

# Anti-IgG1 antibodies, mouse

**For research use only**

One test corresponds to labeling of up to  $10^7$  cells in a total volume of 100  $\mu$ L.

Product	Content	Order no.
Anti-IgG1-FITC	for 30 tests	130-098-105
Anti-IgG1-FITC	for 100 tests	130-095-897
Anti-IgG1-VioBright FITC	for 30 tests	130-104-652
Anti-IgG1-VioBright FITC	for 100 tests	130-104-580
Anti-IgG1-PE	for 30 tests	130-098-106
Anti-IgG1-PE	for 100 tests	130-095-900
Anti-IgG1-APC	for 30 tests	130-098-107
Anti-IgG1-APC	for 100 tests	130-095-902
Anti-IgG1-VioBlue	for 30 tests	130-099-084
Anti-IgG1-VioBlue	for 100 tests	130-099-089
Anti-IgG1-PE-Vio770	for 30 tests	130-099-062
Anti-IgG1-PE-Vio770	for 100 tests	130-099-061
Anti-IgG1-APC-Vio770	for 30 tests	130-098-109
Anti-IgG1-APC-Vio770	for 100 tests	130-096-593
Anti-IgG1-Vio515	for 30 tests	130-108-859
Anti-IgG1-Vio515	for 100 tests	130-108-833
Anti-IgG1-Vio667	for 30 tests	130-110-415
Anti-IgG1-Vio667	for 100 tests	130-110-314
Anti-IgG1-Biotin	for 100 tests	130-095-879

## Warnings

Reagents contain sodium azide. Under acidic conditions sodium azide yields hydrazoic acid, which is extremely toxic. Azide compounds should be diluted with running water before discarding. These precautions are recommended to avoid deposits in plumbing where explosive conditions may develop.

## Technical data and background information

<b>Antigen</b>	IgG1
<b>Clone</b>	X-56
<b>Isotype</b>	rat IgG1
<b>Isotype control</b>	Rat IgG1 – isotype control antibodies
<b>Product format</b>	Antibodies are supplied in buffer containing stabilizer and 0.05% sodium azide.
<b>Fixation</b>	The antibody is suited for staining of formaldehyde-fixed cells.
<b>Storage</b>	Store protected from light at 2–8 °C. Do not freeze.

The Anti-IgG1 antibody is suited for flow cytometric analysis of mouse B cells expressing surface IgG1, for example, memory B cells. The antibody can further be used for the indirect immunofluorescent staining and flow cytometric analysis of cells stained with primary mouse antibodies of IgG1 isotype.

