

Recombinant Human IFN- α I/IFN17 Protein

Catalog No.: RP01899

Sequence Information

Species Gene ID

Human 3451

Swiss Prot Tags

P01571 C-His

Synonyms

Interferon alpha-17, IFN- α -17, Interferon alpha-88, Interferon alpha-I', LeIF I, Interferon alpha-T, IFNA17

Product Information

Source Purification

HEK293 cells $\geq 95\%$ as determined by SDS-PAGE.

Calculated MWObserved MW

20.14 kDa 20-25 kDa

Endotoxin

< 0.01 EU/ μ g of the protein by LAL method

Formulation

Lyophilized from a 0.22 μ m filtered solution of PBS, pH 7.4.

Reconstitution

Centrifuge the vial before opening. Reconstitute to a concentration of 0.1-0.5 mg/mL in sterile distilled water. Avoid vortex or vigorously pipetting the protein. For long term storage, it is recommended to add a carrier protein or stabilizer (e.g. 0.1% BSA, 5% HSA, 10% FBS or 5% Trehalose), and aliquot the reconstituted protein solution to minimize free-thaw cycles.

Background

Interferons (IFN) are a family of cytokines with potent antiviral, antiproliferative and immunomodulatory properties, classified based on their binding specificity to cell surface receptors. Human IFNA2 was originally cloned in the early '80s and now more than a dozen closely related IFN α subtypes have been identified in both the human and mouse genome, each sharing about 80% amino acid (aa) sequence homology. Structurally, type I IFNs belong to the class of five helical-bundle cytokines, with the IFNA subtypes containing 2 conserved disulfide bonds. There is not a mouse homolog for IFNA17, but mature human IFNA17 shares 58% aa sequence identity with chimpanzee IFNA17. The type I IFNs bind to the interferon α receptor (IFNAR), which consists of two subunits: IFNAR1 (α -subunit) and IFNAR2 (β -subunit). Individual IFNA subtypes are known to display unique efficacies to viral protection. IFNA17 has been shown to be potent against HIV-1 activity. Human IFNA17 is the only IFNA subtype identified with antiviral activity but a reduced ability to activate NK cells. A mutation in IFNA17, Ile184Arg, is associated with an increased risk for cervical cancer.

Basic Information

Description

Recombinant Human IFN- α I/IFN17 Protein is produced by HEK293 cells expression system. The target protein is expressed with sequence (Cys24-Asp189) of Human IFN- α I/IFN17 (Accession #NP_067091.1) fused with a His tag at the C-terminus.

Activity

Measured in a cell cytotoxicity assay using TF-1 cells. The ED_{50} for this effect is 0.17-0.68 ng/mL, corresponding to a specific activity of $1.47 \times 10^6 \sim 5.88 \times 10^6$ units/mg.

Shipping

Lyophilized proteins are shipped at ambient temperature. Liquid proteins are shipped at frozen temperature with dry ice. Upon receipt, store it immediately at the temperature recommended below.

Storage

Store at -20°C

Operational Notes

For your safety and health, please wear a lab coat and disposable gloves for handling.

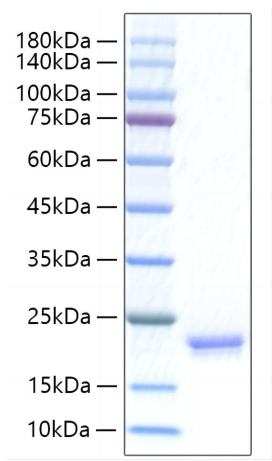
Contact

☎ | 400-999-6126

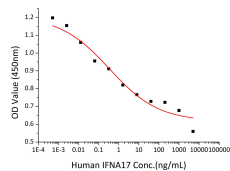
✉ | cn.market@abclonal.com.cn

🌐 | www.abclonal.com.cn

Validation Data



Recombinant Human IFN-alpha I/IFN17 Protein was determined by SDS-PAGE under reducing conditions with Coomassie Blue.



Recombinant Human IFN-alpha I/IFN17 Protein cytotoxicity assay using TF-1 cells. The ED₅₀ for this effect is 0.17-0.68 ng/mL, corresponding to a specific activity of 1.47×10⁶~5.88×10⁶ units/mg.