## **Technical Data Sheet**

# BV605 Mouse Anti-Human CD62E

#### **Product Information**

Material Number:	563359
Alternate Name:	SELE; E-selectin; Selectin E; ELAM; ELAM1; ESEL; LECAM2
Size:	100 Tests
Vol. per Test:	5 µl
Clone:	68-5H11
Isotype:	Mouse IgG1, κ
Reactivity:	QC Testing: Human
Workshop:	VI A090
Storage Buffer:	Aqueous buffered solution containing BSA and ≤0.09% sodium azide.

#### Description

The 68-5H11 monoclonal antibody specifically binds to CD62E. This adhesion molecule is a 97-115 kDa type I transmembrane glycoprotein that is encoded by the *SELE* gene. CD62E is also known as E-selectin, Endothelial-leukocyte adhesion molecule-1 (ELAM-1), and Leukocyte endothelial cell adhesion molecule 2 (LECAM-2). CD62E is minimally expressed by unstimulated endothelium. Activated endothelial cells upregulate surface CD62E expression in response to various activators including inflammatory cytokines such as Interleukin-1 and Tumor Necrosis Factor. CD62E plays a role in leucocyte extravasation by promoting leucocyte rolling on activated endothelial cells during inflammation. CD62E may also play a role in the metastasis of certain tumor cells. The adhesion between endothelial CD62E molecules and a carbohydrate ligand on neutrophils is inhibited by the mAb 68-5H11.

This antibody is conjugated to BD Horizon BV605 which is part of the BD Horizon Brilliant<sup>™</sup> Violet family of dyes. With an Ex Max of 407-nm and Em Max of 602-nm, BD Horizon BV605 can be excited by a violet laser and detected with a standard 610/20-nm filter set. BD Horizon BV605 is a tandem fluorochrome of BD Horizon BV421 and an acceptor dye with an Em max at 605-nm. Due to the excitation of the acceptor dye by the green (532 nm) and yellow-green (561 nm) lasers, there will be significant spillover into the PE and BD Horizon PE-CF594 detectors off the green or yellow-green lasers. BD Horizon BV605 conjugates are very bright, often exhibiting brightness equivalent to PE conjugates and can be used as a third color off of the violet laser.

For optimal and reproducible results, BD Horizon Brilliant Stain Buffer should be used anytime two or more BD Horizon Brilliant dyes are used in the same experiment. Fluorescent dye interactions may cause staining artifacts which may affect data interpretation. The BD Horizon Brilliant Stain Buffer was designed to minimize these interactions. More information can be found in the Technical Data Sheet of the BD Horizon Brilliant Stain Buffer (Cat. No. 563794).



Flow cytometric analysis of CD62E expression on HUVEC cells. Human Umbilical Vein Endothelial Cells (HUVEC) were cultured with Recombinant Human TNF protein (Cat. No. 554618; 20 ng/ml) for 4 hours at 37°C. The cells were stained with BD Horizon™ BV605 Mouse IgG1, κ Isotype Control (Cat. No. 562652; dashed line histogram) or BD Horizon™ BV605 Mouse Anti-Human CD62E antibody (Cat. No. 563359; solid line histogram). The fluorescence histograms were derived from gated events with the forward and side light-scatter characteristics of viable cells. Flow cytometric analysis was performed using a BD™ LSR II Flow Cytometer System.

#### Preparation and Storage

Store undiluted at 4°C and protected from prolonged exposure to light. Do not freeze.

The monoclonal antibody was purified from tissue culture supernatant or ascites by affinity chromatography.

The antibody was conjugated with BD Horizon<sup>™</sup> BV605 under optimum conditions, and unconjugated antibody and free BD Horizon<sup>™</sup> BV605 were removed.

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#### **Application Notes**

Application

Flow cytometry Routinely Tested

### Suggested Companion Products

Catalog Number	Name	Size	Clone
554656	Stain Buffer (FBS)	500 mL	(none)
562652	BV605 Mouse IgG1, κ Isotype Control	50 µg	X40
554618	Recombinant Human TNF	10 µg	(none)
563794	Brilliant Stain Buffer	5 mL	(none)

#### **Product Notices**

- This reagent has been pre-diluted for use at the recommended Volume per Test. We typically use  $1 \times 10^{6}$  cells in a 100-µl experimental sample (a test).
- Source of all serum proteins is from USDA inspected abattoirs located in the United States. 2.
- 3. An isotype control should be used at the same concentration as the antibody of interest.
- Please refer to www.bdbiosciences.com/pharmingen/protocols for technical protocols. 4.
- Please observe the following precautions: Absorption of visible light can significantly alter the energy transfer occurring in any tandem 5. fluorochrome conjugate; therefore, we recommend that special precautions be taken (such as wrapping vials, tubes, or racks in aluminum foil) to prevent exposure of conjugated reagents, including cells stained with those reagents, to room illumination.
- 6. Caution: Sodium azide yields highly toxic hydrazoic acid under acidic conditions. Dilute azide compounds in running water before discarding to avoid accumulation of potentially explosive deposits in plumbing.
- 7. For fluorochrome spectra and suitable instrument settings, please refer to our Multicolor Flow Cytometry web page at www.bdbiosciences.com/colors.
- Although every effort is made to minimize the lot-to-lot variation in the efficiency of the fluorochrome energy transfer, differences in the 8. residual emission from BD Horizon™ BV421 may be observed. Therefore, we recommend that individual compensation controls be performed for every BD Horizon<sup>™</sup> BV605 conjugate.
- CF<sup>™</sup> is a trademark of Biotium, Inc. 9.

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