

## PHB2 Antibody (Y248)

Affinity Purified Rabbit Polyclonal Antibody (Pab) Catalog # AP7270e

## **Specification**

## PHB2 Antibody (Y248) - Product Information

Application WB, IHC-P-Leica,E

Primary Accession <u>Q99623</u>

Other Accession <u>Q5XIH7</u>, <u>Q35129</u>, <u>Q2HI97</u>, <u>NP 009204</u>

Reactivity Human, Mouse, Rat

Predicted Bovine
Host Rabbit
Clonality Polyclonal
Isotype Rabbit IgG
Antigen Region 225-255

## PHB2 Antibody (Y248) - Additional Information

#### **Gene ID** 11331

### **Other Names**

Prohibitin-2, B-cell receptor-associated protein BAP37, D-prohibitin, Repressor of estrogen receptor activity, PHB2 {ECO:0000312|EMBL:AAH147661, ECO:0000312|HGNC:HGNC:30306}

## Target/Specificity

This PHB2 antibody is generated from rabbits immunized with a KLH conjugated synthetic peptide between 225-255 amino acids from human PHB2.

## **Dilution**

WB~~1:1000

IHC-P-Leica~~1:250

E~~Use at an assay dependent concentration.

## **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**

PHB2 Antibody (Y248) is for research use only and not for use in diagnostic or therapeutic procedures.

## PHB2 Antibody (Y248) - Protein Information

Name PHB2 {ECO:0000312|EMBL:AAH14766.1, ECO:0000312|HGNC:HGNC:30306}



**Function** Protein with pleiotropic attributes mediated in a cell- compartment- and tissue-specific manner, which include the plasma membrane-associated cell signaling functions, mitochondrial chaperone, and transcriptional co-regulator of transcription factors and sex steroid hormones in the nucleus.

### **Cellular Location**

Mitochondrion inner membrane. Cytoplasm. Nucleus. Cell membrane Note=Localizes within both nucleus and cytoplasm in proliferative primary myoblasts and mostly within the nucleus of differentiated primary myoblasts. [Isoform 2]: Mitochondrion inner membrane

### **Tissue Location**

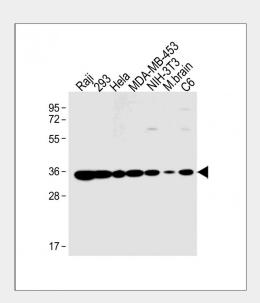
Expressed in myoblasts.

## PHB2 Antibody (Y248) - Protocols

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

- Western Blot
- Blocking Peptides
- Dot Blot
- <u>Immunohistochemistry</u>
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- Cell Culture

## PHB2 Antibody (Y248) - Images

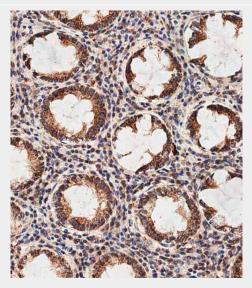


All lanes: Anti-PHB2 Antibody (Y248) at 1:1000 dilution Lane 1: Raji whole cell lysate Lane 2: 293 whole cell lysate Lane 3: Hela whole cell lysate Lane 4: MDA-MB-453 whole cell lysate Lane 5: NIH/3T3 whole cell lysate Lane 6: mouse brain lysate Lane 7: C6 whole cell lysate Lysates/proteins at 20 µg per lane. Secondary Goat Anti-Rabbit IgG, (H+L), Peroxidase conjugated at 1/10000 dilution. Predicted band size: 33 kDa Blocking/Dilution buffer: 5% NFDM/TBST.



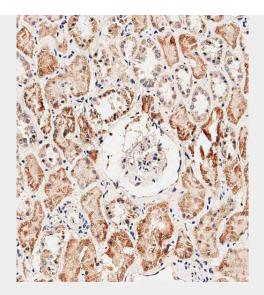


Immunohistochemical analysis of paraffin-embedded human brain tissue using AP7270E performed on the Leica® BOND RXm. Tissue was fixed with formaldehyde at room temperature, antigen retrieval was by heat mediation with a EDTA buffer (pH9. 0). Samples were incubated with primary antibody(1:500) for 1 hours at room temperature. A undiluted biotinylated CRF Anti-Polyvalent HRP Polymer antibody was used as the secondary antibody.



Immunohistochemical analysis of AP7270E on paraffin-embedded human colon tissue was performed on the Leica® BOND RXm. Tissue was fixed with formaldehyde at room temperature. Heat induced epitope retrieval was performed by EDTA buffer (pH9. 0). Samples were incubated with primary antibody(1:250) for 15min at room temperature. Leica Bond Polymer Refine Detection was used as the secondary antibody.





Immunohistochemical analysis of AP7270E on paraffin-embedded human kidney tissue was performed on the Leica® BOND RXm. Tissue was fixed with formaldehyde at room temperature. Heat induced epitope retrieval was performed by EDTA buffer (pH9. 0). Samples were incubated with primary antibody(1:250) for 15min at room temperature. Leica Bond Polymer Refine Detection was used as the secondary antibody.

# PHB2 Antibody (Y248) - Background

PHB2 acts as a mediator of transcriptional repression by nuclear hormone receptors via recruitment of histone deacetylases. It functions as an estrogen receptor (ER)-selective coregulator that potentiates the inhibitory activities of antiestrogens and represses the activity of estrogens. It competes with NCOA1 for modulation of ER transcriptional activity and is probably involved in regulating mitochondrial respiration activity and in aging.

## PHB2 Antibody (Y248) - References

Takata, H., Curr. Biol. 17 (15), 1356-1361 (2007) Kasashima, K., J. Biol. Chem. 281 (47), 36401-36410 (2006)