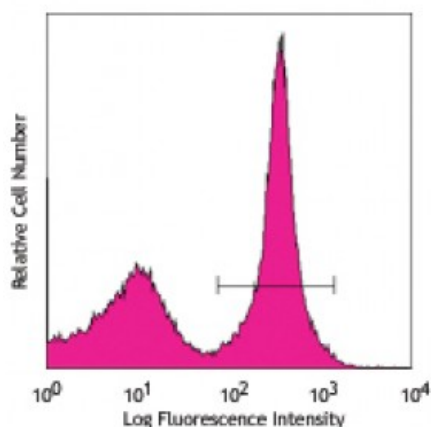


**Mouse Regulatory B Cell (B10) Flow Kit (CD19 FITC/CD5 PE/CD1d Alexa Fluor® 647)**

**Catalog # / Size:** 1263005 / 25 tests  
**Clone:** 6D5, 53-7.3, 1B1  
**Isotype:** Rat IgG2a, Rat IgG2b  
**Reactivity:** Mouse  
**Formulation:** Phosphate-buffered solution, pH 7.2, containing 0.09% sodium azide and 0.2% (w/v) BSA (origin USA).  
**Concentration:** Lot-specific



C57BL/6 mouse splenocytes were stained with Mouse Regulatory B Cell Flow Kit (CD19 FITC/CD5 PE/CD1d Alexa Fluor® 647). Histogram shows staining with CD19 FITC; dot plot data shows staining with CD1d Alexa Fluor® 647 and CD5 PE on gated CD19<sup>+</sup> cells.

**Applications:**

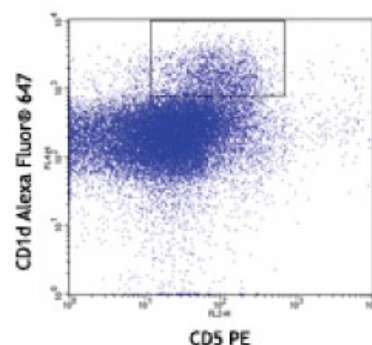
**Applications:** Flow Cytometry  
**Recommended Usage:** Each lot of this antibody is quality control tested by immunofluorescent staining with flow cytometric analysis. For flow cytometric staining, the suggested use of this reagent is 20 µL per million cells.

**Materials provided:**

FITC anti-mouse CD19/PE anti-mouse CD5/Alexa Fluor® 647 anti-mouse CD1d, 25 tests  
 FITC Rat IgG2a/PE Rat IgG2a/Alexa Fluor® 647 Rat IgG2b isotype controls, 25 tests

**Materials not provided:**

Cell Staining Buffer (Cat. No. 420201)  
 TruStain FcX (Cat. No. 101319)  
 Single color compensation controls



**Description:** Splenic IL-10-producing CD1d<sup>high</sup>CD5<sup>+</sup> B cells have been designated as regulatory B cells (Breg or B10). These rare IL-10-producing B cells represent only 1%-2% of spleen B cells and 7%-8% of peritoneal B cells in mice but are not normally detectable in blood or lymph nodes. B10 cells are a unique subset of potent regulatory B cells different from B-1a, B-1b, or CD21<sup>+</sup>CD23<sup>-</sup> mantle zone B cells.

B10 cells produce IL-10 and negatively regulate T cell function. Mouse Regulatory B Cell Flow Kit is composed of fluorochrome conjugated anti-mouse CD19, CD5, and CD1d. It is optimized for detection or isolation of B10 cells by flow cytometry.

**Antigen  
References:**

Yanaba K, *et al.* 2008. *Immunity* 25:639.