

## **MEF-2 Polyclonal Antibody**

Catalog No: YT2699

Reactivity: Human; Mouse; Rat

**Applications:** WB;IHC;IF;ELISA

Target: MEF-2

**Fields:** >>cGMP-PKG signaling pathway;>>Apelin signaling pathway;>>Parathyroid

hormone synthesis, secretion and action;>>Fluid shear stress and atherosclerosis

Gene Name: MEF2A

**Protein Name:** Myocyte-specific enhancer factor 2A

Q02078

Q60929

Human Gene Id: 4205

**Human Swiss Prot** 

No:

Mouse Gene Id: 17258

**Mouse Swiss Prot** 

No:

**Rat Gene Id:** 309957

Rat Swiss Prot No: Q2MJT0

Immunogen: The antiserum was produced against synthesized peptide derived from human

MEF2A. AA range:374-423

**Specificity:** MEF-2 Polyclonal Antibody detects endogenous levels of MEF-2 protein.

**Formulation :** Liquid in PBS containing 50% glycerol, 0.5% BSA and 0.02% sodium azide.

Source: Polyclonal, Rabbit, IgG

**Dilution:** WB 1:500 - 1:2000. IHC 1:100 - 1:300. IF 1:200 - 1:1000. ELISA: 1:40000. Not

yet tested in other applications.



**Purification:** The antibody was affinity-purified from rabbit antiserum by affinity-

chromatography using epitope-specific immunogen.

Concentration: 1 mg/ml

Storage Stability: -15°C to -25°C/1 year(Do not lower than -25°C)

Observed Band: 55kD

**Cell Pathway :** AMPK; Protein\_Acetylation

**Background :** The protein encoded by this gene is a DNA-binding transcription factor that

activates many muscle-specific, growth factor-induced, and stress-induced genes. The encoded protein can act as a homodimer or as a heterodimer and is involved in several cellular processes, including muscle development, neuronal differentiation, cell growth control, and apoptosis. Defects in this gene could be a cause of autosomal dominant coronary artery disease 1 with myocardial infarction (ADCAD1). Several transcript variants encoding different isoforms have been

found for this gene.[provided by RefSeq, Jan 2010],

**Function:** disease:Defects in MEF2A might be a cause of autosomal dominant coronary

artery disease 1 with myocardial infarction (ADCAD1)

[MIM:608320].,function:Transcriptional activator which binds specifically to the MEF2 element, 5'-YTA[AT](4)TAR-3', found in numerous muscle-specific genes. Also involved in the activation of numerous growth factor- and stress-induced genes. Mediates cellular functions not only in skeletal and cardiac muscle development, but also in neuronal differentiation and survival. Plays diverse roles in the control of cell growth, survival and apoptosis via p38 MAPK signaling in muscle-specific and/or growth factor-related transcription. In cerebellar granule neurons, phosphorylated and sumoylated MEF2A represses transcription of NUR77 promoting synaptic differentiation..PTM:Acetylation on Lys-403 activates

transcriptional activity. Acetylated by p300 on several sites in di

Subcellular Location:

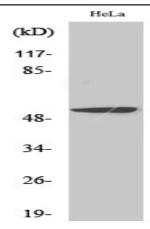
Nucleus.

**Expression:** Isoform MEF2 and isoform MEFA are expressed only in skeletal and cardiac

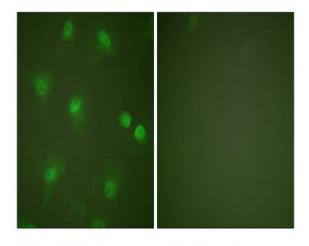
muscle and in the brain. Isoform RSRFC4 and isoform RSRFC9 are expressed in

all tissues examined.

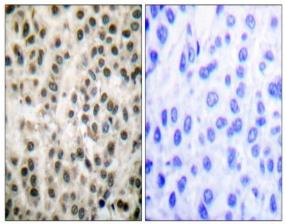
## **Products Images**



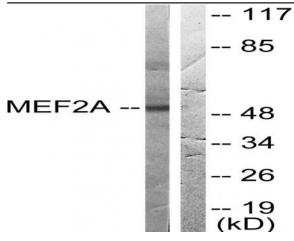
Western Blot analysis of various cells using MEF-2 Polyclonal Antibody diluted at 1:1000 cells nucleus extracted by Minute TM Cytoplasmic and Nuclear Fractionation kit (SC-003,Inventbiotech,MN,USA).



Immunofluorescence analysis of HeLa cells, using MEF2A Antibody. The picture on the right is blocked with the synthesized peptide.



Immunohistochemistry analysis of paraffin-embedded human breast carcinoma tissue, using MEF2A Antibody. The picture on the right is blocked with the synthesized peptide.



Western blot analysis of lysates from HeLa cells, treated with PMA 125ng/ml 30', using MEF2A Antibody. The lane on the right is blocked with the synthesized peptide.