11 Park Drive, Suite 12
Boston, MA 02215

Human Fibroblast Growth Factor-23

ORDERING INFORMATION

Catalog No: rAP-0035;
Size: 2 µg; 10 µg
Storage: <- 20° C

Synonyms:

Tumor-derived hypophosphatemia-inducing factor, HYPF, ADHR, HPDR2, PHPTC, FGF23, FGF-23, Fibroblast Growth Factor-23.

Introduction:

FGF-23 is a member of the fibroblast growth factor (FGF) family. FGF family members possess broad mitogenic and cell survival activities and are involved in a variety of biological processes including embryonic development, cell growth, morphogenesis, tissue repair, tumor growth and invasion. FGF-23 inhibits renal tubular phosphate transport. This gene was identified by its mutations associated with autosomal dominant hypophosphatemic rickets (ADHR), an inherited phosphate wasting disorder. Abnormally high level expression of FGF23 was found in oncogenic hypophosphatemic osteomalacia (OHO), a phenotypically similar disease caused by abnormal phosphate metabolism. Mutations FGF23 have also been shown to cause familial tumoral calcinosis with hyperphosphatemia.

Description:

Fibroblast Growth Factor-23 Human Recombinant produced in E.Coli is a single, non-glycosylated polypeptide chain containing 243 amino acids and having a molecular mass of 28 kDa.
The FGF-23 is purified by chromatographic techniques.

Source:

Escherichia Coli.

Physical Appearance:

Sterile Filtered white lyophilized powder.

Formulation:

The protein (0.5mg/ml) was lyophilized from 25mM Tris pH7.5 and 0.6M NaCl solution.

Solubility:

It is recommended to reconstitute the lyophilized Fibroblast Growth Factor-23 in sterile 18MΩ-cm H2O not less than 100µg/ml, which can then be further diluted to other aqueous solutions.

Stability:

Lyophilized Fibroblast Growth Factor 23 although stable at room temperature for 3 weeks, should be stored desiccated below -18°C. Upon reconstitution FGF-23 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.

Purity:

Greater than 90.0% as determined by:
(a) Analysis by RP-HPLC.
(b) Analysis by SDS-PAGE.

Contact & Ordering Information: Angio-Proteomie, 11 Park Drive, Suite 12, Boston, MA 02215, USA. Fax: (480) 247-4337, angioproteomie@gmail.com

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Amino acid sequence:

MLGARLRLW VCALCSVCSM SVLRAYPNAS PLLGSSWGG
NSYHLQIHKN GHVDGAPHQT IYSALMIRSE DAGFVVITGV MSRRYLCMDF RGNIFGSHYF
DPENCRFQHQ TLENGYDVYH SPQYHFLVS LGRAKRAFLP GMNPPPYSQF LSRRNEIPLI HFNTPIPRRH
TRSAEDDSER DPLNVLKPRA RMTPAPASCS QELPSAEDNS PMASDPLGVV RGGRVNTHAG
GTGPEGCRPF AKI

Biological Activity:

Treatment with hrFGF23 has been shown to induce FGFR mediated Erk phosphorylation, reduce plasma PTH levels in rats and to reduce blood phosphate levels (Ref 1).

Usage:

Angio-Proteomie's products are furnished for LABORATORY RESEARCH USE ONLY. The product may not be used as drugs, agricultural or pesticidal products, food additives or household chemicals.