

## 32-6492: M CSF Rat

**Application :** Functional Assay

**Alternative Name :** Macrophage colony-stimulating factor 1, CSF-1, MCSF, Csf1, Csfm.

### Description

Source: Escherichia Coli.

Sterile Filtered White lyophilized (freeze-dried) powder.

Granulocyte/Macrophage Colony-Stimulating Factors are cytokines that act in hematopoiesis by controlling the production, differentiation, and function of 2 related white cell populations of the blood, the granulocytes and the monocytes-macrophages. MCSF induces cells of the monocyte/macrophage lineage. MCSF plays a role in immunological defenses, bone metabolism, lipoproteins clearance, fertility and pregnancy.

Macrophage Colony Stimulating Factor Rat Recombinant produced in E.coli is a non-glycosylated homodimer, containing 2 x 155 amino acids and having a total molecular mass of 36.2 kDa. MCSF is purified by proprietary chromatographic techniques.

### Product Info

**Amount :** 2 µg / 10 µg

**Purification :** Greater than 95.0% as determined by SDS-PAGE.

**Content :** Lyophilized from a sterile filtered aqueous solution containing 10mM Na<sub>3</sub>PO<sub>4</sub>, pH 7.5.  
It is recommended to reconstitute the lyophilized MCSF in sterile 18M-cm H<sub>2</sub>O not less than 100µg/ml, which can then be further diluted to other aqueous solutions.

**Storage condition :** Lyophilized MCSF although stable at room temperature for 3 weeks, should be stored desiccated below -18°C. Upon reconstitution MCSF should be stored at 4°C between 2-7 days and for future use below -18°C. For long term storage it is recommended to add a carrier protein (0.1% HSA or BSA). Please prevent freeze-thaw cycles.

**Amino Acid :** MEVSEHCSHM IGNGHLQILQ QLIDSQMETA CLIEYKFVDQ EQLDDPVCYL KKAFLVLQVI  
IEETMRFKDN TPNANATERL QELSMKLNSC FIKDYKEQNE ACVQTYKESP LRLLEKIKNF  
FNETKNFLEK DWNIFSKNCN DSLAKCSSRD VVTKP.

### Application Note

The activity as determined by dose-dependent induction of M-NFS-60 cell proliferation is 1.65 ng/ml. This corresponds to an expected specific activity of 6.1x10<sup>5</sup> units/mg.