

Product datasheet

Recombinant human VEGFB 167 protein (Active) ab245959

Description

Product name	Recombinant human VEGFB 167 protein (Active)	
Biological activity	Determined by the dose-dependent stimulation of the proliferation of human umbilical vein endothelial cells (HUVEC) in the presence of human VEGF ₁₆₅ . The expected ED ₅₀ for this effect is 1.0-2.0 µg/ml.	
Endotoxin level	< 1.000 Eu/µg	
Expression system	Escherichia coli	
Accession	P49765-2	
Protein length	Full length protein	
Animal free	No	
Nature	Recombinant	
Species	Human	
Sequence	PVSQPDAPGHQRKVVSWIDVYTRATCQPREVVVPLTVEL MGTVAKQLVPS CVTVQRCGGCCPDDGLECVPTGQHQVRMQILMIRYPSSQ LGEMSLEEHSQ CECRPKKKDSAVKPDSPRPLCPRCTQHHQRDPRTCRC RCRRRSFLRCQG RGLELNPDTCRCRKLRR	
Predicted molecular weight	38 kDa	
Amino acids	21 to 188	
Additional sequence information	Full length mature chain without signal peptide.	

Specifications

Our [Abpromise guarantee](#) covers the use of **ab245959** in the following tested applications.

The application notes include recommended starting dilutions; optimal dilutions/concentrations should be determined by the end user.

Applications	SDS-PAGE
	Functional Studies
	HPLC
Form	Lyophilized

Preparation and Storage

Stability and Storage

Shipped at 4°C. Store at +4°C short term (1-2 weeks). Upon delivery aliquot. Store at -20°C or -80°C. Avoid freeze / thaw cycle.

Constituent: 0.3% Acetic acid

This product is an active protein and may elicit a biological response in vivo, handle with caution.

Reconstitution

Reconstitute in water to 0.1 - 1.0 mg/ml.

General Info

Relevance

Vascular endothelial growth factors (VEGFs) are a family of closely related growth factors having a conserved pattern of eight cysteine residues and sharing common VEGF receptors. VEGFs stimulate endothelial cells, induce angiogenesis, promote cell migration, increase vascular permeability, and inhibit apoptosis. VEGFB has structural similarities to VEGF and PlGF and is frequently co-expressed with VEGF. There are two alternatively spliced isoforms of VEGFB: VEGFB 167 and VEGFB 186. VEGFB 167, a highly basic heparin-binding protein, remains with the cell or extracellular matrix whereas, VEGFB 186 is readily secreted. VEGFB stimulates endothelial cell proliferation. VEGFB binds to the tyrosine kinase receptor VEGFR1 (flt1) and does not bind to VEGFR2. Vascular Endothelial Growth Factor B is widely expressed but is most abundant in heart, skeletal muscle, and pancreas. It has been suggested that VEGFB expression in human primary breast cancers is associated with lymph node metastasis.

Cellular localization

Secreted protein. Secreted but remains associated to cells or to the extracellular matrix unless released by heparin.

Please note: All products are "FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC PROCEDURES"

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