech Group brand and is not available to purchase from any other manufacturer.

Selected Validation Data



Immunohistochemical analysis of paraffin-embedded human kidney tissue slide using 19366-1-AP (DNMT3A antibody) at dilution of 1:200 (under 10x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



Immunohistochemical analysis of paraffin-embedded human kidney tissue slide using 19366-1-AP (DNMT3A antibody) at dilution of 1:200 (under 40x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).