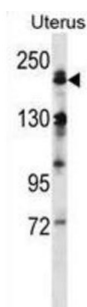
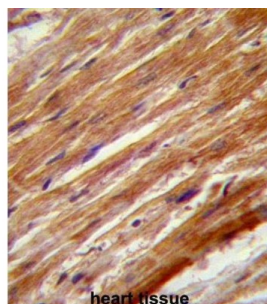


## Mitogen-Activated Protein Kinase Kinase Kinase 4 (MEKK4) Antibody

Catalogue No.: abx028307



The central core of each mitogen-activated protein kinase (MAPK) pathway is a conserved cascade of 3 protein kinases: an activated MAPK kinase kinase (MAPKKK) phosphorylates and activates a specific MAPK kinase (MAPKK), which then activates a specific MAPK. While the ERK MAPKs are activated by mitogenic stimulation, the CSBP2 and JNK MAPKs are activated by environmental stresses such as osmotic shock, UV irradiation, wound stress, and inflammatory factors. This gene encodes a MAPKKK, the MEKK4 protein, also called MTK1. This protein contains a protein kinase catalytic domain at the C terminus. The N-terminal nonkinase domain may contain a regulatory domain. Expression of MEKK4 in mammalian cells activated the CSBP2 and JNK MAPK pathways, but not the ERK pathway. In vitro kinase studies indicated that recombinant MEKK4 can specifically phosphorylate and activate PRKMK6 and SERK1, MAPKKs that activate CSBP2 and JNK, respectively but cannot phosphorylate PRKMK1, an MAPKK that activates ERKs. MEKK4 is a major mediator of environmental stresses that activate the CSBP2 MAPK pathway, and a minor mediator of the JNK pathway. Two alternatively spliced transcripts encoding distinct isoforms have been described.

**Target:** Mitogen-Activated Protein Kinase Kinase Kinase 4 (MEKK4)

**Clonality:** Polyclonal

**Reactivity:** Human

**Tested Applications:** ELISA, WB, IHC

**Host:** Rabbit

**Recommended dilutions:** WB: 1/1000, IHC-P: 1/10 - 1/50. Not tested in IHC-F. Optimal dilutions/concentrations should be determined by the end user.

**Conjugation:** Unconjugated

# Datasheet

Version: 4.0.0  
Revision date: 23 May 2025



<b>Immunogen:</b>	KLH-conjugated synthetic peptide between 1067-1097 amino acids from the Central region of human MEKK4.
<b>Isotype:</b>	IgG
<b>Form:</b>	Liquid
<b>Purification:</b>	Purified through a protein A column, followed by peptide affinity purification.
<b>Storage:</b>	Aliquot and store at -20°C. Avoid repeated freeze/thaw cycles.
<b>UniProt Primary AC:</b>	Q9Y6R4 ( <a href="#">UniProt</a> , <a href="#">ExPASy</a> )
<b>Gene Symbol:</b>	MAP3K4
<b>String:</b>	<a href="#">9606.ENSP00000375986</a>
<b>Molecular Weight:</b>	Calculated MW: 182 kDa
<b>Buffer:</b>	PBS containing 0.09% sodium azide.
<b>Specificity:</b>	Predicted to react with Mouse MAP3K4.
<b>Note:</b>	THIS PRODUCT IS FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC, THERAPEUTIC OR COSMETIC PROCEDURES. NOT FOR HUMAN OR ANIMAL CONSUMPTION.