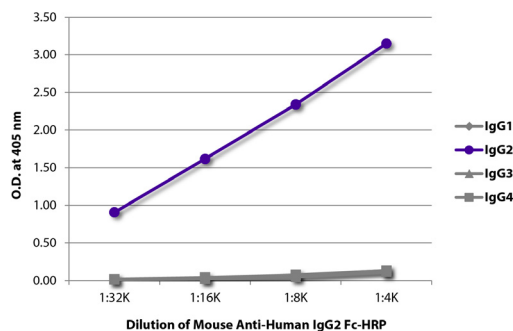




Mouse Anti-Human IgG₂ Fc

Cat. No.	Format	Size
9060-01	Purified (UNLB)	0.5 mg
9060-02	Fluorescein (FITC)	0.5 mg
9060-04	Alkaline Phosphatase (AP)	1.0 mL
9060-05	Horseradish Peroxidase (HRP)	1.0 mL
9060-08	Biotin (BIOT)	0.5 mg
9060-09	R-phycoerythrin (PE)	0.1 mg



ELISA plate was coated with purified human IgG₁, IgG₂, IgG₃, and IgG₄. Immunoglobulins were detected with serially diluted Mouse Anti-Human IgG₂ Fc-HRP (SB Cat. No. 9060-05).

Overview

Clone	31-7-4
Isotype	Mouse (BALB/c) IgG _{1κ}
Immunogen	Human IgG ₂ myeloma protein
Specificity	Human IgG ₂ Fc; Mr 146 kDa

Applications

ELISA – Quality tested ²⁻¹²
 FLISA – Quality tested
 ELISPOT – Reported in literature ¹³
 FC – Reported in literature ¹⁵⁻¹⁷
 ICC – Reported in literature ¹
 WB – Reported in literature ^{6,14}
 Multiplex – Reported in literature ^{7,18-22}

Note – For direct immunostaining of IgG₂ positive cells in flow cytometry applications, clone HP6002 (SB Cat. No. 9070) is recommended

Working Dilutions

ELISA	AP conjugate	1:500 – 1:1,000
	HRP conjugate	1:2,000 – 1:8,000
	BIOT conjugate	1:5,000 – 1:20,000

FLISA	FITC conjugate	1:100 – 1:400
	PE conjugate	≤ 1 µg/mL

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.

Handling and Storage

- The purified (UNLB) antibody is supplied as 0.5 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 0.5 mg in 1.0 mL of PBS/NaN₃. Store at 2-8°C.
- The alkaline phosphatase (AP) conjugate is supplied as 1.0 mL of stock solution in 50 mM Tris/1 mM MgCl₂/50% glycerol, pH 8.0, containing NaN₃ as preservative. Store at 2-8°C or long-term at -20°C.
- The horseradish peroxidase (HRP) conjugate is supplied as 1.0 mL of stock solution in 50% glycerol/50% PBS, pH 7.4. No preservative added. Store at 2-8°C or long-term at -20°C.
- The biotin (BIOT) conjugate is supplied as 0.5 mg in 1.0 mL of PBS/NaN₃. Store at 2-8°C.
- The R-phycoerythrin (PE) conjugate is supplied as 0.1 mg in 1.0 mL of PBS/NaN₃ and a stabilizing agent. Store at 2-8°C. **Do not freeze!**
- 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 (M)SDS.

