

**CHASELECTION****Recombinant Mouse SCF, Tag Free**

货号(Catalog Number): CY172FXXXX(L)

**别名(synonym):**

Mast cell growth factor; MGF; MGFSHEP7;

SCF;c-kit Ligand; DCUA; DFNA69; Kitl; KITLG

**来源(Source):**

Human embryonic kidney cell, HEK293-derived mouse SCF/c-kit Ligand protein

**蛋白结构 (Structure):**

该蛋白不含标签

**基因 ID:** P20826**氨基酸序列:**

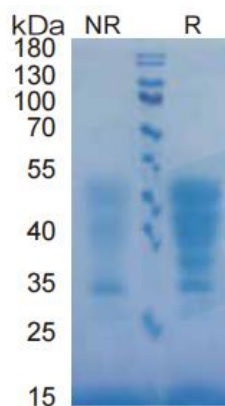
Lys26-Ala189

**分子量大小(MW):**

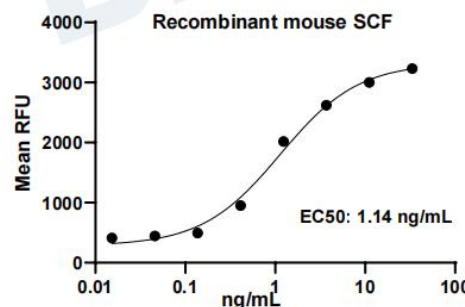
18.3 kDa

**纯度 (Purity):**

&gt; 95%, determined by SDS-PAGE

**SDS-PAGE**

4 ug/lane protein was resolved with SDS-PAGE under non-reducing (NR) and reducing (R) conditions and visualized by CoomassieBlue staining.

**活性检测 (Biological Activity):**

Recombinant mouse SCF/c-kit stimulates cell proliferation of the TF-1 human erythroleukemic cells.

**内毒素含量 (Endotoxin):**

&lt;0.010 EU per 1 ug of the protein by the LAL method

**制剂(Formulation):**

Solution protein.

Dissolved in sterile PBS buffer.

This solution can be diluted into other aqueous buffers. Centrifuge the vial prior to opening.

**储存与运输(Storage):**

Avoid repeated freeze-thaw cycles.

It is recommended that the protein be aliquoted for optimal storage.

36 months from date of receipt, -20 to -70 °C as supplied.

Shipping with dry ice

**产品背景介绍 (Production):**

Stem cell factor (SCF), also known as c-kit ligand (KL), mast cell growth factor (MGF), and steel factor (SLF), is a widely expressed 28 - 40 kDa type I transmembrane glycoprotein. It promotes the survival, differentiation, and mobilization of multiple cell types including myeloid, erythroid, megakaryocytic, lymphoid, germ cell, and melanocyte progenitors. SCF is a primary growth and activation factor for mast cells and eosinophils. Mature mouse SCF



consists of a 189 amino acid (aa) extracellular domain (ECD), a 23 aa transmembrane segment, and a 36 aa cytoplasmic tail. The ECD shows both N-linked and O-linked glycosylation. Proteolytic cleavage at two alternate sites in the extracellular juxtamembrane region releases a 25 kDa soluble molecule which is comparable to the only form produced by Steel-dickie mutant mice. An alternately spliced isoform of mouse SCF lacks 28 aa that encompasses the primary proteolytic recognition site. Within the ECD of the short isoform (corresponding to this recombinant protein), mouse SCF shares 93% aa sequence identity with rat SCF and 72% - 75% with canine, feline, and human SCF. Rat SCF is active on mouse and human cells, but human SCF is only weakly active on mouse cells. Noncovalent dimers of transmembrane or soluble SCF interact with the receptor tyrosine kinase SCF R/c-kit to trigger receptor dimerization and signaling. SCF assists in the recovery of cardiac function following myocardial infarction by increasing the number of cardiomyocytes and vascular channels.

