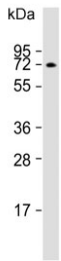
ATG16L Antibody (F54288)

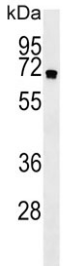
Catalog No.	Formulation	Size
F54288-0.4ML	In 1X PBS, pH 7.4, with 0.09% sodium azide	0.4 ml
F54288-0.08ML	In 1X PBS, pH 7.4, with 0.09% sodium azide	0.08 ml

Bulk quote request

Availability	1-3 business days
Species Reactivity	Human, Mouse
Format	Purified
Host	Rabbit
Clonality	Polyclonal (rabbit origin)
Isotype	Rabbit Ig
Purity	Antigen affinity purified
UniProt	Q676U5
Localization	Cytoplasmic
Applications	Western Blot : 1:500-1:2000 Immunohistochemistry (FFPE) : 1:25 Immunofluorescence : 1:25
Limitations	This ATG16L1 antibody is available for research use only.

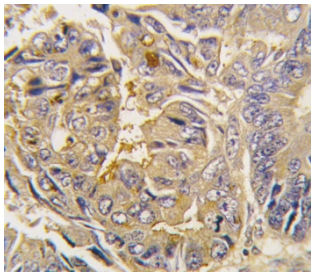


Western blot testing of human Jurkat lysate with ATG16L1 antibody. Predicted molecular weight ~68 kDa.

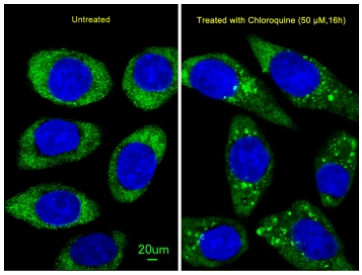


Western blot testing of human NCI-H460 lysate with NCI-H460 antibody. Predicted molecular weight ~68 kDa.

Western blot testing of mouse brain lysate with NCI-H460 antibody. Predicted molecular weight ~68 kDa.



IHC testing of FFPE human colon carcinoma tissue with ATG16L antibody. HIER: steam section in pH6 citrate buffer for 20 min and allow to cool prior to staining.



Immunofluorescent staining of fixed and permeabilized human U-251 cells with ATG16L1 antibody (green) and DAPI nuclear stain (blue).

Description

Macroautophagy is the major inducible pathway for the general turnover of cytoplasmic constituents in eukaryotic cells, it is also responsible for the degradation of active cytoplasmic enzymes and organelles during nutrient starvation. Macroautophagy involves the formation of double-membrane bound autophagosomes which enclose the cytoplasmic constituent targeted for degradation in a membrane bound structure, which then fuse with the lysosome (or vacuole) releasing a single-membrane bound autophagic bodies which are then degraded within the lysosome (or vacuole). The APG12-APG5-APG16L complex is esential for the elongation of autophagic isolation membranes. This complex initially associates in uniform distribution with small vesicle membranes. During membrane elongation, the complex partitions, with a great concentration building on the outer side of the isolation membrane. Upon completion of the formation of the autophagosome, the APG12-APG5-APG16L dissociates from the membrane.

Application Notes

The stated application concentrations are suggested starting points. Titration of the ATG16L1 antibody may be required due to differences in protocols and secondary/substrate sensitivity.

Immunogen

A portion of amino acids 161-190 from the human protein were used as the immunogen for the ATG16L1 Antibody.

Storage

Aliquot the ATG16L1 antibody and store frozen at -20oC or colder. Avoid repeated freeze-thaw cycles.