

32-20324: Animal-Free Recombinant Human Oncostatin M (209 a.a.)(Discontinued)

Reactivity : Human

Alternative Name : OSM

Description

Source: E.coli

Oncostatin M (OSM) is a growth and differentiation factor that participates in the regulation of neurogenesis, osteogenesis and hematopoiesis. Produced by activated T cells, monocytes and Kaposi's sarcoma cells, OSM can exert both stimulatory and inhibitory effects on cell proliferation. It stimulates the proliferation of fibroblasts, smooth muscle cells and Kaposi's sarcoma cells, but inhibits the growth of some normal and tumor cell lines. It also promotes cytokine release (e.g. IL-6, GM-CSF and G-CSF) from endothelial cells, and enhances the expression of low-density lipoprotein receptors in hepatoma cells. OSM shares several structural and functional characteristics with LIF, IL-6, and CNTF. Human OSM is active on murine cells. The human OSM gene encodes for a 252 amino acid polypeptide, containing 25 amino acid signal sequence for secretion and a 227 precursor protein. Proteolytic processing of this precursor removes an 18 amino acid C-terminal peptide and generates the mature OSM form. Recombinant Human Oncostatin M is a 23.6 kDa protein, containing 209 amino acid residues.

Product Info

Amount : 2 µg / 10 µg

Purification : Purity: $\geq 98\%$ by SDS-PAGE gel and HPLC analyses.

Content : This recombinant protein is supplied in lyophilized form.

Amino Acid : AAIGSCSKEY RVLLGQLQKQ TDLMQDTSRL LDPYIRIQGL DVPKLRHCR ERPGAFPSEE TLRGLGRRGF
LQTLNATLGC VLHRLADLEQ RLPKAQDLER SGLNIEDLEK LQMARPNI LG LRNNIYCMAQ LLDNSDTAEP
TKAGRGASQP PTPTPASDAF QRKLEGCRFL HGYHRFMHSV GRVFSKWGES PNRSRRHSPH QALRKGVRR

Application Note

Determined by its ability to stimulate the proliferation of human TF-1 cells. The expected ED_{50} is ≤ 2.0 ng/ml, corresponding to a specific activity of $\geq 5 \times 10^5$ units/mg.