

For Research Use Only

# Osteopontin Polyclonal antibody

Catalog Number: 32601-1-AP



## Basic Information

<b>Catalog Number:</b> 32601-1-AP	<b>GenBank Accession Number:</b> NM_012881.2	<b>Purification Method:</b> Antigen affinity Purification
<b>Size:</b> 150ul , Concentration: 500 ug/ml by Nanodrop;	<b>GeneID (NCBI):</b> 25353	<b>Recommended Dilutions:</b> WB: 1:500-1:2000
<b>Source:</b> Rabbit	<b>UNIPROT ID:</b> P08721	
<b>Isotype:</b> IgG	<b>Full Name:</b> secreted phosphoprotein 1	
<b>Immunogen Catalog Number:</b> EG3247	<b>Calculated MW:</b> 35 kDa	
	<b>Observed MW:</b> 60 kDa	

## Applications

<b>Tested Applications:</b> WB, ELISA	<b>Positive Controls:</b> WB : RAW 264.7 cells, LPS and Brefeldin A treated RAW 264.7 cells
<b>Species Specificity:</b> mouse, rat	

## Background Information

Osteopontin (OPN) is also named as 2AR, minopontin, bone sialoprotein 1, Spp1, Eta-1 and Op, and belongs to the osteopontin family. Osteopontin is major non-collagenous bone protein that binds tightly to hydroxyapatite. It is a highly phosphorylated glycoprophosphoprotein having acidic characteristics and rich in aspartic acid (PMID: 30003880). And it acts as a cytokine involved in enhancing production of interferon-gamma and interleukin-12 and reducing production of interleukin-10 and is essential in the pathway that leads to type I immunity (PMID:2351930, PMID:10657301). OPN, a multifunctional protein, has important functions on cardiovascular diseases, cancer, diabetes and kidney stone diseases and in the process of inflammation, biomineralization, cell viability and wound healing (PMID: 30003880). Osteopontin (OPN) is a pleiotropic glycoprotein expressed in various cell types in animals and in humans, including bone, immune, smooth muscle, epithelial and endothelial cells. Moreover, OPN is found in kidneys (in the thick ascending limbs of the loop of Henle and in distal nephrons) and urine (PMID:30456594). Osteopontin (OPN) is an acidic 60-70 kDa glycoprotein that is cleaved by proteases to yield 45-kDa and 24-kDa fragments (PMID: 10491621, PMID: 1995615)

## Storage

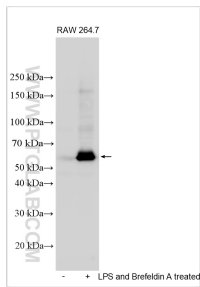
**Storage:**  
Store at -20°C. Stable for one year after shipment.  
**Storage Buffer:**  
PBS with 0.02% sodium azide and 50% glycerol, pH7.3  
**Aliquoting is unnecessary for -20°C storage**

\*\*\* 20ul sizes contain 0.1% BSA

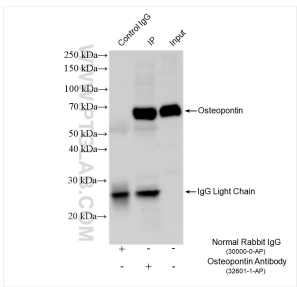
For technical support and original validation data for this product please contact:  
T: 1 (888) 4PTGLAB (1-888-478-4522) (toll free in USA), or 1(312) 455-8498 (outside USA)  
E: [proteintech@ptglab.com](mailto:proteintech@ptglab.com)  
W: [ptglab.com](http://ptglab.com)

This product is exclusively available under Proteintech Group brand and is not available to purchase from any other manufacturer.

Selected Validation Data



Non-treated and LPS and Brefeldin A treated RAW 264.7 cells were subjected to SDS PAGE followed by western blot with 32601-1-AP (Osteopontin antibody) at dilution of 1:1000 incubated at room temperature for 1.5 hours.



IP result of anti-Osteopontin (IP:32601-1-AP, 4ug; Detection:32601-1-AP 1:1000) with LPS and Brefeldin A treated RAW 264.7 cells lysate 2120 ug.