## For Research Use Only

## PLS1 Polyclonal antibody

Catalog Number: 13143-1-AP



**Basic Information** 

Catalog Number: GenBank Accession Number: 13143-1-AP BC031083 GeneID (NCBI): Size: 1000 ug/ml UNIPROT ID: Source:

Rabbit Q14651 Full Name: Isotype: plastin 1 (I isoform)

Calculated MW: Immunogen Catalog Number: AG3532 629 aa, 70 kDa Observed MW:

70 kDa

**Applications** 

**Tested Applications:** WB, IHC, IF/ICC, ELISA Species Specificity: 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

**Positive Controls:** 

WB: A549 cells, mouse colon tissue, mouse kidney

**Purification Method:** 

WB 1:500-1:2000 IHC 1:200-1:800

IF/ICC 1:50-1:500

Antigen affinity purification

Recommended Dilutions:

IHC: human kidney tissue, Human Colon cancer tissue

IF/ICC: A549 cells,

## **Background Information**

PLS1 also known as Fimbrin, Plastin 1, is an actin-binding protein in the absence of calcium. In the inner ear, PLS1 is required for stereocilia formation. PLS1 Mediates liquid packing of actin filaments that is necessary for stereocilia to grow to their proper dimensions. PLS1 is specifically expressed at high levels in the small intestine, colon, and kidney; relatively expressed at lower levels in the lung and stomach (PMID: 8139549). PLS1 is required for normal hearing in humans and mice. Mutations in PLS1, encoding fimbrin, cause autosomal dominant nonsyndromic hearing loss(NSHL)(PMID: 31397523).

Storage

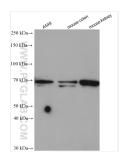
Store at -20°C. Stable for one year after shipment.

Storage Buffer:

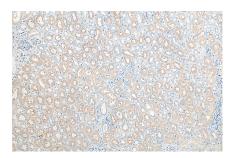
PBS with 0.02% sodium azide and 50% glycerol pH 7.3.

Aliquoting is unnecessary for -20°C storage

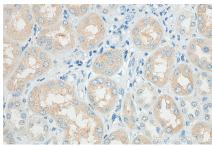
## **Selected Validation Data**



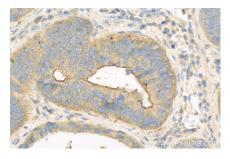
Various lysates were subjected to SDS PAGE followed by western blot with 13143-1-AP (PLS1 antibody) at dilution of 1:1000 incubated at room temperature for 1.5 hours.



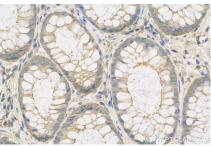
Immunohistochemical analysis of paraffinembedded human kidney tissue slide using 13143-1-AP (PLS1 antibody) at dilution of 1:400 (under 10x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



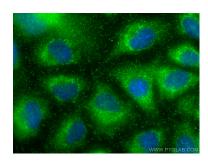
Immunohistochemical analysis of paraffinembedded human kidney tissue slide using 13143-1-AP (PLS1 antibody) at dilution of 1:400 (under 40x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



Immunohistochemical analysis of paraffinembedded Human Colon cancer tissue slide using 13143-1-AP (PLS1 antibody) at dilution of 1:200 (under 40x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



Immunohistochemical analysis of paraffinembedded Human Colon cancer tissue slide using 13143-1-AP (PLS1 antibody) at dilution of 1:200 (under 40x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



Immunofluorescent analysis of (-20°C Methanol) fixed A549 cells using PL51 antibody (13143-1-AP) at dilution of 1:200 and CoraLite® 488-Conjugated AffiniPure Goat Anti-Rabbit IgG(H+L).