



ATG7 Rabbit mAb

Catalog No	YP-rAb-17949
Isotype	IgG
Reactivity	Human,Mouse,Rat
Applications	WB,IHC,IF,ELISA
Gene Name	ATG7 APG7L
Protein Name	Ubiquitin-like modifier-activating enzyme ATG7 (ATG12-activating enzyme E1 ATG7) (Autophagy-related protein 7) (APG7-like) (hAGP7) (Ubiquitin-activating enzyme E1-like protein)
Purification Process	Protein A
Specificity	Endogenous
Formulation	PBS, 50% glycerol, 0.05% Proclin 300, 0.05%BSA
Source	Monoclonal, Rabbit,IgG
Dilution	IHC 1:200-1:1000; WB 1:1000-1:5000; IF 1:200-1:1000; ELISA 1:5000-1:20000; Note: For IHC, we suggest antigen retrieval with TE buffer pH 9.0
Concentration	0.5 mg/ml
Purity	≥90%
Storage Stability	-15 ° C to -25 ° C/1 year(Do not lower than -25 ° C)
Synonyms	APG7;Ubiquitin-like modifier-activating enzyme ATG7 (ATG12-activating enzyme E1 ATG7) (Autophagy-related protein 7) (APG7-like) (hAGP7) (Ubiquitin-activating enzyme E1-like protein);Ubiquitin-like modifier-activating enzyme ATG7 ; ATG12-activating enzyme E1 ATG7 ; Autophagy-related protein 7 ; APG7-like ; hAGP7 ; Ubiquitin-activating enzyme E1-like protein ;ATG7 APG7L
Observed Band	78kD
Calculated Molecular Weight	78kD
Cell Pathway	Cytoplasm
Tissue Specificity	Widely expressed, especially in kidney, liver, lymph nodes and bone marrow.
Function	Domain:The C-terminal part of the protein is essential for the dimerization and interaction with ATG3 and ATG12.,Function:Functions as an E1 enzyme essential for multisubstrates such as GABARAPL1 and ATG12. Forms intermediate conjugates with GABARAPL1 (GABARAPL2, GABARAP or MAP1ALC3). Formation of the final GABARAPL1-PE conjugate is essential for autophagy.,similarity:Belongs to the ATG7 family.,subunit:Homodimer (By similarity). Interacts with ATG3 and ATG12. The complex, composed of ATG3 and ATG7, plays a role in the conjugation of ATG12 to ATG5.,tissue specificity:Widely expressed, especially in kidney, liver, lymph nodes and bone marrow.,



Background

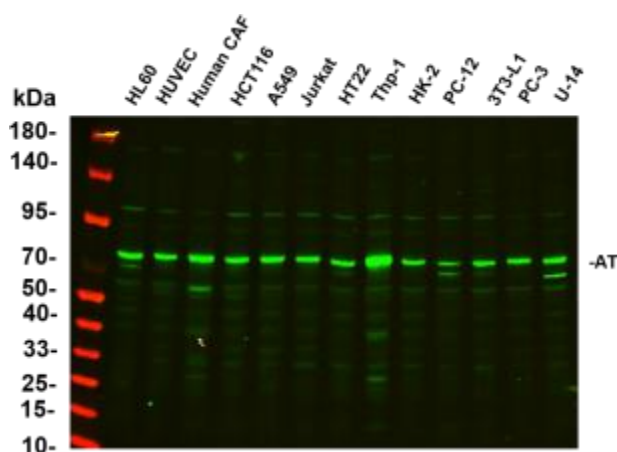
This gene encodes an E1-like activating enzyme that is essential for autophagy and cytoplasmic to vacuole transport. The encoded protein is also thought to modulate p53-dependent cell cycle pathways during prolonged metabolic stress. It has been associated with multiple functions, including axon membrane trafficking, axonal homeostasis, mitophagy, adipose differentiation, and hematopoietic stem cell maintenance. Alternative splicing results in multiple transcript variants. [provided by RefSeq, Sep 2015],

