Anti-Human VEGF therapeutic Antibody Fab Fragment (ranibizumab)
Cat. No.: TAB-012-F(E)

This product is for research use only and is not intended for diagnostic use.

Product Overview
Recombinant monoclonal antibody Fragment Fab to Human VEGF. Ranibizumab (trade name ranibizumab) is a monoclonal antibody fragment (Fab) derived from the same parent mouse antibody as bevacizumab (bevacizumab). It is much smaller than the parent molecule and has been affinity matured to provide stronger binding to VEGF-A. It is an anti-angiogenic that has been approved to treat the "wet" type of age-related macular degeneration (AMD, also ARMD), a common form of age-related vision loss.

Antigen Description
Growth factor active in angiogenesis, vasculogenesis and endothelial cell growth. Induces endothelial cell proliferation, promotes cell migration, inhibits apoptosis and induces permeabilization of blood vessels. Binds to the FLT1/VEGFR1 and KDR/VEGFR2 receptors, heparan sulfate and heparin. NRP1/Neuropilin-1 binds isoforms VEGF-165 and VEGF-145. Isoform VEGF165B binds to KDR but does not activate downstream signaling pathways, does not activate angiogenesis and inhibits tumor growth.

Specificity
Tested positive against native human antigen

Target
VEGF

Immunogen
Purified intact human VEGF

Source
Humanized (from mouse)

Species Reactivity
Human

Type
Fab - G1 - kappa

Expression Host
CHO

Protein Construction
Immunoglobulin G1, anti-(human vascular endothelial growth factor) Fab fragment
**Trade name**  ranibizumab  
**CAS**  347396-82-1  
**Purity**  >95.0% as determined by analysis by SDS-PAGE.  
**Applications**  Suitable for use in IP, IF, FuncS, FC, Neut, ELISA, IHC and most other immunological methods.  
**Size**  1mg  
**Storage**  Store at 4°C for up to 3 months. For longer term storage aliquot into small volumes and store at -20°C.

### ANTIGEN GENE INFORMATION

<table>
<thead>
<tr>
<th>Gene Name</th>
<th>VEGFA vascular endothelial growth factor A [ Homo sapiens ]</th>
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<tbody>
<tr>
<td>Official Symbol</td>
<td>VEGF</td>
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<tr>
<td>Synonyms</td>
<td>VEGFA; vascular endothelial growth factor A; vascular endothelial growth factor , VEGF; VEGF A; VPF; vascular permeability factor; VEGF; MVCD1; MGC70609;</td>
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<td>Pathway</td>
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<tr>
<td>Function</td>
<td>cell surface binding; chemoattractant activity; cytokine activity; cytokine activity; extracellular matrix binding; fibronectin binding; growth factor activity; growth factor activity; heparin binding; heparin binding; platelet-derived growth factor recep</td>
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