

Product datasheet for **MG209110**

Mmp14 (NM_008608) Mouse Tagged ORF Clone

Product data:

Product Type:	Expression Plasmids
Product Name:	Mmp14 (NM_008608) Mouse Tagged ORF Clone
Tag:	TurboGFP
Symbol:	Mmp14
Synonyms:	AI325305; MMP-X1; MT-MMP-1; MT1-MM; MT1-MMP; sa; sabe
Mammalian Cell Selection:	Neomycin
Vector:	pCMV6-AC-GFP (PS100010)
E. coli Selection:	Ampicillin (100 ug/mL)



[View online »](#)

ORF Nucleotide Sequence:

>MG209110 representing NM_008608
 Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGGCCGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC
 GCC**CGGATCGCC**

ATGTCTCCCGCCCCTCGACCCTCCCGCAGCCTCCTGCTCCCCCTGCTCAGCTTGGCAGCGCGCTCGCCT
 CCCTCGGCTGGGCCAAGGCAGCAACTTACGCCCGAAGCCTGGCTGCAGCAGTATGGCTACCTACCTCC
 AGGGGACCTGCGTACCCACACACACGCTCACCCAGTCACTCTCAGCTGCCATTGCCGCCATGCAAAAAG
 TTCTATGGTTTACAAGTGACAGGCAAGGCTGATTTGGCAACCATGATGGCCATGAGGCGCCCTCGTGTG
 GTGTTCCGGATAAGTTTGGGACTGAGATCAAGGCCAATGTTGGGAGGAAGCGCTATGCCATTCAGGGCCT
 CAAGTGGCAGCATAATGAGATCACTTTCTGCATTGAGAAATACACCCCTAAGGTGGGCGAGTATGCCACA
 TTCGAGGCCATTGGAAGGCCTTCGAGTATGGGAGAGTCCACGCCACTGCGCTCCGAGAAGTGCCTT
 ATGCCTACATCCGGGAGGACATGAGAAGCAGGCTGACATCATGATCTTGTGTTGCTGAGGGTTTCCACGG
 CGACAGTACACCCTTTGTGTTGAGGAGGTTCTGGCTCATGCCTACTCCCAGGCCCAATATTGGA
 GGGGATACCCACTTTGATTCTGTGAGCCCTGGACTGTCCAAAATGAGGATCTAAATGGGAATGACATCT
 TCTTGGTGGCTGTGCATGAGTTGGGCATGCCCTAGGCCTGGAACATTCCAATGATCCCTCCGCCATCAT
 GGCCCCTTTTACCAGTGGATGGACACAGAGAAGTTCGTGTTGCCTGATGACGATCGCCGTGGCATCCAG
 CACTTTATGGAAGCAAGTCAGGGTACCCACAAAAGATGCCCCCTCAACCCAGAAGTACCTCTCGGCCCT
 CTGTCCAGATAAGCCCCAAAACCCCGCTATGGGCCAACATCTGTGACGGGAACCTTGGACCCGTGGC
 CATGCTCCGAGGAGAGATGTTTGTCTTCAAGGAGCGATGGTTCTGGCGGGTGAGGAATAACCAAGTATG
 GATGGATTCCCAATGCCATTGGCCAATCTGGAGGGCCCTGCCTGCATCCATCAATACTGCCTACGAGA
 GGAAGGATGGCAAAATTTGCTTCTTCAAAGGAGATAAGCACTGGGTGTTTGGCAGCAAGCTCCCTGGAAC
 CGGGTACCCCAAGCACATTAAGGAGCTGGGCCGAGGGCTGCCACGGACAAGATCGATGCAGCTCTCTTC
 TGGATGCCAATGGGAAGACCTACTTCTCCGGGCAATAAGTACTACCGTTCAATGAAGAATTACGGG
 CAGTGGACAGCGAGTACCCTAAAAACATCAAAGTCTGGGAAGGAATCCCTGAATCTCCAGGGGGTCAAT
 CATGGGCAGTATGAAGTCTTACATACTTCTACAAGGAAACAAATACTGGAAGTTCAACAACCAGAAG
 CTGAAGGTAGAGCCAGGGTATCCCAAGTCAAGTCTGCGGGACTGGATGGGCTGCCCTTCCGGGGGCCGGC
 CCGATGAGGGGACTGAGGAGGAGACGGAGGTGATCATCATTGAGGTGGATGAGGAGGGCAGTGGAGCTGT
 GAGTGGCGCCCGTGGTCTGCCGTAAGTACTGCTGCTCCTGGTACTGGCAGTGGGCTCGCTGTCTTC
 TTCTTACAGACCCATGGGACGCCAAGCGACTGCTTTACTGCCAGCGTTCGCTGCTGGACAAGGTC