## Reagent requirements

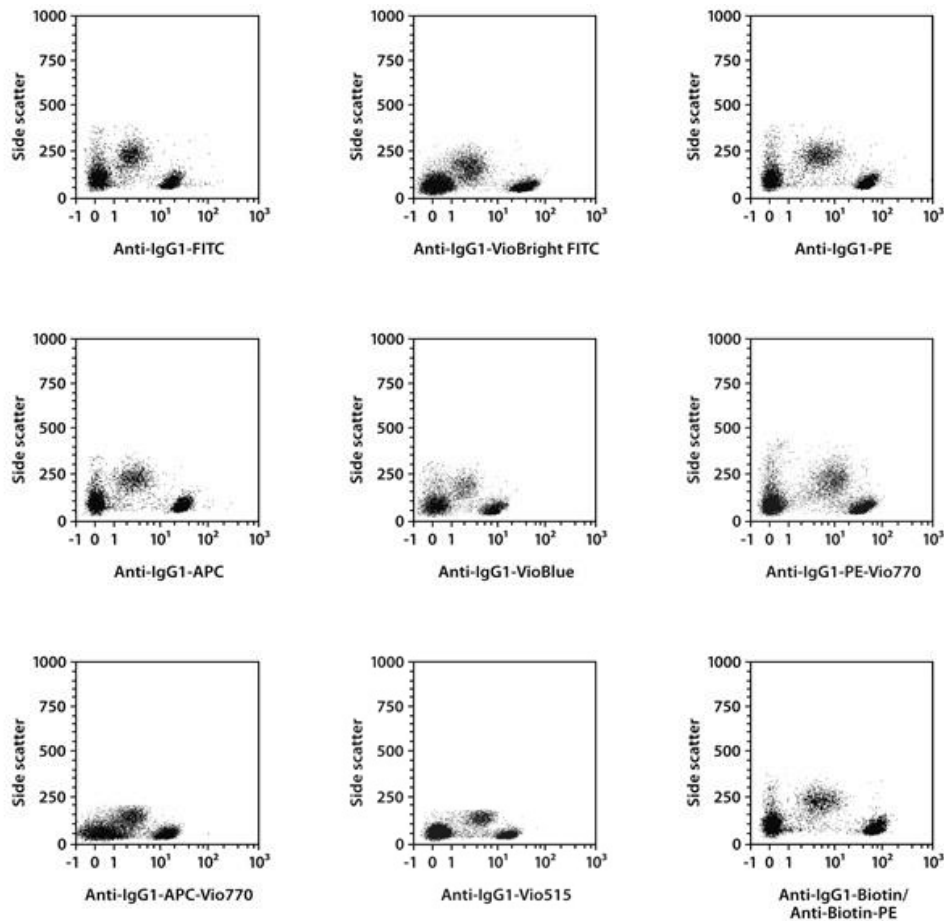
- Buffer: Prepare a solution containing phosphate-buffered saline (PBS), pH 7.2, 0.5% bovine serum albumin (BSA), and 2 mM EDTA by diluting MACS<sup>®</sup> BSA Stock Solution (# 130-091-376) 1:20 with autoMACS<sup>®</sup> Rinsing Solution (# 130-091-222). Keep buffer cold (2–8 °C).  
Note: EDTA can be replaced by other supplements such as anticoagulant citrate dextrose formula-A (ACD-A) or citrate phosphate dextrose (CPD). Buffers or media containing Ca<sup>2+</sup> or Mg<sup>2+</sup> are not recommended for use.
- (Optional) FcR Blocking Reagent, mouse (# 130-092-575) to avoid Fc receptor-mediated antibody labeling.
- (Optional) Fluorochrome-conjugated anti-biotin antibodies, e.g., Anti-Biotin-PE (# 130-090-756) as secondary antibody reagent in combination with biotinylated antibodies.
- (Optional) Propidium Iodide Solution (# 130-093-233) for flow cytometric exclusion of dead cells without fixation.
- (Optional) Fixation and Dead Cell Discrimination Kit (# 130-091-163) for cell fixation and flow cytometric exclusion of dead cells.

## Protocol for cell surface staining

- The recommended antibody dilution for labeling of cells and subsequent analysis by flow cytometry is 1:11 for up to 10<sup>7</sup> cells/100 µL of buffer.
  - Volumes given below are for up to 10<sup>7</sup> nucleated cells. When working with fewer than 10<sup>7</sup> cells, use the same volumes as indicated. When working with higher cell numbers, scale up all reagent volumes and total volumes accordingly (e.g. for 2×10<sup>7</sup> nucleated cells, use twice the volume of all indicated reagent volumes and total volumes).
1. Determine cell number.
  2. Centrifuge cell suspension at 300×g for 10 minutes. Aspirate supernatant completely.
  3. Resuspend up to 10<sup>7</sup> nucleated cells per 100 µL of buffer.
  4. Add 10 µL of the antibody.
  5. Mix well and incubate for 10 minutes in the dark in the refrigerator (2–8 °C).  
Note: Higher temperatures and/or longer incubation times may lead to non-specific cell labeling. Working on ice requires increased incubation times.
  6. Wash cells by adding 1–2 mL of buffer and centrifuge at 300×g for 10 minutes. Aspirate supernatant completely.
  7. (Optional) If biotinylated antibody was used, resuspend the cell pellet in 100 µL of buffer, add 10 µL of fluorochrome-conjugated anti-biotin antibody, and continue as described in steps 5 and 6.
  8. Resuspend cell pellet in a suitable amount of buffer for analysis by flow cytometry or fluorescence microscopy.

## Examples of immunofluorescent staining

Human peripheral blood mononuclear cells (PBMCs) were first labeled with CD4 antibodies (isotype IgG1) and subsequently stained with Anti-IgG1 antibodies. Cells were analyzed by flow cytometry using the MACSQuant<sup>®</sup> Analyzer. Cell debris and dead cells were excluded from the analysis based on scatter signals and propidium iodide fluorescence.



## Warranty

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**Miltenyi Biotec GmbH** | Friedrich-Ebert-Straße 68 | 51429 Bergisch Gladbach | Germany | Phone +49 2204 8306-0 | Fax +49 2204 85197 | [macs@miltenyibiotec.de](mailto:macs@miltenyibiotec.de) | [www.miltenyibiotec.com](http://www.miltenyibiotec.com)  
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