

Animal-Free Recombinant Human IL-6

Catalog # PBG10514

Specification

Animal-Free Recombinant Human IL-6 - Product Information

Animal-Free Recombinant Human IL-6 - Additional Information

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 α and gp130. Murine IL-6 is inactive on human cells, while both human and murine are equally active on murine cells. Recombinant human IL-6 is a 20.9 kDa protein containing 184 amino acid residues.

BiologicalActivity

The ED₅₀ as determined by the dose-dependent stimulation of the proliferation of IL-6 dependent murine 7TD1 cells is ≤ 0.1 ng/ml, corresponding to a specific activity of $\geq 1 \times 10$ ⁷units/mg.

Authenticity Verified by N-terminal and Mass Spectrometry analyses (when applicable).

Endotoxin Endotoxin level is <0.1 ng/ μg of protein (<1EU/ μg).

Protein Content Verified by UV Spectroscopy and/or SDS-PAGE gel.

Storage -20°C

Precautions

Animal-Free Recombinant Human IL-6 is for research use only and not for use in diagnostic or therapeutic procedures.

Animal-Free Recombinant Human IL-6 - Protocols

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

- <u>Western Blot</u>
- Blocking Peptides
- <u>Dot Blot</u>
- Immunohistochemistry
- Immunofluorescence



• Immunoprecipitation

- <u>Flow Cytomety</u>
 <u>Cell Culture</u>

Animal-Free Recombinant Human IL-6 - Images