

## 32-6353: FGF 18 Human

**Application :** Functional Assay

**Alternative Name :** Fibroblast growth factor 18, FGF-18, zFGF5, FGF18.

### Description

Source: Escherichia Coli.

Sterile Filtered White lyophilized (freeze-dried) powder.

Fibroblast growth factor 18 (FGF18) is a member of the large FGF family which has at least 23 members. FGF18 is a binding growth factor with a core 120 amino acid FGF domain which allows for a common tertiary structure. FGFs are expressed in the course of the embryonic development and in restricted adult tissues. FGF-18 is an indispensable regulator of long bone and calvarial development. FGF-18 signals via FGFR 1c, 2c, 3c, and 4.

FGF-18 Human Recombinant produced in E.coli is a single, non-glycosylated polypeptide chain containing 181 amino acids and having a molecular mass of 21.1kDa. The FGF-18 is purified by proprietary chromatographic techniques.

### Product Info

**Amount :** 5 µg / 25 µg

**Purification :** Greater than 95.0% as determined by: (a) Analysis by RP-HPLC.(b) Analysis by SDS-PAGE.

**Content :** FGF-18 protein was lyophilized from a 0.2µm filtered concentrated solution in PBS, pH 7.4. It is recommended to reconstitute the lyophilized FGF-18 in sterile 18M Omega -cm H2O not less than 100µg/ml, which can then be further diluted to other aqueous solutions.

**Storage condition :** Lyophilized FGF-18 although stable at room temperature for 3 weeks, should be stored desiccated below -18°C. Upon reconstitution FGF-18 should be stored at 4°C between 2-7 days and for future use below -18°C. For long term storage it is recommended to add a carrier protein (0.1% HSA or BSA). Please prevent freeze-thaw cycles.

**Amino Acid :** AEENVDFRIH VENQTRARDD VSRKQLRLYQ LYSRTSGKHI QVLGRRISAR GEDGDKYAQL LVETDTFGSQ VRIKGKETEF YLCMNRKGKL VGKPDGTSKE CVFIEKVLN NYTALMSAKY SGWYVGFTKK GRPRKGPKTR ENQQDVHFMK RYPKGQPELQ KPFGYTTVTK RSRIRPHTP A.

### Application Note

The ED50 as determined by the dose-dependent stimulation of thymidine uptake by BaF3 cells expressing FGF-receptors is  $< 0.5\text{ng/ml}$ , corresponding to a specific activity of  $> 2.0 \times 10^6$  units/mg.