For Research Use Only

OPN, SPP1 Recombinant antibody

Catalog Number:83341-1-RR



Basic Information

Catalog Number:

83341-1-RR

Size: 1000 µg/ml

Source: Rabbit

Isotype:

GenBank Accession Number: BC007016

GeneID (NCBI):

6696

UNIPROT ID: P10451-5

Full Name:

secreted phosphoprotein 1

Calculated MW: 314 aa, 35 kDa Observed MW: 70 kDa, 44-66 kDa **Purification Method:**

Protein A purification

CloneNo.: 240206A2

Recommended Dilutions:

WB 1:1000-1:6000

Applications

Tested Applications:

WB, ELISA

Species Specificity:

Human

Positive Controls:

WB: MOLT-4 cells, HepG2 cells, HEK-293 cells

Background Information

Osteopontin (OPN), also known as SPP1, is a secreted glycophosphoprotein that belongs to the small integrinbinding ligand N-linked glycoprotein (SIBLING) family. Originally isolated from bone, OPN has been found in kidneys, vascular tissues, biological fluids, and various tumor tissues (PMID: 15138464; 16406521). OPN can interact with CD44 and integrins and regulate diverse biological processes. It has a multifaceted role in bone development and remodeling, and is also involved in the inflammatory and immune response, oncogenesis and cancer progression. The very acidic nature of OPN, as well as the presence of variable posttranslational modifications, has led to anomalous migration in SDS-polyacrylamide gels and therefore to reports of different molecular weights for OPN (PMID: 8293561). Depending on the cell and tissue source and/or the SDS-PAGE system, OPN migrates with a molecular weight of 44-80 kDa, as well as at some smaller bands corresponding to peptide fragments (PMID: 8195113; 17890765).

Storage

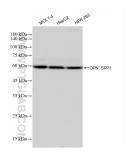
Storage:

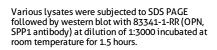
Store at -20°C. Stable for one year after shipment.

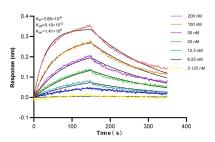
PBS with 0.02% sodium azide and 50% glycerol pH 7.3.

Aliquoting is unnecessary for -20°C storage

Selected Validation Data







Biolayer interferometry (BLL) kinetic assays of 83341-1-RR against Human OPN/SPP1 were performed. The affinity constant is 36.8 nM.