

#### **MMP2 Antibody**

Purified Rabbit Polyclonal Antibody (Pab) Catalog # AP51352

## **Specification**

# **MMP2 Antibody - Product Information**

Application
Primary Accession
Reactivity
Host
Clonality
Calculated MW

WB, ICC, IHC-P, E
P08253
Human, Mouse, Rat
Rabbit
Polyclonal
72 KDa

# **MMP2 Antibody - Additional Information**

**Gene ID 4313** 

#### **Other Names**

72 kDa type IV collagenase, 72 kDa gelatinase, Gelatinase A, Matrix metalloproteinase-2, MMP-2, TBE-1, PEX, MMP2, CLG4A

### **Dilution**

WB~~1:1000 ICC~~N/A IHC-P~~N/A E~~N/A

#### **Format**

0.01M PBS, pH 7.2, 0.09% (W/V) Sodium azide, Glycerol 50%

#### **Storage**

Store at -20 °C.Stable for 12 months from date of receipt

# **MMP2 Antibody - Protein Information**

Name MMP2

**Synonyms CLG4A** 

#### **Function**

Ubiquitinous metalloproteinase that is involved in diverse functions such as remodeling of the vasculature, angiogenesis, tissue repair, tumor invasion, inflammation, and atherosclerotic plaque rupture. As well as degrading extracellular matrix proteins, can also act on several nonmatrix proteins such as big endothelial 1 and beta- type CGRP promoting vasoconstriction. Also cleaves KISS at a Gly-|-Leu bond. Appears to have a role in myocardial cell death pathways. Contributes to myocardial oxidative stress by regulating the activity of GSK3beta. Cleaves GSK3beta in vitro. Involved in the formation of the fibrovascular tissues in association with MMP14. [Isoform 2]: Mediates the proteolysis of CHUK/IKKA and initiates a primary innate immune response by



inducing mitochondrial- nuclear stress signaling with activation of the pro-inflammatory NFkappaB, NFAT and IRF transcriptional pathways.

#### **Cellular Location**

[Isoform 1]: Secreted, extracellular space, extracellular matrix. Membrane. Nucleus Note=Colocalizes with integrin alphaV/beta3 at the membrane surface in angiogenic blood vessels and melanomas. Found in mitochondria, along microfibrils, and in nuclei of cardiomyocytes

#### **Tissue Location**

Produced by normal skin fibroblasts. PEX is expressed in a number of tumors including gliomas, breast and prostate

## **MMP2 Antibody - Protocols**

Provided below are standard protocols that you may find useful for product applications.

- Western Blot
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- Cell Culture

## MMP2 Antibody - Images

## MMP2 Antibody - Background

Ubiquitinous metalloproteinase that is involved in diverse functions such as remodeling of the vasculature, angiogenesis, tissue repair, tumor invasion, inflammation, and atherosclerotic plaque rupture. As well as degrading extracellular matrix proteins, can also act on several nonmatrix proteins such as big endothelial 1 and beta-type CGRP promoting vasoconstriction. Also cleaves KISS at a Gly-I-Leu bond. Appears to have a role in myocardial cell death pathways. Contributes to myocardial oxidative stress by regulating the activity of GSK3beta. Cleaves GSK3beta in vitro. Isoform 2: Mediates the proteolysis of CHUK/IKKA and initiates a primary innate immune response by inducing mitochondrial-nuclear stress signaling with activation of the pro-inflammatory NF-kappaB, NFAT and IRF transcriptional pathways.

#### **MMP2 Antibody - References**

Huhtala P., et al.J. Biol. Chem. 265:11077-11082(1990). Collier I.E., et al. Genomics 9:429-434(1991). Ota T., et al. Nat. Genet. 36:40-45(2004). Martin J., et al. Nature 432:988-994(2004). Huhtala P., et al. Genomics 6:554-559(1990).

# **MMP2 Antibody - Citations**

 Nkx2-5 Is Expressed in Atherosclerotic Plagues and Attenuates Development of Atherosclerosis in Apolipoprotein E-Deficient Mice.