

## Product datasheet

### Anti-CLPP antibody [EPR7133] ab124822

Recombinant RabMAb

★★★★★ **3 Abreviews** **36 References** [7 Images](#)

#### Overview

<b>Product name</b>	Anti-CLPP antibody [EPR7133]
<b>Description</b>	Rabbit monoclonal [EPR7133] to CLPP
<b>Host species</b>	Rabbit
<b>Tested applications</b>	<b>Suitable for:</b> IHC-P, WB, IP <b>Unsuitable for:</b> Flow Cyt
<b>Species reactivity</b>	<b>Reacts with:</b> Mouse, Rat, Human
<b>Immunogen</b>	Synthetic peptide corresponding to Human CLPP.
<b>Positive control</b>	WB: Recombinant Human CLPP protein ( <a href="#">ab124872</a> ), Fetal muscle, Saos-2, A431, 293T, K562, A549, and Mouse brain lysates; IHC-P: Human liver, Mouse kidney, and Rat stomach tissues IP: K562
<b>General notes</b>	<p>This product is a recombinant monoclonal antibody, which offers several advantages including:</p> <ul style="list-style-type: none"> <li>- High batch-to-batch consistency and reproducibility</li> <li>- Improved sensitivity and specificity</li> <li>- Long-term security of supply</li> <li>- Animal-free production</li> </ul> <p>For more information <a href="#">see here</a>.</p> <p>Our RabMAb<sup>®</sup> technology is a patented hybridoma-based technology for making rabbit monoclonal antibodies. For details on our patents, please refer to <a href="#">RabMAb<sup>®</sup> patents</a>.</p>

#### Properties

<b>Form</b>	Liquid
<b>Storage instructions</b>	Shipped at 4°C. Store at +4°C short term (1-2 weeks). Upon delivery aliquot. Store at -20°C long term. Avoid freeze / thaw cycle.
<b>Storage buffer</b>	pH: 7.20 Preservative: 0.01% Sodium azide Constituents: 59% PBS, 40% Glycerol (glycerin, glycerine), 0.5% BSA
<b>Purity</b>	Protein A purified
<b>Clonality</b>	Monoclonal
<b>Clone number</b>	EPR7133

Isotype

IgG

## Applications

### The Abpromise guarantee

Our **Abpromise guarantee** covers the use of ab124822 in the following tested applications.

The application notes include recommended starting dilutions; optimal dilutions/concentrations should be determined by the end user.

Application	Abreviews	Notes
IHC-P		1/50. Perform heat mediated antigen retrieval with citrate buffer pH 6 before commencing with IHC staining protocol. See <b><u>IHC antigen retrieval protocols</u></b> .
WB	★★★★★ (3)	1/1000 - 1/10000. Detects a band of approximately 26 kDa (predicted molecular weight: 30 kDa).
IP		1/10 - 1/100.

### Application notes

Is unsuitable for Flow Cyt.

## Target

### Function

Clp cleaves peptides in various proteins in a process that requires ATP hydrolysis. Clp may be responsible for a fairly general and central housekeeping function rather than for the degradation of specific substrates.

### Tissue specificity

Predominantly expressed in skeletal muscle. Intermediate levels in heart, liver and pancreas. Low in brain, placenta, lung and kidney.

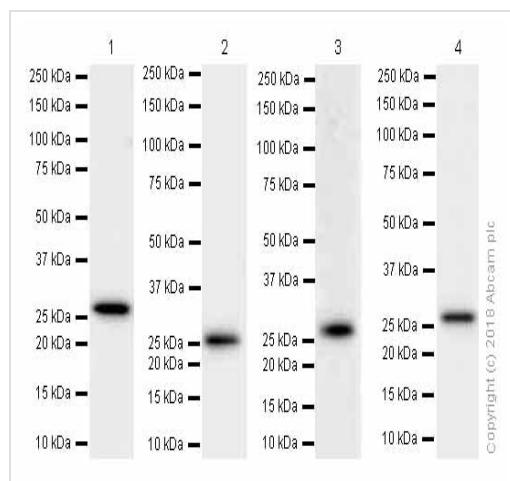
### Sequence similarities

Belongs to the peptidase S14 family.

