

Product Information

Size:

50ul

Reactivity:

Human, Mouse, Rat

Source:

Rabbit

Isotype:

IgG

Applications:

ELISA, IHC

Recommended dilutions:

ELISA:1:2000-1:5000, IHC:1:25-1:100

Protein Background:

Dioxygenase that catalyzes the conversion of the modified genomic base 5-methylcytosine (5mC) into 5-hydroxymethylcytosine (5hmC) and plays a key role in epigenetic chromatin reprogramming in the zygote following fertilization. Also mediates subsequent conversion of 5hmC into 5-formylcytosine (5fC), and conversion of 5fC to 5-carboxylcytosine (5caC). Conversion of 5mC into 5hmC, 5fC and 5caC probably constitutes the first step in cytosine demethylation. In zygotes, DNA demethylation occurs selectively in the paternal pronucleus before the first cell division, while the adjacent maternal pronucleus and certain paternally-imprinted loci are protected from this process. Participates in DNA demethylation in the paternal pronucleus by mediating conversion of 5mC into 5hmC, 5fC and 5caC. Does not mediate DNA demethylation of maternal pronucleus because of the presence of DPPA3/PGC7 on maternal chromatin that prevents TET3-binding to chromatin.

Gene ID:

PTMA

Uniprot

P06454

Synonyms:

prothymosin, alpha

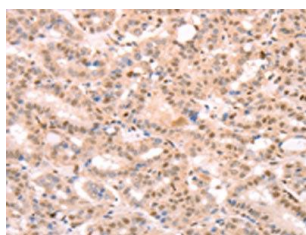
Immunogen:

Synthetic peptide of human PTMA.

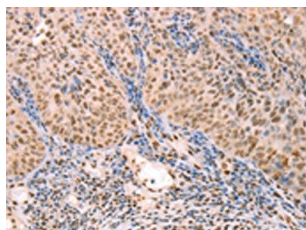
Storage:

-20°C; C, pH7.4 PBS, 0.05% NaN₃, 40% Glycerol

Product Images



The image on the left is immunohistochemistry of paraffin-embedded Human thyroid cancer tissue using PACO18981 (PTMA Antibody) at dilution 1/25, on the right is treated with synthetic peptide. (Original magnification: x—200).



The image on the left is immunohistochemistry of paraffin-embedded Human lymphoma tissue using PACO18981 (PTMA Antibody) at dilution 1/25, on the right is treated with synthetic peptide. (Original magnification: x—200).