

## Technical Data Sheet

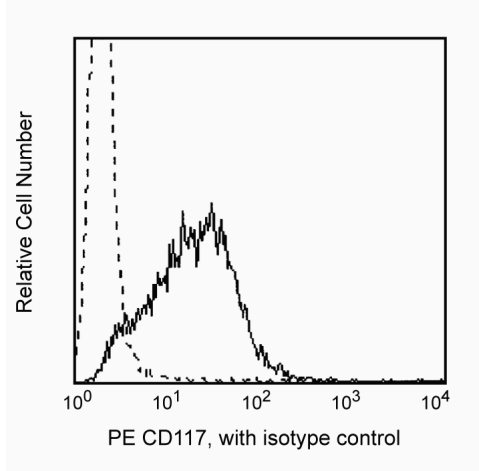
## PE Mouse Anti-Human CD117

## Product Information

|                         |                                                                  |
|-------------------------|------------------------------------------------------------------|
| <b>Material Number:</b> | <b>555714</b>                                                    |
| <b>Alternate Name:</b>  | KIT ; c-Kit; SCFR; PBT: Mast/stem cell growth factor receptor    |
| <b>Size:</b>            | 0.1 mg                                                           |
| <b>Concentration:</b>   | 0.2 mg/ml                                                        |
| <b>Clone:</b>           | YB5.B8                                                           |
| <b>Isotype:</b>         | Mouse IgG1, $\kappa$                                             |
| <b>Reactivity:</b>      | QC Testing: Human                                                |
| <b>Workshop:</b>        | V C009                                                           |
| <b>Storage Buffer:</b>  | Aqueous buffered solution containing $\leq 0.09\%$ sodium azide. |

## Description

The YB5.B8 monoclonal antibody specifically binds to CD117. CD117, also known as c-Kit, is a 145 kDa cell-surface glycoprotein with tyrosine kinase activity. CD117 is present on hematopoietic progenitor cell subsets, thymocytes, mast cells, hepatocytes and histiocytes. CD117 serves as a cytokine receptor for steel factor (SLF), also known as stem cell factor (SCF) or mast cell growth factor (MGF). The interaction of c-Kit and SLF is crucial to hematopoiesis, mast cell differentiation, melanogenesis, and germ cell development. The ability of the YB5.B8 antibody to block the binding of c-Kit ligand is still controversial.



Profile of the erythroleukemia cell line, TF-1, analyzed on a FACScan (BDIS, San Jose, CA)

## Preparation and Storage

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

The antibody was conjugated with R-PE under optimum conditions, and unconjugated antibody and free PE were removed.

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

## Application Notes

## Application

|                |                  |
|----------------|------------------|
| Flow cytometry | Routinely Tested |
|----------------|------------------|

## Suggested Companion Products

| Catalog Number | Name                                    | Size      | Clone   |
|----------------|-----------------------------------------|-----------|---------|
| 555749         | PE Mouse IgG1, $\kappa$ Isotype Control | 100 tests | MOPC-21 |

## Product Notices

1. Since applications vary, each investigator should titrate the reagent to obtain optimal results.
2. Please refer to [www.bdbiosciences.com/pharmingen/protocols](http://www.bdbiosciences.com/pharmingen/protocols) for technical protocols.
3. For fluorochrome spectra and suitable instrument settings, please refer to our Fluorochrome Web Page at [www.bdbiosciences.com/colors](http://www.bdbiosciences.com/colors).
4. 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.

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## References

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