Data Sheet (Cat.No.TMPK-00152)

TargetMol

CD27/TNFRSF7 Protein, Cynomolgus, Recombinant (His)

General Information

Synonyms:	CD27 antigen;S152. LPFS2;S152;TNFRSF7;Tp55;T14
Protein Construction:	Thr21-Ile192
Species:	Cynomolgus
Expression Host:	HEK293 Cells
Accession:	G7N5M1
Molecular Weight:	20.41 kDa (predicted). Due to glycosylation, the protein migrates to 42-52 kDa based on Tris-Bis PAGE result.

QC Testing

Biological Activity:	Immobilized Cynomolgus CD27, His Tag at 1μg/ml (100μl/well) on the plate. Dose response curve for Human CD27 Ligand, hFc Tag with the EC50 of 0.23μg/ml determined by ELISA.
Purity:	> 95% as determined by Tris-Bis PAGE; > 95% as determined by HPLC
Endotoxin:	< 1.0 EU/μg of the protein as determined by the LAL method.
Formulation:	Lyophilized from a solution filtered through a 0.22 μm filter, containing PBS (pH 7.4). Typically, 8% trehalose is incorporated as a protective agent before lyophilization.

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:

It is recommended to store recombinant proteins at -20°C to -80°C for future use. 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

CD27, also known as TNFRSF7, is an approximately 55 kDa transmembrane protein in the TNF receptor superfamily. It functions as a co-stimulatory molecule that supports lymphocyte activation and survival. It binds to ligand CD70, and plays a key role in regulating B-cell activation and immunoglobulin synthesis.

Reference

Buchan S L, et al. The immunobiology of CD27 and OX40 and their potential as targets for cancer immunotherapy [J]. Blood, 2017:blood-2017-07-741025.