

Datasheet: MCA477SBB580

BATCH NUMBER 100006971

Description:	MOUSE ANTI HUMAN HLA DP DQ DR:StarBright Blue 580
Specificity:	HLA DP DQ DR
Format:	StarBright Blue 580
Product Type:	Monoclonal Antibody
Clone:	WR18
Isotype:	IgG2a
Quantity:	100 TESTS/0.5ml

Product Details

Applications

This product has been reported to work in the following applications. This information is derived from testing within our laboratories, peer-reviewed publications or personal communications from the originators. Please refer to references indicated for further information. For general protocol recommendations, please visit www.bio-rad-antibodies.com/protocols.

	Yes	No	Not Determined	Suggested Dilution
Flow Cytometry	▪			Neat

Where this product has not been tested for use in a particular technique this does not necessarily exclude its use in such procedures. Suggested working dilutions are given as a guide only. It is recommended that the user titrates the product for use in their own system using appropriate negative/positive controls.

Target Species	Human		
Product Form	Purified IgG conjugated to StarBright Blue 580 - liquid		
Max Ex/Em	Fluorophore	Excitation Max (nm)	Emission Max (nm)
	StarBright Blue 580	475	582
Preparation	Purified IgG prepared by affinity chromatography on Protein G from tissue culture supernatant		
Buffer Solution	Phosphate buffered saline		
Preservative	0.09% Sodium Azide (NaN ₃)		
Stabilisers	1% Bovine Serum Albumin		
	0.1% Pluronic F68		
	0.1% PEG 3350		
	0.05% Tween 20		

Immunogen	Human HLA Class II (DP, DQ, DR).
Fusion Partners	Spleen cells from immunized BALB/c mice were fused with cells from NS0 mouse myeloma cell line.
Specificity	<p>Mouse anti Human HLA DP DQ DR antibody, clone WR18 reacts with a monomorphic determinant common to DP, DQ and DR beta chains, which are expressed by antigen presenting cells, B cells, monocytes and activated T lymphocytes.</p> <p>The major histocompatibility complex (MHC) is a cluster of genes that are important in the immune response to infections. In humans, this complex is referred to as the human leukocyte antigen (HLA) region. There are 3 major MHC class II proteins encoded by the HLA which are HLA DP, HLA DQ and HLA DR.</p>
Flow Cytometry	Use 5ul of the suggested working dilution to label 10 ⁶ cells in 100ul. Best practices suggest a 5 minutes centrifugation at 6,000g prior to sample application.
References	<ol style="list-style-type: none"> 1. Moore, K. <i>et al.</i> (1987) Use of the monoclonal antibody WR17, identifying the CD37 gp40-45 Kd antigen complex, in the diagnosis of B-lymphoid malignancy. J Pathol 152:13-21. 2. Trefzer, U. <i>et al.</i> (2000) Hybrid cell vaccination for cancer immune therapy: first clinical trial with metastatic melanoma. Int J Cancer. 85 (5): 618-26. 3. Palmer, K.J. <i>et al.</i> (2000) Interferon-alpha (IFN-alpha) stimulates anti-melanoma cytotoxic T lymphocyte (CTL) generation in mixed lymphocyte tumour cultures (MLTC). Clin Exp Immunol. 119: 412-8. 4. Chia, J.S. <i>et al.</i> (2001) Human T-cell responses to the glucosyltransferases of <i>Streptococcus mutans</i>. Clin Diagn Lab Immunol. 8: 441-5. 5. Keating, S. <i>et al.</i> (2002) The lytic cycle of Epstein-Barr virus is associated with decreased expression of cell surface major histocompatibility complex class I and class II molecules. J Virol. 76: 8179-88. 6. Elias, F. <i>et al.</i> (2003) Strong cytosine-guanosine-independent immunostimulation in humans and other primates by synthetic oligodeoxynucleotides with PyNTTTTGT motifs. J Immunol. 171: 3697-704. 7. Llewelyn, M. <i>et al.</i> (2004) HLA class II polymorphisms determine responses to bacterial superantigens. J Immunol. 172 (3): 1719-26. 8. Neumann F <i>et al.</i> (2004) Identification of an HLA-DR-restricted peptide epitope with a promiscuous binding pattern derived from the cancer testis antigen HOM-MEL-40/SSX2. Int J Cancer. 112 (4): 661-8. 9. Neumann, F. <i>et al.</i> (2004) Identification of an antigenic peptide derived from the cancer-testis antigen NY-ESO-1 binding to a broad range of HLA-DR subtypes. Cancer Immunol Immunother. 53 (7): 589-99. 10. Adamski, J. (2004) 17{beta}-Estradiol Inhibits Class II MHC Expression: Influence on Histone Modifications and CBP Recruitment to the Class II MHC Promoter Molecular Endocrinology 18:1963 11. Iking-Konert C <i>et al.</i> (2005) Transdifferentiation of polymorphonuclear neutrophils to dendritic-like cells at the site of inflammation in rheumatoid arthritis: evidence for activation by T cells. Ann Rheum Dis. 64 (10): 1436-42. 12. Hayman, M.W. <i>et al.</i> (2006) Soluble human leukocyte antigen: a diagnostic indicator of

