

Technical Data Sheet

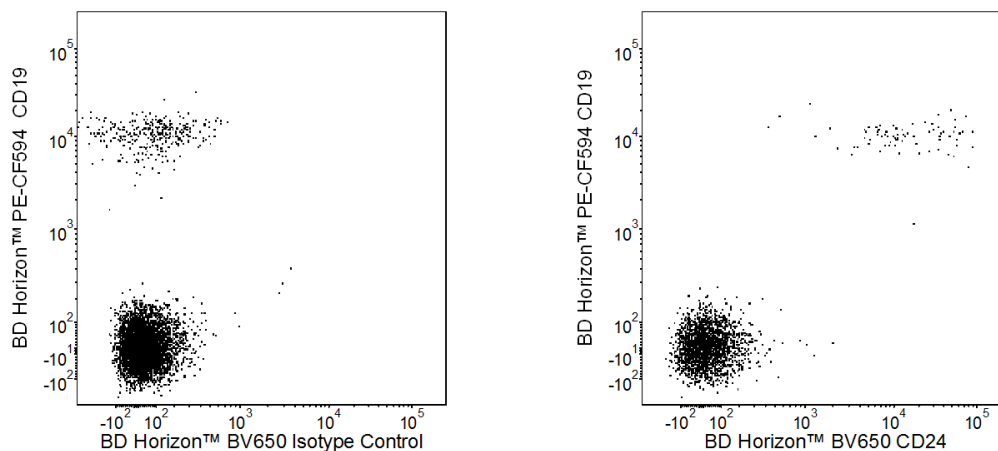
BV650 Mouse Anti-Human CD24**Product Information**

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|-------------------------|---|
| Material Number: | 563720 |
| Alternate Name: | Heat Stable Antigen Homologue (HSA); Ba-1; CD24A |
| Size: | 100 tests |
| Vol. per Test: | 5 µl |
| Clone: | ML5 |
| Isotype: | Mouse IgG2a, κ |
| Reactivity: | QC Testing: Human |
| Workshop: | V CD24.5 |
| Storage Buffer: | Aqueous buffered solution containing BSA and ≤0.09% sodium azide. |

Description

The ML5 monoclonal antibody specifically binds to CD24. CD24 is a 35–45 kDa two-chain glycoprotein expressed on the surface of B cells, granulocytes and most B-cell lines. CD24 may play a role in regulation of B-cell proliferation and maturation.

The antibody was conjugated to BD Horizon™ BV650 which is part of the BD Horizon™ Brilliant Violet™ family of dyes. This dye is a tandem fluorochrome of BD Horizon™ BV421 with an Ex Max of 405-nm and an acceptor dye with an Em Max at 650-nm. BD Horizon™ BV650 can be excited by the violet laser and detected in a filter used to detect APC-like dyes (eg, 660/20-nm filter). Due to the excitation and emission characteristics of the acceptor dye, there will be spillover into the APC and Alexa Fluor® 700 detectors. However, the spillover can be corrected through compensation as with any other dye combination.



Flow cytometric analysis of CD24 expression on human peripheral blood lymphocytes. Whole blood was stained with BD Horizon™ PE-CF594 Mouse Anti-Human CD19 antibody (Cat. No. 562294/562321) and either BD Horizon™ BV650 Mouse IgG2a, κ Isotype Control (Cat. No. 563417; Left Panel) or BD Horizon™ BV650 Mouse Anti-Human CD24 antibody (Cat. No. 563720; Right Panel). The erythrocytes were lysed with BD Pharm Lyse™ Lysing Buffer (Cat. No. 555899). The two-color flow cytometric dot plots show the correlated expression patterns of CD24 versus CD19 for gated events with the forward and side light-scatter characteristics of viable lymphocytes. Flow cytometry 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™ BV650 under optimum conditions, and unconjugated antibody and free BD Horizon™ BV650 were removed.

Application Notes**Application**

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| Flow cytometry | Routinely Tested |
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Suggested Companion Products

| Catalog Number | Name | Size | Clone |
|----------------|---|------------|----------|
| 554656 | Stain Buffer (FBS) | 500 ml | (none) |
| 563417 | BV650 Mouse IgG2a, κ Isotype Control | 50 μ g | G155-178 |
| 562294 | PE-CF594 Mouse Anti-Human CD19 | 100 tests | HIB19 |
| 562321 | PE-CF594 Mouse Anti-Human CD19 | 25 tests | HIB19 |
| 555899 | Lysing Buffer | 100 ml | (none) |
| 349202 | BD FACS™ Lysing Solution | 100 ml | (none) |

Product Notices

1. This reagent has been pre-diluted for use at the recommended Volume per Test. We typically use 1×10^6 cells in a 100- μ l experimental sample (a test).
2. Source of all serum proteins is from USDA inspected abattoirs located in the United States.
3. An isotype control should be used at the same concentration as the antibody of interest.
4. Please refer to www.bdbiosciences.com/pharmingen/protocols for technical protocols.
5. Alexa Fluor® is a registered trademark of Molecular Probes, Inc., Eugene, OR.
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.
8. Brilliant Violet™ 650 is a trademark of Sirigen.

References

Chtanova T, Tangye SG, Newton R, Frank N, Hodge MR, Rolph MS, Mackay CR. T follicular helper cells express a distinctive transcriptional profile, reflecting their role as non-Th1/Th2 effector cells that provide help for B cells. *J Immunol.* 2004; 173(1):68-78. (Clone-specific: Flow cytometry)

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