matters needing attention

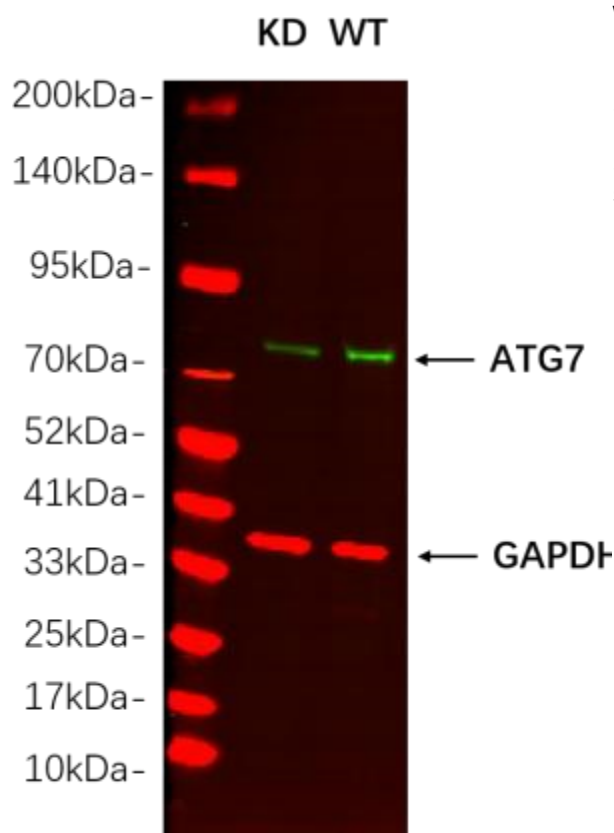
Avoid repeated freezing and thawing!

Usage suggestions

This product can be used in immunological reaction related experiments. For more information, please consult technical personnel.

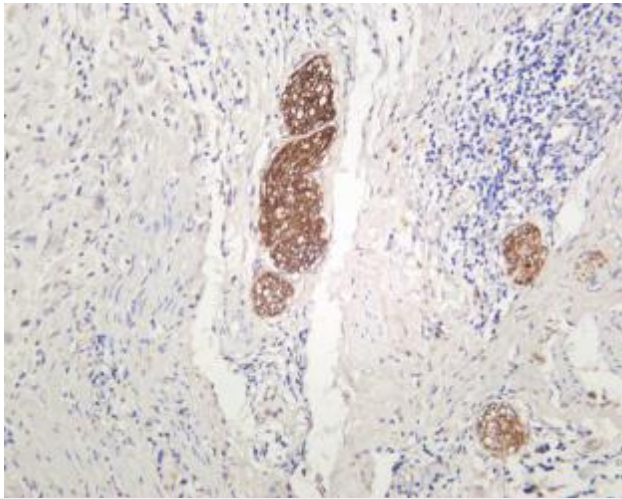


Various whole cell lysates were separated by 4-20% SDS-PAGE, and the primary antibody was used at 4°C, over night with a 1:2500 dilution. The Dylight 800-conjugated Goat anti-Rabbit antibody

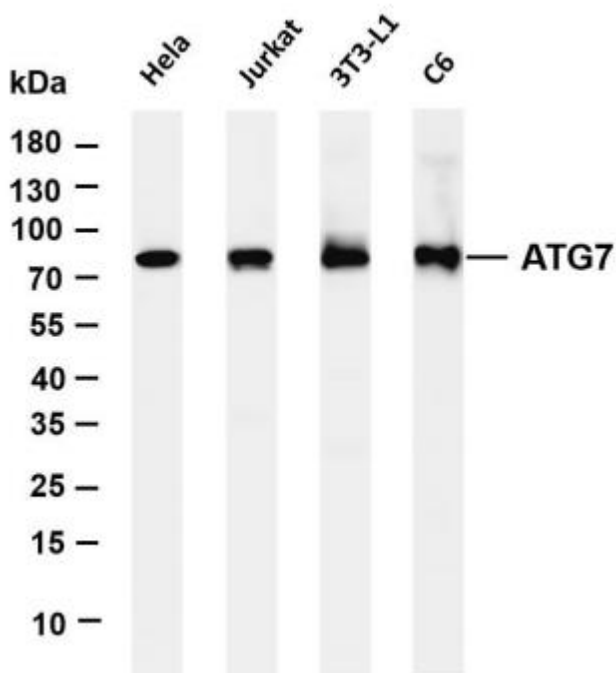


Western blot analysis of lysates from HAP1 WT and knockdown cell. (Green) primary antibody was diluted at 1:5000, 4 ° over night, Dylight 800 secondary antibody was diluted at 1:10000, 37 ° 1hour. (Red) GAPDH Monoclonal Antibody(5B7) antibody was diluted at 1:5000 as loading control, 4 ° over night, Dylight 680 secondary antibody was diluted at 1:10000, 37 ° 1hour.





Human cervical carcinoma was stained with anti-ATG7 rabbit antibody



Various whole cell lysates were separated by 4-20% SDS-PAGE, and the membrane was blotted with anti-ATG7 antibody. The HRP-conjugated Goat anti-Rabbit IgG(H + L) antibody was used to detect the antibody.
Lane 1: HeLa Lane 2: Jurkat Lane 3: 3T3-L1 Lane 4: C6
Predicted band size: 78kDa Observed band size: 78kDa

