

**MSTN Antibody**  
**Purified Mouse Monoclonal Antibody**  
**Catalog # AO1921a**

**Specification**

**MSTN Antibody - Product Information**

Application	<b>E, WB, IHC</b>
Primary Accession	<a href="#">O14793</a>
Reactivity	<b>Human</b>
Host	<b>Mouse</b>
Clonality	<b>Monoclonal</b>
Isotype	<b>IgG2b</b>
Calculated MW	<b>42.8kDa KDa</b>

**Description**

The protein encoded by this gene is a member of the bone morphogenetic protein (BMP) family and the TGF-beta superfamily. This group of proteins is characterized by a polybasic proteolytic processing site which is cleaved to produce a mature protein containing seven conserved cysteine residues. The members of this family are regulators of cell growth and differentiation in both embryonic and adult tissues. This gene is thought to encode a secreted protein which negatively regulates skeletal muscle growth.

**Immunogen**

Purified recombinant fragment of human MSTN (AA:24-266) expressed in E. Coli.

**Formulation**

Purified antibody in PBS with 0.05% sodium azide.

**MSTN Antibody - Additional Information**

**Gene ID** 2660

**Other Names**

Growth/differentiation factor 8, GDF-8, Myostatin, MSTN, GDF8

**Dilution**

E~~1/10000  
WB~~1/500 - 1/2000  
IHC~~1/200 - 1/1000

**Storage**

Maintain refrigerated at 2-8°C for up to 6 months. For long term storage store at -20°C in small aliquots to prevent freeze-thaw cycles.

**Precautions**

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

**MSTN Antibody - Protein Information**

**Name** MSTN

**Synonyms** GDF8

**Function**

Acts specifically as a negative regulator of skeletal muscle growth.

**Cellular Location**

Secreted {ECO:0000250|UniProtKB:O08689}.

**MSTN 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 Cytometry](#)
- [Cell Culture](#)

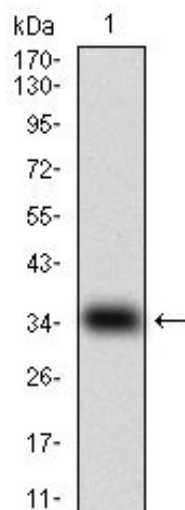
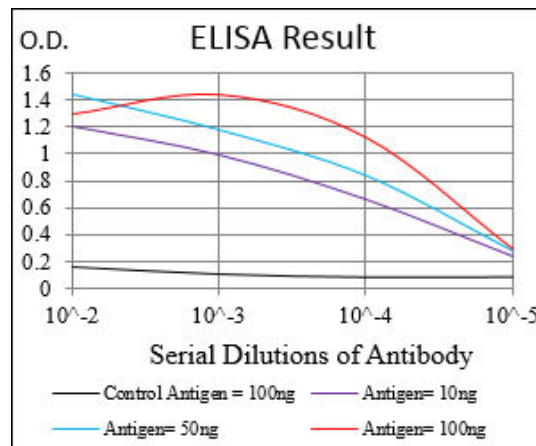


Figure 1: Western blot analysis using MSTN mAb against human MSTN (AA:24-266 ) recombinant protein. (Expected MW is 28.9 kDa)

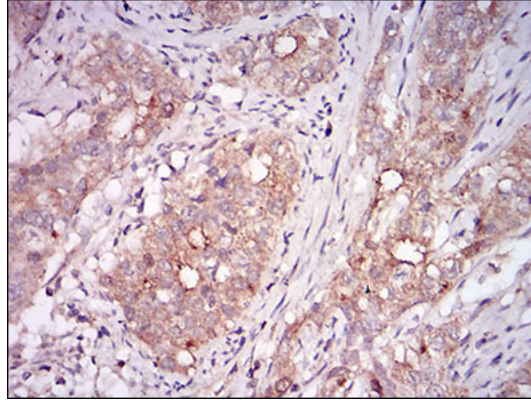


Figure 2: Immunohistochemical analysis of paraffin-embedded cervical cancer tissues using MSTN mouse mAb with DAB staining.

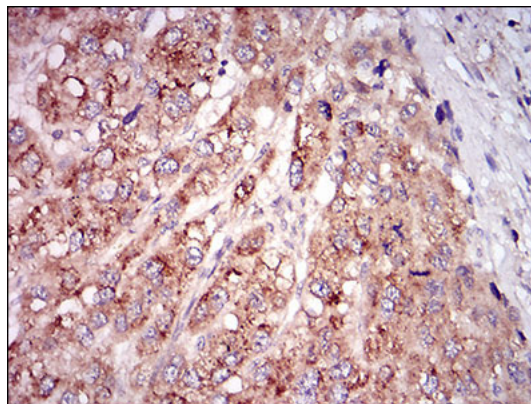


Figure 3: Immunohistochemical analysis of paraffin-embedded liver cancer tissues using MSTN mouse mAb with DAB staining.

### **MSTN Antibody - Background**

The protein encoded by this gene belongs to the inhibitor of DNA binding family, members of which are transcriptional regulators that contain a helix-loop-helix (HLH) domain but not a basic domain. Members of the inhibitor of DNA binding family inhibit the functions of basic helix-loop-helix transcription factors in a dominant-negative manner by suppressing their heterodimerization partners through the HLH domains. This protein may play a role in negatively regulating cell differentiation. A pseudogene of this gene is located on chromosome 3. ; ;

### **MSTN Antibody - References**

1. Eur J Endocrinol. 2012 Dec;167(6):873-80.
2. Biochem J. 2012 Aug 15;446(1):23-36.