ACGCGTACGCGGCCGCTCGAG – GFP Tag – GTTTAA

Protein Sequence:

>MG209110 representing NM_008608
 Red=Cloning site Green=Tags(s)

MSPAPRPSRSLLLPLLLTLGTALASLGWAQGSNFSPEAWLQYGYLPPGDLRHTQRSPQSLSAIIAMQK
 FYGLQVTGKADLATMMAMRRPRCGVPDKFGTEIKANVRRKRYAIQGLKQWHEITFCIQNYTPKVGAYAT
 FEAIRKAFRVWESATPLRFREVPYAYIREGHEKQADIMILFAEGFHGDSTPFDGEGGFLAHAYFPGPNIG
 GDTHFDSVEPWTQNEIDLNGNDIFLVAVHELGHALGLEHSNDPSAIMAPFYQWMDTENFVLPDDDRRGIQ
 QLYGSKSGSPTKMPPQPRRTSRPSVPDKPKNPAYGNICDGNFDTVAMLRGEMFVKERWFWRVRRNQVM
 DGFPMPIGQFWRGLPASINTAYERKDGKVFVFKGDKHWVFDEASLEPGYPKHIKELGRGLPTDKIDAALF
 WMPNGKTYFFRGNKYRFNEEFRAVDSEYPKNIKVWEGIPESPRGSFMGSDEVFTYFYKGNKYWKFNQK
 LKVEPGYPKSALRDWMCPSGGRPDEGTEETEVIIEVDEEGSGAVSAAAVVLPVLLLLLVAVGLAVF
 FRRRHGTPKRLLYCQRSLLDKV

TRTRPLE – GFP Tag – V

Restriction Sites:

SgfI-MluI

Cloning Scheme:


ACCN: NM_008608

ORF Size: 1746 bp

OTI Disclaimer: The molecular sequence of this clone aligns with the gene accession number as a point of reference only. However, individual transcript sequences of the same gene can differ through naturally occurring variations (e.g. polymorphisms), each with its own valid existence. This clone is substantially in agreement with the reference, but a complete review of all prevailing variants is recommended prior to use. [More info](#)

OTI Annotation: This clone was engineered to express the complete ORF with an expression tag. Expression varies depending on the nature of the gene.

Components: The ORF clone is ion-exchange column purified and shipped in a 2D barcoded Matrix tube containing 10ug of transfection-ready, dried plasmid DNA (reconstitute with 100 ul of water).

Reconstitution Method:

1. Centrifuge at 5,000xg for 5min.
2. Carefully open the tube and add 100ul of sterile water to dissolve the DNA.
3. Close the tube and incubate for 10 minutes at room temperature.
4. Briefly vortex the tube and then do a quick spin (less than 5000xg) to concentrate the liquid at the bottom.
5. Store the suspended plasmid at -20°C. The DNA is stable for at least one year from date of shipping when stored at -20°C.

RefSeq: [NM_008608.2](#), [NP_032634.2](#)

RefSeq Size: 2597 bp

RefSeq ORF: 1749 bp

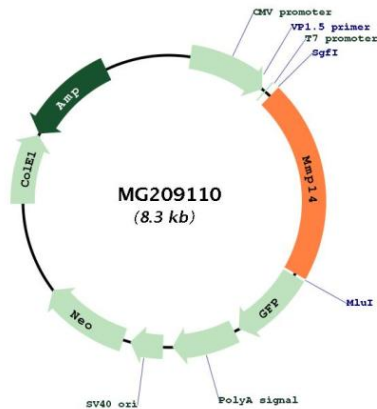
Locus ID: 17387

UniProt ID: [P53690](#)

Cytogenetics: 14 27.79 cM

Gene Summary:

This gene encodes a member of the matrix metalloproteinase family of extracellular matrix-degrading enzymes that are involved in tissue remodeling, wound repair, progression of atherosclerosis and tumor invasion. The encoded preproprotein undergoes proteolytic processing to generate a mature, zinc-dependent endopeptidase enzyme. Mice lacking the encoded protein exhibit craniofacial dysmorphism, arthritis, osteopenia, dwarfism, and fibrosis of soft tissues. [provided by RefSeq, Feb 2016]

Product images:


Circular map for MG209110