

For Research Use Only

ATG7 Monoclonal antibody

Catalog Number: 67341-1-Ig

Featured Product

35 Publications



Basic Information

Catalog Number:

67341-1-Ig

Size:

1500 ug/ml

Source:

Mouse

Isotype:

IgG2a

Immunogen Catalog Number:

AG29172

GenBank Accession Number:

BC000091

GeneID (NCBI):

10533

UNIPROT ID:

O95352

Full Name:

ATG7 autophagy related 7 homolog
(S. cerevisiae)

Calculated MW:

78 kDa

Observed MW:

68-78 kDa

Purification Method:

Protein A purification

CloneNo.:

2B5A10

Recommended Dilutions:

WB 1:5000-1:50000

IHC 1:500-1:2000

IF/ICC 1:50-1:500

Applications

Tested Applications:

WB, IHC, IF/ICC, FC (Intra), ELISA

Cited Applications:

WB, IHC, IF, IP

Species Specificity:

human, mouse, rat, pig

Cited Species:

human, mouse, rat, canine

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 : LNCaP cells, Jurkat cells, pig spleen tissue, HepG2 cells, 4T1 cells, HeLa cells, THP-1 cells, HSC-T6 cells, NIH/3T3 cells, HEK-293 cells

IHC : human cervical cancer tissue,

IF/ICC : HeLa cells,

Background Information

Atg7 is an E1-like enzyme that is specifically involved in autophagosome formation and is essential for autophagy. As an autophagic-related protein it is required for linking to Atg12, Atg5 and Atg8, which are essential for Atg conjugation and autophagosome formation. Atg7 has been reported as an important regulator of autophagy with starvation-induced or chemotherapeutic agent treatment. The high expression level of ATG7 is related to the survival of patients with breast cancer. There are several isoforms of ATG7 protein ranged from 68 kDa to 78 kDa.

Notable Publications

Author	Pubmed ID	Journal	Application
Meng Wang	36090477	Mol Ther Oncolytics	WB
Syed Riaz Ud Din	33044599	Appl Microbiol Biotechnol	WB
Xinxin Si	36382664	Pharmacology	IHC

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:

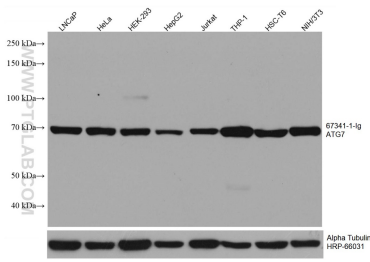
T: 4006900926

E: Proteintech-CN@ptglab.com

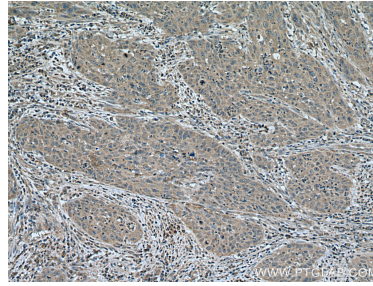
W: ptgcn.com

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

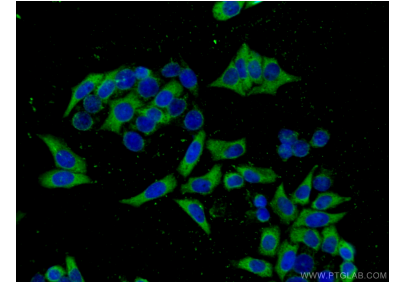
Selected Validation Data



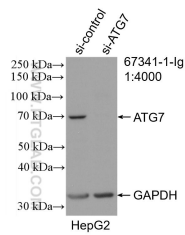
LNCaP cells were subjected to SDS PAGE followed by western blot with 67341-1-Ig (ATG7 antibody) at dilution of 1:10000 incubated at room temperature for 1.5 hours. The membrane was stripped and reblotted with HRP-conjugated Alpha Tubulin Monoclonal antibody (HRP-66031) as loading control.



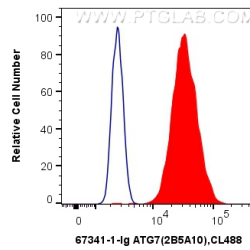
Immunohistochemical analysis of paraffin-embedded human cervical cancer tissue slide using 67341-1-Ig (ATG7 antibody) at dilution of 1:1000 (under 10x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



Immunofluorescent analysis of (-20°C Ethanol) fixed HeLa cells using 67341-1-Ig (ATG7 antibody) at dilution of 1:100 and CoraLite488-Conjugated AffiniPure Goat Anti-Mouse IgG(H+L).



WB result of ATG7 antibody (67341-1-Ig; 1:4000; incubated at room temperature for 1.5 hours) with sh-Control and sh-ATG7 transfected HepG2 cells.



1×10^6 HeLa cells were intracellularly stained with 0.5 ug Anti-Human ATG7 (67341-1-Ig, Clone:2B5A10) and CoraLite@488-Conjugated AffiniPure Goat Anti-Mouse IgG(H+L) at dilution 1:1000 (red), or 0.5 ug Mouse IgG2a Isotype Control (66360-2-Ig, Clone: K11A1B2A2) (blue). Cells were fixed with 4% PFA and permeabilized with Flow Cytometry Perm Buffer (PF00011-C).