SONY

Product Data Sheet

Brilliant Violet 421™ anti-mouse CD135

Catalog # / Size: 1276570 / 500 µl
1276565 / 125 µl

1276575 / 50 µg

Clone: A2F10

Isotype: Rat IgG2a, κ

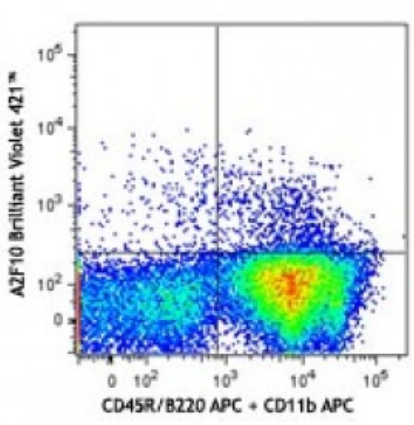
Immunogen: Mouse Flt3 transfected cell line

Reactivity: Mouse

Preparation: The antibody was purified by affinity chromatography and conjugated with Brilliant Violet 421™ under optimal conditions. The solution is free of unconjugated Brilliant Violet 421™ and unconjugated antibody.

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

Concentration: microg size: 0.2 mg/ml
test sizes: Lot-specific nd



C57 BL/6 bone marrow cells stained with CD45R/B220 APC+ CD11b APC and CD135 (clone A2F10) Brilliant Violet 421™ (top) or rat IgG2a, κ Brilliant Violet 421™ isotype control (bottom).

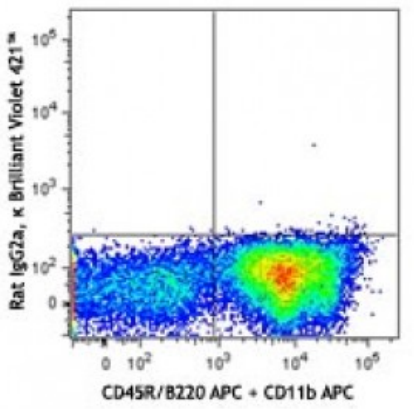
Applications:

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 using the test sizes, the suggested use of this reagent is ≤5 microL per million cells or 5 microL per 100 microL of whole blood. For flow cytometric staining using the microg size, the suggested use of the this reagent is ≤0.5 microg per million cells in 100 microL volume. It is recommended that the reagent be titrated for optimal performance for each application.

Brilliant Violet 421™ excites at 405 nm and emits at 421 nm. The standard bandpass filter 450/50 nm is recommended for detection. Brilliant Violet 421™ 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 References:

1. Sergejeva S, *et al.* 2004. *Blood* 103:1270.
2. Auffray C, *et al.* 2009. *J. Exp. Med.* 206:595.
3. Esplin BL, *et al.* 2011. *J. Immunol.* 186:5367. PubMed

Description: CD135, also known as Flk-2, Flt3, and Ly-72, is a type III tyrosine kinase receptor. It is expressed on early B lymphoid lineage cells in bone marrow and on primitive myeloid progenitors within the BM CD34+ cell population. Ligation of Flk-2 with Flt3 ligand regulates the growth of hematopoietic stem cells and promotes the survival of primitive hematopoietic progenitor cells with myeloid as well as B lymphoid potential. It was reported that the receptor tyrosine kinase Flt3 is required for dendritic cell development. Combined signaling through interleukin-7 receptors and Flt3 selectively promotes B-cell commitment and differentiation from uncommitted murine bone marrow progenitor cells.

Antigen References:

1. Waskow C, *et al. Nat. Immunol.* 9:676.
2. Veiby OP, *et al.* 1996. *Blood* 88:1256.
3. Veiby OP, *et al.* 1996. *J. Immunol.* 157:2953.
4. Mattews W, *et al.* 1991. *Cell.* 65:1143.