

## Recombinant Human Interleukin-18/IL-18 Protein

**Catalog No.** PKSH033626

**Note:** Centrifuge before opening to ensure complete recovery of vial contents.

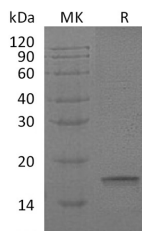
### Description

<b>Synonyms</b>	Interleukin-18;Ibctadekin;Interferon gamma-inducing factor;IFN-gamma-inducing factor;Interleukin-1 gamma;IL-1 gamma;GIF;IL-18;IL-1g;IL1F4;MGC12320;IL18
<b>Species</b>	Human
<b>Expression Host</b>	E.coli
<b>Sequence</b>	Tyr37-Asp193
<b>Accession</b>	Q14116
<b>Calculated Molecular Weight</b>	18.2 kDa
<b>Observed molecular weight</b>	15 kDa
<b>Tag</b>	None
<b>Bioactivity</b>	Measure by its ability to induce IFN gamma secretion in KG-1 cells. The ED <sub>50</sub> for this effect is < 6 ng/mL.

### Properties

<b>Purity</b>	> 95 % as determined by reducing SDS-PAGE.
<b>Endotoxin</b>	< 0.1 EU per µg of the protein as determined by the LAL method.
<b>Storage</b>	Generally, lyophilized proteins are stable for up to 12 months when stored at -20 to -80°C. Reconstituted protein solution can be stored at 4-8°C for 2-7 days. Aliquots of reconstituted samples are stable at < -20°C for 3 months.
<b>Shipping</b>	This product is provided as lyophilized powder which is shipped with ice packs.
<b>Formulation</b>	Lyophilized from a 0.2 µm filtered solution of PBS, pH 8.0. Normally 5 % - 8 % trehalose, mannitol and 0.01% Tween80 are added as protectants before lyophilization. Please refer to the specific buffer information in the printed manual.
<b>Reconstitution</b>	Please refer to the printed manual for detailed information.

### Data



> 95 % as determined by reducing SDS-PAGE.

### Background

#### For Research Use Only

Interleukin-18 is a secreted protein and it belongs to the IL-1 family. IL-18 is a proinflammatory cytokine and produced by macrophages and other cells. This cytokine can induce the IFN-gamma production of T cells. The combination of this cytokine and IL12 has been shown to inhibit IL-4 dependent IgE and IgG1 production; and enhance IgG2a production of B cells. IL-18 binding protein (IL18BP) can specifically interact with this cytokine; and thus negatively regulate its biological activity. After stimulation with IL-18; natural killer (NK) cells and certain T cells release another important cytokine called interferon- $\gamma$  (IFN- $\gamma$ ) or type II interferon that plays an important role in activating the macrophages or other cells.