

For Research Use Only

VWF Recombinant antibody

Catalog Number: 83854-2-RR



Basic Information

Catalog Number:

83854-2-RR

Size:

100ul , Concentration: 1000 ug/ml by Nanodrop;

Source:

Rabbit

Isotype:

IgG

Immunogen Catalog Number:

AG25578

GenBank Accession Number:

GeneID (NCBI):

7450

UNIPROT ID:

P04275

Full Name:

von Willebrand factor

Observed MW:

309-320 kDa

Purification Method:

Protein A purification

CloneNo.:

240867D10

Recommended Dilutions:

WB 1:1000-1:4000

IHC 1:500-1:2000

IF-P 1:500-1:2000

Applications

Tested Applications:

WB, IHC, IF-P, ELISA

Species Specificity:

human, 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 : human placenta tissue, rat spleen tissue

IHC : human tonsillitis tissue, human ovary cancer tissue, human placenta tissue

IF-P : human tonsillitis tissue,

Background Information

Von Willebrand factor (VWF) is a large multimeric glycoprotein found in blood plasma involved in hemostasis following vascular injury. Due to the multimeric nature of VWF, it can range in size from 500 to 20,000 kDa due to the differences in the number of subunits comprising the protein. Each subunit is approximately 250 kDa (PMID: 9759493). The biosynthesis of VWF in vivo is limited to endothelial cells (PMID: 4209883) and megakaryocytes (PMID: 2413071). VWF synthesized in endothelial cells is either released directly into the plasma via 27186a secretory pathway, or tubulized and stored in organelles unique to this cell type called Weibel-Palade bodies (PMID: 16459301). Whereas VWF synthesized in megakaryocytes is stored in the alpha granules of platelets (PMID: 2046403). The primary function of VWF is as an adhesive plasma glycoprotein, particularly factor VIII; an essential blood-clotting protein (PMID: 6982084). VWF is also important in platelet adhesion to wound sites by binding specifically to type I and type III collagen (PMID: 11098050), with larger VWF multimers being most effective (PMID: 24448155).

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

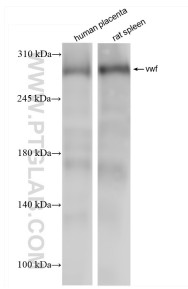
For technical support and original validation data for this product please contact:

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

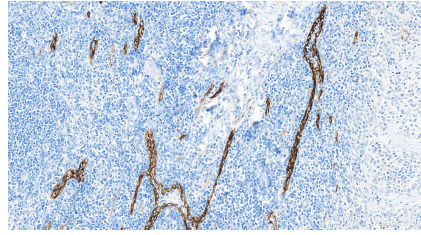
E: proteintech@ptglab.com
W: ptglab.com

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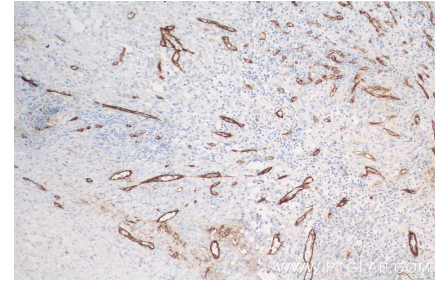
Selected Validation Data



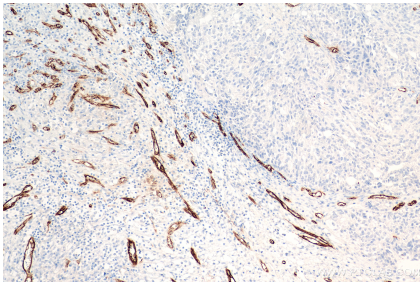
Various lysates were subjected to SDS PAGE followed by western blot with 83854-2-RR (vwf antibody) at dilution of 1:2000 incubated at room temperature for 1.5 hours.



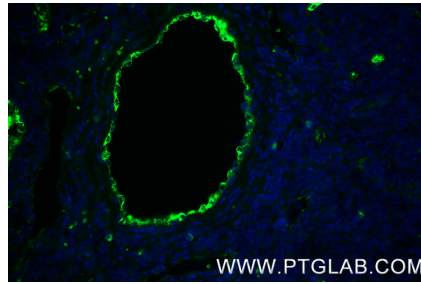
Immunohistochemical analysis of paraffin-embedded human tonsillitis tissue slide using 83854-2-RR (VWF antibody) at dilution of 1:400 (under 40x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



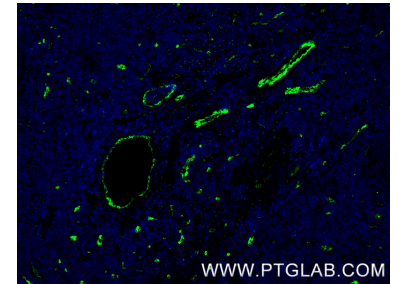
Immunohistochemical analysis of paraffin-embedded human ovary cancer tissue slide using 83854-2-RR (VWF antibody) at dilution of 1:400 (under 10x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



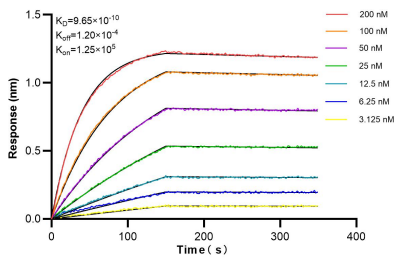
Immunohistochemical analysis of paraffin-embedded human ovary cancer tissue slide using 83854-2-RR (VWF antibody) at dilution of 1:1000 (under 10x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



Immunofluorescent analysis of (4% PFA) fixed paraffin-embedded human tonsillitis tissue using VWF antibody (83854-2-RR, Clone: 240867D10) at dilution of 1:1000 and CoraLite®488-Conjugated Goat Anti-Rabbit IgG(H+L) (SA00013-2). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



Immunofluorescent analysis of (4% PFA) fixed paraffin-embedded human tonsillitis tissue using VWF antibody (83854-2-RR, Clone: 240867D10) at dilution of 1:1000 and CoraLite®488-Conjugated Goat Anti-Rabbit IgG(H+L) (SA00013-2). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



Biolayer interferometry (BLI) kinetic assays of 83854-2-RR against Human VWF were performed. The affinity constant is 0.965 nM.