

# Anti-MEKK2/MAP3K2 Antibody

Catalog Number: PA1499

### **About MAP3K2**

MAP3K2, mitogen-activated protein kinase kinase 2, also known as MEKK2, belongs to the mitogen-activated protein kinase (MAPK) kinase kinase gene family, which is involved in regulating multiple MAPK signaling pathways. Endogenous MAP3K2 localized mainly to the cytosol of unstimulated HeLa cells and rat fibroblasts. The MAP3K2 gene is mapped to chromosome 2 by the International Radiation Hybrid Mapping Consortium. MAP3K2 is a major upstream activator of the JNK, MAPK cascade. MAP3K2 was identifies as 1 of 6 kinases that regulate different steps of the caveolar cycle. Silencing of MAP3K2 strongly reduced kiss-and-run dynamics, leading to an accumulation of caveolar structures at the cell surface without affecting caveolae coat assembly or clustering.

#### Overview

Product Name	Anti-MEKK2/MAP3K2 Antibody
Reactive Species	Human, Mouse, Rat
Description	Boster Bio Anti-MEKK2/MAP3K2 Antibody catalog # PA1499. Tested in WB applications. This antibody reacts with Human, Mouse, Rat.
Application	WB
Clonality	Polyclonal
Formulation	Each vial contains 5mg BSA, 0.9mg NaCl, 0.2mg Na2HPO4, 0.05mg Thimerosal, 0.05mg NaN3.
Storage Instructions	Store at -20°C for one year from date of receipt. After reconstitution, at 4°C for one month. It can also be aliquotted and stored frozen at -20°C for six months. Avoid repeated freeze-thaw cycles.
Host	Rabbit
Uniprot ID	Q9Y2U5

#### **Technical Details**

Immunogen	A synthetic peptide corresponding to a sequence at the C-terminus of human MEKK2, different from the related rat and mouse sequences by one amino acid.
Predicted Reactive Species	Canine, Horse, Monkey, Rabbit
Recommended Detection Systems	Boster recommends Enhanced Chemiluminescent Kit with anti-Rabbit IgG (EK1002) for Western blot.
Cross Reactivity	No cross-reactivity with other proteins
Isotype	Rabbit IgG
Form	Lyophilized





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Concentration	Adding 0.2 ml of distilled water will yield a concentration of 500 ug/ml.
Purification	Immunogen affinity purified.
Suggested Dilutions	Dilute the sample so that the expected range of concentrations fall within the detection range of this kit.  If the expected range of concentration is unknown, a pilot test should be conducted to decide the optimal dilution ratio for your samples.  Some PubMed article(s) citing the expression level of this target are as follows:  Boster Bio's internal QC testing used:  Western blot, 0.1-0.5ug/ml, Human, Rat, Mouse



## Anti-MEKK2/MAP3K2 Antibody (PA1499) Images

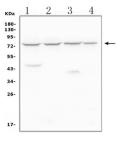


Figure 1. Western blot analysis of MEKK2 using anti-MEKK2 antibody (PA1499).

Electrophoresis was performed on a 5-20% SDS-PAGE gel at 70V (Stacking gel) / 90V (Resolving gel) for 2-3 hours. The sample well of each lane was loaded with 50ug of sample under reducing conditions.

Lane 1: human Caco-2 whole cell lysates

Lane 2: human K562 whole cell lysates

Lane 3: human THP-1 whole cell lysates

Lane 4: human Raji whole cell lysates

After Electrophoresis, proteins were transferred to a Nitrocellulose membrane at 150mA for 50-90 minutes. Blocked the membrane with 5% Non-fat Milk/ TBS for 1.5 hour at RT. The membrane was incubated with rabbit anti-MEKK2 antigen affinity purified polyclonal antibody (Catalog # PA1499) at 0.5 ug/mL overnight at 4°C, then washed with TBS-0.1%Tween 3 times with 5 minutes each and probed with a goat anti-rabbit IgG-HRP secondary antibody at a dilution of 1:10000 for 1.5 hour at RT. The signal is developed using an Enhanced Chemiluminescent detection (ECL) kit (Catalog # EK1002) with Tanon 5200 system. A specific band was detected for MEKK2 at approximately 78KD. The expected band size for MEKK2 is at 70KD.

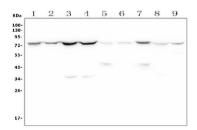


Figure 2. Western blot analysis of MEKK2 using anti-MEKK2 antibody (PA1499).

Electrophoresis was performed on a 5-20% SDS-PAGE gel at 70V (Stacking gel) / 90V (Resolving gel) for 2-3 hours. The sample well of each lane was loaded with 50ug of sample under reducing conditions.

Lane 1: rat kidney tissue lysates

Lane 2: rat brain tissue lysates

Lane 3: rat heart tissue lysates

Lane 4: rat C6 whole cell lysates

Lane 5: mouse kidney tissue lysates

Lane 6. mayor brain tipona lyantas

Lane 6: mouse brain tissue lysates

Lane 7: mouse heart tissue lysates Lane 8: mouse Neuro-2a whole cell lysates

Lane 9: mouse NIH/3T3 whole cell lysates

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# **1 Publications Citing This Product**



1. PubMed ID: 25304384, Li Y, Zhang Z, Zhou X, Li L, Liu Q, Wang Z, Bai X, Zhao Y, Shi H, Zhang X, Ye L. Cancer Lett. 2014 Dec 28;355(2):288-96. Doi: 10.1016/J.Canlet.2014.09.047. Epub 2014 Oct 7. The Oncoprotein Hbxip Enhances Migration Of Breast Cancer Cells Through In...

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