

Anti-MUM1 Picoband Antibody

Catalog # ABO11913

Specification

Anti-MUM1 Picoband Antibody - Product Information

ApplicationWB, IHC-PPrimary AccessionQ15306HostRabbitReactivityHumanClonalityPolyclonalFormatLyophilizedDescriptionRabbit IgG polyclonal antibody for Interferon regulatory factor 4(IRF4) detection. Tested with WB, IHC-P in Human.

Reconstitution Add 0.2ml of distilled water will yield a concentration of 500ug/ml.

Anti-MUM1 Picoband Antibody - Additional Information

Gene ID 3662

Other Names Interferon regulatory factor 4, IRF-4, Lymphocyte-specific interferon regulatory factor, LSIRF, Multiple myeloma oncogene 1, NF-EM5, IRF4, MUM1

Calculated MW 51772 MW KDa

Application Details Immunohistochemistry(Paraffin-embedded Section), 0.5-1 μg/ml, Human, By Heat
Western blot, 0.1-0.5 μg/ml, Human

Subcellular Localization Nucleus.

Tissue Specificity Lymphoid cells.

Protein Name Interferon regulatory factor 4

Contents Each vial contains 5mg BSA, 0.9mg NaCl, 0.2mg Na2HPO4, 0.05mg NaN3.

Immunogen

E.coli-derived human MUM1 recombinant protein (Position: E272-E451). Human MUM1 shares 92% amino acid (aa) sequence identity with mouse MUM1.



Purification Immunogen affinity purified.

Cross Reactivity No cross reactivity with other proteins

Storage

At -20°C for one year. After r°Constitution, at 4°C for one month. It°Can also be aliquotted and stored frozen at -20°C for a longer time.Avoid repeated freezing and thawing.

Sequence Similarities Belongs to the IRF family.

Anti-MUM1 Picoband Antibody - Protein Information

Name IRF4 {ECO:0000303|PubMed:15489334, ECO:0000303|PubMed:8921401}

Function

Transcriptional activator. Binds to the interferon-stimulated response element (ISRE) of the MHC class I promoter. Binds the immunoglobulin lambda light chain enhancer, together with PU.1. Probably plays a role in ISRE-targeted signal transduction mechanisms specific to lymphoid cells. Involved in CD8(+) dendritic cell differentiation by forming a complex with the BATF-JUNB heterodimer in immune cells, leading to recognition of AICE sequence (5'-TGAnTCA/GAAA- 3'), an immune-specific regulatory element, followed by cooperative binding of BATF and IRF4 and activation of genes.

Cellular Location Nucleus. Cytoplasm

Tissue Location Lymphoid cells.

Anti-MUM1 Picoband Antibody - Protocols

Provided below are standard protocols that you may find useful for product applications.

- <u>Western Blot</u>
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- <u>Cell Culture</u>

Anti-MUM1 Picoband Antibody - Images



100KD -70KD -55KD -35KD -25KD -

Anti- MUM1 antibody, ABO11913, Western blottingAll lanes: Anti MUM1 (ABO11913) at 0.5ug/mlWB: Recombinant Human MUM1 Protein 0.5ngPredicted bind size: 38KDObserved bind size: 38KD



Anti- MUM1 antibody, ABO11913, Western blottingAll lanes: Anti MUM1 (ABO11913) at 0.5ug/mlLane 1: HELA Whole Cell Lysate at 40ugLane 2: JURKAT Whole Cell Lysate at 40ugPredicted bind size: 51KDObserved bind size: 40KD



Anti- MUM1 antibody, ABO11913, IHC(P)IHC(P): Human Tonsil Tissue



Anti-MUM1 Picoband Antibody - Background

Interferon regulatory factor 4 (IRF4), also known as MUM1, is a protein that in humans is encoded by the IRF4 gene. It is located on 6p25.3. IRF4 is a transcription factor, and it is essential for the development of T helper-2 (Th2) cells, IL17 -producing Th17 cells, and IL9 -producing Th9 cells. In melanocytic cells, the IRF4 gene may be regulated by MITF. IRF4 is a transcription factor that has been implicated in acute leukemia. This gene is strongly associated with pigmentation, sensitivity of skin to sun exposure, freckles, blue eyes, and brown hair color. What's more, IRF4 inhibition is toxic to myeloma cell lines, regardless of transforming oncogenic mechanism.