

PRODUCT INFORMATION

Target	TNFA
Synonyms	DIF;TNF-alpha;TNFA;TNFSF2;cachexin;cachectin;TNF α
Description	Recombinant human TNF α protein with C-terminal 6 \times His tag
Delivery	In Stock
Uniprot ID	P01375
Expression Host	HEK293
Tag	C-6 \times His Tag
Molecular Characterization	TNF α (Arg78-Leu233) 6 \times His tag
Molecular Weight	The protein has a predicted molecular mass of 18.1 kDa after removal of the signal peptide.
Purity	The purity of the protein is greater than 95% as determined by SDS-PAGE and Coomassie blue staining.
Formulation & Reconstitution	Lyophilized from sterile PBS, pH 7.4. Normally 5% - 8% trehalose is added as protectants before lyophilization. Please see Certificate of Analysis for specific instructions of reconstitution.
Storage & Shipping	Store at -20 $^{\circ}$ C to -80 $^{\circ}$ C for 12 months in lyophilized form. After reconstitution, if not intended for use within a month, aliquot and store at -80 $^{\circ}$ C (Avoid repeated freezing and thawing). Lyophilized proteins are shipped at ambient temperature.
Background	This gene encodes a multifunctional proinflammatory cytokine that belongs to the tumor necrosis factor (TNF) superfamily. This cytokine is mainly secreted by macrophages. It can bind to, and thus functions through its receptors TNFRSF1A/TNFR1 and TNFRSF1B/TNFR2. This cytokine is involved in the regulation of a wide spectrum of biological processes including cell proliferation, differentiation, apoptosis, lipid metabolism, and coagulation. This cytokine has been implicated in a variety of diseases, including autoimmune diseases, insulin resistance, and cancer. Knockout studies in mice also suggested the neuroprotective function of this cytokine.
Usage	Research use only



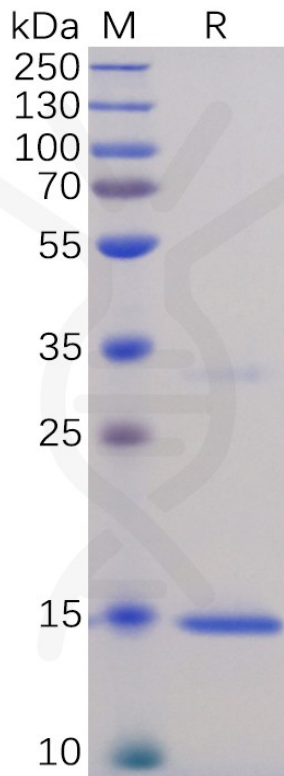


Figure 1. Human TNF α Protein, His Tag on SDS-PAGE under reducing condition.

Human TNF α , His Tagged protein ELISA

0.1 μ g of Human TNF α , His Tagged protein per well

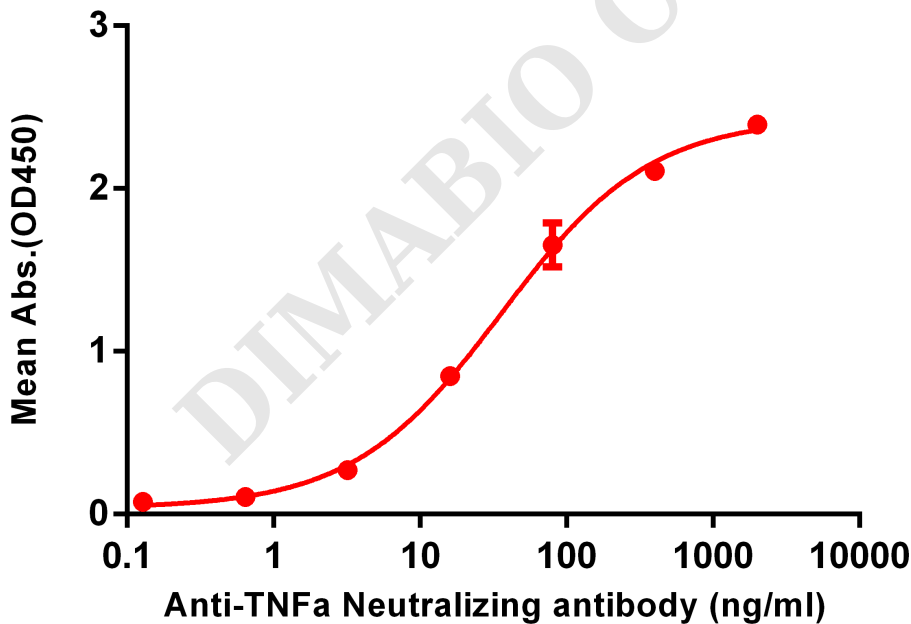


Figure 2.ELISA plate pre-coated by 1 μ g/ml (100 μ l/well) Human TNF α , His tagged protein (PME100076) can bind Anti-TNF α Neutralizing antibody ([getskuurl sku="BME100056"]) in a linear range of 0.64-16 ng/ml.



