

Datasheet: MCA477

BATCH NUMBER 152303

Description:	MOUSE ANTI HUMAN HLA DP DQ DR
Specificity:	HLA DP DQ DR
Format:	Purified
Product Type:	Monoclonal Antibody
Clone:	WR18
Isotype:	IgG2a
Quantity:	0.2 mg

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	▪			1/50 - 1/200
Immunohistology - Frozen			▪	
Immunohistology - Paraffin (1)	▪			
ELISA			▪	
Immunoprecipitation			▪	
Western Blotting			▪	
Functional Assays (2)	▪			

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.

(1) This product requires antigen retrieval using heat treatment prior to staining of paraffin sections. Sodium citrate buffer pH 6.0 is recommended for this purpose.

(2) This product contains sodium azide, removal by dialysis is recommended prior to use in functional assays.

Target Species	Human
Product Form	Purified IgG - liquid
Preparation	Purified IgG prepared by affinity chromatography on Protein G from tissue culture supernatant

Buffer Solution	Phosphate buffered saline
Preservative Stabilisers	0.09% Sodium Azide
Approx. Protein Concentrations	IgG concentration 1 mg/ml
Immunogen	Human HLA Class II (DP, DQ, DR).
RRID	AB_322101
Fusion Partners	Spleen cells from immunised 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 10ul of the suggested working dilution to label 10 ⁶ cells in 100ul.
Histology Positive Control Tissue	Tonsil
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. Kissner, T.L. <i>et al.</i> (2011) Activation of MyD88 Signaling upon Staphylococcal Enterotoxin Binding to MHC Class II Molecules. PLoS One. 6: e15985. 3. 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. 4. Chang, Y.C. <i>et al.</i> (2008) Epigenetic control of MHC class II expression in tumor-associated macrophages by decoy receptor 3. Blood. 111: 5054-63. 5. Litzinger, M.T. <i>et al.</i> (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. 6. Sadallah, S. <i>et al.</i> (2011) Microparticles (ectosomes) shed by stored human platelets downregulate macrophages and modify the development of dendritic cells. J Immunol. 186: 6543-52. 7. Sabbah, S. <i>et al.</i> (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. 8. John, J. <i>et al.</i> (2010) Differential effects of Paclitaxel on dendritic cell function. BMC Immunol. 11:14.

9. Palmer, K.J. *et al.* (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.](#)
10. 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.](#)
11. Elias, F. *et al.* (2003) Strong cytosine-guanosine-independent immunostimulation in humans and other primates by synthetic oligodeoxynucleotides with PyNTTTTGT motifs. [J Immunol. 171: 3697-704.](#)
12. 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.](#)
13. 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](#)
14. Keating, S. *et al.* (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.](#)
15. Trefzer, U. *et al.* (2000) Hybrid cell vaccination for cancer immune therapy: first clinical trial with metastatic melanoma. [Int J Cancer. 85 \(5\): 618-26.](#)
16. Hayman, M.W. *et al.* (2006) Soluble human leukocyte antigen: a diagnostic indicator of rheumatoid arthritis? [J Immunol Methods. 315 \(1-2\): 19-26.](#)
17. Manna, D. *et al.* (2012) WR18 MONOCLONAL ANTIBODY: A SINGLE ANTIBODY TO DETECT HLA DR, DP AND DQ ANTIGENS. [Abstracts/Human immunology 73:49-167 abstract 36P](#)
18. Neumann, F. *et al.* (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.](#)
19. Neumann F *et al.* (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.](#)
20. Iking-Konert C *et al.* (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.](#)
21. Hönger, G. *et al.* (2015) Inter-individual differences in HLA expression can impact the CDC crossmatch. [Tissue Antigens. 85 \(4\): 260-6.](#)
22. 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.](#)
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. Llewelyn, M. *et al.* (2004) HLA class II polymorphisms determine responses to bacterial superantigens. [J Immunol. 172 \(3\): 1719-26.](#)
25. 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.](#)
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.](#)

Storage Store at +4°C or at -20°C if preferred.

This product should be stored undiluted.

Storage in frost-free freezers is not recommended. Avoid repeated freezing and thawing as this may denature the antibody. Should this product contain a precipitate we recommend microcentrifugation before use.

Guarantee 12 months from date of despatch

Health And Safety Information Material Safety Datasheet documentation #10040 available at: <https://www.bio-rad-antibodies.com/SDS/MCA477>
10040

Regulatory For research purposes only

Related Products

Recommended Secondary Antibodies

Rabbit Anti Mouse IgG (STAR12...) [RPE](#)
Goat Anti Mouse IgG IgA IgM (STAR87...) [HRP](#)
Goat Anti Mouse IgG (STAR76...) [RPE](#)
Goat Anti Mouse IgG (STAR70...) [FITC](#)
Goat Anti Mouse IgG (H/L) (STAR117...) [Alk. Phos.](#), [DyLight®488](#), [DyLight®550](#),
[DyLight®650](#), [DyLight®680](#), [DyLight®800](#),
[FITC](#), [HRP](#)
Rabbit Anti Mouse IgG (STAR9...) [FITC](#)
Goat Anti Mouse IgG (STAR77...) [HRP](#)
Goat Anti Mouse IgG (Fc) (STAR120...) [FITC](#), [HRP](#)
Rabbit Anti Mouse IgG (STAR13...) [HRP](#)

Recommended Negative Controls

[MOUSE IgG2a NEGATIVE CONTROL \(MCA929\)](#)

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To find a batch/lot specific datasheet for this product, please use our online search tool at: [bio-rad-antibodies.com/datasheets](https://www.bio-rad-antibodies.com/datasheets)

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