

# Human SCF, His Tag, E. coli

Catalog Number LDG173PHE

**Package** 5 μg / 20 μg / 100 μg / Customized package

For full product information, images and publications, please visit our website.



### **Specifications**

**Species of Origin** 

Human

**Affinity Tag** 

His Tag (C-term)

**Purity** 

>98% as determined by SDS-PAGE analysis.

**Activity** 

Measure by its ability to induce TF-1 cells proliferation. The ED $_{50}$  for this effect is <5 ng/mL. The specific activity of recombinant human SCF is > 5 x  $10^5$  IU/mg.

Form

Lyophilized

**Expression System** 

Escherichia coli

**Storage Buffer** 

Lyophilized from a 0.2  $\mu m$  filtered solution of PBS, pH 7.4.

**Molecular Weight** 

The protein has a calculated MW of 19.4 kDa. The protein migrates as 21 kDa under reducing condition (SDS-PAGE analysis).

**Endotoxin Level** 

<0.1 EU per 1  $\mu g$  of the protein by the LAL method.

**Background** 



#### **Background**

Stem Cell Factor (SCF) is a 166-amino-acid protein with a monomeric molecular weight of approximately 18.5 kDa. SCF is the ligand for the tyrosine kinase receptor c-kit, which regulates other Growth Factorss, such as granulocyte colony-stimulating factor (G-CSF), granulocyte macrophage-colony-stimulating factor (GM-CSF), and interleukin-3 to stimulate proliferation, and differentiation of hematopoietic stem cells. SCF can be produced by a variety of cells, including fibroblasts, smooth muscle, endothelial cells, mast cells and bone marrow macrophages endothelial cells.

**Synonyms** 

Stem cell factor, Mast cell Growth Factors , MGF, c-Kit ligand, Kit ligand

**Uniprot ID** 

#P21583

**Sequence Note** 

Glu26-Ala189

### Instruction

#### Reconstitution

It is recommended to reconstitute the lyophilized protein in sterile  $H_2O$  to a concentration not less than 200  $\mu$ g/mL and incubate the stock solution for at least 20 min to ensure sufficient redissolved.

## Shipping

The product is shipped with polar packs. Upon receipt, store it immediately at -20°C or lower for long term storage.

#### **Stability & Storage**

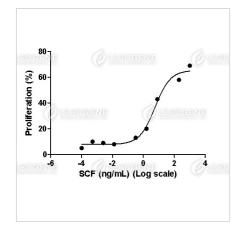
This product is stable after storage at:

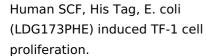
- -20°C for 12 months in lyophilized state from date of receipt.
- -20°C or -80°C for 1 month under sterile conditions after reconstitution.

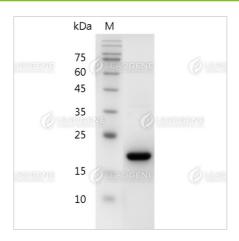
Avoid repeated freeze/thaw cycles.



# **Image**







SDS-PAGE analysis of recombinant human SCF.

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