

# Phospho-MKK3(S189) Antibody Blocking peptide

Synthetic peptide Catalog # BP3170a

## **Specification**

## Phospho-MKK3(S189) Antibody Blocking peptide - Product Information

**Primary Accession** 

P46734

# Phospho-MKK3(S189) Antibody Blocking peptide - Additional Information

**Gene ID 5606** 

#### **Other Names**

Dual specificity mitogen-activated protein kinase kinase 3, MAP kinase kinase 3, MAPKK 3, MAPK/ERK kinase 3, MEK 3, Stress-activated protein kinase kinase 2, SAPK kinase 2, SAPKK-2, SAPKK2, MAP2K3, MEK3, MKK3, PRKMK3, SKK2

### Target/Specificity

The synthetic peptide sequence used to generate the antibody <a href=/product/products/AP3170a>AP3170a</a> was selected from the 185-194<CR>region of human Phospho-MKK3-S189. A 10 to 100 fold molar excess to antibody is recommended. Precise conditions should be optimized for a particular assay.

#### **Format**

Peptides are lyophilized in a solid powder format. Peptides can be reconstituted in solution using the appropriate buffer as needed.

#### Storage

Maintain refrigerated at 2-8°C for up to 6 months. For long term storage store at -20°C.

### **Precautions**

This product is for research use only. Not for use in diagnostic or therapeutic procedures.

# Phospho-MKK3(S189) Antibody Blocking peptide - Protein Information

### Name MAP2K3

Synonyms MEK3, MKK3, PRKMK3, SKK2

### **Function**

Dual specificity kinase. Is activated by cytokines and environmental stress in vivo. Catalyzes the concomitant phosphorylation of a threonine and a tyrosine residue in the MAP kinase p38. Part of a signaling cascade that begins with the activation of the adrenergic receptor ADRA1B and leads to the activation of MAPK14.

### **Tissue Location**

Abundant expression is seen in the skeletal muscle. It is also widely expressed in other tissues



## Phospho-MKK3(S189) Antibody Blocking peptide - Protocols

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

### • Blocking Peptides

Phospho-MKK3(S189) Antibody Blocking peptide - Images

## Phospho-MKK3(S189) Antibody Blocking peptide - Background

MKK3 is a dual specificity protein kinase that belongs to the MAP kinase kinase family. This kinase is activated by mitogenic and environmental stress, and participates in the MAP kinase-mediated signaling cascade. It phosphorylates and thus activates MAPK14/p38-MAPK. This kinase can be activated by insulin, and is necessary for the expression of glucose transporter. Expression of RAS oncogene is found to result in the accumulation of the active form of this kinase, which thus leads to the constitutive activation of MAPK14, and confers oncogenic transformation of primary cells. The inhibition of this kinase is involved in the pathogenesis of Yersina pseudotuberculosis.

## Phospho-MKK3(S189) Antibody Blocking peptide - References

Yustein, J.T., et al., Oncogene 22(40):6129-6141 (2003). Edlund, S., et al., Mol. Biol. Cell 14(2):529-544 (2003). Lim, S., et al., J. Biol. Chem. 277(28):25040-25046 (2002). Han, Q., et al., J. Biol. Chem. 277(50):48379-48385 (2002). Wang, W., et al., Mol. Cell. Biol. 22(10):3389-3403 (2002).