# Recombinant Human VEGF-165

Cat. # and size: PVEGF165-10 10 μg

> PVEGF165-100 100 μg PVEGF165-1000 1000 μg

## **Product Specifications**

• Expression of Human Proteins in Human Cells

• Extreme low Endotoxin

High Purity

• Animal Free and Xeno Free

Tag Free

Source: Human cells derived

Structure: Glycosylated homodimer

Purity: >95% by SDS-PAGE Endotoxin Level: <0.5EU/ug Molecular Weight: 39-45kDa

Formulation: Lyophilized from a 0.2µm filtered

solution in PBS without carrier protein

#### **Activity Assay**

The activity was measured by its ability to stimulate the proliferation of HUVEC cells (Human Umbilical Vein Endothelial Cells).

### Reconstitution

Briefly centrifuge the vial before opening. It is recommended to reconstitute the protein in sterile PBS containing 0.1% endotoxin-free recombinant human serum albumin to a desired concentration.

### Stability & Storage

Store in a manual defrost freezer. In general, the lyophilized protein is stable for 12 months if stored at -80°C. Reconstituted protein is stable for 4 weeks at 2 to 8°C under sterile conditions. Stored the reconstituted protein in aliquots at -20°C to -80°C for up to 3 months under sterile conditions. Avoid repeated freeze-thaw cycles.

### **Protein Description**

Vascular endothelial growth factor (VEGF) is a potent growth and angiogenic cytokine. It is a member of the PDGF family that is characterized by the presence of eight conserved cysteine residues and a cystine knot structure. Humans express alternately spliced isoforms, and VEGF-165 is the most abundant and potent isoform. VEGF stimulates angiogenesis, vasculogenesis and endothelial cell growth, induces endothelial cell proliferation, promotes cell migration, inhibits apoptosis and induces permeabilization of blood vessels. Recombinant human VEGF-165 is a 39-45kDa, disulfide-linked homodimeric protein consisting of two 165 amino acid polypeptides.

### References

Leung DW, et al. (1989) Science 246:1306-1309.

Tischer E, et al. (1991) J. Biol. Chem. 266,11947-11954.

Byrne AM, et al. (2005) J. Cell. Mol. Med. 9,777