### Cellular localization

Mitochondrion matrix.

## Images



Western blot - Anti-CLPP antibody [EPR7133]  
(ab124822)

**All lanes :** Anti-CLPP antibody [EPR7133] (ab124822) at 0.05 µg/ml (purified)

**Lane 1 :** 293T (Human embryonic kidney epithelial cell) whole cell lysates

**Lane 2 :** A549 (Human lung carcinoma epithelial cell) whole cell lysate

**Lane 3 :** Mouse brain lysates

**Lane 4 :** Rat brain lysates

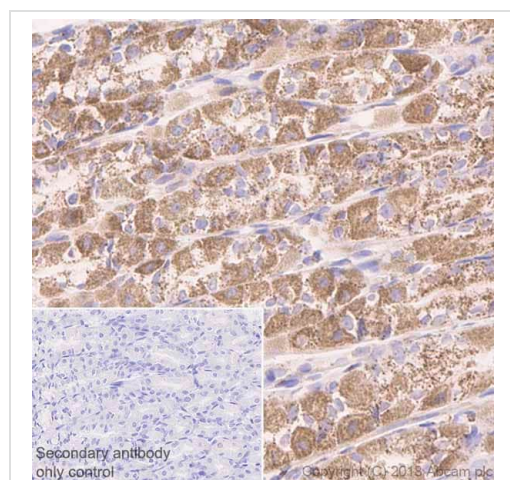
Lysates/proteins at 15 µg per lane.

### Secondary

**All lanes :** Goat Anti-Rabbit IgG H&L (HRP) (**ab97051**) at 1/20000 dilution

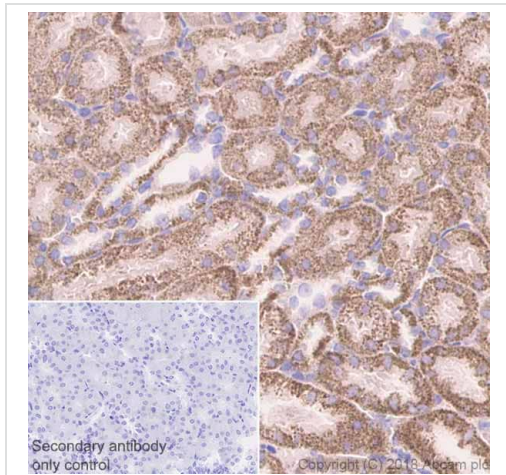
**Predicted band size:** 30 kDa

Blocking and diluting buffer: 5% NFDM/TBST



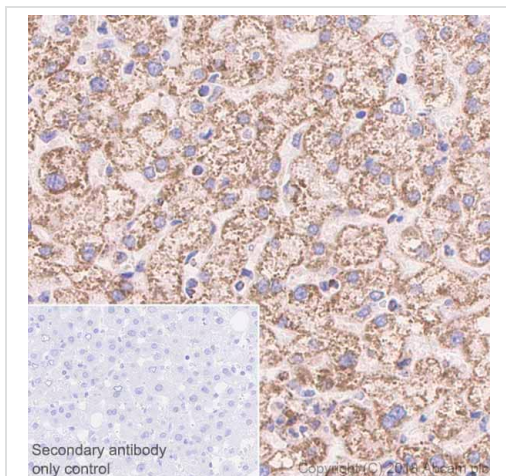
Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) - Anti-CLPP antibody [EPR7133] (ab124822)

Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) analysis of Rat stomach tissue sections labeling CLPP with Purified ab124822 at 1:50 dilution (2 µg/ml). Heat mediated antigen retrieval was performed using **ab93684** (Tris/EDTA buffer, pH 9.0). ImmunoHistoProbe one step HRP Polymer (ready to use) was used as the secondary antibody. Negative control: PBS instead of the primary antibody. Hematoxylin was used as a counterstain.



