

Human EPO/Erythropoietin Protein

Cat. No. EPO-HM001

Description

Source	Recombinant Human EPO/Erythropoietin Protein is expressed from HEK293 without tag. It contains Ala28-Arg193.
Accession	AAH93628.1
Molecular Weight	The protein has a predicted MW of 18.39 kDa. Due to glycosylation, the protein migrates to 35-45 kDa based on Bis-Tris PAGE result.
Endotoxin	Less than 0.1EU per μg by the LAL method.
Purity	> 95% as determined by Bis-Tris PAGE > 95% as determined by HPLC

Formulation and Storage

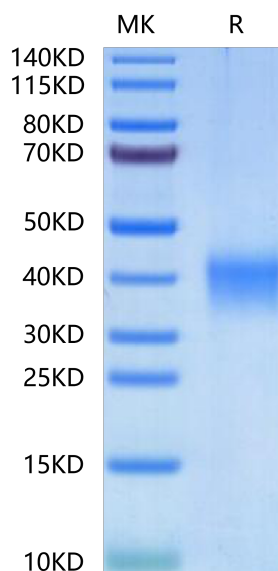
Formulation	Lyophilized from 0.22 μm filtered solution in PBS (pH 7.4). Normally 8% trehalose is added as protectant before lyophilization.
Reconstitution	Centrifuge the tube before opening. Reconstituting to a concentration more than 100 $\mu\text{g}/\text{ml}$ is recommended. Dissolve the lyophilized protein in distilled water.
Storage	-20 to -80°C for 12 months as supplied from date of receipt. -80°C for 3 months after reconstitution. Recommend to aliquot the protein into smaller quantities for optimal storage. Please minimize freeze-thaw cycles.

Background

Erythropoietin (EPO) is a circulating hormone conventionally considered to be responsible for erythropoiesis. In addition to facilitating red blood cell production, EPO has pluripotent potential, such as for cognition improvement, neurogenesis, and anti-fibrotic, anti-apoptotic, anti-oxidative, and anti-inflammatory effects.

Assay Data

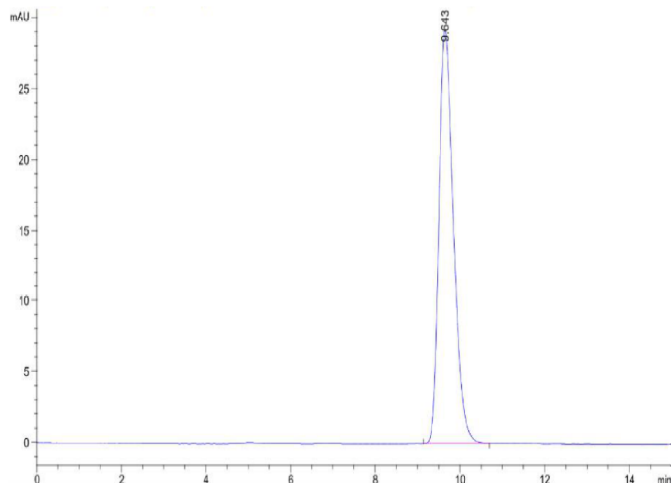
Bis-Tris PAGE



Human EPO on Bis-Tris PAGE under reduced condition. The purity is greater than 95%.

SEC-HPLC

Assay Data

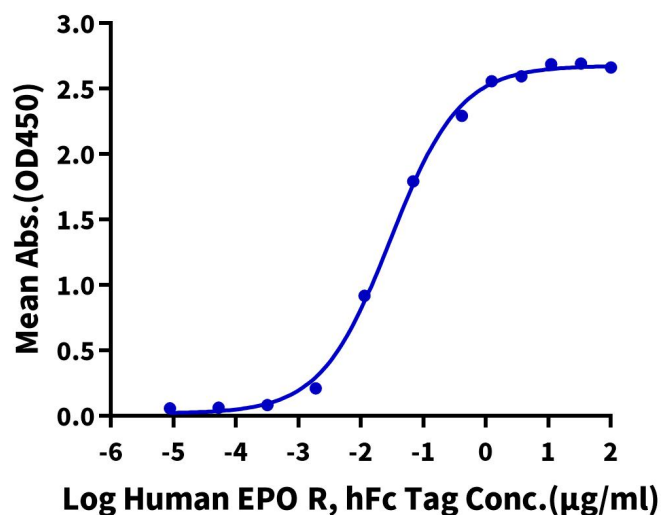


The purity of Human EPO is greater than 95% as determined by SEC-HPLC.

ELISA Data

Human EPO, No Tag ELISA

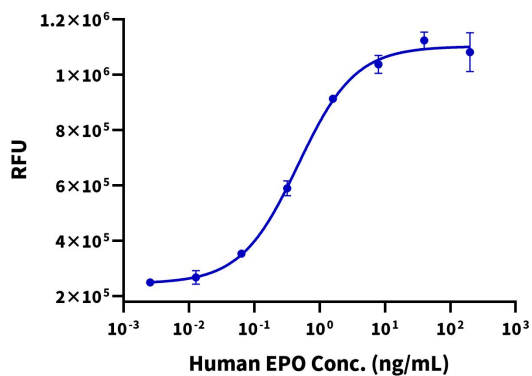
0.1µg Human EPO, No Tag Per Well



Immobilized Human EPO, No Tag at 1µg/ml (100µl/well) on the plate. Dose response curve for Human EPO R, hFc Tag with the EC50 of 29.7ng/ml determined by ELISA.

Cell Based Assay

Recombinant Human EPO Bioactivity



Measured in a cell proliferation assay using TF1 human erythroleukemic cells. The ED50 for this effect is 0.4 1 ng/mL (QC Test).