

For Research Use Only

# Cathepsin D Monoclonal antibody, PBS Only

Catalog Number: 66534-1-PBS

Featured Product



## Basic Information

**Catalog Number:**

66534-1-PBS

**Size:**

100ug, Concentration: 1mg/ml by Nanodrop;

**Source:**

Mouse

**Isotype:**

IgG2b

**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:**

Protein A purification

**CloneNo.:**

2F6F7

## Applications

**Tested Applications:**

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

**Species Specificity:**

human

## 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).

## Storage

**Storage:**

Store at -80°C.

**Storage Buffer:**

PBS Only

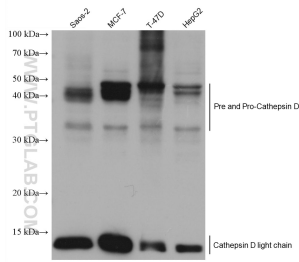
For technical support and original validation data for this product please contact:

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

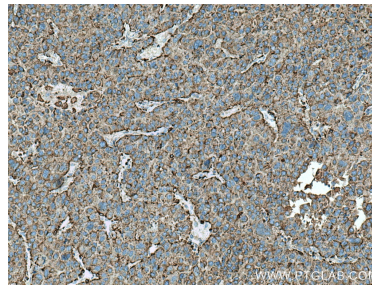
E: [proteintech@ptglab.com](mailto:proteintech@ptglab.com)  
W: [ptglab.com](http://ptglab.com)

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

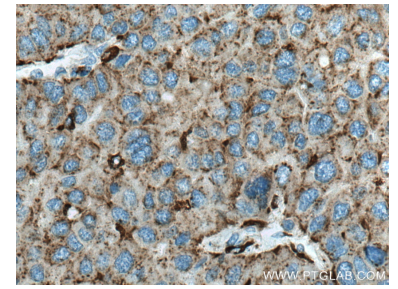
## Selected Validation Data



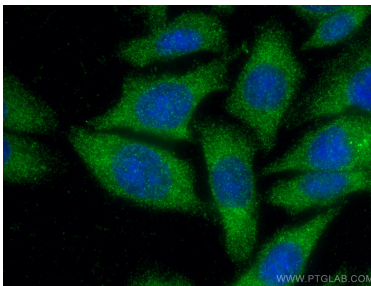
Various lysates were subjected to SDS PAGE followed by western blot with 66534-1-Ig (Cathepsin D antibody) at dilution of 1:10000 incubated at room temperature for 1.5 hours. This data was developed using the same antibody clone with 66534-1-PBS in a different storage buffer formulation.



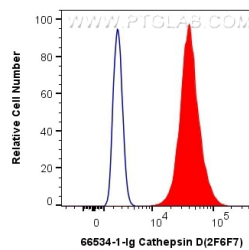
Immunohistochemical analysis of paraffin-embedded human liver cancer tissue slide using 66534-1-Ig (Cathepsin D antibody) at dilution of 1:1000 (under 10x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0). This data was developed using the same antibody clone with 66534-1-PBS in a different storage buffer formulation.



Immunohistochemical analysis of paraffin-embedded human liver cancer tissue slide using 66534-1-Ig (Cathepsin D antibody) at dilution of 1:1000 (under 40x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0). This data was developed using the same antibody clone with 66534-1-PBS in a different storage buffer formulation.



Immunofluorescent analysis of (-20°C Ethanol) fixed HepG2 cells using Cathepsin D antibody (66534-1-Ig, Clone: 2F6F7) at dilution of 1:400 and CoraLite@488-Conjugated AffiniPure Goat Anti-Mouse IgG(H+L). This data was developed using the same antibody clone with 66534-1-PBS in a different storage buffer formulation.



1X10<sup>6</sup> HepG2 cells were intracellularly stained with 0.4 ug Anti-Human Cathepsin D (66534-1-Ig, Clone:2F6F7) and CoraLite@488-Conjugated AffiniPure Goat Anti-Mouse IgG(H+L) at dilution 1:1000 (red), or 0.4 ug Mouse IgG2b Isotype Control (MPC-11) (65128-1-Ig, Clone: MPC-11) (blue). Cells were fixed with 4% PFA and permeabilized with Flow Cytometry Perm Buffer (PF00011-C). This data was developed using the same antibody clone with 66534-1-PBS in a

Immunohistochemical analysis of paraffin-embedded human liver cancer tissue slide using 66534-1-Ig (Cathepsin D antibody) at dilution of 1:1000 (under 20x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0). This data was developed using the same antibody clone with 66534-1-PBS in a different storage buffer formulation.