

Anti-MyD88 Antibody
Catalog # ABO10975**Specification**

Anti-MyD88 Antibody - Product Information

Application	WB, IHC
Primary Accession	Q99836
Host	Rabbit
Reactivity	Human, Mouse, Rat
Clonality	Polyclonal
Format	Lyophilized

Description

Rabbit IgG polyclonal antibody for Myeloid differentiation primary response protein MyD88(MYD88) detection. Tested with WB, IHC-P in Human;Mouse;Rat.

Reconstitution

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

Anti-MyD88 Antibody - Additional Information

Gene ID 4615

Other Names

Myeloid differentiation primary response protein MyD88, MYD88

Calculated MW

33233 MW KDa

Application Details

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

Subcellular Localization

Cytoplasm .

Tissue Specificity

Ubiquitous. .

Protein Name

Myeloid differentiation primary response protein MyD88

Contents

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

Immunogen

A synthetic peptide corresponding to a sequence in the middle region of human MyD88(174-188aa FVQEMIRQLEQTNYR), different from the related rat and mouse sequences by one amino acid.

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

Contains 1 death domain.

Anti-MyD88 Antibody - Protein Information

Name MYD88 ([HGNC:7562](#))

Function

Adapter protein involved in the Toll-like receptor and IL-1 receptor signaling pathway in the innate immune response (PubMed: [15361868](http://www.uniprot.org/citations/15361868) target="_blank">15361868, PubMed: [18292575](http://www.uniprot.org/citations/18292575) target="_blank">18292575, PubMed: [33718825](http://www.uniprot.org/citations/33718825) target="_blank">33718825, PubMed: [37971847](http://www.uniprot.org/citations/37971847) target="_blank">37971847). Acts via IRAK1, IRAK2, IRF7 and TRAF6, leading to NF-kappa-B activation, cytokine secretion and the inflammatory response (PubMed: [15361868](http://www.uniprot.org/citations/15361868) target="_blank">15361868, PubMed: [19506249](http://www.uniprot.org/citations/19506249) target="_blank">19506249, PubMed: [24316379](http://www.uniprot.org/citations/24316379) target="_blank">24316379). Increases IL-8 transcription (PubMed: [9013863](http://www.uniprot.org/citations/9013863) target="_blank">9013863). Involved in IL-18-mediated signaling pathway. Activates IRF1 resulting in its rapid migration into the nucleus to mediate an efficient induction of IFN-beta, NOS2/INOS, and IL12A genes. Upon TLR8 activation by GU-rich single-stranded RNA (GU- rich RNA) derived from viruses such as SARS-CoV-2, SARS-CoV and HIV-1, induces IL1B release through NLRP3 inflammasome activation (PubMed: [33718825](http://www.uniprot.org/citations/33718825) target="_blank">33718825). MyD88-mediated signaling in intestinal epithelial cells is crucial for maintenance of gut homeostasis and controls the expression of the antimicrobial lectin REG3G in the small intestine (By similarity).

Cellular Location

Cytoplasm. Nucleus

Tissue Location

Ubiquitous..

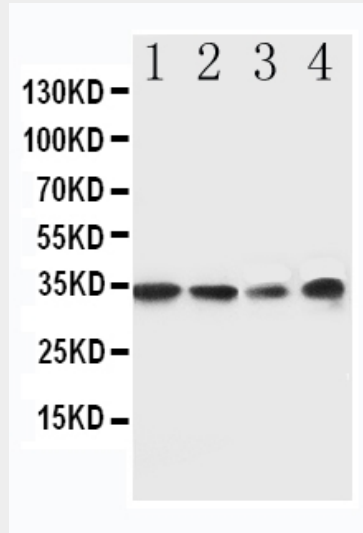
Anti-MyD88 Antibody - Protocols

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

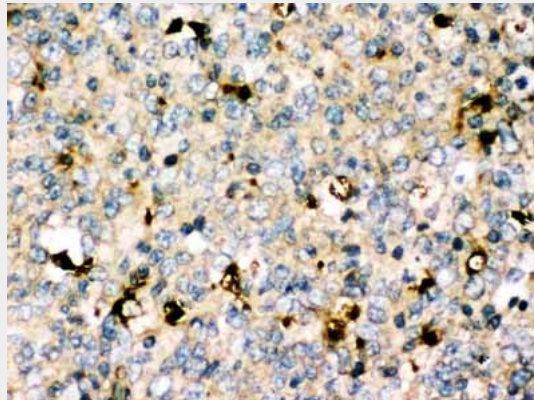
- [Western Blot](#)
- [Blocking Peptides](#)
- [Dot Blot](#)
- [Immunohistochemistry](#)
- [Immunofluorescence](#)

- [Immunoprecipitation](#)
- [Flow Cytometry](#)
- [Cell Culture](#)

Anti-MyD88 Antibody - Images



Anti-MyD88 antibody, ABO10975, Western blotting Lane 1: Rat Spleen Tissue Lysate Lane 2: Rat Thymus Tissue Lysate Lane 3: JURKAT Cell Lysate Lane 4: RAJI Cell Lysate



Anti-MyD88 antibody, ABO10975, IHC(P) IHC(P): Human Tonsil Tissue

Anti-MyD88 Antibody - Background

MYD88 (MYELOID DIFFERENTIATION PRIMARY RESPONSE GENE 88), is a protein that, in humans, is encoded by the MYD88 gene. MyD88 is a key downstream adapter for most Toll-like receptors (TLRs) and interleukin-1 receptors (IL1Rs). And it is mapped on 3p22.2. MYD88 encodes a cytosolic adapter protein that plays a central role in the innate and adaptive immune response. This protein functions as an essential signal transducer in the interleukin-1 and Toll-like receptor signaling pathways. Overexpression of MYD88 caused an increase in the level of transcription from the interleukin-8 promoter. The C-terminal domain of MYD88 has significant sequence similarity to the cytoplasmic domain of IL1RAP. Inhibiting the IL1R-MYD88 pathway in vivo could block the damage from acute inflammation that occurs in response to sterile cell death, and do so in a way that might not compromise tissue repair or host defense against pathogens.

Anti-MyD88 Antibody - Citations

- [DFMG attenuates the activation of macrophages induced by co-culture with LPC-injured HUVE-12 cells via the TLR4/MyD88/NF- \$\kappa\$ B signaling pathway.](#)

