10320 Camino Santa Fe, Suite G
San Diego, CA 92121
Tel: 858.875.1900 Fax: 858.875.1999

M-CSF

Catalog # PVGS1142

Specification

M-CSF - Product Information

Primary Accession P09603-3

Species
Human

Sequence
Glu33-Ser190, expressed with an N-terminal Met

Purity
> 95% as analyzed by SDS-PAGE

Endotoxin Level
< 1 EU/ µg of protein by gel clotting method

Biological Activity
ED₅₀ of 1.0-3.0 ng/ml, measured by cell proliferation assay of M-NFS-60, corresponding to a specific activity of 3.3 × 10⁵-1.0 × 10⁶ units/mg.

Expression System
E. coli

Formulation **Lyophilized after extensive dialysis against 50 mM Tris-HCl, pH 8.0.**

Reconstitution
It is recommended that this vial be briefly centrifuged prior to opening to bring the contents to the bottom. Reconstitute the lyophilized powder in ddH_2O or PBS or Tris-HCl, pH 8.0 up to 100 µg/ml.

Storage & Stability
Upon receiving, this product remains stable for up to 6 months at lower than -70°C. Upon reconstitution, the product should be stable for up to 1 week at 4°C or up to 3 months at -20°C. For long term storage it is recommended that a carrier protein (example 0.1% BSA) be added. Avoid repeated freeze-thaw cycles.

M-CSF - Additional Information

Target Background
Macrophage-Colony Stimulating Factor (M-CSF), also known as Colony Stimulating Factor-1 (CSF-1), is a hematopoietic growth factor. It can stimulate the survival, proliferation and differentiation of mononuclear phagocytes, in addition to the spreading and motility of macrophages. In mammals, it exits three isoforms, which invariably share an N-terminal 32-aa signal peptide, a 149-residue growth factor domain, a 21-residue transmembrane region and a 37-aa cytoplasmictail. M-CSF is mainly produced by monocytes, macrophages, fibroblasts, and endothelial cells. M-CSF interaction with its receptor, c-fms, has been implicated in the growth, invasion, and metastasis of of several diseases, including breast and endometrial cancers. The biological activity of human M-CSF is maintained within the 149-aa growth factor domain, and it is

only active in the disulfide-linked dimeric form, which is bonded at Cys63.

M-CSF - Protein Information

M-CSF - Protocols

Provided below are standard protocols that you may find useful for product applications.

- Western Blot
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- Cell Culture

M-CSF - Images