

# **California Bioscience**

# **Product Datasheet**

Product Name	CB501312
Cata No	Interleukin-1 beta Mouse Recombinant, His Tag
Source	Escherichia Coli.
Synonyms	Catabolin, Lymphocyte-activating factor (LAF), Endogenous Pyrogen (EP), Leukocyte Endogenous Mediator (LEM), Mononuclear Cell Factor (MCF), IL1F2, IL-1 beta, Interleukin-1 beta.

# Description

Interleukin-1b is produced by activated macrophages, IL-1B stimulates thymocyte proliferation by inducing il-2 release, b-cell maturation and proliferation, and fibroblast growth factor activity. IL1B proteins are involved in the inflammatory response, being identified as endogenous pyrogens, and are reported to stimulate the release of prostaglandin and collagenase from synovial cells. IL-1b is an inflammatory cytokine which modulates angiogenesis by interacting directly with vascular endothelial cells & increasing the production of proangiogenic factors through paracrine control. IL-1 beta stimulates endothelial cell migration and proliferation, adhesion-molecule expression, inflammatory mediator production, and leukocyte recruitment. IL1B is essential for tumor growth, metastasis, and angiogenesis in quite a few animal models.

Interleukin-1 beta Mouse Recombinant produced in E.Coli is a non-glycosylated, Polypeptide chain containing 189 amino acids and having a molecular mass of 21 kDa.

The IL-1b is fused to His-Tag and purified by proprietary chromatographic techniques.

## **Physical Appearance**

Sterile Filtered colorless solution.

## Purity

Greater than 90.0% as determined by:(a) Analysis by RP-HPLC.(b) Analysis by SDS-PAGE.

#### Formulation

The IL-1B protein contains 20mM Tris pH-8 and 10% glycerol.

#### Stability

IL-1b although stable at 4°C for 2 weeks, should be stored desiccated 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.

#### Sequence

MRGSHHHHHH GMASMTGGQQ MGRDLYDDDD KDRWGSMVPI RQLHYRLRDE QQKSLVLSDP YELKALHLNG QNINQQVIFS MSFVQGEPSN DKIPVALGLK GKNLYLSCVM KDGTPTLQLE SVDPKQYPKK KMEKRFVFNK IEVKSKVEFE SAEFPNWYIS TSQAEHKPVF LGNNSGQDII DFTMESVSS