rheumatoid arthritis? [J Immunol Methods. 315 \(1-2\): 19-26.](#)

13. Chang, Y.C. *et al.* (2008) Epigenetic control of MHC class II expression in tumor-associated macrophages by decoy receptor 3. [Blood. 111: 5054-63.](#)

14. del Pilar Martin, M. *et al.* (2008) Decrease in the numbers of dendritic cells and CD4+ T cells in cerebral perivascular spaces due to natalizumab. [Arch Neurol. 65 \(12\): 1596-603.](#)

15. Litzinger, M.T. *et al.* (2009) Chronic lymphocytic leukemia (CLL) cells genetically modified to express B7-1, ICAM-1, and LFA-3 confer APC capacity to T cells from CLL patients. [Cancer Immunol Immunother. 58: 955-65.](#)

16. John, J. *et al.* (2010) Differential effects of Paclitaxel on dendritic cell function. [BMC Immunol. 11:14.](#)

17. Sadallah, S. *et al.* (2011) Microparticles (ectosomes) shed by stored human platelets downregulate macrophages and modify the development of dendritic cells. [J Immunol. 186: 6543-52.](#)

18. Kissner, T.L. *et al.* (2011) Activation of MyD88 Signaling upon Staphylococcal Enterotoxin Binding to MHC Class II Molecules. [PLoS One. 6: e15985.](#)

19. Silk, K.M. *et al.* (2012) Cross-presentation of tumour antigens by human induced pluripotent stem cell-derived CD141(+)XCR1+ dendritic cells. [Gene Ther. 19 \(10\): 1035-40.](#)

20. Silk, K.M. *et al.* (2012) Rapamycin conditioning of dendritic cells differentiated from human ES cells promotes a tolerogenic phenotype. [J Biomed Biotechnol. 2012: 172420.](#)

21. Sabbah, S. *et al.* (2012) T-cell immunity to Kaposi sarcoma-associated herpesvirus: recognition of primary effusion lymphoma by LANA-specific CD4+ T cells. [Blood. 119 \(9\): 2083-92.](#)

22. Manna, D. *et al.* (2012) 36-P: WR18 Monoclonal Antibody: A Single Antibody to Detect HLA DR, DP and DQ Antigens. [Human Immunol. 73: 72.](#)

23. Noble, P. *et al.* (2013) High levels of cleaved caspase-3 in colorectal tumour stroma predict good survival. [Br J Cancer. 108 \(10\): 2097-105.](#)

24. Koschwanez, H. *et al.* (2015) Stress-related changes to immune cells in the skin prior to wounding may impair subsequent healing. [Brain Behav Immun. 50: 47-51.](#)

25. Hönger, G. *et al.* (2015) Inter-individual differences in HLA expression can impact the CDC crossmatch. [Tissue Antigens. 85 \(4\): 260-6.](#)

26. Ziegler, C.G.K. *et al.* (2019) Constitutive Activation of the B Cell Receptor Underlies Dysfunctional Signaling in Chronic Lymphocytic Leukemia. [Cell Rep. 28 \(4\): 923-937.e3.](#)

27. Costa, S.F. *et al.* (2024) MicroRNA-194 regulates parasitic load and IL-1 β -dependent nitric oxide production in the peripheral blood mononuclear cells of dogs with leishmaniasis. [PLoS Negl Trop Dis. 18 \(1\): e0011789.](#)

Storage	Store at +4°C. DO NOT FREEZE. This product should be stored undiluted.
Guarantee	12 months from date of despatch
Acknowledgements	This product is covered by U.S. Patent No. 10,150,841 and related U.S. and foreign counterparts
Health And Safety Information	Material Safety Datasheet documentation #20471 available at: https://www.bio-rad-antibodies.com/SDS/MCA477SBB580

20471

Regulatory

For research purposes only

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