

For Research Use Only

# LONP1 Monoclonal antibody, PBS Only



Catalog Number: 66043-1-PBS

## Basic Information

<b>Catalog Number:</b> 66043-1-PBS	<b>GenBank Accession Number:</b> BC000235	<b>Purification Method:</b> Protein G purification
<b>Size:</b> 1mg/ml	<b>GeneID (NCBI):</b> 9361	<b>CloneNo.:</b> 1C6C12
<b>Source:</b> Mouse	<b>UNIPROT ID:</b> P36776	
<b>Isotype:</b> IgG1	<b>Full Name:</b> lon peptidase 1, mitochondrial	
<b>Immunogen Catalog Number:</b> AG7306	<b>Calculated MW:</b> 106 kDa	
	<b>Observed MW:</b> 100 kDa	

## Applications

**Tested Applications:**  
WB, IF, IHC, Indirect ELISA

**Species Specificity:**  
human, mouse, rat

## Background Information

LONP1 (Lon protease homolog, mitochondrial) is also named as LONP, LONHS, HLON, LON, PRSS15, PIM1, MGC1498 and belongs to the peptidase S16 family. It seems to play a major role in the elimination of oxidatively modified proteins in the mitochondrial matrix (PMID:18021745). LONP1, also a nuclearly encoded and mitochondrially located stress-responsive protease, is involved in heme-mediated ALAS-1 turnover (PMID:21659532). It recognizes specific surface determinants or folds, initiates proteolysis at solvent-accessible sites, and generates unfolded polypeptides that are then processively degraded (PMID:15870080).

## Storage

**Storage:**  
Store at -80°C.

**Storage Buffer:**  
PBS Only

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

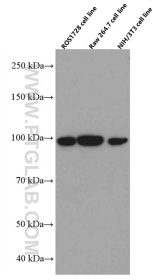
T: 4006900926

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

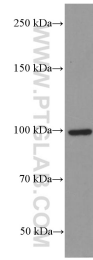
W: [ptgcn.com](http://ptgcn.com)

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

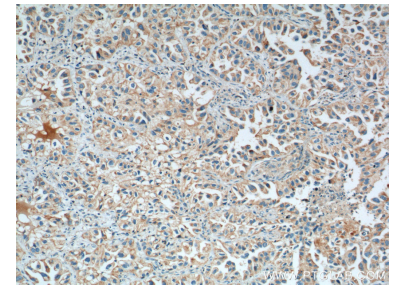
## Selected Validation Data



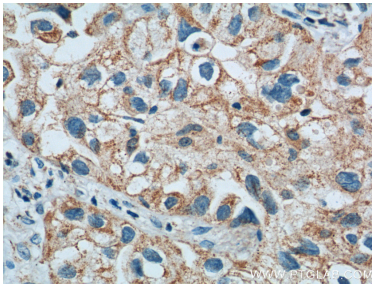
Various lysates were subjected to SDS PAGE followed by western blot with 66043-1-Ig (LONP1 antibody) at dilution of 1:5000 incubated at room temperature for 1.5 hours. This data was developed using the same antibody clone with 66043-1-PBS in a different storage buffer formulation.



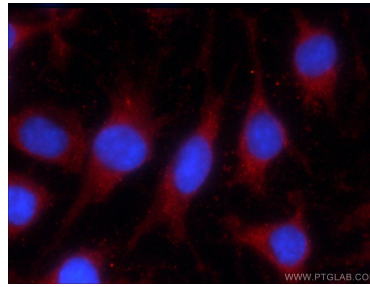
Jurkat cells were subjected to SDS PAGE followed by western blot with 66043-1-Ig (LONP1 Antibody) at dilution of 1:5000 incubated at room temperature for 1.5 hours. This data was developed using the same antibody clone with 66043-1-PBS in a different storage buffer formulation.



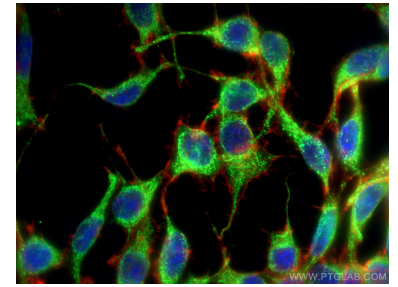
Immunohistochemical analysis of paraffin-embedded human lung cancer tissue slide using 66043-1-Ig (LONP1 Antibody) at dilution of 1:800 (under 10x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0). This data was developed using the same antibody clone with 66043-1-PBS in a different storage buffer formulation.



Immunohistochemical analysis of paraffin-embedded human lung cancer tissue slide using 66043-1-Ig (LONP1 Antibody) at dilution of 1:800 (under 40x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0). This data was developed using the same antibody clone with 66043-1-PBS in a different storage buffer formulation.



Immunofluorescent analysis of C6 cells using 66043-1-Ig (LONP1 antibody) at dilution of 1:25 and Rhodamine-Goat anti-Mouse IgG. This data was developed using the same antibody clone with 66043-1-PBS in a different storage buffer formulation.



Immunofluorescent analysis of (-20°C Ethanol) fixed C6 cells using LONP1 antibody (66043-1-Ig, Clone: 1C6C12) at dilution of 1:200 and CoraLite®488-Conjugated AffiniPure Goat Anti-Mouse IgG(H+L), CL594-Phalloidin (red). This data was developed using the same antibody clone with 66043-1-PBS in a different storage buffer formulation.