

For Research Use Only

# Collagen Type III Monoclonal antibody

Catalog Number: 68320-1-Ig

10 Publications



## Basic Information

Catalog Number:

68320-1-Ig

Size:

150ul, Concentration: 1000 ug/ml by Nanodrop;

Source:

Mouse

Isotype:

IgG1

Immunogen Catalog Number:

AG4229

GenBank Accession Number:

BC028178

GeneID (NCBI):

1281

UNIPROT ID:

P02461

Full Name:

collagen, type III, alpha 1

Calculated MW:

1466 aa, 139 kDa

Observed MW:

130 kDa

Purification Method:

Protein G purification

CloneNo.:

3B1F3

Recommended Dilutions:

WB 1:5000-1:50000

IHC 1:1000-1:4000

## Applications

Tested Applications:

WB, IHC, ELISA

Cited Applications:

WB, IHC, IF

Species Specificity:

human, mouse, rat, pig, rabbit

Cited Species:

human, mouse, rat

**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**: pig colon tissue, human placenta tissue, human rectum tissue, rabbit large intestine tissue, rat colon tissue

**IHC**: human ovary tumor tissue, human hepatocirrhosis tissue, human placenta tissue, mouse skin tissue

## Background Information

Type III collagen is a fibrillar-forming collagen comprising three  $\alpha 1(\text{III})$  chains and is expressed in early embryos and throughout embryogenesis (PMID: 9050868). In the adult, type III collagen is a major component of the extracellular matrix in a variety of internal organs and skin. It occurs in most soft connective tissues along with type I collagen (PMID: 2445760). COL3A1 gene encodes type III procollagen. Mutations in this gene are associated with Ehlers-Danlos syndrome type IV, and with aortic and arterial aneurysms (PMID: 10706896; 2243125; 18389341).

## Notable Publications

Author	Pubmed ID	Journal	Application
Yunxian Dong	39407227	J Nanobiotechnology	IHC
Xuelian Yang	39129313	Int J Mol Med	WB
Qianqian Xu	39068752	Int Immunopharmacol	IHC

## Storage

Storage:

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

Storage Buffer:

PBS with 0.02% sodium azide and 50% glycerol

Aliquoting is unnecessary for -20°C storage

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

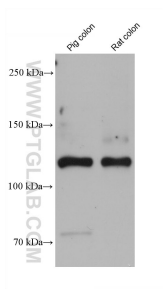
For technical support and original validation data for this product please contact:

T: 1 (888) 4PTGLAB (1-888-478-4522) (toll free in USA), or 1(312) 455-8498 (outside USA)

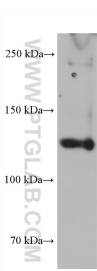
E: [proteintech@ptglab.com](mailto:proteintech@ptglab.com)  
W: [ptglab.com](http://ptglab.com)

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

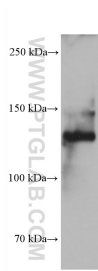
Selected Validation Data



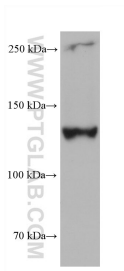
Various lysates were subjected to SDS PAGE followed by western blot with 68320-1-Ig (COL3A1 antibody) at dilution of 1:10000 incubated at room temperature for 1.5 hours.



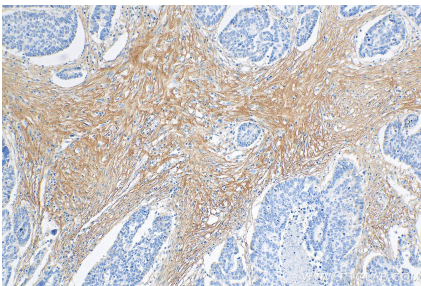
human placenta tissue were subjected to SDS PAGE followed by western blot with 68320-1-Ig (COL3A1 antibody) at dilution of 1:10000 incubated at room temperature for 1.5 hours.



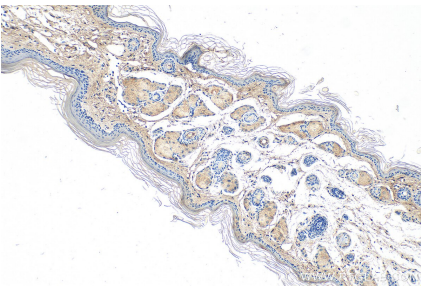
human rectum tissue were subjected to SDS PAGE followed by western blot with 68320-1-Ig (COL3A1 antibody) at dilution of 1:10000 incubated at room temperature for 1.5 hours.



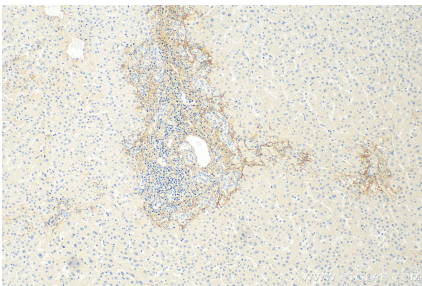
rabbit large intestine tissue were subjected to SDS PAGE followed by western blot with 68320-1-Ig (COL3A1 antibody) at dilution of 1:10000 incubated at room temperature for 1.5 hours.



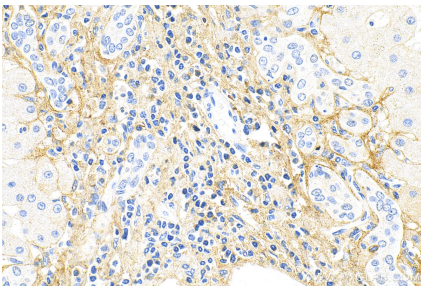
Immunohistochemical analysis of paraffin-embedded human ovary tumor tissue slide using 68320-1-Ig (COL3A1 antibody) at dilution of 1:2000 (under 10x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



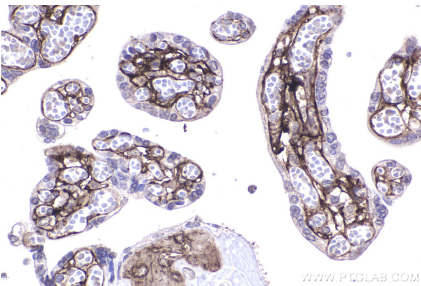
Immunohistochemical analysis of paraffin-embedded mouse skin tissue slide using 68320-1-Ig (COL3A1 antibody) at dilution of 1:1000 (under 10x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



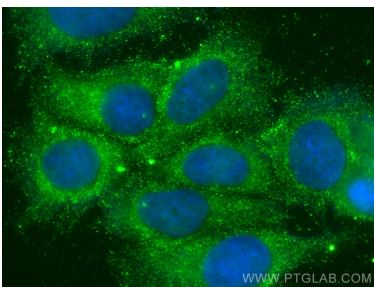
Immunohistochemical analysis of paraffin-embedded human hepatocirrhosis tissue slide using 68320-1-Ig (COL3A1 antibody) at dilution of 1:1000 (under 10x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



Immunohistochemical analysis of paraffin-embedded human hepatocirrhosis tissue slide using 68320-1-Ig (COL3A1 antibody) at dilution of 1:1000 (under 40x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



Immunohistochemical analysis of paraffin-embedded human placenta tissue slide using 68320-1-Ig (COL3A1 antibody) at dilution of 1:2000 (under 40x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



Immunofluorescent analysis of (-20°C Methanol)  
fixed MCF-7 cells using COL3A1 antibody (68320-  
1-Ig, Clone: 3B1F3 ) at dilution of 1:400 and  
CoraLite®488-Conjugated AffiniPure Goat Anti-  
Mouse IgG(H+L) (SA00013-1).