## For Research Use Only

## Prohibitin 2 Polyclonal antibody

Catalog Number: 12295-1-AP

**Featured Product** 

**42 Publications** 

BC014766

11331

Q99623

GeneID (NCBI):

**UNIPROT ID:** 

Full Name:

prohibitin 2 Calculated MW:

299 aa, 33 kDa

GenBank Accession Number:



**Basic Information** 

Catalog Number: 12295-1-AP

Size: 800  $\mu$  g/ml Source: Rabbit Isotype:

Immunogen Catalog Number:

AG2977

Observed MW: 33 kDa

**Purification Method:** 

Antigen affinity purification

Recommended Dilutions: WB 1:2000-1:16000

IP 0.5-4.0 ug for 1.0-3.0 mg of total

protein lysate IHC 1:50-1:500 IF 1:50-1:500

**Applications** 

**Tested Applications:** 

FC, IF/ICC, IHC, IP, WB, ELISA

**Cited Applications:** 

WB, IP, IF, IHC, CoIP, Electrochemical Immunosensor

Species Specificity: human, mouse **Cited Species:** 

human, rat, mouse, rice

Note-IHC: suggested antigen retrieval with TE buffer pH 9.0; (\*) Alternatively, antigen retrieval may be performed with citrate buffer pH 6.0

Positive Controls:

WB: HeLa cells,

IP: HeLa cells, mouse brain tissue

IHC: human heart tissue, human pancreas tissue

IF: HepG2 cells,

**Background Information** 

PHB2, also named as BAP, REA, D-prohibitin, BAP37 and Prohibitin-2, belongs to the prohibitin family. It acts as a mediator of transcriptional repression by nuclear hormone receptors via recruitment of histone deacetylases. PHB2 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. PHB2 is probably involved in regulating mitochondrial respiration activity and in aging. (PMID: 10359819)

## **Notable Publications**

Author	Pubmed ID	Journal	Application
Y Poitelon	26383514	Nat Commun	IF
Ryan Houston	34495738	Mol Biol Cell	WB
Kelly A Chamberlain	34506725	Neuron	WB

Storage

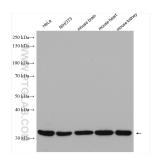
Storage:

Store at -20°C. Stable for one year after shipment.

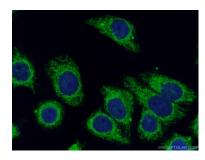
PBS with 0.02% sodium azide and 50% glycerol pH 7.3.

Aliquoting is unnecessary for -20°C storage

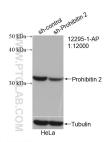
## Selected Validation Data



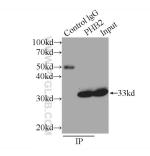
Various lysates were subjected to SDS PAGE followed by western blot with 12295-1-AP (Prohibitin 2 antibody) at dilution of 1:8000 incubated at room temperature for 1.5 hours.



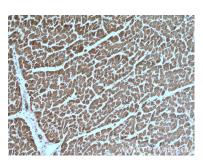
Immunofluorescent analysis of (4% PFA) fixed HepG2 cells using 12295-1-AP (Prohibitin 2 antibody) at dilution of 1:50 and Alexa Fluor 488-conjugated AffiniPure Goat Anti-Rabbit IgG(H+L).



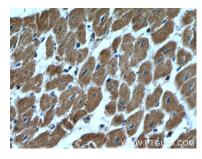
WB result of Prohibitin 2 antibody (12295-1-AP; 1:12000; incubated at room temperature for 1.5 hours) with sh-Control and sh-Prohibitin 2 transfected HeLa cells.



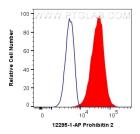
IP result of anti-Prohibitin 2 (IP:12295-1-AP, 3ug; Detection:12295-1-AP 1:1000) with HeLa cells lysate 1840ug.



Immunohistochemical analysis of paraffinembedded human heart tissue slide using 12295-1-AP (Prohibitin 2 antibody at dilution of 1:200 (under 10x lens).



Immunohistochemical analysis of paraffinembedded human heart tissue slide using 12295-1-AP (Prohibitin 2 antibody at dilution of 1:200 (under 40x lens).



1X10^6 HeLa cells were intracellularly stained with 0.4 ug Anti-Human Prohibitin 2 (12295-1-AP) and CoraLite® 488-Conjugated Affini Pure Goat Anti-Rabbit 1gG(H+L) at dilution 1:1000 (red), or 0.4 ug Isotype Control. Cells were fixed with 4% PFA and permeabilized with Flow Cytometry Perm Buffer (PF00011-C).