HB-EGF Human E. coli

Product Data Sheet

Type: Recombinant
Source: E. coli
Species: Human
Other names: Heparin Binding EGF-like growth factor, HBEGF, Diphtheria toxin receptor, DTR

Cat. No.:

RBG10173010	(10 µg)
RBG10173050	(50 µg)
RBG10173100	(100 µg)

Description

HB-EGF is an EGF-related growth factor that signals through the EGF receptor, and stimulates the proliferation of smooth muscle cells (SMC), fibroblasts, epithelial cells, and keratinocytes. HB-EGF is expressed in numerous cell types and tissues, including vascular endothelial cells, and vascular SMC, macrophages, skeletal muscle, keratinocytes, and certain tumor cells. The ability of HB-EGF to specifically bind heparin and heparin sulfate proteoglycans is distinct from other EGF-like molecules, and may be related to the enhanced mitogenic activity, relative to EGF, that HB-EGF exerts on smooth muscle cells. The human HB-EGF gene encodes a 208 amino acid transmembrane protein, which can be proteolytically cleaved to produce soluble HB-EGF. Recombinant Human HB-EGF is a 9.7 kDa protein containing 86 amino acid residues, corresponding to the extracellular EGF-like and heparin-binding domains of the full length HB-EGF protein.

Research topic

Apoptosis, Cardiovascular disease, Coronary artery disease

Amino Acid Sequence

DLQEADLDLL RVTLSSKPQA LATPNKEEHG KRKKKGKGLG KKRDPCLRKY KDFCIHGECK YVKELRAPSC ICHPGYHGER CHGLSL

Source

E. coli

Purity

95%

Biological Activity

The ED_{50} was determined by a cell proliferation assay using balb/c 3T3 cells is 1.0 ng/ml, corresponding to a specific activity of 1×10^6 units/mg.

Endotoxin

Endotoxin level is <0.1 ng/µg of protein (<1EU/µg).

Reconstitution

Centrifuge the vial prior to opening. Reconstitute in water to a concentration of 0.1-1.0 mg/ml. Do not vortex. For extended storage, it is recommended to further dilute in a buffer containing a carrier protein (example 0.1% BSA) and store in working aliquots at -20°C to -80°C.

Storage, Stability/Shelf Life

-20°C

HEADQUARTERS: BioVendor Laboratorní medicína, a.s.	Karasek 1767/1	621 00 Brno CZECH REPUBLIC	Phone: +420-549-124-185 Fax: +420-549-211-460	E-mail: Web:	info@biovendor.com sales@biovendor.com www.biovendor.com
AUSTRIA: BioVendor GesmbH	Nußdorfer Straße 20/10	1090 Vienna AUSTRIA	Phone: +43-1-89090-25 Fax: +43-1-89090-2515	E-mail:	infoAustria@biovendor.com
GERMANY, SWITZERLAND: BioVendor GmbH	Otto-Hahn-Straße 16	34123 Kassel GERMANY	Phone: +49-6221-433-9100 Fax: +49-6221-433-9111	E-mail:	infoEU@biovendor.com
USA, CANADA AND MEXICO: BioVendor LLC	128 Bingham Rd. Suite 1300	Asheville, NC 28806 USA	Phone: +1-828-575-9250 +1-800-404-7807 Fax: +1-828-575-9251	E-mail:	infoUSA@biovendor.com