
Product Data Sheet

Product Name: HB-EGF Rat
 Cat. No.: GP20275
 Batch No.: 1

Product Data

Purity	>98%	Source	Escherichia Coli.
Physical Appearance	solid	Shipping Condition	Shipped at Room temp.
Synonyms	Proheparin-binding EGF-like growth factor; Heparin-binding EGF-like growth factor; HB-EGF; HBEGF; Dtr; Hegfl; GFHB.		
Amino Acid Sequence	DLEGTDLDLF KVAFSSKPQA LATPGKEKNG KKKRKGKGLG KKRDPCLKKY KDYCIHGECR YLKELRIPSC HCLPGYHGQR CHGLTL.		
Solubility	It is recommended to reconstitute the lyophilized Rat HB-EGF in sterile 18M-cm H ₂ O not less than 100 µg/ml, which can then be further diluted to other aqueous solutions.		
Formulation	The protein was filtered (0.2µm) and lyophilized from a concentrated solution containing PBS, 300mM NaCl, pH 7.4 and 5% trehalose.		

Introduction

HB-EGF is an EGF related growth factor which signals via the EGF receptor, and stimulates the proliferation of SMC (smooth muscle cells), fibroblasts, epithelial cells and keratinocytes. HB-EGF is expressed in various cell types and tissues, including vascular endothelial cells and SMC, macrophages, skeletal muscle, keratinocytes and particular tumor cells. HB-EGF's ability to explicitly bind heparin and heparin sulfate proteoglycans is dissimilar from other EGF-like molecules, and might be related to the enhanced mitogenic activity, relative to EGF, that HB-EGF exerts on smooth muscle cells.

Biological Activity

The ED₅₀ as determined by a cell proliferation assay using balb/c 3T3 cells is < 1.0 ng/ml, corresponding to a specific activity of > 1.0×10⁶ units/mg.

Stability

Lyophilized Rat HB-EGF Recombinant although stable at room temperature for 3 weeks,

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

should be stored desiccated below -18°C . Upon reconstitution HB-EGF 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

HB-EGF Rat Recombinant produced in E.Coli is a single, non-glycosylated, polypeptide chain containing 86 amino acids and having a molecular mass of 9.7kDa. The HB-EGF 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