

For Research Use Only

# SMARCA4/BRG1 Polyclonal antibody

Catalog Number: 21634-1-AP

Featured Product

41 Publications



## Basic Information

### Catalog Number:

21634-1-AP

### Size:

150ul, Concentration: 550 ug/ml by Nanodrop;

### Source:

Rabbit

### Isotype:

IgG

### Immunogen Catalog Number:

AG16256

### GenBank Accession Number:

BC150298

### GeneID (NCBI):

6597

### UNIPROT ID:

P51532

### Full Name:

SWI/SNF related, matrix associated, actin dependent regulator of chromatin, subfamily a, member 4

### Calculated MW:

1647 aa, 185 kDa

### Observed MW:

185 kDa

### Purification Method:

Antigen affinity purification

### Recommended Dilutions:

WB 1:500-1:3000

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

IHC 1:200-1:800

IF/ICC 1:300-1:1200

## Applications

### Tested Applications:

WB, IHC, IF/ICC, IP, ELISA

### Cited Applications:

WB, IHC, IF, IP, CoIP, ChIP, RIP

### Species Specificity:

human, mouse, rat

### Cited Species:

human, mouse, rat, zebrafish, bovine

**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, HepG2 cells, human placenta tissue, mouse brain tissue, rat brain tissue, MCF-7 cells, PC-3 cells

**IP:** HeLa cells,

**IHC:** human colon cancer tissue, human lung cancer tissue, mouse kidney tissue, human breast cancer tissue, human gliomas tissue

**IF/ICC:** HepG2 cells, HeLa cells, HEK-293 cells

## Background Information

SMARCA4, also named as BAF190A, BRG1, SNF2B and SNF2L4, belongs to the SNF2/RAD54 helicase family. SMARCA4 is a transcriptional coactivator cooperating with nuclear hormone receptors to potentiate transcriptional activation. It is a component of the CREST-BRG1 complex, a multiprotein complex that regulates promoter activation by orchestrating a calcium-dependent release of a repressor complex and a recruitment of an activator complex. It is also involved in vitamin D-coupled transcription regulation via its association with the WINAC complex, a chromatin-remodeling complex recruited by vitamin D receptor (VDR), which is required for the ligand-bound VDR-mediated transrepression of the CYP27B1 gene.

## Notable Publications

Author	Pubmed ID	Journal	Application
Shibin Hu	34534457	Mol Cell	ChIP
Mingyan Huang	30546959	Oncoimmunology	WB, ChIP
Xiaodong Yan	33071648	Cancer Cell Int	IF, IHC

## Storage

### Storage:

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

### Storage Buffer:

PBS with 0.02% sodium azide and 50% glycerol, pH7.3

Aliquoting is unnecessary for -20°C storage

\*\*\* 20ul sizes contain 0.1% BSA

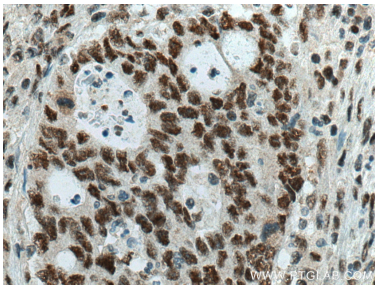
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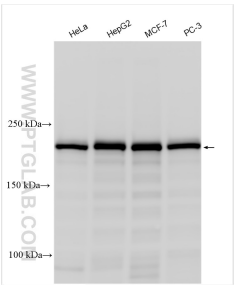
E: [proteintech@ptglab.com](mailto:proteintech@ptglab.com)  
W: [ptglab.com](http://ptglab.com)

**This product is exclusively available under Proteintech Group brand and is not available to purchase from any other manufacturer.**

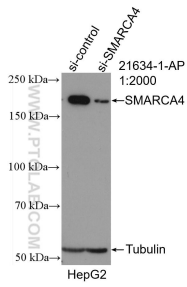
Selected Validation Data



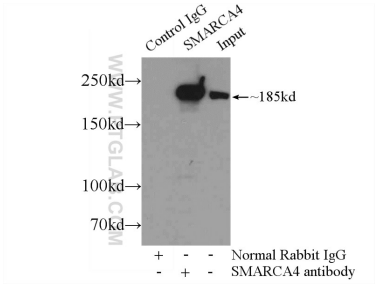
Immunohistochemical analysis of paraffin-embedded human colon cancer tissue slide using 21634-1-AP (SMARCA4/BRG1 antibody) at dilution of 1:400 (under 40x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



Various lysates were subjected to SDS PAGE followed by western blot with 21634-1-AP (SMARCA4/BRG1 antibody) at dilution of 1:1500 incubated at room temperature for 1.5 hours.



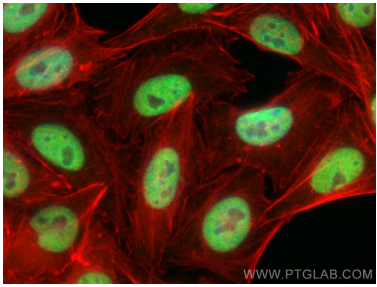
WB result of SMARCA4/BRG1 antibody (21634-1-AP; 1:2000; incubated at room temperature for 1.5 hours) with sh-Control and sh-SMARCA4/BRG1 transfected HepG2 cells.



IP result of anti-SMARCA4/BRG1 (IP:21634-1-AP, 5ug; Detection:21634-1-AP 1:1000) with HeLa cells lysate 2500ug.



Various lysates were subjected to SDS PAGE followed by western blot with 21634-1-AP (SMARCA4/BRG1 antibody) at dilution of 1:5000 incubated at room temperature for 1.5 hours.



Immunofluorescent analysis of (4% PFA) fixed HepG2 cells using SMARCA4/BRG1 antibody (21634-1-AP) at dilution of 1:600 and Multi-rAb Coralite ® Plus 488-Goat Anti-Rabbit Recombinant Secondary Antibody (H+L) (RGAR002), CL594-phalloidin (red).