

# Anti-Tropomyosin 1 (alpha) antibody [EPR5158] ab109505

リコンビナント **RabMAb**

## 2 References [画像数 7](#)

### 製品の概要

製品名	Anti-Tropomyosin 1 (alpha) antibody [EPR5158]
製品の詳細	Rabbit monoclonal [EPR5158] to Tropomyosin 1 (alpha)
由来種	Rabbit
アプリケーション	<b>適用あり:</b> WB, IHC-P
種交差性	<b>交差種:</b> Mouse, Rat, Human
免疫原	Synthetic peptide. This information is proprietary to Abcam and/or its suppliers.
ポジティブ・コントロール	WB: Human heart, Mouse heart, and Rat heart tissue lysates, and Recombinant Human TMP1 protein. IHC-P: Human cardiac muscle, Rat cardiac muscle, Mouse cardiac muscle, and Human prostatic hyperplasia tissues.
特記事項	<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>

### 製品の特性

製品の状態	Liquid
保存方法	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.
バッファー	<p>pH: 7.20</p> <p>Preservative: 0.01% Sodium azide</p> <p>Constituents: 0.05% BSA, 40% Glycerol (glycerin, glycerine), 59% PBS</p>
精製度	Protein A purified
ポリ/モノ	モノクローナル
クローン名	EPR5158

## アプリケーション

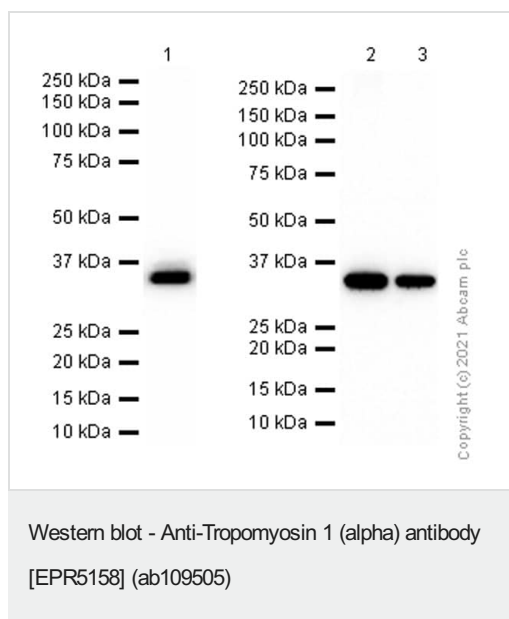
**The Abpromise guarantee** Abpromise保証は、 次のテスト済みアプリケーションにおけるab109505の使用に適用されます  
アプリケーションノートには、推奨の開始希釈率がありますが、適切な希釈率につきましてはご確認ください。

アプリケーション	Abreviews	特記事項
WB		1/1000 - 1/10000. Predicted molecular weight: 33 kDa.
IHC-P		1/500 - 1/1000. Perform heat mediated antigen retrieval via the pressure cooker method before commencing with IHC staining protocol. Heat up to 98 degrees C, below boiling, and then let cool for 10-20 min.

## ターゲット情報

機能	Binds to actin filaments in muscle and non-muscle cells. Plays a central role, in association with the troponin complex, in the calcium dependent regulation of vertebrate striated muscle contraction. Smooth muscle contraction is regulated by interaction with caldesmon. In non-muscle cells is implicated in stabilizing cytoskeleton actin filaments.
組織特異性	Detected in primary breast cancer tissues but undetectable in normal breast tissues in Sudanese patients. Isoform 1 is expressed in adult and fetal skeletal muscle and cardiac tissues, with higher expression levels in the cardiac tissues. Isoform 10 is expressed in adult and fetal cardiac tissues, but not in skeletal muscle.
関連疾患	Defects in TPM1 are the cause of cardiomyopathy familial hypertrophic type 3 (CMH3) [MIM:115196]. Familial hypertrophic cardiomyopathy is a hereditary heart disorder characterized by ventricular hypertrophy, which is usually asymmetric and often involves the interventricular septum. The symptoms include dyspnea, syncope, collapse, palpitations, and chest pain. They can be readily provoked by exercise. The disorder has inter- and intrafamilial variability ranging from benign to malignant forms with high risk of cardiac failure and sudden cardiac death. Defects in TPM1 are the cause of cardiomyopathy dilated type 1Y (CMD1Y) [MIM:611878]. Dilated cardiomyopathy is a disorder characterized by ventricular dilation and impaired systolic function, resulting in congestive heart failure and arrhythmia. Patients are at risk of premature death.
配列類似性	Belongs to the tropomyosin family.
ドメイン	The molecule is in a coiled coil structure that is formed by 2 polypeptide chains. The sequence exhibits a prominent seven-residues periodicity.
細胞内局在	Cytoplasm > cytoskeleton.

