Anti-Mouse PD-1 (29F.1A12) In Vivo Antibody - Low Endotoxin

Product Code: ICH1091

Bulk anti-PD-1 In Vivo Antibody - Low Endotoxin (29F.1A12)

Product Specific Citations:

Majewska, J., Agrawal, A., Mayo, A. et al. p16-dependent increase of PD-L1 stability regulates immunosurveillance of senescent cells. Nat Cell Biol 26, 1336–1345 (2024).

Liang B. et al. SIX4 Controls Anti-PD-1 Efficacy by Regulating STING Expression. Cancer Research Communications (2023) 3 (11): 2412–2419.

Bio X Cell:

ICH1091 is up to 19% cheaper for academia & non-profits and up to 47% cheaper for industry than the equivalent products BE0273 (low endotoxin) and up to 7% for academia & up to 39% cheaper for industry for the the ultra-low endotoxin version from Bio X Cell (BP0273).

Product Benefits:

ichorbio's anti-PD-1 In Vivo Antibody - Low Endotoxin (29F.1A12) is manufactured in a cGMP compliant facility. Click here to view ichorbio’s complete list of anti-PD-1 antibodies and biosimilars. ichorbio: the best antibodies for *in vivo* research.

Target:

PD-1

Clone:

29F.1A12

Size:

ichorbio's 29F.1A12 *in vivo* antibody is available in the following bulk sizes: 1mg, 5mg, 25mg, 50mg and 100mg ichorbio regularly manufactures multi-gram amounts of our anti-PD-1 29F.1A12 clone - please contact us for pricing.

Isotype:

Rat IgG2a

Other Names:

Programmed cell death protein 1, Pdcd1, CD279

Uniprot:

Q02242

Host:

Rat

Species Reactivity:

Mouse, Rat

Specificity:

Anti-PD-1 In Vivo Antibody - Low Endotoxin (29F.1A12) recognizes an epitope on Mouse PD-1. Despite its predicted molecular weight, PD-1 often migrates at higher molecular weight in SDS-PAGE.

Purification Method:

This monoclonal antibody was purified using multi-step affinity chromatography methods such as Protein A or G depending on the species and isotype.

Antigen Distribution:

Induced on splenic T and B lymphocytes, thymocytes, and myeloid cells after stimulation.Subset of double negative thymocytes, activated T and B cells

Background:

Programmed death-1 (PD-1), also know as CD279 is a 50-55 kD glycoprotein belonging to the CD28 family of the Ig superfamily. PD-1 is transiently expressed on CD4 and CD8 thymocytes as well as activated T and B lymphocytes and myeloid cells. Like the clones RMP1-14 and J43 antibodies, the 29F.1A12 antibody has been shown to block the binding of PD-1 to its ligands in vivo.

Immunogen:

PD-1 cDNA followed by PD-1-Ig fusion protein

Concentration:

1.0 - 5.0 mg/ml

Formulation:

0.01 M phosphate buffered saline (PBS) pH 7.2, 150 mM NaCl with no carrier protein, potassium or preservatives added. BSA and Azide free.

Purity:

>95% by SDS-PAGE and HPLC

>98% by SDS-PAGE and HPLC

Endotoxin:

≤ 1.0 EU/mg as determined by the LAL method

≤ 0.75 EU/mg as determined by the LAL method

Aggregation:

Aggregation level ≤ 5%

Aggregation level ≤ 1%

IMPACT Pathogen Test:

We use the IMPACT test generated by IDEXX Laboratories to guarantee our Ultra Low Endotoxin antibodies are pathogen free. Our rat antibodies are tested for: Mycoplasma spp Mycoplasma pulmonis Pneumonia virus of mice Kilham's rat virus Toolan's H1 virus Rat

parvovirus Lymphocytic choriomeningitis virus Rat cytomegalovirus Sendai virus Rat coronavirus Sialodacryoadenitis virus Rat minute virus Seoul virus Mouse adenovirus Reovirus 3 Rat theilovirus

Storage:

This antibody is stable for at least 4 weeks when stored at 2-8°C. For long term storage, aliquot in working volumes without diluting and store at – 20°C or -80°C. Avoid repeated freeze thaw cycles.

Applications:

Flow Cytometry, Western Blot, Blocking, IHC (Frozen)

Application Notes:

Western Blotting: To detect Mouse PD-1 this antibody can be used at a concentration of 30 µg/ml. Blocking: The 29F.1A12 antibody has been shown to block the binding of PD-1 to its ligands in vivo. For immune checkpoint antibodies 200 ug per mouse per injection is the standard dosage in the literature. NOTE: The response is model dependent. We have seen some tumor lines in mice that grow progressively. If we treat the animal with anti-PD-1 (days 3,6,9 @ 200 ug per animal per injection) then the tumor will regress, and disappear. Each investigator should determine their own optimal working dilution for specific applications.

Use:

Products are for research use only.

Isotype Control:

Rat IgG2a In Vivo Isotype Control - Low Endotoxin [1-1] (ICH2244)

Antibodies against the same target:

Anti-PD-1 In Vivo Antibody - Low Endotoxin [RMP1-14] (ICH1132), Anti-PD-1 In Vivo Antibody - Ultra Low Endotoxin [RMP1-14] (ICH1132UL)

Alternative Names:

- CD279 antibody

- CD279 antigen antibody
- hPD 1 antibody
- hPD l antibody
- hPD-1 antibody
- hSLE1 antibody
- PD 1 antibody
- PD-1 antibody
- PD1 antibody
- PDCD 1 antibody
- PDCD1 antibody
- Programmed cell death 1 antibody
- Programmed cell death 1 protein antibody
- Programmed cell death protein 1 antibody
- Protein PD 1 antibody
- Protein PD-1 antibody
- SLEB2 antibody
- Systemic lupus erythematosus susceptibility 2 antibody