

**PRODUCT INFORMATION**

<b>Tag</b>	C-Flag Tag
<b>Target</b>	TLR2
<b>Synonyms</b>	CD282; TIL4
<b>Description</b>	Human TLR2 full length protein-synthetic nanodisc
<b>Delivery</b>	In Stock
<b>Uniprot ID</b>	O60603
<b>Expression Host</b>	HEK293
<b>Protein Families</b>	Druggable Genome, Transmembrane
<b>Protein Pathways</b>	Toll-like receptor signaling pathway
<b>Molecular Weight</b>	The human full length TLR2 protein has a MW of 89.8 kDa
<b>Formulation &amp; Reconstitution</b>	Lyophilized from nanodisc solubilization buffer (20 mM Tris-HCl, 150 mM NaCl, pH 8.0). Normally 5% - 8% trehalose is added as protectants before lyophilization. Please see Certificate of Analysis for specific instructions. Do not use solvents with a pH below 6.5 or those containing high concentrations of divalent metal ions (greater than 5 mM) in subsequent experiments.
<b>Storage &amp; Shipping</b>	Store at -20°C to -80°C for 12 months in lyophilized form. After reconstitution, if not intended for use within a month, aliquot and store at -80°C (Avoid repeated freezing and thawing). Lyophilized proteins are shipped at ambient temperature.
<b>Background</b>	The protein 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 <i>Drosophila</i> to humans and share structural and functional similarities. This protein is a cell-surface protein that can form heterodimers with other TLR family members to recognize conserved molecules derived from microorganisms known as pathogen-associated molecular patterns (PAMPs). Activation of TLRs by PAMPs leads to an up-regulation of signaling pathways to modulate the host's inflammatory response. This gene is also thought to promote apoptosis in response to bacterial lipoproteins. This gene has been implicated in the pathogenesis of several autoimmune diseases. Alternative splicing results in multiple transcript variants.
<b>Usage</b>	Research use only
<b>Conjugate</b>	Unconjugated



### ELISA assay to evaluate TLR2-Nanodisc 0.2 $\mu$ g Human TLR2-Nanodisc per well

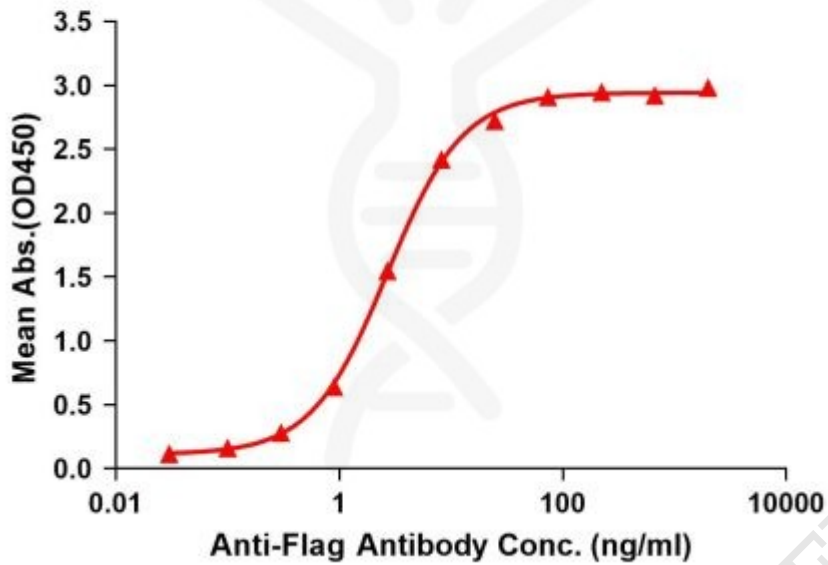


Figure1. Elisa plates were pre-coated with Flag Tag TLR2-Nanodisc (0.2 $\mu$ g/per well). Serial diluted anti-Flag monoclonal antibody solutions were added, washed, and incubated with secondary antibody before Elisa reading. From above data, the EC50 for anti-Flag monoclonal antibody binding with TLR2-Nanodisc is 2.685ng/ml.



Figure2. Human TLR2-Nanodisc, Flag Tag on SDS-PAGE

