

## Basic Information

Product Name	Anti-TLR4 Antibody	
Gene Name	TLR4	
Source	Rabbit	
Clonality	Polyclonal	
Isotype	IgG	
Species Reactivity	human	
Tested Application	WB, IHC	
Contents	500 ug/ml antibody with PBS, 0.02% NaN <sub>3</sub> , 1 mg/ml BSA and 50% glycerol.	
Immunogen	A synthetic peptide corresponding to a sequence at the N-terminus of human TLR4.	
Concentration	500 ug/ml	
Purification	Immunogen affinity purified.	
Observed MW	96 kDa	
Dilution Ratios	Western blot (WB): 1:500-2000 Immunohistochemistry (IHC): 1:50-400 (Boiling the paraffin sections in 10mM citrate buffer, pH6.0, or PH8.0 EDTA repair liquid for 20 mins is required for the staining of formalin/paraffin sections.) Optimal working dilutions must be determined by end user.	

## Storage

12 months from date of receipt, -20°C as supplied.

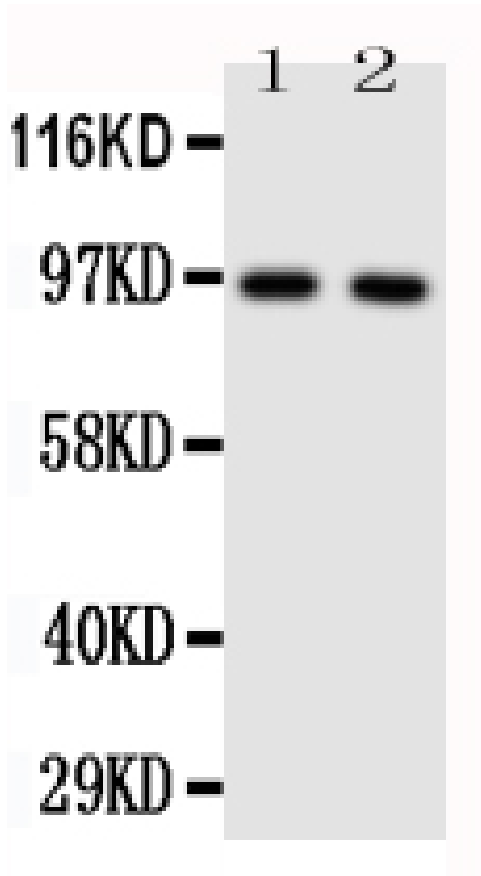
## Background Information

TLR4, Toll-like receptor 4, is a protein that in humans is encoded by the TLR4 gene. TLR 4 is a toll-like receptor. TLR4, the human homolog of Drosophila Toll, is a type I transmembrane protein with an extracellular domain consisting of a leucine-rich repeat region and an intracellular domain homologous to that of human interleukin-1 receptor. The TLR4 gene is mapped to chromosome 9q32-q33 by fluorescence in situ hybridization. It detects lipopolysaccharide from Gram-negative bacteria and is thus important in the activation of the innate immune system. The protein encoded by this gene is a member of the Toll-like receptor (TLR) family, which plays a fundamental role in pathogen recognition and activation of innate immunity. TLRs are highly conserved from Drosophila to humans and share structural and functional similarities. They recognize pathogen-associated molecular patterns (PAMPs) that are expressed on infectious agents, and mediate the production of cytokines necessary for the development of effective immunity.

## Reference

Anti-TLR4 Antibody被引用在71文献中。

## Selected Validation Data

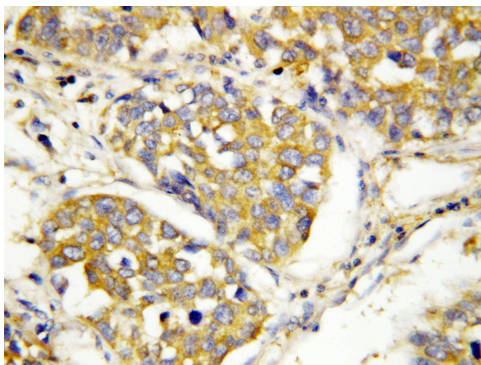


Western blot analysis of TLR4 using anti-TLR4 antibody (BA1717). The sample well of each lane was loaded with 30 ug of sample under reducing conditions.

Lane 1: HELA whole cell lysates ,

Lane 2: SMMC whole cell lysates.

After electrophoresis, proteins were transferred to a membrane. Then the membrane was incubated with rabbit anti-TLR4 antigen affinity purified polyclonal antibody (BA1717) at a dilution of 1:1000 and probed with a goat anti-rabbit IgG-HRP secondary antibody (Catalog # BA1054). The signal is developed using ECL Plus Western Blotting Substrate (Catalog # AR1197). A specific band was detected for TLR4 at approximately 96 kDa. The expected band size for TLR4 is at 96 kDa.



IHC analysis of TLR4 using anti-TLR4 antibody (BA1717).

TLR4 was detected in a paraffin-embedded section of human lung cancer tissue. The tissue section was incubated with rabbit anti-TLR4 Antibody (BA1717) at a dilution of 1:200 and developed using HRP Conjugated Rabbit IgG Super Vision Assay Kit (Catalog # SV0002) with DAB (Catalog # AR1027) as the chromogen.