## 画像



**All lanes :** Anti-Tropomyosin 1 (alpha) antibody [EPR5158] (ab109505) at 1/1000 dilution (Purified)

**Lane 1 :** Human heart lysate at 15 µg

**Lane 2 :** Mouse heart lysate at 20 µg

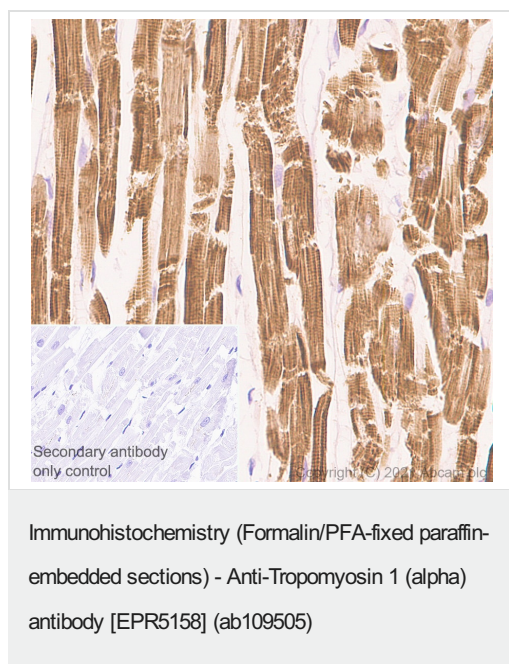
**Lane 3 :** Rat heart lysate at 20 µg

### Secondary

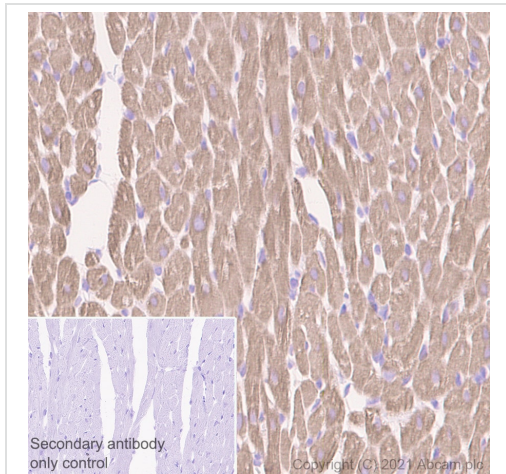
**All lanes :** Goat Anti-Rabbit IgG (HRP) with minimal cross-reactivity with human IgG at 1/2000 dilution

**Predicted band size:** 33 kDa

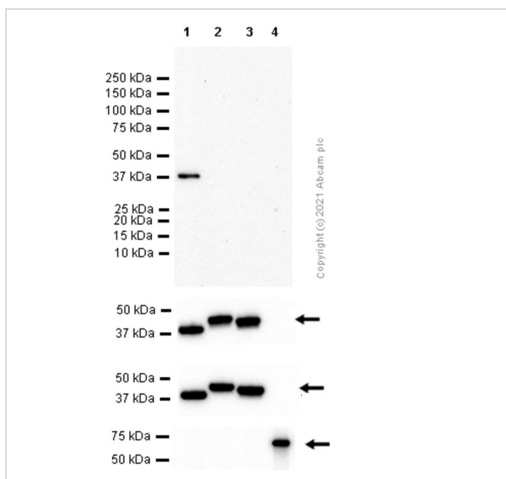
**Observed band size:** 33 kDa



Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) analysis of human cardiac muscle tissue sections labeling Tropomyosin 1 (alpha) with purified ab109505 at 1:600 (0.343 µg/ml). Heat mediated antigen retrieval was performed using **ab93684** (Tris/EDTA buffer, pH 9.0). Tissue was counterstained with Hematoxylin. ImmunoHistoProbe one step HRP Polymer (ready to use) was used at 1:0 dilution. PBS instead of the primary antibody was used as the negative control.



Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) - Anti-Tropomyosin 1 (alpha) antibody [EPR5158] (ab109505)



Western blot - Anti-Tropomyosin 1 (alpha) antibody [EPR5158] (ab109505)

Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) analysis of rat cardiac muscle tissue sections labeling Tropomyosin 1 (alpha) with purified ab109505 at 1:600 (0.343 µg/ml). Heat mediated antigen retrieval was performed using **ab93684** (Tris/EDTA buffer, pH 9.0). Tissue was counterstained with Hematoxylin. ImmunoHistoProbe one step HRP Polymer (ready to use) was used at 1:0 dilution. PBS instead of the primary antibody was used as the negative control.

**All lanes :** Anti-Tropomyosin 1 (alpha) antibody [EPR5158] (ab109505) at 1/1000 dilution

**Lane 1 :** MYC and DDK-tagged Recombinant Human TPM1 protein (Full length)

**Lane 2 :** MYC and DDK-tagged Recombinant Human TPM2 protein (Full length)

**Lane 3 :** MYC and DDK-tagged Recombinant Human TPM3 protein (Full length)

**Lane 4 :** GST-tagged Recombinant Human TPM4 protein (Full length)

### Secondary

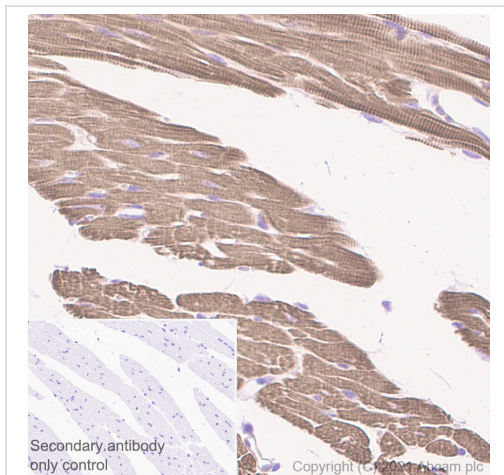
**All lanes :** Goat Anti-Rabbit IgG H&L (HRP) (**ab97051**) at 1/20000 dilution

**Predicted band size:** 33 kDa

**Observed band size:** 37 kDa

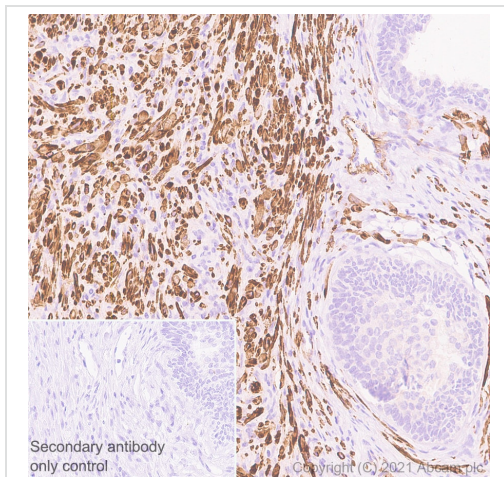
**Exposure time:** 60 seconds

Blocking and Diluting buffer and concentration: 5% NFDM/TBST



Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) - Anti-Tropomyosin 1 (alpha) antibody [EPR5158] (ab109505)

Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) analysis of mouse cardiac muscle tissue sections labeling Tropomyosin 1 (alpha) with purified ab109505 at 1:600 (0.343 µg/ml). Heat mediated antigen retrieval was performed using **ab93684** (Tris/EDTA buffer, pH 9.0). Tissue was counterstained with Hematoxylin. ImmunoHistoProbe one step HRP Polymer (ready to use) was used at 1:0 dilution. PBS instead of the primary antibody was used as the negative control.



Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) - Anti-Tropomyosin 1 (alpha) antibody [EPR5158] (ab109505)

Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) analysis of human prostatic hyperplasia tissue sections labeling Tropomyosin 1 (alpha) with purified ab109505 at 1:600 (0.343 µg/ml). Heat mediated antigen retrieval was performed using **ab93684** (Tris/EDTA buffer, pH 9.0). Tissue was counterstained with Hematoxylin. ImmunoHistoProbe one step HRP Polymer (ready to use) was used at 1:0 dilution. PBS instead of the primary antibody was used as the negative control.

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Anti-Tropomyosin 1 (alpha) antibody [EPR5158]  
(ab109505)

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