For Research Use Only

Anti-Mouse CD126/IL-6R alpha Rabbit Recombinant Antibody, PBS Only



Purification Method:

Protein A purfication

CloneNo.:

230371A7

Catalog Number: 98024-1-PBS

Basic Information

Catalog Number: 98024-1-PBS

Size: 1mg, 2 mg/ml

Source:

Rabbit

GenBank Accession Number: NM_010559.3

GeneID (NCBI):

16194

UNIPROT ID: P22272

Full Name: Isotype:

interleukin 6 receptor, alpha

Calculated MW:

50KD

Applications

Tested Applications:

FC, Sandwich ELISA, Indirect ELISA, Sample test

Species Specificity:

mouse

Background Information

Interleukin-6 (IL-6) is a pleiotropic cytokine produced by a variety of cells during infection, trauma, and immunological challenge (PMID: 8274730). IL-6 acts via a receptor complex consisting of two distinct membranebound glycoproteins, an 80-kDa IL-6-binding subunit (IL-6R alpha, CD126, gp80) and a 130-kDa signal-transducing element (gp130, CD130). After binding of IL-6 to membrane-bound IL-6R alpha, the complex of IL-6 and IL-6R alpha associates with gp130, thus activating the receptor (PMID: 9716487). Expression of gp130 is found in almost all organs while expression of IL-6R alpha is predominantly confined to hepatocytes and leukocyte subpopulations (monocytes, neutrophils, T cells, and B cells) (PMID: 11149892).

Storage

Storage:

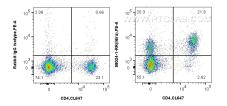
Store at -80°C.

The product is shipped with ice packs. Upon receipt, store it immediately at -80°C

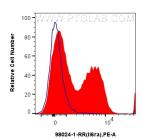
Storage Buffer:

PBS Only

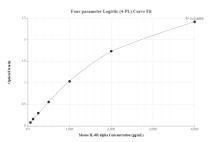
Selected Validation Data



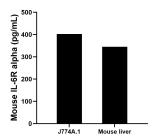
1x10^6 mouse splenocytes were surface stained with 0.25 ug Anti-Mouse CD126/IL-6R alpha Rabbit Recombinant Antibody (98024-1-RR, Clone: 230371A7) or Isotype Control, and PE-conjugated Goat Anti-Rabbit IgG. Cells were then stained with CoraLite® Plus 647 Anti-Mouse CD4. Cells were not fixed. This data was developed using the same antibody clone with 98024-1-PBS in a different storage buffer formulation.



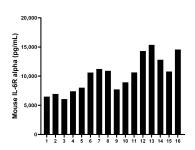
1x10^6 mouse splenocytes were surface stained with 0.25 ug Anti-Mouse CD126/IL-6R alpha Rabbit Recombinant Antibody (98024-1-RR, Clone: 230371A7) (red) or Isotype Control (blue), and PEconjugated Goat Anti-Rabbit IgG. Cells were not fixed. This data was developed using the same antibody clone with 98024-1-PBS in a different storage buffer formulation.



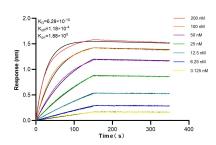
Sandwich ELISA standard curve of MP00182-2, Mouse CD126/IL-6R alpha Monoclonal Matched Antibody Pair - PBS only. 98024-1-PBS was coated to a plate as the capture antibody and incubated with serial dilutions of standard Eg0664. 83209-2-PBS was HRP conjugated as the detection antibody. Range: 62.5-4000 pg/mL



J774A.1 mouse reticulum cell sarcoma macrophage cells (1 x 106 cells/mL) were cultured for 3 days in DMEM containing 10% fetal bovine serum. An aliquot of the cell culture supernatants were removed, assayed for mouse IL-6R alpha, and measured 402.5 pg/mL. Liver tissue from one mouse washomogenized and seeded into 100 mL of RPMI containing 10% fetal bovine serum, 2 mM Leglutamine, 100 U/mL penicillin, 100 μ g/mL streptomycin sulfate, and 50 μ M β -



Serum of sixteen mice were measured. The IL-6R alpha concentration of detected samples was determined to be 10,180.3 pg/mL with a range of 6,065.2-15,362.2 pg/mL



Biolayer interferometry (BLL) kinetic assays of 98024-1 -RR against Mouse IL-6R alpha were performed. The affinity constant is 0.629 nM.