

For Research Use Only

CD45 Polyclonal antibody

Catalog Number: 20103-1-AP **21 Publications**



Basic Information

Catalog Number:

20103-1-AP

Size:

150UL, Concentration: 400 µg/ml by Bradford method using BSA as the standard;

Source:

Rabbit

Isotype:

IgG

Immunogen Catalog Number:

AG13712

GenBank Accession Number:

BC014239

GeneID (NCBI):

5788

Full Name:

protein tyrosine phosphatase, receptor type, C

Calculated MW:

1304 aa, 147 kDa

Observed MW:

180-220 kDa

Purification Method:

Antigen affinity purification

Recommended Dilutions:

WB 1:500-1:2000

IP 0.5-4.0 µg for IP and 1:200-1:1000 for WB

IHC 1:500-1:2000

Applications

Tested Applications:

FC, IHC, IP, WB, ELISA

Cited Applications:

IF, IHC, WB

Species Specificity:

human, mouse, rat

Cited Species:

Bovine, dog, 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: mouse thymus tissue, rat thymus tissue, mouse spleen tissue

IP: mouse spleen tissue,

IHC: human colon tissue, human tonsil tissue, human lymphoma tissue, human tonsillitis tissue, human liver cancer tissue

Background Information

CD45, also known as leukocyte common antigen (LCA), B220, and T200, is a 180-240 kD single chain type I membrane glycoprotein. It is a tyrosine phosphatase expressed on the plasma membrane of all hematopoietic cells, except erythrocytes and platelets. CD45 is a signaling molecule that regulates a variety of cellular processes including cell growth, differentiation, cell cycle, and oncogenic transformation. CD45 is one of the best negative selection markers for characterizing and/or isolating human mesenchymal stem cells from bone marrow and other sources. Along with the positive selection markers (such as CD29, CD44, CD90, CD105 and CD166), negative selection markers (such as CD34 and CD45) are used for MSC identification.

Notable Publications

Author	Pubmed ID	Journal	Application
Bingling Dai	27460008	Oncol Rep	
Takao Inoue	31610200	Life Sci	IF
Felix Hempel	31591328	Cells	IHC

Storage

Storage:

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

Storage Buffer:

PBS with 0.1% sodium azide and 50% glycerol pH 7.3.

Aliquoting is unnecessary for -20°C storage

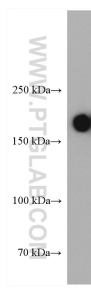
For technical support and original validation data for this product please contact:

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

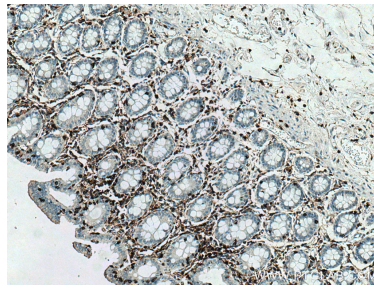
E: proteintech@ptglab.com
W: ptglab.com

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

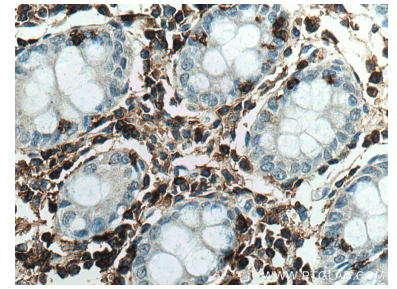
Selected Validation Data



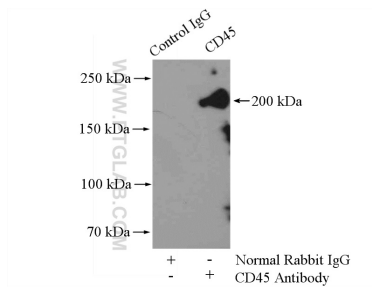
mouse thymus tissue were subjected to SDS PAGE followed by western blot with 20103-1-AP (CD45 antibody) at dilution of 1:1000 incubated at room temperature for 1.5 hours.



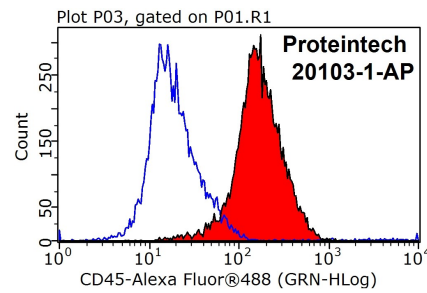
Immunohistochemical analysis of paraffin-embedded human colon tissue slide using 20103-1-AP (CD45 antibody) at dilution of 1:1000 (under 10x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



Immunohistochemical analysis of paraffin-embedded human colon tissue slide using 20103-1-AP (CD45 antibody) at dilution of 1:1000 (under 40x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



IP Result of anti-CD45 (IP:20103-1-AP, 4ug; Detection:20103-1-AP 1:300) with mouse spleen tissue lysate 4800ug.



1X10⁶ Jurkat cells were stained with 0.5ug CD45 antibody (20103-1-AP, red) and control antibody (blue). Fixed with 90% MeOH blocked with 3% BSA (30 min). Alexa Fluor 488-conjugated AffiniPure Goat Anti-Rabbit IgG(H+L) with dilution 1:1000.