For Research Use Only

## CD38 Recombinant antibody, PBS Only (Capture)

Catalog Number:84070-3-PBS



**Basic Information** 

Catalog Number:

GenBank Accession Number:

**Purification Method:** 

84070-3-PBS

BC007964 GeneID (NCBI): Protein A purification CloneNo.:

100ug, Concentration: 1 mg/ml by

241246E3

Nanodrop: Source:

ENSEMBL Gene ID: ENSG00000004468

Rabbit Isotype:

IgG

**UNIPROT ID:** P28907

Full Name: CD38 molecule Calculated MW:

300 aa, 34 kDa

**Applications** 

**Tested Applications:** 

IHC, Cytometric bead array, Indirect ELISA

Species Specificity:

human

## **Product Information**

84070-3-PBS targets CD38 as part of a matched antibody pair:

MP00991-3: 84070-3-PBS capture and 84070-2-PBS detection (validated in Cytometric bead array)

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 security of supply.

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**

CD38, also known as ADP-ribosyl cyclase 1, is a type II transmembrane glycoprotein with a short N-terminal cytoplasmic tail, a single membrane-spanning domain, and a C-terminal extracellular region with four Nglycosylation sites (PMID: 2319135). The extracellular domain of CD38 has bifunctional enzyme activities that catalyze synthesis of cyclic ADP ribose from nicotinamide adenine dinucleotide (NAD) and hydrolysis of cyclic ADP ribose to adenosine diphosphoribose (PMID: 10636863). CD38 is expressed on a variety of hematopoietic and nonhematopoietic cells and is involved in diverse processes such as generation of calcium-mobilizing metabolites, cell activation, and chemotaxis (PMID: 25938500).

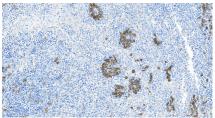
Storage

Storage: Store at -80°C. Storage Buffer: PBS Only

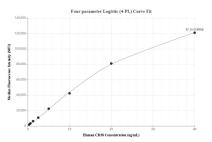
## **Selected Validation Data**



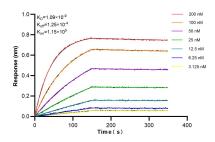
Immunohistochemical analysis of paraffinembedded human tonsillitis tissue slide using 84070-3-RR (CD38 antibody) at dilution of 1:1000 (under 10x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0). This data was developed using the same antibody clone with 84070-3-PBS in a different storage buffer formulation.



Immunohistochemical analysis of paraffinembedded human tonsillitis tissue slide using 84070-3-RR (CD38 antibody) at dilution of 1:1000 (under 40x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0). This data was developed using the same antibody clone with 84070-3-PBS in a different storage buffer formulation.



Cytometric bead array standard curve of MP00991-3, CD38 Recombinant Matched Antibody Pair, PBS Only. Capture antibody: 84070-3-PBS. Detection antibody: 84070-2-PBS. Standard: Eg0110. Range: 0.313-40 ng/mL



Biolayer interferometry (BLI) kinetic assays of 84070-3-RR against Human CD38 were performed. The affinity constant is 1.09 nM.