Product name:	MMP-19 Rabbit Polyclonal Antibody
Cat number:	ABN13985
Conjugate:	Unconjugated
Size:	100µL
Clone:	Polyclonal
Concentration:	1mg/ml
Host:	Rabbit
Isotype:	IgG
Immunogen:	The antiserum was produced against synthesized peptide derived from human MMP-19. AA range:11-60
Reactivity:	Human,Mouse
Applications:	WB 1:500-1:2000,IHC 1:100-1:300,ICC/IF 1:50-1:200,ELISA 1:5000-1:20000
Molecular Weight:	57kDa
Purification:	Affinity purification
Form:	Liquid
Buffer:	Liquid in PBS containing 50% glycerol, 0.5% BSA and 0.02% New type preservative N.
Storage:	Store at 4°C short term. Aliquot and store at -20°C for 12 months. Avoid freeze/thaw cycles.

Background:

This gene encodes a member of a family of proteins that are involved in the breakdown of extracellular matrix in normal physiological processes, such as embryonic development, reproduction, and tissue remodeling, as well as in disease processes, such as arthritis and metastasis. The encoded protein is secreted as an inactive proprotein, which is activated upon cleavage by extracellular proteases. Alternative splicing results in multiple transcript variants for this gene. [provided by RefSeq, Jan 2013],alternative products:Additional isoforms seem to exist,catalytic activity:Cleaves aggrecan at the 360-Ser-|-Phe-361 site.,cofactor:Binds 1 zinc ion per subunit.,cofactor:Calcium.,disease:May play a role in pathological processes participating in rheumatoid arthritis (RA)-associated joint tissue destruction. Autoantigen anti-MMP19 are frequent in RA patients.,domain:The conserved cysteine present in the cysteine-switch motif binds the catalytic zinc ion, thus inhibiting the enzyme. The dissociation of the cysteine from the zinc ion upon the activation-peptide release activates the enzyme.,enzyme regulation:Strongly inhibited by TIMP-2, TIMP-3 and TIMP-4, while TIMP-1 is less efficient.,function:Endopeptidase that degrades various components of the extracellular matrix, such as aggrecan and cartilage oligomeric matrix protein (comp), during development, haemostasis and pathological conditions (arthritic disease). May also play a role in neovascularization or angiogenesis. Hydrolyzes collagen type IV, laminin, nidogen, nascin-C isoform, fibronectin, and type I gelatin.,PTM:Activated by autolytic cleavage after Lys-97.,similarity:Belongs to the peptidase M10A family.,similarity:Contains 4 hemopexin-like domains.,tissue specificity:Expressed in mammary gland, placenta, lung, pancreas, ovary, small intestine, spleen, thymus, prostate, testis colon, heart and blood vessel walls. Not detected in brain and peripheral blood leukocytes. Also expressed in the synovial fluid of normal and rheumatoid patients.,