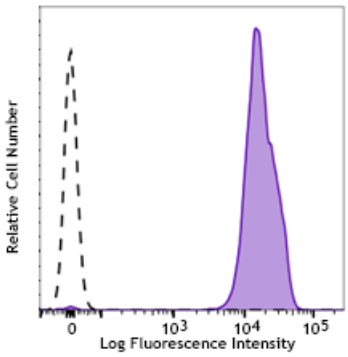
SONY

Product Data Sheet

PE/Dazzle™ 594 anti-human CD41/CD61

Catalog # / Size:	2399090 / 100 tests 2399085 / 25 tests
Clone:	A2A9/6
Isotype:	Mouse IgG2a, κ
Immunogen:	Human platelets
Reactivity:	Human
Preparation:	The antibody was purified by affinity chromatography and conjugated with PE/Dazzleâ„¢ 594 under optimal conditions. The solution is free of unconjugated PE/Dazzleâ„¢ 594 and unconjugated antibody.
Formulation:	Phosphate-buffered solution, pH 7.2, containing 0.09% sodium azide and 0.2% (w/v) BSA (origin USA).
Concentration:	Lot-specific



Human platelets were stained with CD41/CD61 (clone A2A9/6) PE/Dazzle™ 594 (filled histogram) or mouse IgG2a

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 5 µl per million cells in 100 µl staining volume or 5 µl per 100 µl of whole blood. It is recommended that the reagent be titrated for optimal performance for each application. * PE/Dazzle™ 594 has a maximum excitation of 566 nm and a maximum emission of 610 nm.
Application Notes:	Additional reported applications (for relevant formats) include: immunoprecipitation[1] and blocking (aggregation)[2]. A2A9/6 is recognized as having high affinity to gpIIb/IIIa. It has been shown to inhibit platelet aggregation induced by a variety of agonists and the initiation of clot formation.

Application References:

1. Matsumura-Takeda K, *et al.* 2007. *Stem Cell.* 25:862.
2. Corbel C, *et al.* 2005. 49:279.
3. Bennett JS, *et al.* 1983. *Proc. Natl. Acad. Sci. USA.* 80:2417.
4. Clemetson KJ, *et al.* 1994. *Curr. Opin. Hematol.* 1:388.

Description: CD41/CD61, also known as gpIIb/IIIa, is a member of a family integrin receptors. This is a complex comprised by CD41 and CD61 through non-covalent association. CD41/CD61 is mainly expressed by platelets and megakaryocytes. The resting form of the CD41/CD61 complex is involved in platelet activation and aggregation by binding to immobilized fibrinogen. After activation, CD41/CD61 becomes a receptor for soluble fibrinogen and several other RGD-containing adhesive proteins such as von Willebrand Factor (vWF) and fibronectin. An absence or dysfunction of CD41/CD61 on the platelet surface results in an inherited bleeding disorder, called Glanzmann Thromsasthenia (GT). CD41/CD61 has been found on murine hematopoietic progenitor cells, indicating that this complex may play a role in regulating hematopoietic development.

Antigen References:

1. Matsumura-Takeda K, *et al.* 2007. *Stem Cell.* 25:862.
2. Corbel C, *et al.* 2005. 49:279.
3. Bennett JS, *et al.* 1983. *Proc. Natl. Acad. Sci. USA.* 80:2417.
4. Clemetson KJ, *et al.* 1994. *Curr. Opin. Hematol.* 1:388.