

## Anti-Human CD45RA Biotin

Catalog Number :07121-30

RUO: For Research Use Only. Not for use in diagnostic procedures.

### Product Information

**Clone:** HI100

**Format/Conjugate:** Biotin

**Concentration:** 0.5 mg/mL

**Reactivity:** Human

**Laser:** Not Applicable

**Peak Emission:** Not Applicable

**Peak Excitation:** Not Applicable

**Filter:** Not Applicable

**Brightness (1=dim,5=brightest):** Not Applicable

**Isotype:** Mouse IgG2b, kappa

**Formulation:** Phosphate-buffered aqueous solution, ≤0.09% Sodium azide, may contain carrier protein/stabilizer, pH7.2.

**Storage:** Product should be kept at 2-8°C and protected from prolonged exposure to light.

**Applications:** FC

### Description

The HI100 monoclonal antibody specifically reacts with human CD45RA, the 220 kDa isoform of the human leukocyte common antigen (LCA) found on 40-50% of the peripheral CD4+ T lymphocytes, half of the peripheral CD8+ T lymphocytes and some of the monocytes and B lymphocytes. The CD45RA antigen is expressed by naïve and activated T lymphocytes. The HI100 monoclonal antibody is used as a phenotypic marker to discriminate T lymphocyte subsets.

### Preparation & Storage

The product should be stored undiluted at 4°C and should be protected from prolonged exposure to light. Do not freeze. The monoclonal antibody was purified utilizing affinity chromatography and unreacted dye was removed from the product.

### Application Notes

The antibody has been analyzed for quality through the flow cytometric analysis of the relevant cell type. For flow cytometric staining, the suggested use of this reagent is ≤0.5 ug per million cells in 100 µl volume. It is recommended that the reagent be titrated for optimal performance for each application.

### References

1. Knapp W; (1989) Leucocyte typing IV: white cell differentiation antigens. Oxford University Press, 1989.
2. Barclay, A. N., Brown, M. H., Law, S. A. K. A., McKnight, A. J., Tomlinson, M. G., van der Merwe, P. A. (1997).; The leucocyte antigen factsbook. Academic Press.
3. Yamada, T., Zhu, D., Saxon, A., Zhang, K. (2002). CD45 controls interleukin-4-mediated IgE class switch recombination in human B cells through its function as a Janus kinase phosphatase. Journal of Biological Chemistry, 277(32), 28830-28835.