

### PIM2 Antibody (C-Term)

Peptide-affinity purified goat antibody Catalog # AF3507a

### **Specification**

## PIM2 Antibody (C-Term) - Product Information

Application WB
Primary Accession O9P1W9

Other Accession NP 006866.2, 11040

Reactivity
Host
Clonality
Concentration
Conc

Isotype IgG
Calculated MW 34190

# PIM2 Antibody (C-Term) - Additional Information

#### **Gene ID 11040**

### **Other Names**

Serine/threonine-protein kinase pim-2, 2.7.11.1, Pim-2h, PIM2

# **Format**

0.5 mg/ml in Tris saline, 0.02% sodium azide, pH7.3 with 0.5% bovine serum albumin

#### **Storage**

Maintain refrigerated at 2-8°C for up to 6 months. For long term storage store at -20°C in small aliquots to prevent freeze-thaw cycles.

### **Precautions**

PIM2 Antibody (C-Term) is for research use only and not for use in diagnostic or therapeutic procedures.

### PIM2 Antibody (C-Term) - Protein Information

### Name PIM2

#### **Function**

Proto-oncogene with serine/threonine kinase activity involved in cell survival and cell proliferation. Exerts its oncogenic activity through: the regulation of MYC transcriptional activity, the regulation of cell cycle progression, the regulation of cap-dependent protein translation and through survival signaling by phosphorylation of a pro- apoptotic protein, BAD. Phosphorylation of MYC leads to an increase of MYC protein stability and thereby an increase transcriptional activity. The stabilization of MYC exerted by PIM2 might explain partly the strong synergism between these 2 oncogenes in tumorigenesis. Regulates cap-dependent protein translation in a mammalian target of rapamycin complex 1 (mTORC1)-independent manner and in parallel to the PI3K-Akt pathway. Mediates



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survival signaling through phosphorylation of BAD, which induces release of the anti-apoptotic protein Bcl-X(L)/BCL2L1. Promotes cell survival in response to a variety of proliferative signals via positive regulation of the I-kappa-B kinase/NF-kappa-B cascade; this process requires phosphorylation of MAP3K8/COT. Promotes growth factor-independent proliferation by phosphorylation of cell cycle factors such as CDKN1A and CDKN1B. Involved in the positive regulation of chondrocyte survival and autophagy in the epiphyseal growth plate.

#### **Tissue Location**

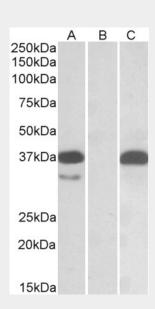
Highly expressed in hematopoietic tissues, in leukemic and lymphoma cell lines, testis, small intestine, colon and colorectal adenocarcinoma cells. Weakly expressed in normal liver, but highly expressed in hepatocellular carcinoma tissues

# PIM2 Antibody (C-Term) - Protocols

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

- Western Blot
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- <u>Immunoprecipitation</u>
- Flow Cytomety
- Cell Culture

# PIM2 Antibody (C-Term) - Images



HEK293 lysate (10ug protein in RIPA buffer) overexpressing Human PIM2 with C-terminal MYC tag probed with AF3507a (0.1ug/ml) in Lane A and probed with anti-MYC Tag (1/1000) in lane C. Mock-transfected HEK293 probed with AF3507a (0.1mg/ml) in Lane B. Primary incubations were for 1 hour. Detected by chemiluminescence.

## PIM2 Antibody (C-Term) - References

Pim kinases promote cell cycle progression by phosphorylating and down-regulating p27Kip1 at the transcriptional and posttranscriptional levels. Morishita D, Katayama R, Sekimizu K, Tsuruo T, Fujita N, Cancer research 2008 Jul 68 (13): 5076-85. PMID: 18593906