

MMP14 Rabbit mAb

Catalog No: #48761

Package Size: #48761-1 50ul #48761-2 100ul

Orders: order@signalwayantibody.comSupport: tech@signalwayantibody.com

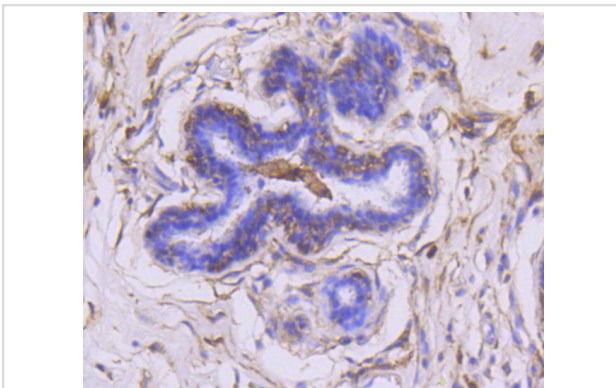
Description

Product Name	MMP14 Rabbit mAb
Host Species	Recombinant Rabbit
Clonality	Monoclonal antibody
Clone No.	3-F7
Purification	Affinity-chromatography
Applications	WB, ICC/IF, IHC, IP, FC
Species Reactivity	Human;Mouse;Rat
Immunogen Description	A synthesized peptide derived from human MMP14
Conjugates	Unconjugated
Other Names	Matrix metalloproteinase 14 (membrane inserted) antibody Matrix metalloproteinase 14 antibody Matrix metalloproteinase-14 antibody Membrane type 1 matrix metalloproteinase antibody Membrane type 1 metalloproteinase antibody Membrane type matrix metalloproteinase 1 antibody Membrane-type matrix metalloproteinase 1 antibody Membrane-type-1 matrix metalloproteinase antibody MMP 14 antibody MMP X1 antibody MMP-14 antibody MMP-X1 antibody Mmp14 antibody MMP14_HUMAN antibody MMPX1 antibody MT MMP 1 antibody MT-MMP 1 antibody MT1 MMP antibody MT1-MMP antibody MT1MMP antibody MTMMP 1 antibody MTMMP1 antibody
Accession No.	Swiss-Prot#:P50281
Calculated MW	66 kDa
SDS-PAGE MW	56 kDa
Formulation	Rabbit IgG in 10mM phosphate buffered saline , pH 7.4, 150mM sodium chloride, 0.05% BSA, 0.02% sodium azide and 50% glycerol.
Storage	Store at -20°C

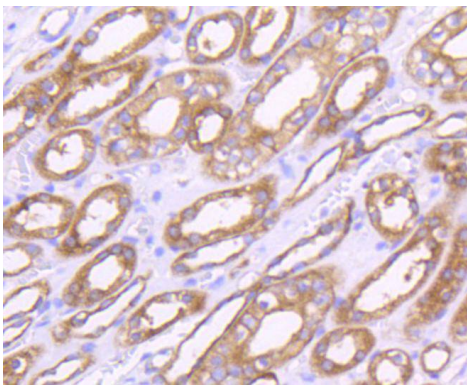
Application Details

WB 1:1000-1:2000; IHC 1:100-1:200; ICC/IF 1:50-1:200; IP 1:20-1:50; FC 1:20-1:100

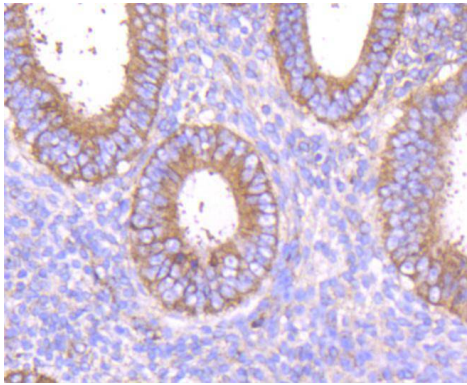
Images



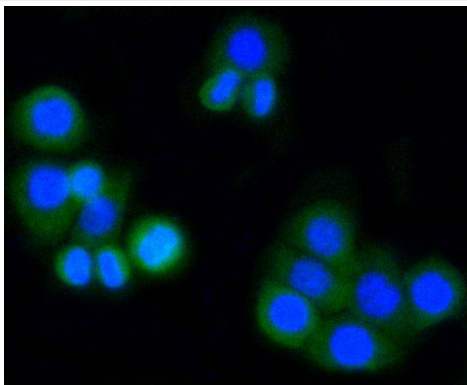
Immunohistochemical analysis of paraffin-embedded human breast carcinoma tissue using anti-MMP14 antibody. Counter stained with hematoxylin.