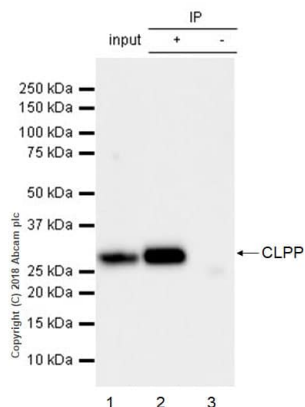
Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) - Anti-CLPP antibody [EPR7133] (ab124822)

Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) analysis of Mouse kidney tissue sections labeling CLPP with Purified ab124822 at 1:50 dilution (2 µg/ml). Heat mediated antigen retrieval was performed using [ab93684](#) (Tris/EDTA buffer, pH 9.0). ImmunoHistoProbe one step HRP Polymer (ready to use) was used as the secondary antibody. Negative control: PBS instead of the primary antibody. Hematoxylin was used as a counterstain.



Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) - Anti-CLPP antibody [EPR7133] (ab124822)

Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) analysis of Human liver tissue sections labeling CLPP with Purified ab124822 at 1:50 dilution (2 µg/ml). Heat mediated antigen retrieval was performed using [ab93684](#) (Tris/EDTA buffer, pH 9.0). ImmunoHistoProbe one step HRP Polymer (ready to use) was used as the secondary antibody. Negative control: PBS instead of the primary antibody. Hematoxylin was used as a counterstain.



Immunoprecipitation - Anti-CLPP antibody  
[EPR7133] (ab124822)

ab124822 (purified) at 1:20 dilution (2µg) immunoprecipitating CLPP in K562 whole cell lysate.

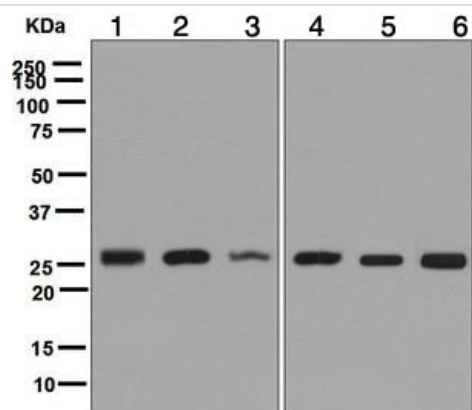
Lane 1 (input): K562 (Human chronic myelogenous leukemia lymphoblast) whole cell lysate 10µg

Lane 2 (+): ab124822 & K562 whole cell lysate

Lane 3 (-): Rabbit monoclonal IgG (**ab172730**) instead of ab124822 in K562 whole cell lysate

For western blotting, VeriBlot for IP Detection Reagent (HRP) (**ab131366**) was used for detection at 1:5000 dilution.

Blocking and diluting buffer: 5% NFDM/TBST.



Western blot - Anti-CLPP antibody [EPR7133]  
(ab124822)

**All lanes** : Anti-CLPP antibody [EPR7133] (ab124822) at 1/1000 dilution (unpurified)

**Lane 1** : Fetal muscle lysate

**Lane 2** : Saos-2 (Human osteosarcoma cell line) cell lysate

**Lane 3** : A431 (Human epidermoid carcinoma cell line) cell lysate

**Lane 4** : HEK-293T (human epithelial cell line from embryonic kidney transformed with large T antigen) cell lysate

**Lane 5** : K562 cell lysate

**Lane 6** : A549 (Human lung carcinoma cell line) cell lysate

Lysates/proteins at 10 µg per lane.

## Secondary

**All lanes** : HRP labelled goat anti-rabbit at 1/2000 dilution

**Predicted band size:** 30 kDa

**Observed band size:** 26 kDa

### Why choose a recombinant antibody?



**Research with confidence**  
Consistent and reproducible results



**Long-term and scalable supply**  
Recombinant technology



**Success from the first experiment**  
Confirmed specificity



**Ethical standards compliant**  
Animal-free production

Anti-CLPP antibody [EPR7133] (ab124822)

**Please note:** All products are "FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC PROCEDURES"

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