

MEK-2 Monoclonal Antibody

Catalog No: YM0435

Reactivity: Human; Mouse; Rat

Applications: WB;IF;FCM;ELISA

Target: MEK2

Fields: >>EGFR tyrosine kinase inhibitor resistance;>>Endocrine resistance;>>MAPK

signaling pathway;>>ErbB signaling pathway;>>Ras signaling pathway;>>Rap1

signaling pathway;>>cGMP-PKG signaling pathway;>>cAMP signaling

pathway;>>HIF-1 signaling pathway;>>FoxO signaling pathway;>>Sphingolipid

signaling pathway;>>Phospholipase D signaling pathway;>>Autophagy -

animal;>>mTOR signaling pathway;>>PI3K-Akt signaling

pathway;>>Apoptosis;>>Cellular senescence;>>Vascular smooth muscle contraction;>>VEGF signaling pathway;>>Apelin signaling pathway;>>Gap junction;>>Signaling pathways regulating pluripotency of stem cells;>>Neutrophil extracellular trap formation;>>Toll-like receptor signaling pathway;>>Natural killer cell mediated cytotoxicity;>>T cell receptor signaling pathway;>>B cell receptor

signaling pathway;>>Fc epsilon RI signaling pathway;>>Long-term potentiation;>>Neurotrophin signaling pathway;>>Long-term depression;>>Regulation of actin cytoskeleton;>>Insulin signaling

pathway;>>GnRH signal

Gene Name: MAP2K2

Protein Name: Dual specificity mitogen-activated protein kinase kinase 2

Human Gene Id: 5605

Human Swiss Prot P36507

No:

Mouse Gene Id: 26396

Mouse Swiss Prot

No:

Rat Gene ld: 58960

Q63932

Rat Swiss Prot No: P36506

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Immunogen: Purified recombinant fragment of human MEK-2 expressed in E. Coli.

Specificity: MEK-2 Monoclonal Antibody detects endogenous levels of MEK-2 protein.

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

Source: Monoclonal, Mouse

Dilution: WB 1:500 - 1:2000. IF 1:200 - 1:1000. Flow cytometry: 1:200 - 1:400. ELISA:

1:10000. Not yet tested in other applications.

Purification : Affinity purification

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

Molecularweight: 44kD

Cell Pathway: Regulates Angiogenesis; Regulation of Actin Dynamics; Stem cell pathway;

T Cell Receptor; Insulin Receptor; Cell Growth; Toll Like;

MAPK_ERK_Growth;MAPK_G_Protein; B_Cell_Antigen; PI3K/Akt

P References: 1. Mol Cell Biol. 1993 Aug;13(8):4679-90.

2. Eur J Biochem. 1995 Nov 15;234(1):32-8.

3. Oncogene. 1998 Jul 9;17(1):57-65.

Background : The protein encoded by this gene is a dual specificity protein kinase that belongs

to the MAP kinase kinase family. This kinase is known to play a critical role in mitogen growth factor signal transduction. It phosphorylates and thus activates MAPK1/ERK2 and MAPK2/ERK3. The activation of this kinase itself is dependent on the Ser/Thr phosphorylation by MAP kinase kinase kinases. Mutations in this gene cause cardiofaciocutaneous syndrome (CFC syndrome), a disease

characterized by heart defects, mental retardation, and distinctive facial features similar to those found in Noonan syndrome. The inhibition or degradation of this kinase is also found to be involved in the pathogenesis of Yersinia and anthrax. A pseudogene, which is located on chromosome 7, has been identified for this

gene. [provided by RefSeq, Jul 2008],

Function: catalytic activity:ATP + a protein = ADP + a phosphoprotein.,disease:Defects in

MAP2K2 are a cause of cardiofaciocutaneous syndrome (CFC syndrome) [MIM:115150]; also known as cardio-facio-cutaneous syndrome. CFC syndrome is characterized by a distinctive facial appearance, heart defects and mental retardation. Heart defects include pulmonic stenosis, atrial septal defects and hypertrophic cardiomyopathy. Some affected individuals present with ectodermal abnormalities such as sparse, friable hair, hyperkeratotic skin lesions and a

generalized ichthyosis-like condition. Typical facial features are similar to Noonan syndrome. They include high forehead with bitemporal constriction, hypoplastic

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supraorbital ridges, downslanting palpebral fissures, a depressed nasal bridge, and posteriorly angulated ears with prominent helices. The inheritance of CFC syndrome is autosomal dominant.,function:C

Subcellular Location :

Cytoplasm . Membrane ; Peripheral membrane protein . Membrane localization is probably regulated by its interaction with KSR1. .

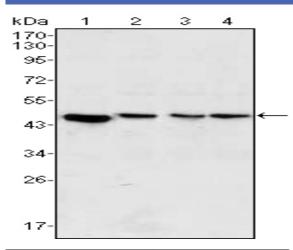
Expression: Colon carcinoma, Epithelium, Human cerebellum, Muscle, Platelet

Tag: orthogonal

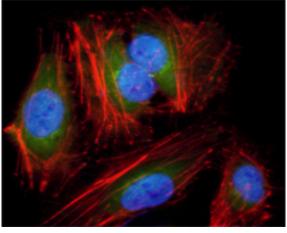
Sort: 9542

No4:

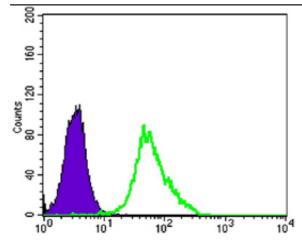
Products Images



Western Blot analysis using MEK-2 Monoclonal Antibody against PC-12 (1), Jurkat (2), HeLa (3) and NIH/3T3 (4) cell lysate.



Immunofluorescence analysis of Hela cells using MEK-2 Monoclonal Antibody (green). Red: Actin filaments have been labeled with DY-554 phalloidin. Blue: DRAQ5 fluorescent DNA dye.



Flow cytometric analysis of Hela cells using MEK-2 Monoclonal Antibody (green) and negative control (purple).