NKMAXBiO we support you, we believe in your research Recombinant rat IL-2 protein Catalog Number: ATGP3889

# **PRODUCT INFORMATION**

**Expression system** E.coli

**Domain** 21-155aa

**UniProt No.** P17108

NCBI Accession No. NP\_446288

Alternative Names Interleukin-2, IL-2, T-cell growth factor, TCGF

# **PRODUCT SPECIFICATION**

Molecular Weight 15.6 kDa (136aa) confirmed by MALDI-TOF

## **Concentration** 0.25mg/ml (determined by Bradford assay)

**Formulation** Liquid in. Phosphate-Buffered Saline (pH 7.4) containing 10% glycerol

**Purity** > 90% by SDS-PAGE

**Endotoxin level** < 1 EU per 1ug of protein (determined by LAL method)

## **Biological Activity**

Measured in a cell proliferation assay using CTLL2 mouse cytotoxic T cells. The ED50 for this effect is less or equal to 0.3ng/ml.

Tag Non-Tagged

**Application** SDS-PAGE, Bioactivity

### **Storage Condition**

Can be stored at +2C to +8C for 1 week. For long term storage, aliquot and store at -20C to -80C. Avoid repeated freezing and thawing cycles.

# BACKGROUND



## Description

IL-2, also known as T cell growth factor (TCGF), is an immunoregulatory lymphokine produced by T-cells in response to antigenic or mitogenic stimulation. II-2/ II-2R signaling is required for T-cell proliferation and other fundamental functions which are essential for the immune response. IL-2 stimulates growth and differentiation of B-cells, NK cells, lymphokine activated killer cells, monocytes, macrophages and oligodendrocytes. Recombinant rat IL-2 was expressed in E. coli and purified by using conventional chromatography techniques.

## **Amino acid Sequence**

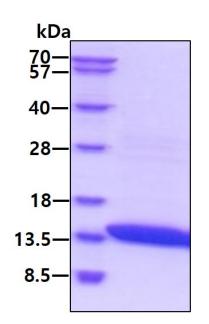
MAPTSSPAKE TQQHLEQLLL DLQVLLRGID NYKNLKLPMM LTFKFYLPKQ ATELKHLQCL ENELGALQRV LDLTQSKSFH LEDAGNFISN IRVTVVKLKG SENKFECQFD DEPATVVEFL RRWIAICQSI ISTMTQ

### **General References**

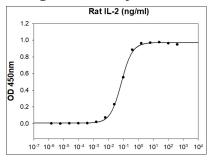
Watson J., et al. (1980). Immunol Rev. 51:257-78. Taniguchi T., et al. (1983). Nature. 302(5906): 305-10.

# DATA

### **SDS-PAGE**



### **Biological Activity**



3ug by SDS-PAGE under reducing condition and visualized by coomassie blue stain.

Rat IL-2 stimulates cell proliferation of the CTLL2 mouse cytotoxic T cells. The ED50 range is less or equal to 0.3 ng/ml.

