

Recombinant Protein Technical Manual Recombinant Human CD80/B7 Protein (mFc Tag)

RPES4935

Product Data:

Product SKU: RPES4935 **Size:** 10μg

Species: Human Cells

Uniprot: P33681

Protein Information:

Molecular Mass: 50.5 kDa

AP Molecular Mass: 70-95 kDa

Tag: C-mFc

Bio-activity:

Purity: > 95% as determined by reducing SDS-PAGE.

Endotoxin: $< 1.0 \text{ EU per } \mu\text{g}$ as determined by the LAL method.

Storage: Lyophilized protein should be stored at < -20°C, though stable at room

temperature for 3 weeks. Reconstituted protein solution can be stored at 4-7°C for 2-7 days. Aliquots of reconstituted samples are stable at < -20°C for 3 months.

Shipping: This product is provided as lyophilized powder which is shipped with ice packs.

Formulation: Lyophilized from a 0.2 µm filtered solution of PBS, pH 7.4.

Reconstitution: Please refer to the printed manual for detailed information.

Application:

Synonyms: CD80; Activation B7 antigen; B7; BB1; CD28LG1; CD28LGB7 antigen; T-lymphocyte

activation antigen CD80;B7;B7.1;CD28LG;LAB7

Immunogen Information:

Sequence: Val35-Leu242

Background:

Cluster of Differentiation 80, also called B7, is a member of cell surface immunoglobulin superfamily which plays key, yet distinct roles in the activation of T cells. It is the ligand for two different proteins on the T cell surface: CD28 and CTLA-4. Studies have shown that CTLA-4 binds mostly to CD80. The structure presents two extracellular domains: a membrane distal variable-like domain (IgV) and a membrane proximal Ig constant-like domain (IgC) along with an intracellular domain. Both IgV and IgC consist of anti-parallel beta sandwiches joined by a short linker region. CD80 is mostly expressed on the surface of antigen-presenting cells including activated B cells, macrophages and dendritic cells.