

Recombinant Human MMP2, His-tagged

Cat. No. MMP2-5051H **Lot. No.** (See product label)

SPECIFICATION

Product Overview	Recombinant human MMP2 protein, fused to His-tag at N-terminus, was expressed in E.coli and purified by using conventional chromatography techniques.
Species	Human
Source	E.coli
Description	MMP2 protein of the matrix metalloproteinase (MMP) family is 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. Most MMP"s are secreted as inactive proproteins which are activated when cleaved by extracellular proteinases. MMP2 is an enzyme which degrades type IV collagen, the major structural component of basement membranes. It plays a role in endometrial menstrual breakdown, regulation of vascularization and the inflammatory response.
Form	Liquid. In 20mM Tris-HCl buffer (pH 8.0) containing 0.15M NaCl, 10% glycerol
Molecular Mass	64.7 kDa (576aa)
AA Sequence	MGSSHHHHHH SSGLVPRGSH MGSEFYNNFFP RPKKWDKNQI TYRIIGYTPD LDPETVDDAF ARAFQVWSDV TPLRFSRIHD GEADIMINFG RWEHGDGYPF DGKDGLLAHA FAPGTGVGGD SHFDDDELWT LGEGQVVRVK YGNADGEYCK FPFLFNGKEY NSCTDTGRSD GFLWCSTTYN FEKDGKYGFC PHEALFTMGG NAEGQPCKFP FRFQGTSYDS CTTEGRTDGY RWC GTTEDYD RDKKYGFCPE

 Tel: 1-631-559-9269 1-516-512-3133

 Email: info@creative-biomart.com  Fax: 1-631-938-8127

 45-1 Ramsey Road, Shirley, NY 11967, USA

TAMSTVGGNS EGAPCVFPFT FLGNKYESCT SAGRSDGKMW CATTANYDDD
 RKWGFCDQG YSLFLVAAHE FGHAMGLEHS QDPGALMAPI YTYTKNFRLS
 QDDIKGIQEL YGASPDIDLG TGPTPTLGPV TPEICKQDIV FDGIAQIRGE
 IFFFFKDRFIW RTVTPRDKPM GPLLVATFWP ELPEKIDAVY EAPQEEKAVF
 FAGNEYWIYS ASTLERGYPK PLTSLGLPPD VQRVDAAFNW SKNKKTYIFA
 GDKFWRYNEV KKKMDPGFPGK LIADAWNAIP DNLDVAVDLQ GGGHSYFFKG
 AYYLKLENQS LKSVKFGSIK SDWLGC

Purity >95% by SDS - PAGE

Applications SDS-PAGE

Storage Can be stored at +4centigrade short term (1-2 weeks). For long term storage, aliquot and store at -20centigrade or -70centigrade. Avoid repeated freezing and thawing cycles.

Concentration 0.25 mg/ml (determined by Bradford assay)

GENE INFORMATION

Gene Name [MMP2 matrix metalloproteinase 2 \(gelatinase A, 72kDa gelatinase, 72kDa type IV collagenase\)](#) [[Homo sapiens](#)]

Official Symbol MMP2

Synonyms MMP2; matrix metalloproteinase 2 (gelatinase A, 72kDa gelatinase, 72kDa type IV collagenase); CLG4, CLG4A, matrix metalloproteinase 2 (gelatinase A, 72kDa gelatinase, 72kDa type IV collagenase) , matrix metalloproteinase 2 (gelatinase A, 72kDa gelatinase, 72kDa type IV collagenase); 72 kDa type IV collagenase; TBE 1; MMP-2; gelatinase A; 72 kDa gelatinase; collagenase type IV-A; neutrophil gelatinase; matrix metalloproteinase-2; matrix metalloproteinase-II; CLG4; MONA;

 Tel: 1-631-559-9269 1-516-512-3133

 Email: info@creative-biomart.com  Fax: 1-631-938-8127

 45-1 Ramsey Road, Shirley, NY 11967, USA

	CLG4A; TBE-1; MMP-II;
Gene ID	4313
mRNA Refseq	NM_001127891
Protein Refseq	NP_001121363
MIM	120360
UniProt ID	P08253
Chromosome Location	16q13-q21
Pathway	ATF-2 transcription factor network, organism-specific biosystem; Activation of Matrix Metalloproteinases, organism-specific biosystem; Angiopoietin receptor Tie2-mediated signaling, organism-specific biosystem; Bladder cancer, organism-specific biosystem; Bladder cancer, conserved biosystem; Degradation of the extracellular matrix, organism-specific biosystem; Diabetes pathways, organism-specific biosystem;
Function	metal ion binding; metalloendopeptidase activity; peptidase activity; zinc ion binding;