

DATASHEET
Version 20181206**SDF-1 β /CXCL12, Rat****Cat. No.:** Z02860-10**Size:** 10.0 ug**Synonyms:** SDF-1 beta/CXCL12, Rat**Description:**

SDF-1 α and β are stromal derived CXC chemokines, and signal through the CXCR4 receptor. SDF-1 α and β chemoattract B and T cells, and have been shown to induce migration of CD34+ stem cells. Additionally, the SDF-1 proteins exert HIV suppressive activity in cells expressing the CXCR4 receptor.

Amino Acid Sequence:

00001 KPVSLSYRCP CRFFESHVAR ANVKHLKILN TPNCALQIVA
00041 RLKSNNRQVC IDPKLKWIQE YLDKALNKRL KM

Source: *E. coli***Species:** Rat

Biological Activity: Fully biologically active when compared to standard. The biological activity determined by a chemotaxis bioassay using human peripheral blood monocytes is in a concentration range of 100-200 ng/ml.

Molecular Weight: Approximately 8.4 kDa, a single non-glycosylated polypeptide chain containing 72 amino acids.

Formulation: Lyophilized from a 0.2 μ m filtered concentrated solution in 20 mM PB, pH 7.4, 150 mM NaCl.

Appearance: Sterile Filtered White lyophilized (freeze-dried) powder.

Reconstitution: We recommend that this vial be briefly centrifuged prior to opening to bring the contents to the bottom. Reconstitute in sterile distilled water or aqueous buffer containing 0.1 % BSA to a concentration of 0.1-1.0 mg/mL. Stock solutions should be apportioned into working aliquots and stored at ≤ -20 °C. Further dilutions should be made in appropriate buffered solutions.

Purity: > 97 % by SDS-PAGE and HPLC analyses.

Endotoxin Level: Less than 1 EU/ μ g of rRtSDF-1 β /CXCL12 β as determined by LAL method.

Storage: This lyophilized preparation is stable at 2-8 °C, but should be kept at -20 °C for long term storage, preferably desiccated. Upon reconstitution, the preparation is stable for up to one week at 2-8 °C. For maximal stability, apportion the reconstituted preparation into working aliquots and store at -20 °C to -70 °C. Avoid repeated freeze/thaw cycles.