Technical Data Sheet

Purified Rat Anti-Mouse CXCR5

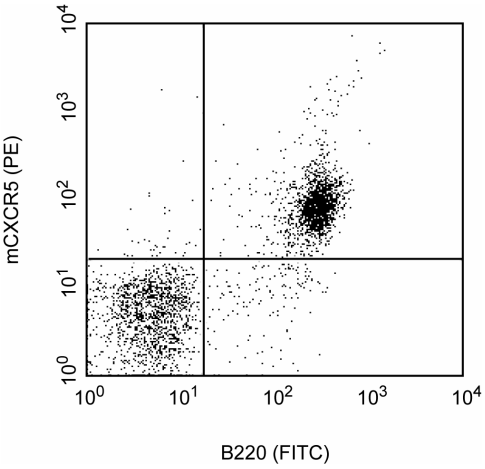
Product Information

Material Number:	**551961**
Size:	0.1 mg
Concentration:	0.5 mg/ml
Clone:	2G8
Immunogen:	Mouse CXCR5
Isotype:	Rat IgG2a, κ
Reactivity:	QC Testing: Mouse
Storage Buffer:	Aqueous buffered solution containing ≤0.09% sodium azide.

Description

The monoclonal antibody 2G8 reacts with the mouse CXC chemokine receptor, CXCR5. CXCR5 (*a.k.a.* BLR1, NLR and MDR15), a seven-transmembrane, G-protein-coupled receptor, is the specific receptor for CXC chemokines, CXCL13/BLC/BCA-1. The expression of CXCR5 has been detected in spleen, lymph nodes, tonsils, brain, bone marrow, T cells, B cells, cerebrum, cerebellum, hippcampus and pituitary. In mouse spleen, CXCR5 was strictly expressed by mature B cells and a small subset of T lymphocytes. The immunogen used to generate 2G8 hybridoma was a recombinant protein containing N-terminal amino acids of mouse CXCR5 (GST-NmBLR1).

This antibody is routinely tested by flow cytometric analysis. Other applications were tested at BD Biosciences Pharmingen during antibody development only or reported in the literature.



Detection of CXCR5 expression on mouse splenocytes by purified 2G8. *Mouse splenocytes were stained with 0.25/test µg of purified 2G8 using 3-step staining protocol below and anti-mouse CD45R/B220-FITC (Cat. No. 553088). The data reflects gating on lymphocytes, based on forward and side scattered light signals. The level of nonspecific staining was assessed by using purified rat IgG2a (Cat. No. 553927) as isotype control. The quadrant markers for the bivariate dot plots were set based on the isotype control.*

Preparation and Storage

The monoclonal antibody was purified from tissue culture supernatant or ascites by affinity chromatography.
Store undiluted at 4° C.

Application Notes

Application

Flow cytometry	Routinely Tested

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Recommended Assay Procedure:
A multistep staining procedure is recommended to amplify immunofluorescent signals for the flow cytometric analysis of mouse CXCR5 expression:

Step 1: Incubate 1 million cells with 0.1 - 0.5 µg of purified 2G8 antibody at 4°C for 15 - 20 minutes. Wash cells two times with staining medium containing sodium azide (e.g., Dulbecco's PBS or tissue culture medium [without phenol red and biotin] with 0.09% sodium azide and 2% heat-inactivated FCS or 0.2% BSA).

Step 2: Incubate the cells with biotinylated mouse anti-rat IgG2a (Cat. No. 553894) at 4°C for 20 minutes. Wash cells two times.

Step 3 : Incubate the cells with ≤ 0.06 µg of streptavidin-phycoerythrin (Cat. No. 554061) at 4°C for 20 minutes. Wash two times. Resuspend cells in staining medium and analyze stained cells with a FACScan™ Flow Cytometer (Becton Dickinson, San Jose, CA) using appropriate specificity and compensation controls.

Suggested Companion Products

Catalog Number	Name	Size	Clone
554061	PE Streptavidin	0.5 mg	(none)
553894	Biotin Mouse Anti-Rat IgG2a	0.5 mg	RG7/1.30
553927	Purified Rat IgG2a, κ Isotype Control	0.5 mg	R35-95

Product Notices

1. Since applications vary, each investigator should titrate the reagent to obtain optimal results.
2. Please refer to www.bdbiosciences.com/pharmingen/protocols for technical protocols.
3. 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.

References

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