

Recombinant Mouse IL-7 (C-6His)**Catalog No.: RP0058****Basic Information****Information**

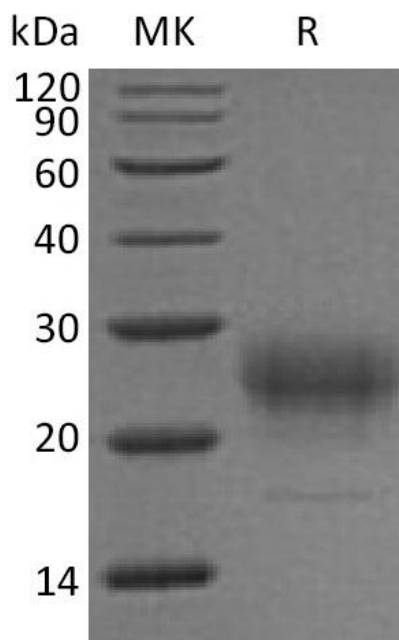
Source	<i>Human Cells</i>
Description	Recombinant Mouse Interleukin-7 is produced by our Mammalian expression system and the target gene encoding Glu26-Ile154 is expressed with a 6His tag at the C-terminus.
Accession	P10168
Known As	IL-7; IL-7 interleukin-7; interleukin-7; Lymphopoietin -1; PBGF
Predicted Mol Mass	15.9 KDa
Apparent Mol Mass	22-28 KDa, reducing conditions

Properties

Formulation	Lyophilized from a 0.2 µm filtered solution of PBS, pH 7.4.
Storage	Lyophilized protein should be stored at ≤ -20°C, stable for one year after receipt. Reconstituted protein solution can be stored at 2-8°C for 2-7 days. Aliquots of reconstituted samples are stable at ≤ -20°C for 3 months.
Endotoxin	< 1 EU/µg as determined by LAL test.
Reconstitution	Always centrifuge tubes before opening. Do not mix by vortex or pipetting. It is not recommended to reconstitute to a concentration less than 100 µg/ml. Dissolve the lyophilized protein in distilled water. Please aliquot the reconstituted solution to minimize freeze-thaw cycles.
Shipping	The product is shipped at ambient temperature. Upon receipt, store it immediately at the temperature listed below.

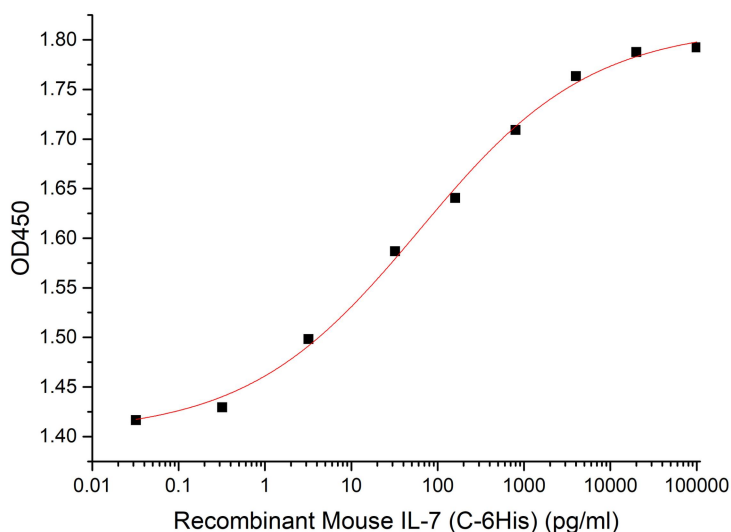
Experimental Data

Purity-SDS-PAGE



Greater than 95% as determined by reducing SDS-PAGE. (QC verified)

Bioactivity-Cell Based Assay



Measured in a cell proliferation assay using PHA-activated human peripheral blood lymphocytes (PBL). The ED50 for this effect is 60-1000 pg/ml. (QC verified)

Background

Mouse interleukin-7(IL-7) is the member of hemopoietin family which is important to the differentiation, proliferation, and survival of lymphocyte. Mouse IL-7 shares approximately 88% aa sequence identity with rat IL-7 and 58-60% with human, equine, bovine, ovine, porcine, feline and canine IL-7. It is widely expressed in primary and secondary lymphoid tissues cell and stromal epithelial cells of the thymus, bone marrow, and intestines. IL-7 activation of IL-7 R alpha is critical for both T cell and B cell lineage development. It is important for proliferation during certain stages of B-cell maturation. IL-7 contributes to the maintenance of all naïve and memory T cells, mainly by promoting expression of the anti-apoptotic protein Bcl-2. It is required for optimal T cell-dendritic cell interaction.