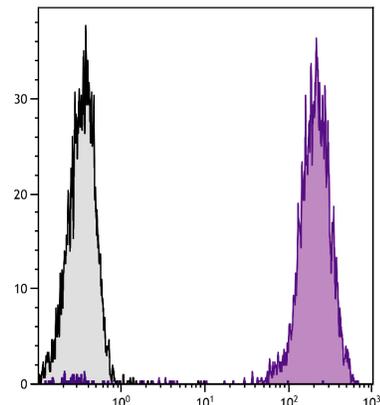




Mouse Anti-Human CD45

Cat. No.	Format	Size
9624-01	Purified (UNLB)	0.1 mg
9624-02	Fluorescein (FITC)	100 tests
9624-08	Biotin (BIOT)	100 tests
9624-09	R-phycoerythrin (PE)	100 tests
9624-11	Allophycocyanin (APC)	100 tests
9624-26	Pacific Blue™ (PACBLU)	100 tests
9624-30	Alexa Fluor® 488 (AF488)	100 tests
9624-31	Alexa Fluor® 647 (AF647)	100 tests



Human peripheral blood lymphocytes were stained with Mouse Anti-Human CD45-PE (SB Cat. No. 9624-09).

Overview

Clone	2D1
Isotype	Mouse (BALB/c) IgG ₁ κ
Immunogen	Human peripheral blood mononuclear cells
Specificity	Human CD45; Mr 180-220 kDa
Alternate Name(s)	LCA, T200, Ly5
Workshop	III 360, 792

Description

CD45, also known as the leukocyte common antigen (LCA), exists as four different isoforms (180, 190, 205, 220 kDa) that are generated by alternative splicing of three exons. LCA is found on all cells of hematopoietic origin, except erythrocytes and platelets. CD45 expression is required for T cell and B cell antigen receptor-mediated activation.

Applications

FC – Quality tested ⁶
 IHC-FS – Reported in literature ¹⁻³
 IHC-PS – Reported in literature ⁴
 IP-NR – Reported in literature ^{5,6}
 WB-NR – Reported in literature ⁵

Working Dilutions

Flow Cytometry	Purified (UNLB) antibody	≤ 1 μg/10 ⁶ cells
	FITC, BIOT, PE, APC, PACBLU, AF488, and AF647 conjugates	10 μL/10 ⁶ cells

For flow cytometry, the suggested use of these reagents is in a final volume of 100 μL

Other Applications Since applications vary, you should determine the optimum working dilution for the product that is appropriate for your specific need.

For Research Use Only. Not for Diagnostic or Therapeutic Use.

Corporate Offices: 160 Oxmoor Blvd • Birmingham, AL 35209 • USA Mailing Address: P.O. Box 26221 • Birmingham, AL 35260 • USA

Tel: 205.945.1774 • U.S. and Canada: 800.722.2255 • Fax: 205.945.8768

Email: info@southernbiotech.com • Website: www.southernbiotech.com

Handling and Storage

- The purified (UNLB) antibody is supplied as 0.1 mg of purified immunoglobulin in 1.0 mL of borate buffered saline, pH 8.2. *No preservatives or amine-containing buffer salts added.* Store at 2-8°C.
- The fluorescein (FITC) conjugate is supplied as 100 tests in 1.0 mL of PBS/NaN₃. Store at 2-8°C.
- The biotin (BIOT) conjugate is supplied as 100 tests in 1.0 mL of PBS/NaN₃. Store at 2-8°C.
- The R-phycoerythrin (PE) and allophycocyanin (APC) conjugates are supplied as 100 tests in 1.0 mL of PBS/NaN₃ and a stabilizing agent. Store at 2-8°C. **Do not freeze!**
- The Alexa Fluor[®] 488 (AF488), Alexa Fluor[®] 647 (AF647), and Pacific Blue[™] (PACBLU) conjugates are supplied as 100 tests in 1.0 mL of PBS/NaN₃. Store at 2-8°C.
- Protect fluorochrome-conjugated forms from light. Reagents are stable for the period shown on the label if stored as directed.

Warning

Some reagents contain sodium azide. Please refer to product specific SDS.

References

1. Gillitzer R, Berger R, Moll H. A reliable method for simultaneous demonstration of two antigens using a novel combination of immunogold-silver staining and immunoenzymatic labeling. *J Histochem Cytochem.* 1990;38:307-13. (IHC-FS)
2. Nickoloff BJ, Kunkel SL, Burdick M, Strieter RM. Severe combined immunodeficiency mouse and human psoriatic skin chimeras. Validation of a new animal model. *Am J Pathol.* 1995;146:580-8. (IHC-FS)
3. Ménétrier-Caux C, Bain C, Favrot MC, Duc A, Blay JY. Renal cell carcinoma induces interleukin 10 and prostaglandin E₂ production by monocytes. *Br J Cancer.* 1999;79:119-30. (IHC-FS)
4. Charbord P, Tavian M, Humeau L, Péault B. Early ontogeny of the human marrow from long bones: an immunohistochemical study of hematopoiesis and its microenvironment. *Blood.* 1996;87:4109-19. (IHC-PS)
5. Poggi A, Pardi R, Pella N, Morelli L, Sivori S, Vitale M, et al. CD45-mediated regulation of LFA1 function in human natural killer cells. Anti-CD45 monoclonal antibodies inhibit the calcium mobilization induced via LFA1 molecules. *Eur J Immunol.* 1993;23:2454-63. (IP, WB)
6. Lazarovits AI, Osman N, Le Feuvre CE, Ley SC, Crumpton MJ. CD7 is associated with CD3 and CD45 on human T cells. *J Immunol.* 1994;153:3956-66. (IP, FC)

Alexa Fluor[®] 488, 647, 700 and Pacific Blue[™] are provided under an agreement between Molecular Probes, Inc. (a wholly owned subsidiary of Invitrogen Corporation), and Southern Biotechnology Associates, Inc., and the manufacture, use, sale or import of this product may be subject to one or more U.S. patents, pending applications, and corresponding non-U.S. equivalents, owned by Molecular Probes, Inc. The purchase of this product conveys to the buyer the non-transferable right to use the purchased amount of the product and components of the product in research conducted by the buyer (whether the buyer is an academic or for-profit entity). The buyer cannot sell or otherwise transfer (a) this product (b) its components or (c) materials made using this product or its components to a third party or otherwise use this product or its components or materials made using this product or its components for Commercial Purposes. Commercial Purposes means any activity by a party for consideration and may include, but is not limited to: (1) use of the product or its components in manufacturing; (2) use of the product or its components to provide a service, information, or data; (3) use of the product or its components for therapeutic, diagnostic or prophylactic purposes; or (4) resale of the product or its components, whether or not such product or its components are resold for use in research. For information on purchasing a license to this product for any other use, contact Molecular Probes, Inc., Business Development, 29851 Willow Creek Road, Eugene, OR 97402, USA, Tel: (541) 465-8300. Fax: (541) 335-0504.