For Research Use Only

ZBP1 Recombinant antibody, PBS Only (Detector)

Catalog Number:84396-2-PBS



Purification Method:

CloneNo.:

241582E2

Protein A purification

Basic Information

Catalog Number: GenBank Accession Number:

84396-2-PBS BC028218

GeneID (NCBI): 100ug, Concentration: 1 mg/ml by 81030

Nanodrop: **UNIPROT ID:** Q9H171 Rabbit

Isotype: Z-DNA binding protein 1

Full Name:

IgG Calculated MW:

Immunogen Catalog Number: 46 kDa

AG4119

Applications

Tested Applications:

IHC, IF/ICC, Cytometric bead array, Sandwich ELISA,

Indirect ELISA, Sample test

Species Specificity:

human

Product Information

84396-2-PBS targets ZBP1 as part of a matched antibody pair:

MP01267-1: 84396-1-PBS capture and 84396-2-PBS detection (validated in Cytometric bead array, Sandwich ELISA)

Unconjugated rabbit recombinant monoclonal antibody in PBS only (BSA and azide free) storage buffer at a concentration of 1 mg/mL, ready for conjugation. Created using Proteintech's proprietary in-house recombinant technology. Recombinant production enables unrivalled batch-to-batch consistency, easy scale-up, and future

This conjugation ready format makes antibodies ideal for use in many applications including: ELISAs, multiplex assays requiring matched pairs, mass cytometry, and multiplex imaging applications. Antibody use should be optimized by the end user for each application and assay.

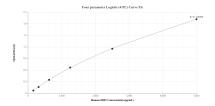
Background Information

ZBP1(Z-DNA-binding protein 1), also named as DAI or DLM-1, is a nucleic acid sensor with some isoforms. It has been reported that ZBP1 can sense the viral nucleic acids of viruses and induce the death of infected cells to prevent virus transmission. ZBP1 can be activated and causes necrocytosis without viral infection, which is associated with nuclear Z-form nucleic acids. ZBP1 can be detected 42 kDa, 55 kDa, 68 kDa isoforms (PMID: 37012234, PMID: 9121465).

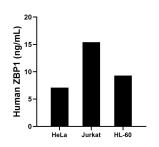
Storage

Storage: Store at -80°C. Storage Buffer: PBS only, pH7.3

Selected Validation Data



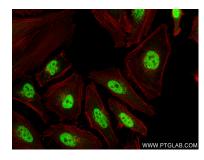
Sandwich ELISA standard curve of MP01267-1, Human ZBP1 Recombinant Matched Antibody Pair -PBS only. 84396-1-PBS was coated to a plate as the capture antibody and incubated with serial dilutions of standard Ag4119. 84396-2-PBS was HRP conjugated as the detection antibody. Range: 156-5000 pg/mL



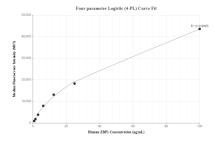
The mean ZBP1 concentration was determined to be 7.1 ng/mL in HeLa cell extract based on a 2.8 mg/mL extract load, 15.4 ng/mL in Jurkat cell extract based on a 1.5 mg/mL extract load and 9.3 ng/mL in HL-60 cell extract based on a 1.4 mg/mL extract load.



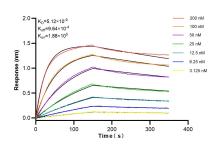
Immunohistochemical analysis of paraffinembedded human colon cancer tissue slide using 84396-2-RR (ZBP1 antibody) at dilution of 1:200 (under 20x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0). This data was developed using the same antibody clone with 84396-2-PBS in a different storage buffer formulation.



Immunofluorescent analysis of (4% PFA) fixed HeLa cells using ZBP1 antibody (84396-2-RR, Clone: 241582E2) at dilution of 1:250 and CoraLite® 488-Conjugated Goat Anti-Rabbit IgG(H+L) (SA00013-2), CL594-Phalloidin (red). This data was developed using the same antibody clone with 84396-2-PBS in a different storage buffer formulation.



Cytometric bead array standard curve of MP01267-1, ZBP1 Recombinant Matched Antibody Pair, PBS Only. Capture antibody: 84396-1-PBS. Detection antibody: 84396-2-PBS. Standard: Ag4119. Range: 0.781-100 ng/mL



Biolayer interferometry (BLL) kinetic assays of 84396-2-RR against Human ZBP1 were performed. The affinity constant is 5.12 nM.