

# Recombinant Human IL18

Cat No:HR2R1558

For research use only

## Overview

Quantity	4 x 25 µg (4 x Z100475)
Gene Symbol	IL18
Gene ID	3606
Accession	Q14116
Alternative Name	IL-18, Interferon gamma-inducing factor, IFN-gamma-inducing factor, Interleukin-1 gamma, IL-1 gamma Recombinant Human Interleukin-18 (IL18)
Species	Human
Source	E. coli
Description	Also known as interferon-gamma-inducing factor (IGIF) and IL-1 $\beta$ , IL18 is a cytokine that bears structural similarities with members of the IL-1 family of proteins. IL18 is natively synthesized as a proform that gets processed by caspase-1 to generate the bioactive form of IL18. IL18 is one of the pro-inflammatory cytokines that is expressed by a variety of immune and non-immune cells. The activities of IL18 appear to be species specific. An important function of IL18 is the regulation of functionally distinct subsets of T-helper cells required for cell mediated immune responses. IL18 functions as a growth and differentiation factor for Th1 cells and is known to up-regulate the FAS ligand mediated cytotoxic activity of murine natural killer cells. IL18 also partakes in a complex regulatory circuit involved in causing cell death by apoptosis.
Functions	The ED(50) as determined by the dose-dependent proliferation of human PBMC co-stimulated with IL12 was found to be in the range of 5.0 ng/mL.
Formulation	Lyophilized from 0.2 µm filtered solution in Tris buffer with NaCl
Solubility	A quick spin of the vial followed by reconstitution in distilled water to a concentration not less than 0.1 mg/mL. This solution can then be diluted into other buffers.
Appearance	Lyophilized Powder
Molecular Weight	18.5
Purity	>95% as determined by SDS-PAGE
Concentration	< 1.0 EU/µg of recombinant protein as determined by the LAL method.
Shipping Condition	Ambient Temperature
Storage Condition	The lyophilized protein is stable for at least one year from date of receipt at -70°C. Upon reconstitution, this cytokine can be stored in working aliquots at 2° - 8°C for one month, or at -20°C for six months, with a carrier protein without detectable loss of activity. Avoid repeated freeze/thaw cycles.