

## GAX / MEOX2 Antibody (clone 6A5)

Mouse Monoclonal Antibody Catalog # ALS14103

### **Specification**

## GAX / MEOX2 Antibody (clone 6A5) - Product Information

Application WB, IF Primary Accession P50222

Reactivity Human, Mouse, Rat

Host Mouse
Clonality Monoclonal
Calculated MW 34kDa KDa

### GAX / MEOX2 Antibody (clone 6A5) - Additional Information

#### **Gene ID 4223**

#### **Other Names**

Homeobox protein MOX-2, Growth arrest-specific homeobox, Mesenchyme homeobox 2, MEOX2, GAX, MOX2

### Target/Specificity

Human Homeobox Protein Mox-2

### **Reconstitution & Storage**

Short term 4°C, long term aliquot and store at -20°C, avoid freeze thaw cycles.

### **Precautions**

GAX / MEOX2 Antibody (clone 6A5) is for research use only and not for use in diagnostic or therapeutic procedures.

## GAX / MEOX2 Antibody (clone 6A5) - Protein Information

Name MEOX2 {ECO:0000303|PubMed:16335786, ECO:0000312|HGNC:HGNC:7014}

#### **Function**

Mesodermal transcription factor that plays a key role in somitogenesis and somitogenesis and limb muscle differentiation (By similarity). Required during limb development for normal appendicular muscle formation and for the normal regulation of myogenic genes (By similarity). May have a regulatory role when quiescent vascular smooth muscle cells reenter the cell cycle (By similarity). Also acts as a negative regulator of angiogenesis (PubMed:<a

href="http://www.uniprot.org/citations/17074759" target="\_blank">17074759</a>, PubMed:<a href="http://www.uniprot.org/citations/20516212" target="\_blank">20516212</a>, PubMed:<a href="http://www.uniprot.org/citations/22206000" target="\_blank">22206000</a>). Activates expression of CDKN1A and CDKN2A in endothelial cells, acting as a regulator of vascular cell proliferation (PubMed:<a href="http://www.uniprot.org/citations/17074759" target="http://www.uniprot.org/citations/17074759" target="http://www.uniprot.org

target="\_blank">17074759</a>, PubMed:<a href="http://www.uniprot.org/citations/22206000" target="\_blank">22206000</a>). While it activates CDKN1A in a DNA- dependent manner, it



activates CDKN2A in a DNA-independent manner (PubMed:<a href="http://www.uniprot.org/citations/22206000" target="\_blank">22206000</a>). Together with TCF15, regulates transcription in heart endothelial cells to regulate fatty acid transport across heart endothelial cells (By similarity).

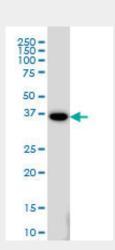
**Cellular Location**Nucleus. Nucleus speckle

## GAX / MEOX2 Antibody (clone 6A5) - Protocols

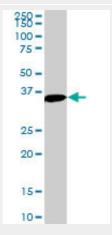
Provided below are standard protocols that you may find useful for product applications.

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

# GAX / MEOX2 Antibody (clone 6A5) - Images

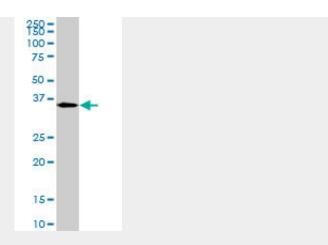


MEOX2 monoclonal antibody clone 6A5 Western blot of MEOX2 expression in HeLa.

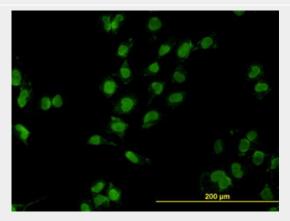


MEOX2 monoclonal antibody clone 6A5. Western blot of MEOX2 expression in PC-12.





MEOX2 monoclonal antibody clone 6A5. Western blot of MEOX2 expression in NIH/3T3.



Immunofluorescence of monoclonal antibody to MEOX2 on HeLa cell. [antibody concentration 10 ug/ml]

### GAX / MEOX2 Antibody (clone 6A5) - Background

Mesodermal transcription factor that plays a key role in somitogenesis and is required for sclerotome development (By similarity). Activates expression of CDKN1A and CDKN2A in endothelial cells, acting as a regulator of vascular cell proliferation. While it activates CDKN1A in a DNA-dependent manner, it activates CDKN2A in a DNA-independent manner (PubMed:22206000). May have a regulatory role when quiescent vascular smooth muscle cells reenter the cell cycle.

# GAX / MEOX2 Antibody (clone 6A5) - References

Grigoriou M.,et al.Genomics 26:550-555(1995). Lepage D.F.,et al.Genomics 24:535-540(1994). Ota T.,et al.Nat. Genet. 36:40-45(2004). Hillier L.W.,et al.Nature 424:157-164(2003). Lin J.,et al.Mol. Cell. Biochem. 275:75-84(2005).