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CTSD Antibody
Purified Rabbit Polyclonal Antibody (Pab)
Catalog # AW5009

Specification

CTSD Antibody - Product Information

Application	**IF, WB, IHC-P,E**
Primary Accession	P07339
Reactivity	**Human**
Host	**Rabbit**
Clonality	**polyclonal**
Calculated MW	**44552 Da**
Isotype	**Rabbit IgG**
Antigen Source	**HUMAN**

CTSD Antibody - Additional Information

Gene ID 1509

Other Names
Cathepsin D, Cathepsin D light chain, Cathepsin D heavy chain, CTSD, CPSD

Dilution
IF~~1:25
WB~~1:1000
IHC-P~~1:25

Target/Specificity
This antibody is generated from a rabbit immunized with a KLH conjugated synthetic peptide between amino acids from human.

Format
Purified polyclonal antibody supplied in PBS with 0.09% (W/V) sodium azide. This antibody is purified through a protein A column, followed by peptide affinity purification.

Storage
Maintain refrigerated at 2-8°C for up to 2 weeks. For long term storage store at -20°C in small aliquots to prevent freeze-thaw cycles.

Precautions
CTSD Antibody is for research use only and not for use in diagnostic or therapeutic procedures.

CTSD Antibody - Protein Information

Name CTSD

Synonyms CPSD

Function
Acid protease active in intracellular protein breakdown. Plays a role in APP processing following cleavage and activation by ADAM30 which leads to APP degradation (PubMed:27333034). Involved in the pathogenesis of several diseases such as breast cancer and possibly Alzheimer disease.

Cellular Location
Lysosome. Melanosome. Secreted, extracellular space. Note=Identified by mass spectrometry in melanosome fractions from stage I to stage IV. In aortic samples, detected as an extracellular protein loosely bound to the matrix (PubMed:20551380)

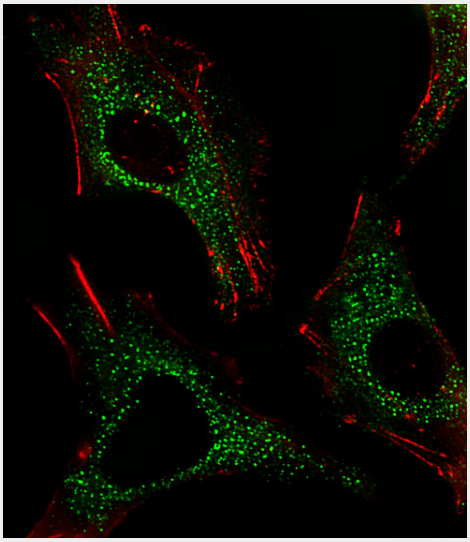
Tissue Location
Expressed in the aorta extracellular space (at protein level) (PubMed:20551380). Expressed in liver (at protein level) (PubMed:1426530).

CTSD Antibody - Protocols

Provided below are standard protocols that you may find useful for product applications.

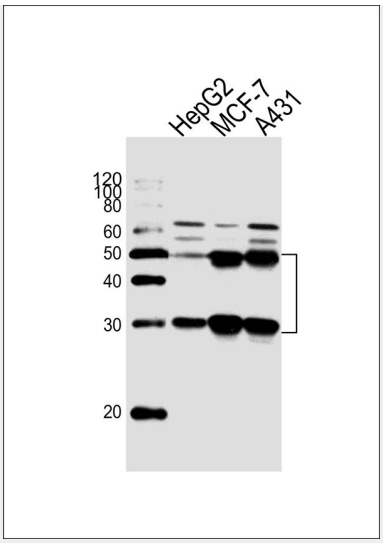
- Western Blot
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- Cell Culture

CTSD Antibody - Images

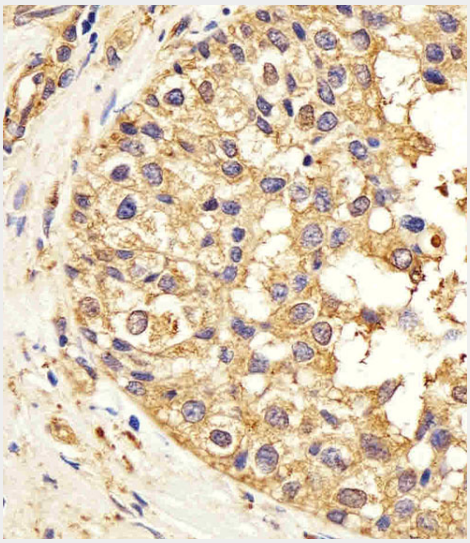


Fluorescent image of HepG2 cells stained with CTSD(Cat#AW5009). AW5009 was diluted at 1:25 dilution. An Alexa Fluor 488-conjugated goat anti-rabbit IgG at 1:400 dilution was used as the secondary antibody (green). Cytoplasmic actin was counterstained with Alexa Fluor® 555 conjugated with Phalloidin (red).

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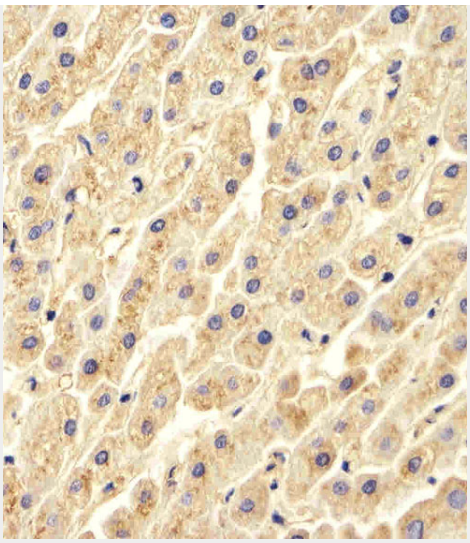


Western blot analysis of lysates from HepG2, MCF-7, A431 cell line (from left to right), using CTSD Antibody(Cat. #AW5009). AW5009 was diluted at 1:1000 at each lane. A goat anti-rabbit IgG H&L(HRP) at 1:5000 dilution was used as the secondary antibody.



Immunohistochemical analysis of paraffin-embedded H.breast carcinoma section using CTSD(Cat#AW5009). AW5009 was diluted at 1:25 dilution. A peroxidase-conjugated goat anti-rabbit IgG at 1:400 dilution was used as the secondary antibody, followed by DAB staining.

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Immunohistochemical analysis of paraffin-embedded H.liver section using CTSD(Cat#AW5009). AW5009 was diluted at 1:25 dilution. A peroxidase-conjugated goat anti-rabbit IgG at 1:400 dilution was used as the secondary antibody, followed by DAB staining.

CTSD Antibody - Background

Acid protease active in intracellular protein breakdown. Involved in the pathogenesis of several diseases such as breast cancer and possibly Alzheimer disease.

CTSD Antibody - References

Faust P.L.,et al.Proc. Natl. Acad. Sci. U.S.A. 82:4910-4914(1985).
Westley B.R.,et al.Nucleic Acids Res. 15:3773-3786(1987).
Redecker B.,et al.DNA Cell Biol. 10:423-431(1991).
Ebert L.,et al.Submitted (JUN-2004) to the EMBL/GenBank/DDBJ databases.
Kalnine N.,et al.Submitted (OCT-2004) to the EMBL/GenBank/DDBJ databases.