

**Brilliant Violet 510™ anti-human CD33**

**Catalog # / Size:** 2117110 / 100 tests  
2117105 / 25 tests

**Clone:** WM53

**Isotype:** Mouse IgG1,  $\kappa$

**Immunogen:** Human myeloid leukaemia cells.

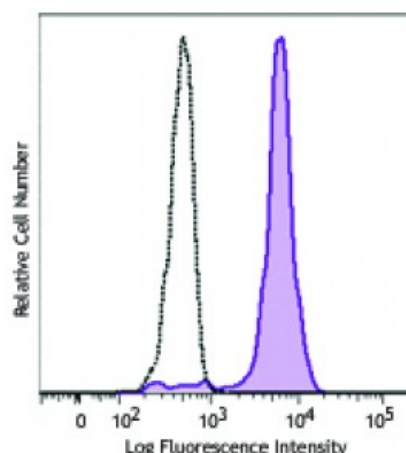
**Reactivity:** Human

**Preparation:** The antibody was purified by affinity chromatography and conjugated with Brilliant Violet 510™ under optimal conditions. The solution is free of unconjugated Brilliant Violet 510™ and unconjugated antibody.

**Formulation:** Phosphate-buffered solution, pH 7.2, containing 0.09% sodium azide and BSA (origin USA).

**Workshop Number:** IV M-505

**Concentration:** Lot-specific



Human peripheral blood monocytes were stained with CD33 (clone WM53) Brilliant Violet 510™ (filled histogram) or mouse IgG1,  $\kappa$  Brilliant Violet 510™ isotype control (open histogram).

**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  $\leq 5$  microL per million cells or 5 microL per 100 microL of whole blood. It is recommended that the reagent be titrated for optimal performance for each application.

Brilliant Violet 510™ excites at 405 nm and emits at 510 nm. The bandpass filter 510/50 nm is recommended for detection, although filter optimization may be required depending on other fluorophores used. **Be sure to verify that your cytometer configuration and software setup are appropriate for detecting this channel.** Refer to your instrument manual or manufacturer for support. Brilliant Violet 510™ is a trademark of Sirigen Group Ltd.

This product is subject to proprietary rights of Sirigen Inc. and is made and sold under license from Sirigen Inc. The purchase of this product conveys to the buyer a non-transferable right to use the purchased product for research purposes only. This product may not be resold or incorporated in any manner into another product for resale. Any use for therapeutics or diagnostics is strictly prohibited. This product is covered by U.S. Patent(s), pending patent applications and foreign equivalents.

**Application Notes:** Additional reported applications (for the relevant formats) include: immunoprecipitation, Western blotting<sup>3</sup>, induction of cytokine production<sup>3</sup>, and immunofluorescence<sup>4</sup>. The LEAF™ purified antibody (Endotoxin  $<0.1$  EU/ $\mu$ g, Azide-Free, 0.2  $\mu$ m filtered) is recommended for functional assays (Cat. No. 303410).

**Application References:** 1. Knapp W, *et al.* 1989. Leucocyte Typing IV. Oxford University Press. New York.  
2. Favaloro E, *et al.* 1988. *Br. J. Haematol.* 69:163.  
3. Garnache-Ottou F, *et al.* 2005. *Blood* 105:1256. (WB)

**Description:** CD33 is a 67 kD type I transmembrane glycoprotein also known as Siglec-3, gp67, and p67. It is a sialoadhesion immunoglobulin superfamily member expressed on myeloid progenitors, monocytes, granulocytes, dendritic cells and mast cells. CD33 is absent on normal platelets, lymphocytes, erythrocytes and hematopoietic stem cells. CD33 functions as a sialic acid-dependent cell adhesion molecule with carbohydrate/lectin binding activity.

**Antigen** 1. Favalaro E, *et al.* 1988. *Br. J. Haematol.* 69:163.  
**References:** 2. Freeman S, *et al.* 1995. *Blood* 85:2005.