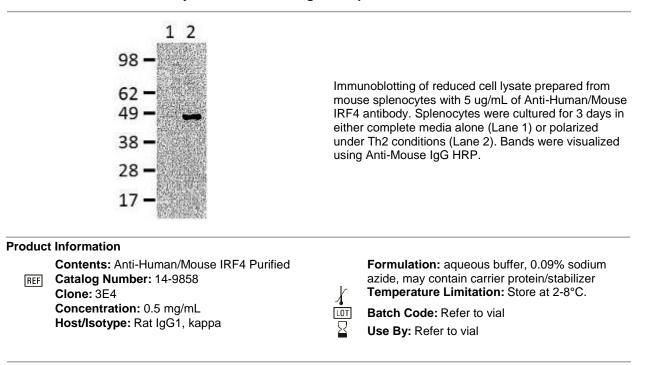


# **Anti-Human/Mouse IRF4 Purified**

Catalog Number: 14-9858 RUO: For Research Use Only. Not for use in diagnostic procedures.



## Description

The monoclonal antibody 3E4 reacts with human and mouse interferon regulatory factor 4 (IRF4). IRF4 is a 52 kDa transcription factor with roles in B cell, T cell and macrophage function. In B cells, IRF4 is highly expressed in mature plasma cells and plays a crucial role in their differentiation. IRF4 has been shown to interact with PU.1 and control the transcription of many B cell-specific genes including *Prdm1*, which encodes Blimp1. In T cells, IRF4 has been implicated in regulatory T (Treg), T helper (Th)2, Th9 and Th17 cell development and function. This transcription factor is upregulated upon T cell activation and is expressed in mature T cells. Studies have shown that IRF4 directly induces Blimp1 expression in Tregs, leading to IL-10 expression. IRF4 has also been demonstrated to be involved in macrophage polarization and regulation. Lastly, in addition to its roles in normal immune function, IRF4 expression has been reported to be upregulated in many blood-related cancers.

## **Applications Reported**

This 3E4 antibody has been reported for use in western blotting.

### **Applications Tested**

This 3E4 antibody has been tested by western blot of reduced cell lysate prepared from splenocytes cultured for 3 days in the presence of plate-bound Anti-Mouse CD3 and soluble Anti-Mouse CD28. This antibody can be used at less than or equal to 5 ug/mL. It is recommended that the antibody be carefully titrated for optimal performance in the assay of interest.

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## **Related Products**

14-4301 Rat IgG1 K Isotype Control Purified