Human TNF α , His Tagged protein ELISA

0.2 μ g of Human TNF α , His tagged protein per well

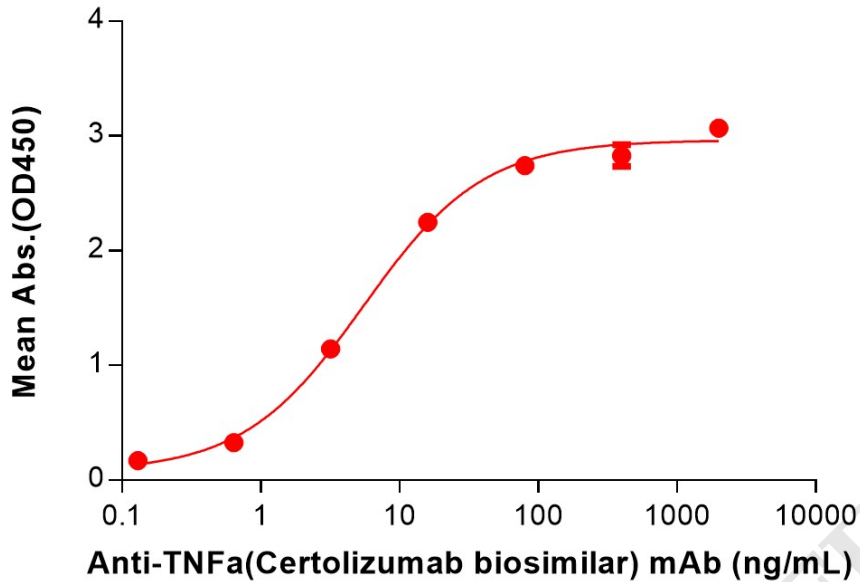


Figure 3. ELISA plate pre-coated by 2 μ g/mL (100 μ L/well) Human TNF α Protein, His Tag (PME100076) can bind Anti-TNF α (Certolizumab biosimilar) mAb (BME100183) in a linear range of 0.64–16 ng/mL.

Human TNF α , His Tagged protein ELISA

0.2 μ g of Human TNF α , His tagged protein per well

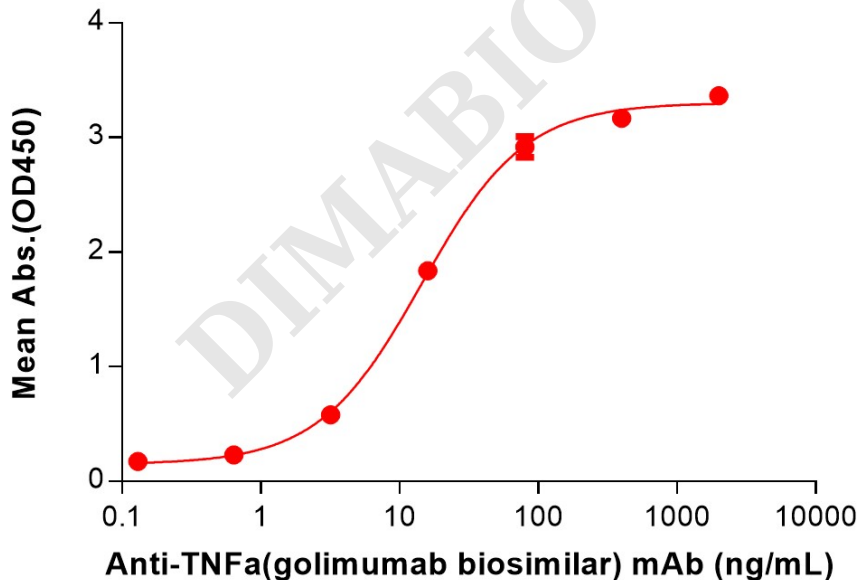


Figure 4. ELISA plate pre-coated by 2 μ g/mL (100 μ L/well) Human TNF α Protein, His Tag (PME100076) can bind Anti-TNF α (golimumab biosimilar) mAb (BME100179) in a linear range of 3.20–80 ng/mL.

