
Product Data Sheet

Product Name: GDF5 Mouse
 Cat. No.: GP20307
 Batch No.: 1

Product Data

Purity	>98%	Source	Escherichia Coli.
Physical Appearance	solid	Shipping Condition	Shipped at Room temp.
Synonyms	Bmp-14; Bp; GDF-5; Bone morphogenetic protein 14; GDF5; Growth/differentiation factor 5.		
Amino Acid Sequence	APLANRQGKR PSKNLKARCS RKALHVNFKD MGWDDWIIAP LEYEAFHCEG LCEFPLRSHL EPTNHAVIQT LMNSMDPEST PPTCCVPTRL SPISILFIDS ANNVYKQYE DMVVESCGCR.		
Solubility	It is recommended to reconstitute the lyophilized GDF5 in sterile 4mM HCl not less than 100µg/ml, which can then be further diluted to other aqueous solutions.		
Formulation	GDF-5 protein was lyophilized from a 0.2µm filtered concentrated solution in 30% Acetonitrile and 0.1% TFA.		

Introduction

GDF-5 is a member of the bone morphogenetic protein (BMP) family and the TGF-beta superfamily. This group of proteins is characterized by a polybasic proteolytic processing site which is cleaved to produce a mature protein containing seven conserved cysteine residues. The members of this family are regulators of cell growth and differentiation in both embryonic and adult tissues. Mutations in this gene are associated with acromesomelic dysplasia, Hunter-Thompson type; brachydactyly, type C; and chondrodysplasia, Grebe type. These associations confirm that the gene product plays a role in skeletal development.

Biological Activity

The ED50 as determined by inducing alkaline phosphatase production of murine ATDC5 cells is less than 1.0µg/ml, corresponding to a specific activity of > 1000IU/mg.

Caution: Product has not been fully validated for medical applications. For research use only.

Tel: (909) 407-4943 Fax: (626) 353-8530 E-mail: tech@glpbio.com

Address: 10292 Central Ave. #205, Montclair, CA, USA

Product Data Sheet

Stability

Lyophilized GDF5 although stable at room temperature for 3 weeks, should be stored desiccated below -18°C . Upon reconstitution GDF-5 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.

Background

GDF5 Mouse Recombinant produced in E.coli is a non-glycosylated disulfide linked homodimer containing 2 chains of 120 amino acids and having a molecular mass of 27.2kDa. The GDF-5 is purified by proprietary chromatographic techniques.

Caution: Product has not been fully validated for medical applications. For research use only.

Tel: (909) 407-4943 Fax: (626) 353-8530 E-mail: tech@glpbio.com

Address: 10292 Central Ave. #205, Montclair, CA, USA