

PIM2 (Internal) Antibody (internal region)

Peptide-affinity purified goat antibody Catalog # AF2477a

Specification

PIM2 (Internal) Antibody (internal region) - Product Information

Application WB

Primary Accession <u>Q9P1W9</u>

Other Accession <u>NP_006866.2</u>, <u>11040</u>

Reactivity Human

Predicted Mouse, Dog, Cow

Host Goat
Clonality Polyclonal
Concentration 0.5 mg/ml
Isotype IgG
Calculated MW 34190

PIM2 (Internal) Antibody (internal region) - 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 (Internal) Antibody (internal region) is for research use only and not for use in diagnostic or therapeutic procedures.

PIM2 (Internal) Antibody (internal region) - 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 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

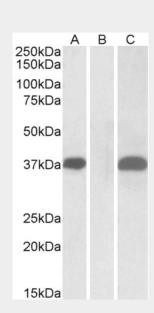
Highly expressed in hematopoietic tissues, in leukemic and lymphoma cell lines, testis, small intestine, colon and colorectal adenocarcinoma cells. Weakly expressed in normal liver, but highly expressed in hepatocellular carcinoma tissues

PIM2 (Internal) Antibody (internal region) - Protocols

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

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

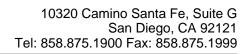
PIM2 (Internal) Antibody (internal region) - Images



HEK293 lysate (10ug protein in RIPA buffer) overexpressing Human PIM2 with C-terminal MYC tag probed with AF2477a (1ug/ml) in Lane A and probed with anti-MYC Tag (1/1000) in lane C. Mock-transfected HEK293 probed with AF2477a (1mg/ml) in Lane B. Primary incubations were for 1 hour. Detected by chemiluminescence.

PIM2 (Internal) Antibody (internal region) - References

Lymphocyte transformation by Pim-2 is dependent on nuclear factor-kappaB activation. Hammerman PS, Fox CJ, Cinalli RM, Xu A, Wagner JD, Lindsten T, Thompson CB. Cancer Res. 2004





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