

MACC1 Antibody

Catalog # ASC10916

Specification

MACC1 Antibody - Product Information

Application WB, IHC, IF Primary Accession O6ZN28

Other Accession
Reactivity
Human, Mouse, Rat
Rabbit

Clonality Polyclonal Isotype IgG

Calculated MW Predicted: 94 kDa

Observed: 90 kDa KDa

Application Notes

MACC1 antibody can be used for detection of MACC1 by Western blot at 1 - 2 µg/mL.

Antibody can also be used for

immunohistochemistry starting at 2.5 µg/mL. For immunofluorescence start at 20

μg/mL.

MACC1 Antibody - Additional Information

Gene ID **346389**

Target/Specificity

MACC1; At least two isoforms of MACC1 are known to exist.

Reconstitution & Storage

MACC1 antibody can be stored at 4°C for three months and -20°C, stable for up to one year. As with all antibodies care should be taken to avoid repeated freeze thaw cycles. Antibodies should not be exposed to prolonged high temperatures.

Precautions

MACC1 Antibody is for research use only and not for use in diagnostic or therapeutic procedures.

MACC1 Antibody - Protein Information

Name MACC1

Function

Acts as a transcription activator for MET and as a key regulator of HGF-MET signaling. Promotes cell motility, proliferation and hepatocyte growth factor (HGF)-dependent scattering in vitro and tumor growth and metastasis in vivo.

Cellular Location

Cytoplasm. Nucleus. Note=Mainly found in the cytoplasm in non-metastasizing tumors



Tissue Location

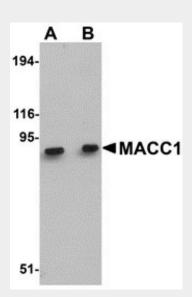
Preferentially expressed in metastasizing tumors.

MACC1 Antibody - Protocols

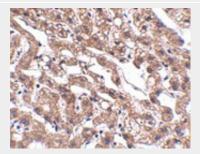
Provided below are standard protocols that you may find useful for product applications.

- Western Blot
- Blocking Peptides
- Dot Blot
- <u>Immunohistochemistry</u>
- <u>Immunofluorescence</u>
- <u>Immunoprecipitation</u>
- Flow Cytomety
- Cell Culture

MACC1 Antibody - Images

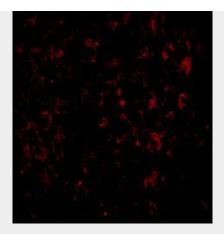


Western blot analysis of MACC1 in mouse liver tissue lysate with MACC1 antibody at (A) 1 and (B) 2 $\mu g/mL$.



Immunohistochemistry of MACC1 in human liver tissue with MACC1 antibody at 2.5 μg/mL.





Immunofluorescence of MACC1 in Human Liver cells with MACC1 antibody at 20 µg/mL.

MACC1 Antibody - Background

MACC1 Antibody: Metastasis associated in colon cancer 1 (MACC1) is a key regulator of the hepatocyte growth factor (HGF)-HGF receptor (MET) pathway, which is involved in cellular growth, epithelial-mesenchymal transition, angiogenesis, cell motility, invasiveness, and metastasis. MACC1 protein consists of four domains: ZU5, SH3, and two C-terminal death domains (DD). Expression of MACC1 was found significantly upregulated in malignant tissues (colon cancer of all stages as well as liver and lung metastases) compared to normal tissues or adenomas. MACC1 represents an early and crucial prognostic indicator for colon cancer metastasis that is independent of age, sex, tumor infiltration, nodal status, and lymph vessel invasion. Besides its involvement in signal transduction with the MET receptor, MACC1 also links MET signaling and apoptosis. MACC1 may also be an important therapeutic target for colorectal cancer treatment.

MACC1 Antibody - References

Stein U, Walther W, Arlt F, et al. MACC1, a newly identified key regulator of HGF-MET signaling, predicts colon cancer metastasis. Nat. Med.2009; 15:59-67.

Boardman LA. Overexpression of MACC1 leads to downstream activation of HGF/MET and potentiates metastasis and recurrence of colorectal cancer. Genome Med.2009; 1:36. Stein U, Smith J, Walther W, et al. MACC1 controls Met: what a difference an Sp1 site makes. Cell Cycle2009; 8:2467-9.

Arlt F and Stein U. Colon cancer metastasis: MACC1 and Met as metastatic pacemakers. Int. J. Biochem. Cell Biol.2009: epub.