MMP12 Rabbit mAb

Catalog No: #48662

Package Size: #48662-1 50ul #48662-2 100ul

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

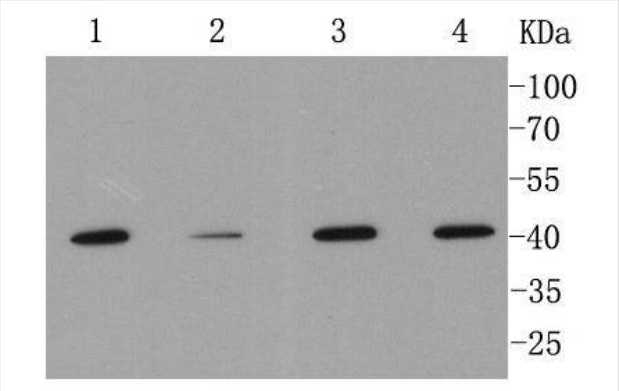
Description

Product Name	MMP12 Rabbit mAb
Host Species	Recombinant Rabbit
Clonality	Monoclonal antibody
Clone No.	SR03-23
Purification	ProA affinity purified
Applications	WB, ICC/IF, IHC, IP, FC
Species Reactivity	Human;Mouse;Rat
Immunogen Description	recombinant protein
Conjugates	Unconjugated
Other Names	EC 3.4.24.65 antibody HME antibody Macrophage elastase antibody Macrophage metalloelastase antibody Macrophage metaloelastase antibody Matrix metallopeptidase 12 (macrophage elastase) antibody Matrix metalloprotease 12 antibody Matrix metalloproteinase-12 antibody ME antibody MGC138506 antibody MME antibody MMP 12 antibody MMP-12 antibody Mmp12 antibody MMP12_HUMAN antibody
Accession No.	Swiss-Prot#:P39900
Calculated MW	54/45/22 kDa
Formulation	1*TBS (pH7.4), 1%BSA, 40%Glycerol. Preservative: 0.05% Sodium Azide.
Storage	Store at -20°C

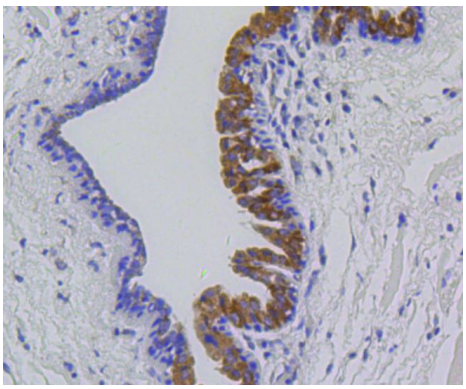
Application Details

WB: 1:1,000-1:2,000 IHC: 1:50-1:200 ICC: 1:50-1:200FC: 1:50-1:100

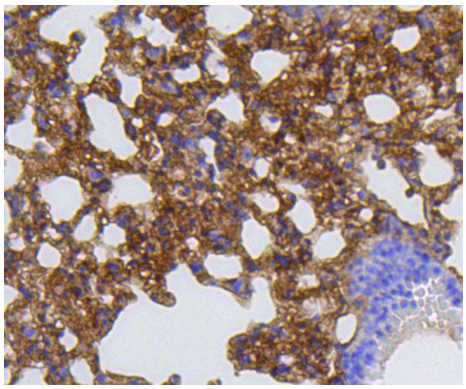
Images



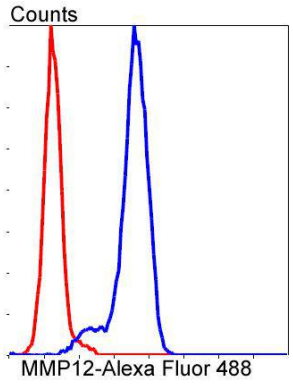
Western blot analysis of MMP12 on different cell lysates using anti-MMP12 antibody at 1/1,000 dilution. Positive control:
Lane 1: A549
Lane 2: Hela
Lane 3: MCF-7
Lane 4: THP-1



Immunohistochemical analysis of paraffin-embedded human breast carcinomna tissue using anti-MMP12 antibody. Counter stained with hematoxylin.



Immunohistochemical analysis of paraffin-embedded mouse lung tissue using anti-MMP12 antibody. Counter stained with hematoxylin.



Flow cytometric analysis of A549 cells with MMP12 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.

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. MMP-12 (also designated macrophage metalloelastase) is produced in alveolar macrophages and degrades elastin. MMP-12 may contribute to elastin degradation occurring in granulomatous skin diseases and may also participate in macrophage migration through the epidermal and vascular basement membranes in inflammatory disorders.

References

1. John-Schuster G et al. Cigarette smoke-induced iBALT mediates macrophage activation in a B cell-dependent manner in COPD. Am J Physiol Lung Cell Mol Physiol 307:L692-706 (2014).
2. Stawski L et al. MMP-12 deficiency attenuates angiotensin II-induced vascular injury, M2 macrophage accumulation, and skin and heart fibrosis. PLoS One 9:e109763 (2014).

Published Papers

el at., A pyroptosis-related gene signature that predicts immune infiltration and prognosis in colon cancerInFront OncolOn2023 Jul 12byMingjian Wu?1,?Shuai Hao et al..PMID:?37503314, , (2023)

PMID:37503314

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