GFH40 Recombinant Human Growth Hormone

Description

Growth hormone is an important mitogenic growth factor that is synthesized, stored, and secreted by somatotropic cells of the anterior pituitary gland. Growth Hormone stimulates growth, cell reproduction, and cell regeneration. In children, Growth Hormone deficiencies can cause short stature, growth failure, and delayed sexual maturity. Adult Growth Hormone deficiency presents with reduced lean body mass, increased adiposity, reduced muscle strength, and ultimately premature mortality.

Length	192 aa
Molecular Weight	22.3 kDa
Source	E. coli
Accession Number	P01241
Purity	≥95% determined by reducing and non-reducing SDS-PAGE

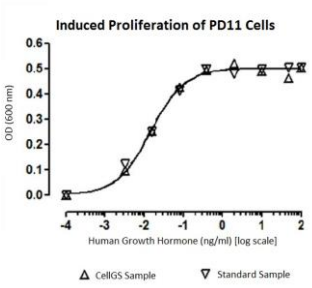
Specifications

Alternative Names	Somatotropin, GH, pituitary growth hormone, IGHD1B, GH-N, GHN, hGH-N
Biological Activity	Human Growth Hormone is fully biologically active when compared to standard. The activity is determined by a proliferation assay using PD11 cells.
Endotoxin Level	≤1.00 EU/µg as measured by kinetic LAL
Formulation	Lyophilized from a sterile (0.2 micron) filtered aqueous solution containing 20 mM sodium bicarbonate, pH 8.0
AA Sequence	MFPTIPLSRL FDNAMLRAHR LHQLAFDTYQ EFEEAYIPKE QKYSFLQNPQ TSLCFSESIP TPSNREETQQ KSNLELLRIS LLLIQSWLEP VQFLRSVFAN SLVYGASDSN VYDLLKDLEE GIQTLMGRLE DGSPRTGQIF KQTYSKFDTN SHNDDALLKN YGLLYCFRKD MDKVETFLRI VQCRSVEGSC GF

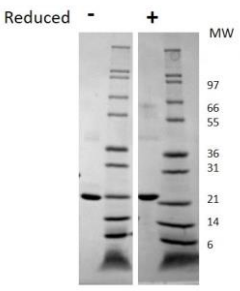
Preparation and Storage

Reconstitution	Centrifuge vial before opening. When reconstituting the product, gently pipet and wash down the sides of the vial to ensure full recovery of the protein into solution. It is recommended to reconstitute the lyophilized product with sterile water at 0.1 mg/ml, which can be further diluted into other aqueous solutions.
Stability and Storage	12 months from date of receipt when stored at -20°C to -80°C as supplied. 1 month when stored at 4°C after reconstituting as directed. 3 months when stored at -20°C to -80°C after reconstituting as directed.

Data



Induced proliferation of PD11 cells assay for Human Growth Hormone.



Non-reducing (-) and reducing (+) conditions in a 4 - 20% Tris-Glycine gel stained with Coomassie Blue. 1 µg of protein was loaded in each lane. Human Growth Hormone has a predicted Mw of 22.3 kDa.