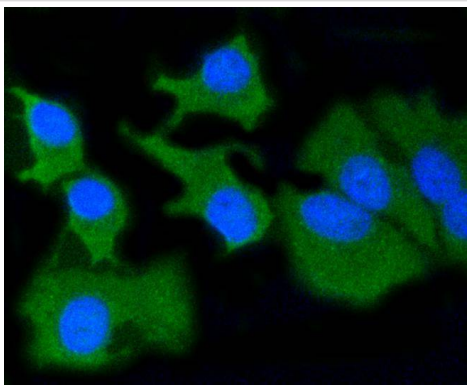
Immunohistochemical analysis of paraffin-embedded human kidney tissue using anti-MMP14 antibody. Counter stained with hematoxylin.



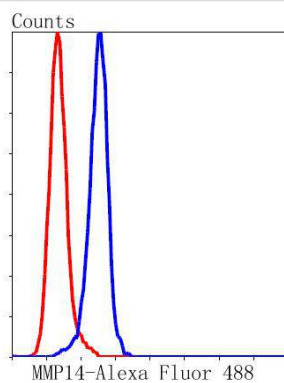
Immunohistochemical analysis of paraffin-embedded human uterus tissue using anti-MMP14 antibody. Counter stained with hematoxylin.



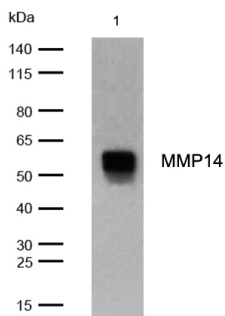
ICC staining MMP14 in CRC cells (green). The nuclear counter stain is DAPI (blue). Cells were fixed in paraformaldehyde, permeabilised with 0.25% Triton X100/PBS.



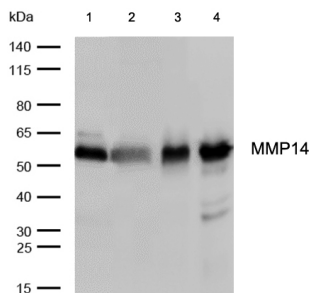
ICC staining MMP14 in BT-20 cells (green). The nuclear counter stain is DAPI (blue). Cells were fixed in paraformaldehyde, permeabilised with 0.25% Triton X100/PBS.



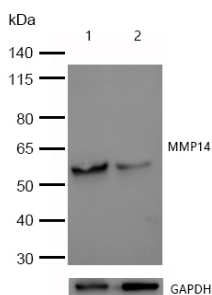
Flow cytometric analysis of A549 cells with MMP14 antibody at 1/50 dilution (blue) compared with an unlabelled control (cells without incubation with primary antibody; red). Alexa Fluor 488-conjugated goat anti rabbit IgG was used as the secondary antibody.



All lanes: MMP14 Rabbit mAb at 1/1k dilution
 Lane 1 : Human spleen lysate
 Lysates/proteins at 20 µg per lane.
 Secondary All lanes : Goat Anti-Rabbit IgG H&L (HRP) at 1/20000 dilution
 Predicted band size: 66 kDa
 Observed band size: 56 kDa
 Exposure time: 4 seconds



All lanes: MMP14 Rabbit mAb at 1/1k dilution
 Lane 1 : Mouse heart lysates
 Lane 2 : Mouse skin lysates
 Lane 3 : Rat heart lysates
 Lane 4 : Rat skin lysates
 Lysates/proteins at 20 µg per lane.
 Secondary All lanes : Goat Anti-Rabbit IgG H&L (HRP) at 1/20000 dilution
 Predicted band size: 66 kDa
 Observed band size: 56 kDa
 Exposure time: 5 seconds



All lanes: MMP14 Rabbit mAb at 1/1k dilution
 Lane 1 : Wild-type HeLa cell lysate
 Lane 2 : MMP14 knockdown HeLa cell lysate
 Lysates/proteins at 20 µg per lane.

Background

The matrix metalloproteinases (MMP) are a family of peptidase enzymes responsible for the degradation of extracellular matrix components, including collagen, gelatin, fibronectin, laminin and proteoglycan. Transcription of MMP genes is differentially activated by phorbol ester, lipopolysaccharide (LPS) or staphylococcal enterotoxin B (SEB). MMP catalysis requires both calcium and zinc. Membrane-type matrix metalloproteinases, including MT-MMP-1 (also designated MMP-14), MT-MMP-2 (also designated MMP-15), MT-MMP-3 (also designated MMP-16) and MT-MMP-4 (also designated MMP-17) are type I membrane proteins that function to activate other MMPs. MT-MMP activation appears to be mediated by members of the proprotein convertase family, suggesting that a proprotein convertase/MT-MMP/MMP cascade may be involved in the regulation of ECM turnover.

References

1. Welch-Reardon KM et al. Angiogenic sprouting is regulated by endothelial cell expression of Slug. *J Cell Sci* 127:2017-28 (2014).
2. Gu Z et al. Soft matrix is a natural stimulator for cellular invasiveness. *Mol Biol Cell* 25:457-69 (2014).

Note: This product is for in vitro research use only and is not intended for use in humans or animals.