

MMP-9 (H-129): sc-10737

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-9 (also designated 92-kDa type IV collagenase or gelatinase B) has been shown to degrade bone collagens in concert with MMP-1 (also designated interstitial collagenase, fibroblast collagenase or collagenase-1), and cysteine proteases and may play a role in bone osteoclastic resorption. MMP-1 is down-regulated by p53, and abnormality of p53 expression may contribute to joint degradation in rheumatoid arthritis by regulating MMP-1 expression.

CHROMOSOMAL LOCATION

Genetic locus: MMP9 (human) mapping to 20q13.12; Mmp9 (mouse) mapping to 2 H3.

SOURCE

MMP-9 (H-129) is a rabbit polyclonal antibody raised against amino acids 459-587 of MMP-9 of human origin.

PRODUCT

Each vial contains 200 µg IgG in 1.0 ml of PBS with < 0.1% sodium azide and 0.1% gelatin.

APPLICATIONS

MMP-9 (H-129) is recommended for detection of MMP-9 of mouse, rat and human origin by Western Blotting (starting dilution 1:200, dilution range 1:100-1:1000), immunoprecipitation [1-2 µg per 100-500 µg of total protein (1 ml of cell lysate)], immunofluorescence (starting dilution 1:50, dilution range 1:50-1:500) and solid phase ELISA (starting dilution 1:30, dilution range 1:30-1:3000).

Suitable for use as control antibody for MMP-9 siRNA (h): sc-29400, MMP-9 siRNA (m): sc-29401, MMP-9 shRNA Plasmid (h): sc-29400-SH, MMP-9 shRNA Plasmid (m): sc-29401-SH, MMP-9 shRNA (h) Lentiviral Particles: sc-29400-V and MMP-9 shRNA (m) Lentiviral Particles: sc-29401-V.

Molecular Weight of MMP-9: 92 kDa.

STORAGE

Store at 4° C, ****DO NOT FREEZE****. Stable for one year from the date of shipment. Non-hazardous. No MSDS required.

RESEARCH USE

For research use only, not for use in diagnostic procedures.

PROTOCOLS

See our web site at www.scbt.com or our catalog for detailed protocols and support products.

SELECT PRODUCT CITATIONS

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13. Liao, C.G., et al. 2011. Characterization of basigin isoforms and the inhibitory function of basigin-3 in human hepatocellular carcinoma proliferation and invasion. *Mol. Cell. Biol.* 31: 2591-2604.
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