

For Research Use Only

Cathepsin D Polyclonal antibody

Catalog Number: 21327-1-AP

Featured Product

125 Publications



Basic Information

Catalog Number:

21327-1-AP

Size:

150ul, Concentration: 700 ug/ml by Nanodrop;

Source:

Rabbit

Isotype:

IgG

Immunogen Catalog Number:

AG15254

GenBank Accession Number:

BC016320

GeneID (NCBI):

1509

UNIPROT ID:

P07339

Full Name:

cathepsin D

Calculated MW:

412 aa, 45 kDa

Observed MW:

32 kDa, 48 kDa, 52 kDa

Purification Method:

Antigen affinity purification

Recommended Dilutions:

WB 1:5000-1:50000

IHC 1:500-1:2000

IF/ICC 1:200-1:800

Applications

Tested Applications:

WB, IHC, IF/ICC, ELISA

Cited Applications:

WB, IHC, IF

Species Specificity:

human, mouse

Cited Species:

human, mouse, rat, pig, bovine

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: A375 cells, HCT 116 cells, HuH-7 cells, HepG2 cells, MCF-7 cells

IHC: human hepatocirrhosis tissue,

IF/ICC: MCF-7 cells, A431 cells

Background Information

CTSD (Cathepsin D) also named CPSD, belongs to the peptidase A1 family. It is ubiquitously expressed and is involved in proteolytic degradation, cell invasion, and apoptosis. Human CTSD is synthesized as a 52-kDa precursor that is converted into an active 48-kDa single-chain intermediate in the endosomes, and then into a fully active mature form, composed of a 34-kDa heavy chain and a 14-kDa light chain, in the lysosomes. It is a lysosomal acid protease found in neutrophils and monocytes and involved in the pathogenesis of several diseases such as breast cancer and possibly Alzheimer disease (PMID: 27114232, PMID: 30717773, PMID: 30051532).

Notable Publications

Author	Pubmed ID	Journal	Application
Yang Yang	32962728	J Exp Clin Cancer Res	WB
Yong Fan	34560177	Food Chem Toxicol	WB
Haojie Zhang	36114802	Phytother Res	WB

Storage

Storage:

Store at -20°C. Stable for one year after shipment.

Storage Buffer:

PBS with 0.02% sodium azide and 50% glycerol, pH7.3

Aliquoting is unnecessary for -20°C storage

*** 20ul sizes contain 0.1% BSA

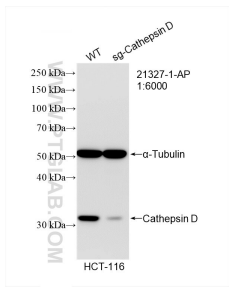
For technical support and original validation data for this product please contact:

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

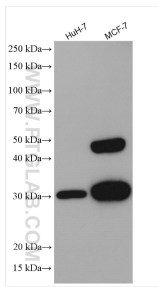
E: proteintech@ptglab.com
W: ptglab.com

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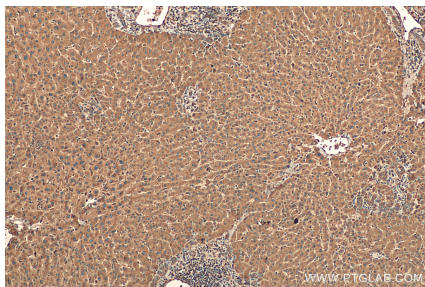
Selected Validation Data



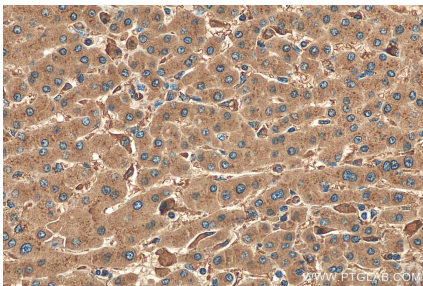
WB result of Cathepsin D antibody (21327-1-AP; 1:6000; room temperature for 1.5 hours) with wild-type and sg-Cathepsin D transfected HCT-116 cells.



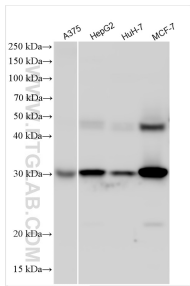
Various lysates were subjected to SDS PAGE followed by western blot with 21327-1-AP (Cathepsin D antibody) at dilution of 1:8000 incubated at room temperature for 1.5 hours.



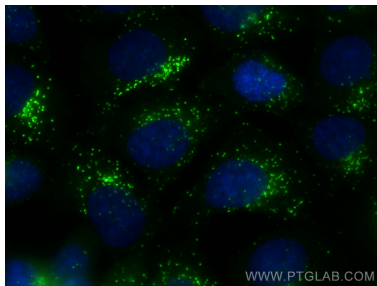
Immunohistochemical analysis of paraffin-embedded human hepatocirrhosis tissue slide using 21327-1-AP (Cathepsin D antibody) at dilution of 1:1000 (under 10x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



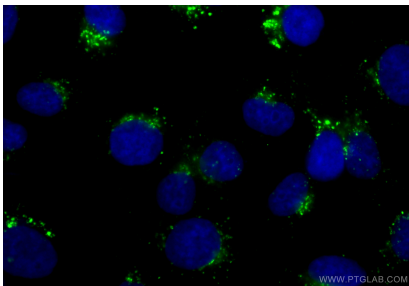
Immunohistochemical analysis of paraffin-embedded human hepatocirrhosis tissue slide using 21327-1-AP (Cathepsin D antibody) at dilution of 1:1000 (under 40x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



Various lysates were subjected to SDS PAGE followed by western blot with 21327-1-AP (Cathepsin D antibody) at dilution of 1:10000 incubated at room temperature for 1.5 hours.



Immunofluorescent analysis of (-20°C Methanol) fixed MCF-7 cells using Cathepsin D antibody (21327-1-AP) at dilution of 1:400 and Multi-rAb Coralite® Plus 488-Goat Anti-Rabbit Recombinant Secondary Antibody (H+L) (RGAR002).



Immunofluorescent analysis of (-20°C Methanol) fixed A431 cells using Cathepsin D antibody (21327-1-AP) at dilution of 1:200 and Coralite® 488-Conjugated Goat Anti-Rabbit IgG(H+L) (SA00013-2).