

MyD88 Antibody

Rabbit Polyclonal Antibody Catalog # ABV10189

Specification

MyD88 Antibody - Product Information

Application WB
Primary Accession O6Y1S1

Reactivity Human, Mouse, Rat, Monkey

Host Rabbit
Clonality Polyclonal
Isotype Rabbit IgG
Calculated MW 33856

MyD88 Antibody - Additional Information

Gene ID 301059

Positive Control Rat kidney tissue lysate

Application & Usage

Western Blot analysis (0.5-4 µg/ml).

However, the optimal concentrations should be determined individually.

Blocking peptide is available separately.

Other Names

Myeloid differentiation primary response protein, MyD88

Target/Specificity

MYD88

Antibody Form

Liquid

Appearance

Colorless liquid

Formulation

 $100~\mu g$ (0.5 mg/ml) affinity purified rabbit anti- MyD88 polyclonal antibody in phosphate buffered saline (PBS), pH 7.2, containing 30% glycerol, 0.5% BSA, 5 mM EDTA and 0.01% thimerosal

Handling

The antibody solution should be gently mixed before use.

Reconstitution & Storage

-20 °C

Background Descriptions

Precautions

MyD88 Antibody is for research use only and not for use in diagnostic or therapeutic procedures.



MyD88 Antibody - Protein Information

Name Myd88

Function

Adapter protein involved in the Toll-like receptor and IL-1 receptor signaling pathway in the innate immune response. Acts via IRAK1, IRAK2, IRF7 and TRAF6, leading to NF-kappa-B activation, cytokine secretion and the inflammatory response. Increases IL-8 transcription. 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, induces IL1B release through NLRP3 inflammasome activation (By similarity). 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

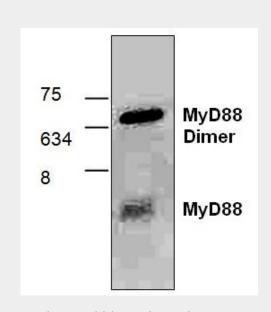
Cytoplasm {ECO:0000250|UniProtKB:Q99836}. Nucleus {ECO:0000250|UniProtKB:Q99836}

MyD88 Antibody - Protocols

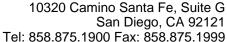
Provided below are standard protocols that you may find useful for product applications.

- Western Blot
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- Cell Culture

MyD88 Antibody - Images



Western blot analysis of MyD88 using rat kidney tissue lysate.





MyD88 Antibody - Background

MyD88 was identified as an adapter molecule in the IL-1 signaling pathway. MyD88 associates with and recruits IRAK to the IL-1 receptor complex in response to IL-1 treatment. Dominant-negative form of MyD88 attenuates IL-1R-mediated NF
B activation. MyD88 is also employed as a regulator molecule by IL-18 receptor and human Toll receptor, which are members in the Toll/IL-1R family of receptors. Targeted disruption of the MyD88 gene results in loss of cellular responses to IL-1 and IL-18. MyD88 is a general adaptor protein for the Toll/IL-1R family of receptors and plays an important role in the inflammatory response induced by cytokines IL-1 and IL-18 and endotoxin. MyD88 gene is expressed in many tissues.