SONY

Product Data Sheet

FITC anti-mouse CD206 (MMR)

Catalog # / Size: 1308520 / 200 µg
1308515 / 50 µg

Clone: C068C2

Isotype: Rat IgG2a, κ

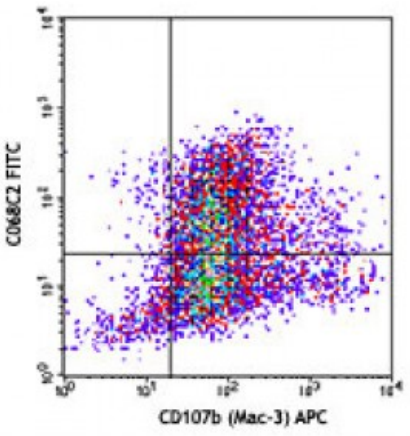
Immunogen: Recombinant mouse CD206 (MMR)

Reactivity: Mouse

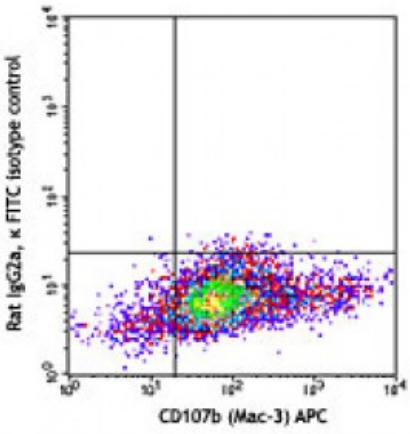
Preparation: The antibody was purified by affinity chromatography, and conjugated with FITC under optimal conditions. The solution is free of unconjugated FITC.

Formulation: Phosphate-buffered solution, pH 7.2, containing 0.09% sodium azide.

Concentration: 0.5



Thioglycollate-elicited Balb/c macrophages were fixed/pemeabilized, and then stained with CD107b (Mac-3) APC and CD206 (clone C068C2) FITC (top) or rat IgG2a, κ FITC isotype control (bottom).



Applications:

Applications: Flow Cytometry

Recommended Usage: Each lot of this antibody is quality control tested by intracellular immunofluorescent staining with flow cytometric analysis. For flow cytometric staining, the suggested use of this reagent is ≤0.125 microg per million cells in 100 microL volume. It is recommended that the reagent be titrated for optimal performance for each application.

Application Notes: Clone C068C2 recognizes a region similar to clone MR5D3, based on the ability of the clones to block each other.

Application References:

1. Keller J, *et al.* 2012. *Biochem Biophys Res Commun.* 417:217. PubMed
2. Ito H, *et al.* 2012. *J Am Soc Nephrol.* 23:1797. PubMed
3. Kida Y, *et al.* 2013. *J Am Soc Nephrol.* 24:559. PubMed
4. Zhang J, *et al.* 2014. *J Immunol.* 193:5149. PubMed
5. Sun L, *et al.* 2015. *J Immunol.* 194:4891. PubMed

Description: CD206, also known as mannose receptor (MR), is a 175 kD type I membrane protein. It is a pattern recognition receptor (PRR) belonging to the C-type lectin superfamily. MR is expressed on macrophages, dendritic cells, Langerhans cells, and hepatic or lymphatic endothelial cells. MR recognizes a range of microbial carbohydrates bearing mannose, fucose, or N-acetyl glucosamine through its C-type lectin-like carbohydrate recognition domains, sulfated carbohydrate antigens through its cysteine-rich domain, and collagens through its fibronectin type II domain. MR mediates endocytosis and phagocytosis as well as activation of

macrophages and antigen presentation. It plays an important role in host defense and provides a link between innate and adaptive immunity. Recently, MR on lymphatic endothelial cells was found to be involved in leukocyte trafficking and a contributor to the metastatic behavior of cancer cells. It suggests that MR may be a potential target in controlling inflammation and cancer metastasis by targeting the lymphatic vasculature.

Antigen References:

1. Wileman TE, *et al.* 1986. *P. Natl. Acad. Sci. USA* 83:2501.
2. Apostolopoulos V, *et al.* 2001. *Curr. Mol. Med.* 1:469.
3. Burgdorf S, *et al.* 2006. *J. Immunol.* 176:6770.
4. McKenzie