

Anti-Mouse IFN gamma Functional Grade Purified

Catalog Number: 16-7312

Also Known As: Interferon-gamma, IFN-g, IFNg

RUO: For Research Use Only

Product Information

Contents: Anti-Mouse IFN gamma Functional Grade Purified

Formulation: aqueous buffer, no sodium azide

REF **Catalog Number:** 16-7312

 **Temperature Limitation:** Store at 2-8°C.

Clone: R4-6A2

LOT **Batch Code:** Refer to Vial

Concentration: 1 mg/ml



Use By: Refer to Vial

Host/Isotype: Rat IgG1, κ

Handling Conditions: Use in sterile environment.

Endotoxin Level: Less than 0.001 ng/ug antibody, as determined by the LAL assay.

Description

The R4-6A2 antibody reacts with mouse interferon- γ (IFN- γ), a homodimeric 15-20 kDa cytokine secreted by Th1 cells. The R4-6A2 antibody is a neutralizing antibody. IFN- γ is an ~20 kDa factor produced by activated T, B and NK cells and is an anti-viral and anti-parasitic cytokine. IFN- γ in synergy with other cytokines, such as TNF- α , inhibits proliferation of normal and transformed cells. Immunomodulatory effects of IFN- γ are exerted on a wide range of cell types expressing the high affinity receptors for IFN- γ . Glycosylation of IFN- γ does not affect its biological activity.

Applications Reported

The R4-6A2 antibody has been reported for use in cytokine neutralization.

Applications Tested

The Functional Grade Purified R4-6A2 antibody has been tested by LAL assay to verify low endotoxin levels and has been tested for ELISA capture and in bioassay for neutralization of IFN- γ bioactivity.

The R4-6A2 antibody at 15 ng/ml has been found to inhibit by 50% the biological effects of 1 ng/ml mouse IFN- γ (ND50), in an EMCV assay of L929 cell protection. Detailed information and protocols about cytokine bioassays and in vitro cytokine neutralization using antibodies can be found in the BestProtocols® section.

The R4-6A2 antibody has been tested as the capture antibody in a sandwich ELISA for analysis of mouse Interferon-gamma (IFN-g) in combination with the biotin XMGI.2 (13-7311) antibody for detection and recombinant mouse IFNg (39-8311) as the standard. A suitable range of concentrations of this antibody for ELISA capture is 1-4 μ g/ml. A standard curve consisting of doubling dilutions of the recombinant standard over the range of 2000 pg/ml - 15 pg/ml should be included in each ELISA plate. Detailed instructions for Cytokine Sandwich ELISA Using Matched Antibody Pairs can be found in the BestProtocols section.

For ELISPOT capture, the Functional Grade Purified AN-18 antibody is recommended.

References

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Kort JJ, Kawamura K, et al. 2006. Efficient presentation of myelin oligodendrocyte glycoprotein peptides but not protein by astrocytes from HLA-DR2 and HLA-DR4 transgenic mice. *J Neuroimmunol.* 173(1-2):23-34. (ELISPOT, PubMed)

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53-7172 Anti-Mouse IL-17A Alexa Fluor® 488 (eBioTC11-18H10.1)

88-7234 Mouse IL-23 ELISA Ready-SET-Go!®

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