References

1. Conley ME, Brown P, Bartlett MS. IgG subclass potential of surface IgM-negative and surface IgM-positive human peripheral blood B cells. *Clin Immunol Immunopathol.* 1987;43:211-22. (Immunogen, ICC)
2. Arnold M, Zacher T, Dechant M, Kalden JR, Doxiadis II, Spriewald BM. Detection and specification of noncomplement binding anti-HLA alloantibodies. *Hum Immunol.* 2004;65:1288-96. (ELISA)
3. Bogdanos D, Baum H, Okamoto M, Montalto P, Sharma UC, Rigopoulou EI, et al. Primary biliary cirrhosis is characterized by IgG3 antibodies cross-reactive with the major mitochondrial autoepitope and its Lactobacillus mimic. *Hepatology.* 2005;42:458-65. (ELISA)
4. Whary MT, Sundina N, Bravo LE, Correa P, Quinones F, Caro F, et al. Intestinal helminthiasis in Colombian children promotes a Th2 response to Helicobacter pylori: possible implications for gastric carcinogenesis. *Cancer Epidemiol Biomarkers Prev.* 2005;14:1464-9. (ELISA)
5. Njoku DB, Mellerson JL, Talor MV, Kerr DR, Faraday NR, Outschoorn I, et al. Role of CYP2E1 immunoglobulin G4 subclass antibodies and complement in pathogenesis of idiosyncratic drug-induced hepatitis. *Clin Vaccine Immunol.* 2006;13:258-65. (ELISA)
6. Bogdanos D, Pusi T, Rust C, Vergani D, Beuers U. Primary biliary cirrhosis following Lactobacillus vaccination for recurrent vaginitis. *J Hepatol.* 2008;49:466-73. (ELISA, WB)
7. Arnold M, Dechant M, Doxiadis II, Spriewald BM. Prevalence and specificity of immunoglobulin G and immunoglobulin A non-complement-binding anti-HLA alloantibodies in retransplant candidates. *Tissue Antigens.* 2008;72:60-6. (ELISA, Multiplex)
8. Pratt-Riccio LR, Sallenave-Sales S, de Oliveira-Ferreira J, da Silva BT, Guimarães ML, Santos F, et al. Evaluation of the genetic polymorphism of Plasmodium falciparum P126 protein (SERA or SERP) and its influence on naturally acquired specific antibody responses in malaria-infected individuals living in the Brazilian Amazon. *Malar J.* 2008;7:144. (ELISA)
9. Xue L, Johnson R, Gorovits B. Prevalence and isotypic complexity of the anti-Chinese hamster ovary host cell protein antibodies in normal human serum. *AAPS J.* 2010;12:98-106. (ELISA)
10. Pratt-Riccio LR, Bianco C Jr, Totino PR, Perce-Da-Silva Dde S, Silva LA, Riccio EK, et al. Antibodies against the Plasmodium falciparum glutamate-rich protein from naturally exposed individuals living in a Brazilian malaria-endemic area can inhibit in vitro parasite growth. *Mem Inst Oswaldo Cruz.* 2011;106 Suppl 1:34-43. (ELISA)
11. Geisler WM, Morrison SG, Doemland ML, Iqbal SM, Su J, Mancevski A, et al. Immunoglobulin-specific responses to Chlamydia elementary bodies in individuals with and at risk for genital chlamydial infection. *J Infect Dis.* 2012;206:1836-43. (ELISA)
12. Chu SY, Yeter K, Kotha R, Pong E, Miranda Y, Phung S, et al. Suppression of rheumatoid arthritis B cells by XmAb5871, an anti-CD19 antibody that coengages B cell antigen receptor complex and Fcγ receptor IIb inhibitory receptor. *Arthritis Rheumatol.* 2014;66:1153-64. (ELISA)
13. Lue C, Tarkowski A, Mestecky J. Systemic immunization with pneumococcal polysaccharide vaccine induces a predominant IgA2 response of peripheral blood lymphocytes and increases of both serum and secretory anti-pneumococcal antibodies. *J Immunol.* 1988;140:3793-800. (ELISPOT)
14. Bogdanos D, Pares A, Baum H, Caballeria L, Rigopoulou EI, Ma Y, et al. Disease-specific cross-reactivity between mimicking peptides of heat shock protein of Mycobacterium gordonae and dominant epitope of E2 subunit of pyruvate dehydrogenase is common in Spanish but not British patients with primary biliary cirrhosis. *J Autoimmun.* 2004;22:353-62. (WB)
15. Jackson AM, Lucas DP, Melancon JK, Desai NM. Clinical relevance and IgG subclass determination of non-HLA antibodies identified using endothelial cell precursors isolated from donor blood. *Transplantation.* 2011;92:54-60. (FC)
16. Jackson AM, Kuperman MB, Montgomery RA. Multiple hyperacute rejections in the absence of detectable complement activation in a patient with endothelial cell reactive antibody. *Am J Transplant.* 2012;12:1643-9. (FC)
17. Toyoda C, Suzuki Y, Tsuneyama H, Onodera T, Masuno A, Yabe R, et al. Production of human monoclonal anti-Jk3, recognising an epitope including the Jk^a/Jk^b polymorphic site of the Kidd glycoprotein. *Transfus Med.* 2014;24:286-91. (FC)
18. Hönger G, Hopfer H, Arnold M, Spriewald BM, Schaub S, Amico P. Pretransplant IgG subclasses of donor-specific human leukocyte antigen antibodies and development of antibody-mediated rejection. *Transplantation.* 2011;92:41-7. (Multiplex)
19. Lowe D, Higgins R, Zehnder D, Briggs DC. Significant IgG subclass heterogeneity in HLA-specific antibodies: Implications for pathogenicity, prognosis, and the rejection response. *Hum Immunol.* 2013;74:666-72. (Multiplex)
20. Arnold M, Ntokou I, Doxiadis II, Spriewald BM, Boletis JN, Iniotaki AG. Donor-specific HLA antibodies: evaluating the risk for graft loss in renal transplant recipients with isotype switch from complement fixing IgG1/IgG3 to noncomplement fixing IgG2/IgG4 anti-HLA alloantibodies. *Transpl Int.* 2014;27:253-61. (Multiplex)
21. Schaub S, Hönger G, Koller MT, Liwski R, Amico P. Determinants of C1q binding in the single antigen bead assay. *Transplantation.* 2014;98:387-93. (Multiplex)
22. Lefaucheur C, Viglietti D, Bentlejewski C, van Huyen JD, Vernerey D, Aubert O, et al. IgG donor-specific anti-human HLA antibody subclasses and kidney allograft antibody-mediated injury. *J Am Soc Nephrol.* 2016;27:293-304. (Multiplex)

TB9060
30-Dec-16

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