# PRODUCT DATA SHEET



# Complex Biotech Co., Ltd

# **CD284 Recombinant Protein**

Catalog: BCP3515 Host: E.coli Tag: His-tag

#### BackGround:

Members of the Toll-like receptor (TLR) family, named for the closely related Toll receptor in Drosophila, play a pivotal role in innate immune responses. TLRs recognize conserved motifs found in various pathogens and mediate defense responses. Triggering of the TLR pathway leads to the activation of NF-kB and subsequent regulation of immune and inflammatory genes. The TLRs and members of the IL-1 receptor family share a conserved stretch of approximately 200 amino acids known as the Toll/Interleukin-1 receptor (TIR) domain. Upon activation, TLRs associate with a number of cytoplasmic adaptor proteins containing TIR domains, including myeloid (MyD88), differentiation factor 88 MyD88-adaptor-like/TIR-associated protein (MAL/TIRAP), Toll-receptor-associated activator of interferon (TRIF), and Toll-receptor-associated molecule (TRAM). This association leads to the recruitment and activation of IRAK1 and IRAK4, which form a complex with TRAF6 to activate TAK1 and IKK. Activation of IKK leads to the degradation of IκB, which normally maintains NF-κB in an inactive state by sequestering it in the cytoplasm.

Toll-like receptor 4 (TLR4) functions in association with MD-2 in the recognition and initiation of immune responses elicited by lipopolysaccharide (LPS) of Gram-negative bacteria. TLR4 triggers the activation of NF-κB, IRF-3, and MAPK pathways leading to the production of inflammatory cytokines.

#### **Product:**

PBS, 4M Urea, PH7.4

### **Molecular Weight:**

~60kDa

#### **Swiss-Prot:**

O00206

## **Purification&Purity:**

Transferred into competent cells and the supernatant was purified by NI column affinity chromatography and the purity is > 85% (by SDS-PAGE).

#### **Restriction Sites:**

NdeI-XhoI

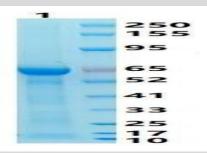
### Storage&Stability:

Store at  $4\,\mathrm{C}$  short term. Aliquot and store at  $-20\,\mathrm{C}$  long term. Avoid freeze-thaw cycles.

#### **Expression Vector:**

pet-22b(+)

## **DATA:**



## Note:

For research use only, not for use in diagnostic procedure.