

For Research Use Only

# SAFB Polyclonal antibody

Catalog Number: 21857-1-AP **4 Publications**



## Basic Information

<b>Catalog Number:</b> 21857-1-AP	<b>GenBank Accession Number:</b> BC126219	<b>Purification Method:</b> Antigen affinity purification
<b>Size:</b> 150ul , Concentration: 450 ug/ml by Nanodrop;	<b>GeneID (NCBI):</b> 6294	<b>Recommended Dilutions:</b> WB 1:5000-1:50000 IHC 1:50-1:500 IF/ICC 1:200-1:800
<b>Source:</b> Rabbit	<b>UNIPROT ID:</b> Q15424	
<b>Isotype:</b> IgG	<b>Full Name:</b> scaffold attachment factor B	
<b>Immunogen Catalog Number:</b> AG16451	<b>Calculated MW:</b> 917 aa, 103 kDa	
	<b>Observed MW:</b> 150 kDa	

## Applications

<b>Tested Applications:</b> WB, IHC, IF/ICC, ELISA	<b>Positive Controls:</b> WB : HepG2 cells, HEK-293 cells, HeLa cells, MCF-7 cells, A431 cells, HCT 116 cells, COLO 320 cells IHC : mouse testis tissue, human testis tissue, human breast cancer tissue IF/ICC : A431 cells,
<b>Cited Applications:</b> IF	
<b>Species Specificity:</b> human, mouse	
<b>Cited Species:</b> human, mouse	

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

## Background Information

Heterogeneous nuclear ribonucleoproteins (hnRNPs) constitute a set of polypeptides that contribute to pre-mRNA processing and transport. hnRNPs also bind heterogeneous nuclear RNA (hnRNA), the transcripts produced by RNA polymerase II. SAFB (scaffold attachment factor B) is a nuclear matrix-associated protein that binds to matrix- or scaffold-associating regions (MARs or SARs) on DNA and interacts with RNA polymerase II and serine-/arginine-rich RNA processing factors (SR proteins). SAFB, also designated HAP (hnRNP A1 associated protein) and HET (HSP 27-ERE-TATA-binding protein) is a proven hnRNP protein that has a speckled distribution in the nucleus and, in response to stress agents such as heat shock, is recruited to a few, large nuclear granules, called perichromatin granules. SAFB also binds to the estrogen receptor (ER) and is expressed in several breast cancer cell lines at varying levels. Subsequently, SAFB may play a role in breast cancer by mediating cellular proliferation and division. This antibody specifically reacts with the isoform 1 of human SAFB protein. SF3A1, also known as SF3a120, is a 793 amino acid protein, which is a subunit of the splicing factor SF3A required for 'A' complex assembly formed by the stable binding of U2 snRNP to the branchpoint sequence (BPS) in pre-mRNA. SF3A1 also be involved in the assembly of the 'E' complex. The calculated molecular weight of SAFB is 103 kDa, but the modified SAFB is about 130-175 kDa. (PMID: 28469965, PMID: 26273616)

## Notable Publications

Author	Pubmed ID	Journal	Application
Mahlon Collins	32586379	Acta Neuropathol Commun	IF
Haiyan An	34915152	Neurobiol Dis	IF
Wan-Ping Huang	38941189	Cell Rep	IF

## Storage

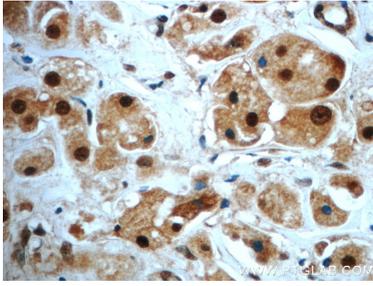
**Storage:**  
Store at -20°C. Stable for one year after shipment.  
**Storage Buffer:**  
PBS with 0.02% sodium azide and 50% glycerol pH 7.3.  
**Aliquoting is unnecessary for -20°C storage**

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

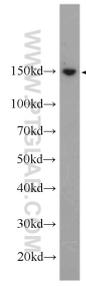
For technical support and original validation data for this product please contact:  
T: 1 (888) 4PTGLAB (1-888-478-4522) (toll free in USA), or 1(312) 455-8498 (outside USA) E: proteintech@ptglab.com W: ptglab.com

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

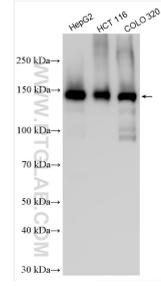
## Selected Validation Data



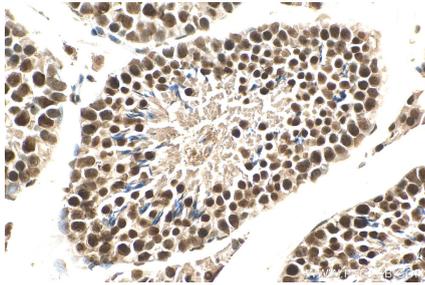
Immunohistochemical analysis of paraffin-embedded human breast cancer slide using 21857-1-AP (SAFB Antibody) at dilution of 1:50.



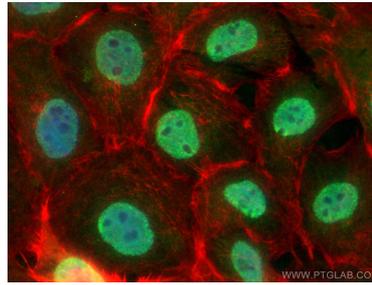
MCF-7 cells were subjected to SDS PAGE followed by western blot with 21857-1-AP (SAFB Antibody) at dilution of 1:1000 incubated at room temperature for 1.5 hours.



Various lysates were subjected to SDS PAGE followed by western blot with 21857-1-AP (SAFB antibody) at dilution of 1:15000 incubated at room temperature for 1.5 hours.



Immunohistochemical analysis of paraffin-embedded mouse testis tissue slide using 21857-1-AP (SAFB antibody) at dilution of 1:200 (under 40x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



Immunofluorescent analysis of (4% PFA) fixed A431 cells using SAFB antibody (21857-1-AP) at dilution of 1:400 and Coralite@488-Conjugated AffiniPure Goat Anti-Rabbit IgG(H+L) (SA00013-2), CL594-phalloidin (red).