

TECHNICAL DATA SHEET

CyFlow™ HLA-DR FITC Anti-Hu; Clone L243

REF AY069614

For Research Use Only.
Not for use in diagnostic or therapeutic procedures.

Specifications

Antigen	HLA-DR
Alternative Names	—
Clone	L243
Clonality	monoclonal
Format	FITC
Host / Isotype	Mouse / IgG2a
Species Reactivity	Human, Non-Human Primates Dog
Negative Species Reactivity	—
Quantity	100 tests
Immunogen	Human B lymphocytes

Specificity

The mouse monoclonal antibody L243 recognizes specifically HLA-DR molecules, both peptide-loaded and empty. It is expressed on antigen-presenting cells (dendritic cells, B lymphocytes, monocytes, macrophages).

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Application

The reagent is designed for Flow Cytometry analysis of human blood cells. Recommended usage is 4 µl reagent / 100 µl of whole blood or 10⁶ cells in a suspension. The content of a vial (0.4 ml) is sufficient for 100 tests.

Other usages may be determined from the scientific literature.

Storage Buffer

The reagent is provided in stabilizing phosphate buffered saline (PBS) solution, pH ≈7.4, containing 0.1% (w/v) sodium azide.

Storage and Stability

Storage	Avoid prolonged exposure to light. Store in the dark at 2-8°C. Do not freeze.
Stability	Do not use after expiration date stamped on vial label.

Background Information

HLA-DR, a member of MHC class II glycoproteins, that bind intracellularly processed peptides and present them to the Th cells, is composed of 36 kDa α chain and 27 kDa β chain, both anchored in the plasma membrane. Together with other MHC II molecules HLA-DR plays a central role in the immune system.

References

- Coral S, Pucillo C, Leonardi A, Fonsatti E, Altomonte M, Maio M: Triggering of HLA-DR antigens differentially modulates tumor necrosis factor alpha release by B cells at distinct stage of maturation. Cell Growth Differ. 1997 May; 8(5):581-8. < PMID: 9149909 >
- Cantin R, Martin G, Tremblay MJ: A novel virus capture assay reveals a differential acquisition of host HLA-DR by clinical isolates of human immunodeficiency virus type 1 expanded in primary human cells depending on the nature of producing cells and the donor source. J Gen Virol. 2001 Dec; 82(12):2979-87. < PMID: 11714974 >
- Kalka-Moll WM, Tzianabos AO, Bryant PW, Niemeyer M, Ploegh HL, Kasper DL: Zwitterionic polysaccharides stimulate T cells by MHC class II-dependent interactions. J Immunol. 2002 Dec 1; 169(11):6149-53. < PMID: 12444118 >

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- Bouillon M, El Fakhry Y, Girouard J, Khalil H, Thibodeau J, Mourad W: Lipid raft-dependent and -independent signaling through HLA-DR molecules. J Biol Chem. 2003 Feb 28; 278(9):7099-107. < PMID: 12499388 >
- Muczynski KA, Ekle DM, Coder DM, Anderson SK: Normal human kidney HLA-DR-expressing renal microvascular endothelial cells: characterization, isolation, and regulation of MHC class II expression. J Am Soc Nephrol. 2003 May; 14(5):1336-48. < PMID: 12707403 >
- De Gassart A, Camosseto V, Thibodeau J, Ceppi M, Catalan N, Pierre P, Gatti E: MHC class II stabilization at the surface of human dendritic cells is the result of maturation-dependent MARCH I down-regulation. Proc Natl Acad Sci USA. 2008 Mar 4; 105(9):3491-6. < PMID: 18305173 >
- Swiatek-de Lange M, Rist W, Stahl HF, Weith A, Lenter MC: Comment on "MHC class II expression identifies functionally distinct human regulatory T cells". J Immunol. 2008 Mar 15; 180(6):3625. < PMID: 18322165 >
- Ivanov A, Beers SA, Walshe CA, Honeychurch J, Alduaij W, Cox KL, Potter KN, Murray S, Chan CH, Klymenko T, Erenpreisa J, Glennie MJ, Illidge TM, Cragg MS: Monoclonal antibodies directed to CD20 and HLA-DR can elicit homotypic adhesion followed by lysosome-mediated cell death in human lymphoma and leukemia cells. J Clin Invest. 2009 Aug; 119(8):2143-59. < PMID: 19620786 >

The Safety Data Sheet for this product is available at www.sysmex-partec.com/services.

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