

BACKGROUND

Interleukin 15 (IL-15) is a widely expressed pro-inflammatory cytokine related to IL-2. IL-15 promotes activation of T cells, neutrophils and macrophages and is critical to dendritic cell function in several model systems. IL-15 has been shown to play a role in several inflammatory disorders, including rheumatoid arthritis, psoriasis and pulmonary inflammatory diseases. Emerging data suggest that IL-15 may serve as a good therapeutic target, as there appears to be a beneficial effect of IL-15 neutralization in models of psoriasis and diabetes. Human IL-15 shows activity on mouse cells.

Recombinant human IL-15 is a non-glycosylated protein, containing 114 amino acids and having a molecular mass of 12.8 kDa.

Alternative Names:

IL-T

Amino Acid Sequence:

MNWNVISDL KKIEDLIQSM HIDATLYTES DVHPSCKVTA
MKCFLLQLQV ISLESQDASI HDTVENLIIL ANNSLSSNGN
VTESGCKECE ELEEKNIKEF LQSFVHIVQM FINTS

TECHNICAL INFORMATION

Source: *E.coli*

Physical Appearance:

Sterile Filtered white lyophilized (freeze-dried) powder.

Formulation:

Recombinant human IL-15 was lyophilized from a concentrated (1mg/ml) solution with 5mM Tris pH 8.0.

Stability:

Lyophilized product is very stable at -20°C. Reconstituted material should be aliquoted and frozen at -20°C. It is recommended that a carrier protein (0.1% HSA or BSA) is added for long term storage.

Reconstitution:

Centrifuge vial before opening. When reconstituting the product, gently pipet and wash down the sides of the vial to ensure full recovery of the protein into solution. It is recommended to reconstitute the lyophilized product with sterile water at a concentration of 0.1 mg/ml, which can be further diluted into other aqueous solutions.

Protein Content and Purity determined by:

- UV spectroscopy at 280 nm
- RP-HPLC calibrated against a known standard
- Quantitation against a known standard via reducing and non-reducing SDS-PAGE gels.

Endotoxin Level:

Endotoxin level, as measured by LAL analysis, is <0.01ng/ug or <0.1EU/ug.

Biological Activity:

The activity is determined by the dose-dependant stimulation of the proliferation of mouse CTLL-2 cells and is typically less than 0.5 ng/mL.

Products are for research use only. They are not intended for human, animal, or diagnostic applications.

