For Research Use Only

## CoraLite® Plus 647-conjugated VE-cadherin/CD144 Recombinant monoclonal antibody



Catalog Number: CL647-83766-6

**Basic Information** 

Catalog Number: CL647-83766-6

Source: Rabbit

Isotype: IgG

Immunogen Catalog Number:

EG1200

GenBank Accession Number:

NM\_001795.5 GeneID (NCBI): 1003 UNIPROT ID: P33151-1

Full Name: cadherin 5, type 2 (vascular endothelium)

Calculated MW: 88 kDa Observed MW:

90-100 kDa, 130-140 kDa

Purification Method:

Protein A purification

CloneNo.: 240755D5

Recommended Dilutions: IF/ICC: 1:50-1:500

Excitation/Emission maxima

wavelengths: 654 nm / 674 nm

**Applications** 

Tested Applications:

IF/ICC

Species Specificity:

human

Positive Controls:

IF/ICC : HUVEC cells,

## **Background Information**

Cadherins are a family of transmembrane glycoproteins that mediate calcium-dependent cell-cell adhesion and play an important role in the maintenance of normal tissue architecture. Vascular endothelial cadherin (VE-cadherin), also known as Cadherin-5 (CDH5) or CD144, is a member of the type II classical cadherin family of cell adhesion proteins (PMID: 21269602). VE-cadherin is expressed specifically in endothelial cells and mediates homophilic adhesion in the vascular endothelium (PMID: 1522121; 8555485; 21269602). VE-cadherin plays a role in the organization of lateral endothelial junctions and in the control of permeability properties of vascular endothelium (PMID: 1522121). VE-cadherin has also been shown to be required for angiogenesis (PMID: 16473763; 18162609). The calculated molecular weight of VE-cadherin is 88 kDa and the apparent molecular weight of 120-140 kDa is higher due to post-translational glycosylation and phosphorylation (PMID: 10460833; 29894844). Full-length VE-cadherin can be proteolytically cleaved to generate a fragment of 90-100 kDa (PMID: 9786462; 22064597).

Storage

Storage:

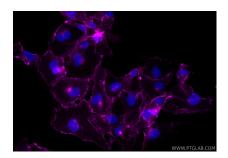
Store at -20  $^{\circ}\text{C}$  . Avoid exposure to light. Stable for one year after shipment.

Storage Buffer

PBS with 50% glycerol, 0.05% Proclin300, 0.5% BSA, pH7.3

Aliquoting is unnecessary for -20°C storage

## Selected Validation Data



Immunofluorescent analysis of (4% PFA) fixed HUVEC cells using Coralite® Plus 647 VE-cadherin/CD144 antibody (CL647-83766-6, Clone: 240755D5) at dilution of 1:200.