# **BioVision**

#### rev. 12/12

## **Recombinant Murine IL-6**

CATALOG #:	4144-10 10 μg 4144-50 50 μg 4144-1000 1 mg
LOT #:	
SOURCE:	E. coli
PURITY:	>98% by SDS-PAGE and HPLC analyses Endotoxin level is <0.1 ng per µg of IL-6.
MOL. WEIGHT:	21.7 kDa
FORMULATION:	Lyophilized with no additives

### **RECONSTITUTION:**

Centrifuge the vial prior to opening. Reconstitute in water to a concentration of 0.1-1.0  $\mu$ g/ $\mu$ l. The solution can then be diluted into other aqueous buffers and stored at 4°C for 1 week or – 20°C for future use.

### STORAGE CONDITIONS:

The lyophilized IL-6 is best stored desiccated below 0°C. Reconstituted IL-6 should be stored at working aliquots at -20°C.

### DESCRIPTION:

IL-6 is a pleiotropic cytokine that plays an important role in host defense by regulating immune and inflammatory responses. Produced by T cells, monocytes, fibroblasts, endothelial cells and keratinocytes, IL-6 has diverse biological functions. It stimulates B-cell differentiation and antibody production, synergizes with IL-3 in megakaryocyte development and platelet production, induces expression of hepatic acute-phase proteins, and regulates bone metabolism. IL-6 signals through the IL-6 receptor system that consists of two chains, IL-6R alpha and gp130. Murine IL-6 is inactive on human cells, while both human and murine are equally active on murine cells. Recombinant murine IL-6 is a 21.7 kDa protein containing 187 amino acid residues.

### **BIOLOGICAL ACTIVITY:**

The ED<sub>50</sub> as determined by the dose-dependent stimulation of the proliferation of the IL-6 dependent murine 7TD1 cells is  $\leq 0.02$  ng/ml, corresponding to a specific activity of  $\geq 5 \times 10^7$  units/mg.

#### **RELATED PRODUCTS:**

Apoptosis Detection Kits & Reagents

- Annexin V Kits & Bulk Reagents
- Caspase Assay Kits & Reagents
- Mitochondrial Apoptosis Kits & Reagents
- Nuclear Apoptosis Kits & Reagents
- Apoptosis Inducers and Set
- Apoptosis siRNA Vectors

Cell Fractionation System

- Mitochondria/Cytosol Fractionation Kit
- Nuclear/Cytosol Fractionation Kit
- Membrane Protein Extraction Kit
- Cytosol/Particulate Rapid Separation Kit
- Mammalian Cell Extraction Kit
- FractionPREP Fractionation System

Cell Proliferation & Senescence

- Quick Cell Proliferation Assay Kit
- Senescence Detection Kit
- High Throughput Apoptosis/Cell Viability Assay Kits
- LDH-Cytotoxicity Assay Kit
- Bioluminescence Cytotoxicity Assay Kit
- Live/Dead Cell Staining Kit

Cell Damage & Repair

- HDAC Fluorometric & Colorimetric Assays & Drug Discovery Kits
- HAT Colorimetric Assay Kit & Reagents
- DNA Damage Quantification Kit
- Glutathione & Nitric Oxide Fluorometric & Colorimetric Assay Kits

Signal Transduction

- cAMP & cGMP Assay Kits
- Akt & JNK Activity Assay Kits
- Beta-Secretase Activity Assay Kit

Adipocyte & Lipid Transfer

- Recombinant Adiponectin, Survivin, & Leptin
- CETP Activity Assay & Drug Discovery Kits
- PLTP Activity Assay & Drug Discovery Kits
- Total Cholesterol Quantification Kit

Molecular Biology & Reporter Assays

- siRNA Vectors
- Cloning Insert Quick Screening Kit
- Mitochondrial & Genomic DNA Isolation Kits
- 5 Minutes DNA Ligation Kit
- 20 Minutes Gel Staining/Destaining Kit
- β -Galactosidase Staining Kit & Luciferase Reporter Assay Kit

Growth Factors and Cytokines Monoclonal and Polyclonal Antibodies

