# **Technical Data Sheet**

# APC Rat anti-Mouse CD172a

#### Product Information

Material Number:
Alternate Name:
Size:
Concentration:
Clone:
Isotype:
Reactivity:
Storage Buffer:

560106
SIRPα, SHPS-1, BIT
0.1 mg
0.2 mg/ml
P84
Rat (SD) IgG1, κ
QC Tested: Mouse
Aqueous buffered solution containing ≤0.09% sodium azide.

### Description

The P84 antibody reacts with CD172a, also known as SIgnal-Regulatory Protein  $\alpha$  (SIRP $\alpha$ ), Src Homology 2 domain-containing protein tyrosine Phosphatase (SHP) Substrate 1 (SHPS-1), or Brain Immunoglobulin-like molecule with Tyrosine-based activation motifs (BIT). CD172a is an adhesion molecule of the Ig superfamily which is expressed on neurons in the central nervous system and the retina, on macrophages, and on bone-marrow myeloid cells. Its ligand, CD47, or Integrin-Associated Protein (IAP), is expressed by a wide variety of cells. CD172a and CD47 are proposed to mediate bi-directional signaling to modify neural synaptic activity and regulate the phagocytic activities of macrophages.



# Flow cytometric analysis of APC-conjugated anti-mouse CD172a on mouse bone marrow.

Bone marrow cells from BALB/c mice were stained with APC anti-mouse CD172a (clone P84, Cat. No. 560106) and FITC anti-mouse CD11b (Clone M1/70, Cat. No. 553310) and analyzed by flow cytometry. Flow cytometry was performed on a BD FACSCalibur™ System and the contour plot was derived from the gated events based on light scattering characteristics of viable bone marrow cells.

### **Preparation and Storage**

Store undiluted at 4°C and protected from prolonged exposure to light. Do not freeze.

The antibody was conjugated to APC under optimum conditions, and unconjugated antibody and free APC were removed.

#### **Application Notes**

Application					
Flow cytometry		Routinely Tested			
Suggested Compa	anion Products				
Catalog Number	Name		Size	Clone	
553310	FITC Rat Anti-Mouse CD11b		0.5 mg	M1/70	
554686	APC Rat IgG1, κ Isotype Control		0.1 mg	R3-34	

#### **Product Notices**

- 1. Since applications vary, each investigator should titrate the reagent to obtain optimal results.
- 2. Caution: Sodium azide yields highly toxic hydrazoic acid under acidic conditions. Dilute azide compounds in running water before discarding to avoid accumulation of potentially explosive deposits in plumbing.
- 3. For fluorochrome spectra and suitable instrument settings, please refer to our Fluorochrome Web Page at www.bdbiosciences.com/colors.
- 4. Please refer to www.bdbiosciences.com/pharmingen/protocols for technical protocols.

#### References

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