

For Research Use Only

# MTH1 Polyclonal antibody

Catalog Number: 16705-1-AP

Featured Product

4 Publications



## Basic Information

Catalog Number:

16705-1-AP

Size:

800 µg/ml

Source:

Rabbit

Isotype:

IgG

Immunogen Catalog Number:

AG10103

GenBank Accession Number:

BC014618

GeneID (NCBI):

4521

UNIPROT ID:

P36639

Full Name:

nudix (nucleoside diphosphate linked moiety X)-type motif 1

Calculated MW:

179aa, 20 kDa; 197aa, 23 kDa

Observed MW:

18-24 kDa

Purification Method:

Antigen affinity purification

Recommended Dilutions:

WB 1:200-1:1000

IHC 1:2000-1:8000

IF/ICC 1:10-1:100

## Applications

Tested Applications:

IF/ICC, IHC, WB, ELISA

Cited Applications:

WB

Species Specificity:

human, mouse, rat

Cited Species:

human, mouse

**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:

WB : HepG2 cells, HEK-293 cells, PC-3 cells

IHC : human lung cancer tissue, mouse brain tissue

IF/ICC : PC-3 cells,

## Background Information

MTH1, also known as NUDT1 or 8-Oxo-dGTPase, is an important repair enzyme that prevents oxidative stress-induced DNA damage through hydrolyzing mutagenic 8-oxo-dGTP into 8-oxo-dGMP. MTH1 is expressed in postmitotic neurons as well as in proliferative tissues, and it is localized both in the mitochondria and nucleus. MTH1 might be a useful marker of oxidative stress and its level increased upon oxidative stress. Increased expression of MTH1 were also found in various cancer tissues and neurodegenerative diseases.

## Notable Publications

Author	Pubmed ID	Journal	Application
Ya Gao	29221173	Oncotarget	WB
Xiang Wang	35395477	Colloids Surf B Biointerfaces	WB
Wenji Xu	39075342	BMC Gastroenterol	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

For technical support and original validation data for this product please contact:

T: 4006900926

E: [Proteintech-CN@ptglab.com](mailto:Proteintech-CN@ptglab.com)

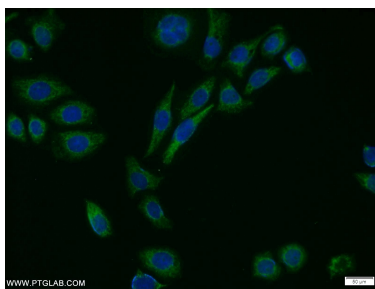
W: [ptgcn.com](http://ptgcn.com)

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

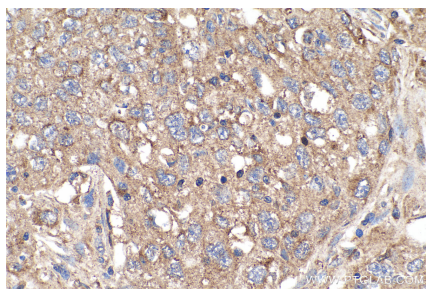
## Selected Validation Data



HepG2 cells were subjected to SDS PAGE followed by western blot with 16705-1-AP (MTH1 antibody) at dilution of 1:300 incubated at room temperature for 1.5 hours.



Immunofluorescent analysis of PC-3 cells using 16705-1-AP (MTH1 antibody) at dilution of 1:25 and Alexa Fluor 488-conjugated Goat Anti-Rabbit IgG(H+L).



Immunohistochemical analysis of paraffin-embedded human lung cancer tissue slide using 16705-1-AP (MTH1 antibody) at dilution of 1:4000 (under 40x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).