

# CD309 (FLK1) Monoclonal Antibody (Avas12a1), Super Bright™ 600, eBioscience™

Product Details	
Size	100 µg
Species Reactivity	Mouse
Host/Isotype	Rat / IgG2a, kappa
Recommended Isotype Control	Rat IgG2a kappa Isotype Control (eBR2a), Super Bright™ 600, eBioscience™
Class	Monoclonal
Type	Antibody
Clone	Avas12a1
Conjugate	Super Bright™ 600
Excitation/Emission Max	414/601 nm
Form	Liquid
Concentration	0.2 mg/mL
Purification	Affinity chromatography
Storage buffer	PBS, pH 7.2, with BSA
Contains	0.09% sodium azide
Storage conditions	4° C, store in dark, DO NOT FREEZE!
RRID	AB_2688141

Applications	Tested Dilution	Publications
Immunohistochemistry (IHC)	-	1 Publication
Immunohistochemistry (PFA fixed) (IHC (PFA))	-	1 Publication
Flow Cytometry (Flow)	1 µg/test	3 Publications

## Product Specific Information

**Description:** The Avas12a1 monoclonal antibody reacts with mouse Flk-1, also known as vascular endothelial growth factor receptor 2 (VEGFR2) and CD309. Flk-1 is a receptor tyrosine kinase involved in vascular endothelial tissue development and is expressed on endothelial cells during embryonic stages and some endothelial tissues in the adult.

**Applications Reported:** This Avas12a1 antibody has been reported for use in flow cytometric analysis.

**Applications Tested:** This Avas12a1 antibody has been tested by flow cytometric analysis of bEnd.3 cells. This may be used at less than or equal to 1.0 µg per test. A test is defined as the amount (µg) of antibody that will stain a cell sample in a final volume of 100 µL. Cell number should be determined empirically but can range from 10<sup>5</sup> to 10<sup>8</sup> cells/test. It is recommended that the antibody be carefully titrated for optimal performance in the assay of interest.

Super Bright 600 is a tandem dye that can be excited with the violet laser line (405 nm) and emits at 600 nm. We recommend using a 610/20 bandpass filter. Please make sure that your instrument is capable of detecting this fluorochrome.

When using two or more Super Bright dye-conjugated antibodies in a staining panel, it is recommended to use Super Bright Complete Staining Buffer (Product # SB-4401) to minimize any non-specific polymer interactions. Please refer to the datasheet for Super Bright Staining Buffer for more information.

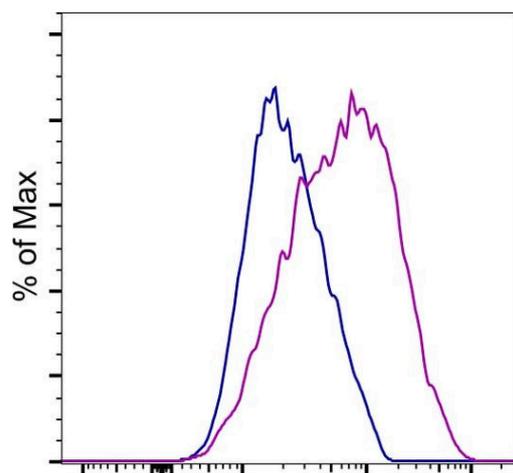
Light sensitivity: This tandem dye is sensitive to photo-induced oxidation. Please protect this vial and stained samples from light.

Fixation: Samples can be stored in IC Fixation Buffer (Product # 00-8222) (100  $\mu$ L of cell sample + 100  $\mu$ L of IC Fixation Buffer) or 1-step Fix/Lyse Solution (Product # 00-5333) for up to 3 days in the dark at 4°C with minimal impact on brightness and FRET efficiency/compensation. Some generalizations regarding fluorophore performance after fixation can be made, but clone specific performance should be determined empirically.

Excitation: 405 nm; Emission: 600 nm; Laser: Violet Laser

Super Bright Polymer Dyes are sold under license from Becton, Dickinson and Company.

## Product Images For CD309 (FLK1) Monoclonal Antibody (Avas12a1), Super Bright™ 600, eBioscience™



### CD309 (FLK1) Antibody (63-5821-82) in Flow

bEnd.3 cells were stained with 0.5  $\mu$ g of Rat IgG2a kappa Isotype Control, Super Bright 600 (Product # 63-4321-82) (blue histogram) or 0.5  $\mu$ g of CD309 (FLK-1) Monoclonal Antibody, Super Bright 600 (purple histogram). Viable cells were used for analysis.

CD309 Super Bright 600

[View more figures on thermofisher.com](https://www.thermofisher.com)

## 5 References

### Immunohistochemistry (1)

<b>PloS one</b> <b>Activation of the canonical bone morphogenetic protein (BMP) pathway during lung morphogenesis and adult lung tissue repair.</b> "Published figure using CD309 (FLK1) monoclonal antibody (Product # 63-5821-82) in Immunohistochemistry (PFA fixed)" Authors: Sountoulidis A, Stavropoulos A, Giaglis S, Apostolou E, Monteiro R, Chuva de Sousa Lopes SM, Chen H, Stripp BR, Mummery C, Andreacos E, Sideras P	<b>Year</b> 2013
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### Immunohistochemistry (PFA fixed) (1)

<b>PloS one</b> <b>Activation of the canonical bone morphogenetic protein (BMP) pathway during lung morphogenesis and adult lung tissue repair.</b> "Published figure using CD309 (FLK1) monoclonal antibody (Product # 63-5821-82) in Immunohistochemistry (PFA fixed)" Authors: Sountoulidis A, Stavropoulos A, Giaglis S, Apostolou E, Monteiro R, Chuva de Sousa Lopes SM, Chen H, Stripp BR, Mummery C, Andreacos E, Sideras P	<b>Year</b> 2013
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### Flow Cytometry (3)

<b>Nature communications</b> <b>Lamin A/C-dependent chromatin architecture safeguards naïve pluripotency to prevent aberrant cardiovascular cell fate and function.</b> "Published figure using CD309 (FLK1) monoclonal antibody (Product # 63-5821-82) in Flow Cytometry" Authors: Wang Y, Elsherbiny A, Kessler L, Cordero J, Shi H, Serke H, Lityagina O, Trogisch FA, Mohammadi MM, El-Battrawy I, Backs J, Wieland T, Heineke J, Dobrova G	<b>Year</b> 2022
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<b>Cell stem cell</b> <b>The Isl1/Ldb1 Complex Orchestrates Genome-wide Chromatin Organization to Instruct Differentiation of Multipotent Cardiac Progenitors.</b> "Published figure using CD309 (FLK1) monoclonal antibody (Product # 63-5821-82) in Flow Cytometry" Authors: Caputo L, Witzel HR, Kolovos P, Cheedipudi S, Looso M, Mylona A, van IJcken WF, Laugwitz KL, Evans SM, Braun T, Soler E, Grosveld F, Dobrova G	<b>Year</b> 2015
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### More applications with references on thermofisher.com

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