

Recombinant Human GDNF Protein

Catalog No. PKSH032488

Note: Centrifuge before opening to ensure complete recovery of vial contents.

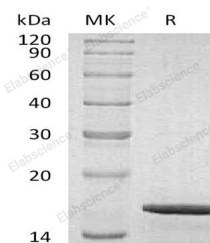
Description

Synonyms	Glial Cell Line-Derived Neurotrophic Factor;hGDNF;Astrocyte-Derived Trophic Factor;ATF;GDNF
Species	Human
Expression Host	E.coli
Sequence	Ser78-Ile211
Accession	P39905
Calculated Molecular Weight	16.0 kDa
Observed molecular weight	16 kDa
Tag	C-His
Bioactivity	Measure by its ability to induce proliferation in SH-SY5Y cells. The ED ₅₀ for this effect is < 10 ng/mL.

Properties

Purity	> 95 % as determined by reducing SDS-PAGE.
Endotoxin	< 0.1 EU per µg of the protein as determined by the LAL method.
Storage	Generally, lyophilized proteins are stable for up to 12 months when stored at -20 to -80°C. Reconstituted protein solution can be stored at 4-8°C for 2-7 days. Aliquots of reconstituted samples are stable at < -20°C for 3 months.
Shipping	This product is provided as lyophilized powder which is shipped with ice packs.
Formulation	Lyophilized from sterile 20 mM sodium citrate, 0.2 M NaCl, pH 3.5. Normally 5 % - 8 % trehalose, mannitol and 0.01% Tween80 are added as protectants before lyophilization. Please refer to the specific buffer information in the printed manual.
Reconstitution	Please refer to the printed manual for detailed information.

Data



> 95 % as determined by reducing SDS-PAGE.

Background

For Research Use Only

Glial Cell Line-Derived Neurotrophic Factor (GDNF) is a disulfide-linked homodimeric glycoprotein that belongs to the TGF- β superfamily. It has been shown to promote the survival of various neuronal subpopulations in both the central as well as the peripheral nervous systems at different stages of their development. Human GDNF cDNA encodes a 211 amino acid residue prepropeptide that is processed to yield a dimeric protein. Mature human GDNF was predicted to contain two 134 amino acid residue subunits. Cells known to express GDNF include Sertoli cells, type 1 astrocytes, Schwann cells, neurons, pinealocytes and skeletal muscle cells. Mutations in this gene may be associated with Hirschsprung disease.