

IL-19
Catalog # PVGS1312

Specification

IL-19 - Product Information

Primary Accession [O8CJ70](#)
Species
Mouse

Sequence
Leu25-Ala176, expressed with an N-terminal Met

Purity
> 95% as analyzed by SDS-PAGE

Endotoxin Level
< 0.2 EU/ µg of protein by gel clotting method

Biological Activity
ED₅₀ < 50.0 ng/ml, measured by a cell proliferation assay using MCF-7 cells, corresponding to a specific activity of > 2.0 × 10⁴ units/mg.

Expression System
E. coli

Formulation **Lyophilized after extensive dialysis against 50 mM acetic acid.**

Reconstitution
It is recommended that this vial be briefly centrifuged prior to opening to bring the contents to the bottom. Reconstitute the lyophilized powder in 50 mM acetic acid up to 50 µg/ml.

Storage & Stability
Upon receiving, this product remains stable for up to 6 months at lower than -70°C. Upon reconstitution, the product should be stable for up to 1 week at 4°C or up to 3 months at -20°C. For long term storage it is recommended that a carrier protein (example 0.1% BSA) be added. Avoid repeated freeze-thaw cycles.

IL-19 - Additional Information

Gene ID 329244

Other Names
Interleukin-19, IL-19, IL19

Target Background
Interleukin-19 (IL-19) is a cytokine belonging to the interleukin family. Structurally, IL-19 is grouped into the IL-10 sub-family, which also includes IL-20, IL-22, IL-24, and IL-26. In contrast to IL-10, which exists as a homodimer, IL-19 is stable and active as a monomer in vivo. IL-19 functions through the receptor complex composed of IL-20 Receptor α and IL-20 Receptor β, which

is also utilized by IL-20 and IL-24. IL-19 is produced by active monocytes and stimulated synergistically by IL-17 and IL-13. The functions of IL-19 are to promote the development and function of Th2 cells and to enhance the production of Th2 cytokines. IL-19 is implicated in aging, vascular disease, Type I diabetes, and rheumatoid arthritis.

IL-19 - Protein Information

Name Il19

Function

Cytokine that functions as an anti-inflammatory and proangiogenic factor (PubMed:12370360, PubMed:27053520). Polarizes adaptive immunity to an anti-inflammatory phenotype through induction of T-helper 2 responses by both down-regulation of IFN-gamma and up-regulation of IL4 and IL5 (PubMed:15557163). Produced by osteocytes, stimulates granulopoiesis and neutrophil formation (PubMed:33684929). Exerts its biological effect through a receptor complex consisting of a heterodimer of IL20RA and IL20RB. In turn, activates the Janus kinase (JAK) and signal transducer and activator of transcription (STAT) pathway, and importantly, STAT3 (By similarity).

Cellular Location

Secreted.

IL-19 - Protocols

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

- [Western Blot](#)
- [Blocking Peptides](#)
- [Dot Blot](#)
- [Immunohistochemistry](#)
- [Immunofluorescence](#)
- [Immunoprecipitation](#)
- [Flow Cytometry](#)
- [Cell Culture](#)

IL-19 - Images