

For Research Use Only

ATG13 Polyclonal antibody

Catalog Number: 18258-1-AP

Featured Product

19 Publications



Basic Information

Catalog Number:

18258-1-AP

Size:

150ul, Concentration: 350 ug/ml by Nanodrop;

Source:

Rabbit

Isotype:

IgG

Immunogen Catalog Number:

AG13090

GenBank Accession Number:

BC001331

GeneID (NCBI):

9776

UNIPROT ID:

O75143

Full Name:

KIAA0652

Calculated MW:

57 kDa

Observed MW:

57-63 kDa

Purification Method:

Antigen affinity purification

Recommended Dilutions:

WB 1:500-1:1000

IP 0.5-4.0 ug for 1.0-3.0 mg of total protein lysate

IHC 1:50-1:500

IF/ICC 1:50-1:500

Applications

Tested Applications:

WB, IHC, IF/ICC, IP, ELISA

Cited Applications:

WB, IF, CoIP

Species Specificity:

human, mouse, rat

Cited Species:

human, mouse, rat

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: SH-SY5Y cells, BGC-823 cells, HeLa cells, human brain tissue, mouse cerebellum tissue, mouse testis tissue, mouse thymus tissue, Jurkat cells, HEK-293 cells, MCF-7 cells

IP: SH-SY5Y cells,

IHC: mouse heart tissue, mouse brain tissue, human brain tissue

IF/ICC: SH-SY5Y cells,

Background Information

ATG13 is one component protein of the ULK1 complex which is required for autophagosome formation and mitophagy. ATG13 has two nutrient regulatory phosphorylation sites and the phosphorylation status of ATG13 affect regulation of autophagy by modulating enzyme activity and cellular localization of ULK1. Besides, it has been reported the nonautophagic function of ATG13 on cardiac development for ATG13-deficient embryos show myocardial growth defects.(PMID:27387056, 26801615, 26644405)

Notable Publications

Author	Pubmed ID	Journal	Application
Zhenbing Lv	36295086	Life (Basel)	WB
Ruyuan Wei	35936222	Oxid Med Cell Longev	WB
Yihan Wang	35959437	Front Pharmacol	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

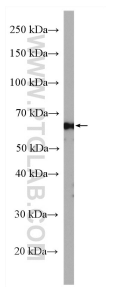
For technical support and original validation data for this product please contact:

T: 1 (888) 4PTGLAB (1-888-478-4522) (toll free in USA), or 1(312) 455-8498 (outside USA)

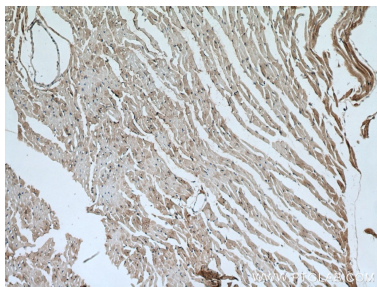
E: proteintech@ptglab.com
W: ptglab.com

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

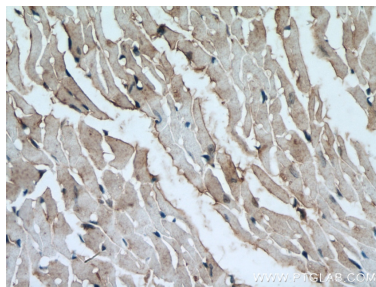
Selected Validation Data



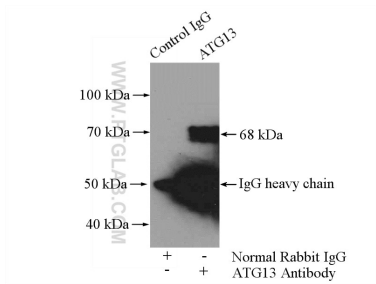
SH-SY5Y cells were subjected to SDS PAGE followed by western blot with 18258-1-AP (ATG13 antibody) at dilution of 1:800 incubated at room temperature for 1.5 hours.



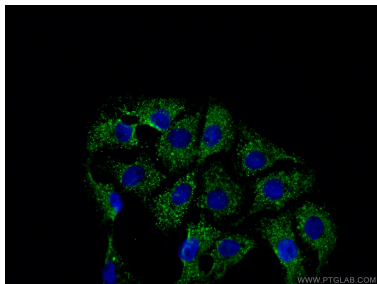
Immunohistochemical analysis of paraffin-embedded mouse heart tissue slide using 18258-1-AP (ATG13 antibody) at dilution of 1:200 (under 10x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



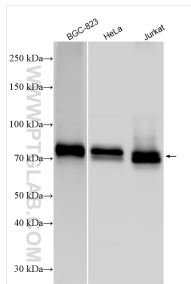
Immunohistochemical analysis of paraffin-embedded mouse heart tissue slide using 18258-1-AP (ATG13 antibody) at dilution of 1:200 (under 40x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



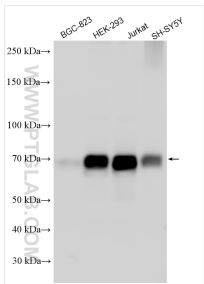
IP result of anti-ATG13 (IP:18258-1-AP, 4ug; Detection:18258-1-AP 1:300) with SH-SY5Y cells lysate 1600ug.



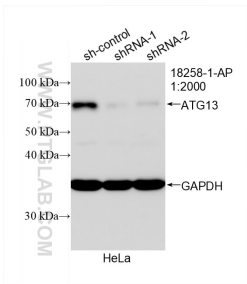
Immunofluorescent analysis of (-20°C Ethanol) fixed SH-SY5Y cells using 18258-1-AP (ATG13 antibody) at dilution of 1:50 and CoraLite488-Conjugated Goat Anti-Rabbit IgG(H+L).



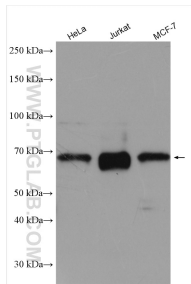
Various lysates were subjected to SDS PAGE followed by western blot with 18258-1-AP (ATG13 antibody) at dilution of 1:2000 incubated at room temperature for 1.5 hours.



Various lysates were subjected to SDS PAGE followed by western blot with 18258-1-AP (ATG13 antibody) at dilution of 1:4000 incubated at room temperature for 1.5 hours.



WB result of ATG13 antibody (18258-1-AP; 1:2000; incubated at room temperature for 1.5 hours) with sh-Control and sh-ATG13 transfected HeLa cells.



Various lysates were subjected to SDS PAGE followed by western blot with 18258-1-AP (ATG13 antibody) at dilution of 1:2000 incubated at room temperature for 1.5 hours.