

CD40 Ligand Protein, Human, Recombinant

General Information

Synonyms:	CD40LG;CD40 Ligand;TRAP;TNF-Related Activation Protein;TNFSF5;Tumor Necrosis Factor Ligand Superfamily Member 5;T-Cell Antigen Gp39;CD40-L;CD154;CD40L
Protein Construction:	Met113-Leu261
Species:	Human
Expression Host:	E. coli
Accession:	P29965
Molecular Weight:	15 KDa (reducing condition)
AA Sequence:	Met113-Leu261

QC Testing

Biological Activity:	1. Loaded Human CD40-His on HIS1K Biosensor, can bind Human CD40L with an affinity constant of 2.43 nM as determined in BLI assay. (Regularly tested) 2. Immobilized Human CD40-Fc at 5µg/ml (100 µl/well) can bind Human CD40L. The ED50 of Human CD40L is 6.05 ng/ml. (Regularly tested)
Purity:	Greater than 95% as determined by reducing SDS-PAGE. Greater than 95% as determined by SEC-HPLC.
Endotoxin:	< 0.1 ng/µg (1 EU/µg) as determined by LAL test.
Formulation:	Lyophilized from a solution filtered through a 0.22 µm filter, containing 20 mM PB, 200 mM NaCl, 0.1 mM EDTA, pH 7.0.

Preparation and Storage

Reconstitution:

Reconstitute the lyophilized protein in distilled water. The product concentration should not be less than 100 µg/ml. Before opening, centrifuge the tube to collect powder at the bottom. After adding the reconstitution buffer, avoid vortexing or pipetting for mixing.

Stability & Storage:

Lyophilized powders can be stably stored for over 12 months, while liquid products can be stored for 6-12 months at -80°C. For reconstituted protein solutions, the solution can be stored at -20°C to -80°C for at least 3 months. Please avoid multiple freeze-thaw cycles and store products in aliquots.

Actual storage temperature shall be subject to the COA.

Shipping:

In general, lyophilized powders are shipped with blue ice, while solutions are shipped with dry ice.

Protein Background

CD40 Ligand (CD40LG) is a type II transmembrane glycoprotein that belongs to the TNF superfamily. Like other TNF superfamily members, CD40LG exists as a trimer in membrane bound and soluble form, both of which are

A DRUG SCREENING EXPERT

bioactive. CD40LG is a ligand for CD40; its ligation also initiates signal transduction in CD40LG expressing cells. CD40LG is a differentiation antigen that is expressed on the surface of T-cells. It stimulates B-cell proliferation and secretion of all immunoglobulin isotypes in the presence of cytokines. CD40LG has been shown to induce cytokine production and tumoricidal activity in peripheral blood monocytes. It also co-stimulates proliferation of activated T-cells and this is accompanied by the production of IFN-gamma, TNF-alpha, and IL2.

Inhibitor · Natural Compounds · Compound Libraries · Recombinant Proteins

This product is for Research Use Only · Not for Human or Veterinary or Therapeutic Use

Tel:781-999-4286 E_mail:info@targetmol.com Address:34 Washington Street,Wellesley Hills,MA 02481