

## Anti-Fcgr4 polyclonal antibody (CPB-289RM)

This product is for research use only and is not intended for diagnostic use.

## **PRODUCT INFORMATION**

Product Overview	Rabbit Anti-Fcgr4 Polyclonal Antibody
Antigen Description	Receptors for the Fc region of IgG (Fc $\gamma$ Rs) constitute a subfamily of the Ig super family, and function in the activation or inhibition of immune responses. Based on close relationships in their extracellular domains, the Fc $\gamma$ R have been divided into three classes designated as Fc $\gamma$ RI (CD64), Fc $\gamma$ RII (CD32), and Fc $\gamma$ RIII (CD16). Human CD16 is encoded by two genes: Fc $\gamma$ RIIIA and Fc $\gamma$ RIIIB, and the newly described mouse FCGR4, also referred to as CD16-2, has been proposed to be the mouse homolog of human Fc $\gamma$ RIIIA because of high sequence homology (60 % aa identity). FCGR4 is expressed in peripheral blood leukocytes, spleen, thymus, colon and intestine, and serves as an activating receptor for IgG2a and IgG2b via association with an ITAM bearing accessory protein. Although mouse FCGR4 functioned as a low-affinity IgE receptor for all IgE allotypes, ligation of FCGR4 by antigen-IgE(b) immune complexes promotes macrophage-mediated phagocytosis, presentation of antigen to T cells, production of proinflammatory cytokines and the late phase of cutaneous allergic reactions.
Specificity	Mouse CD16-2/FCGR4
Target	Fcgr4
Immunogen	Recombinant mouse FCGR4 protein
Isotype	IgG
Source/Host	Rabbit
Species Reactivity	N/A
Conjugate	Unconjugated
Preparation	Produced in rabbits immunized with purified, human cell-derived, recombinant mouse FCGR4 (Met 1-Gln 203). Total IgG was purified by Protein A affinity chromatography.

Format	0.2µm filtered solution in PBS with 5% trehalose
Size	200 µg
Preservative	None
Storage	This antibody can be stored at 2°C-8°C for one month without detectable loss of activity. Antibody products are stable for twelve months from date of receipt when stored at -20°C to - 70°C. Preservative-Free. Sodium azide is recommended to avoid contamination (final concentration 0.05%-0.1%). It is toxic to cells and should be disposed of properly. Avoid repeated freeze-thaw cycles.

## **GENE INFORMATION**

Gene Name	Fcgr4 Fc receptor, IgG, low affinity IV [ Mus musculus ]
Official Symbol	Fcgr4
Synonyms	FCGR4; Fc receptor, IgG, low affinity IV; Fc gammaRIV; Fc receptor-like 3; Fc fragment of IgG, low affinity IIIa, receptor for (CD16); Fc fragment of IgG, low affinity III, receptor for (CD16); Fcrl3; CD16-2; FcgRIV; Fcgr3a; FcgammaRIV; 4833442P21Rik;
Entrez Gene ID	246256
Protein Refseq	<u>NP 653142</u>
Pathway	Adaptive Immune System, organism-specific biosystem; Immune System, organism-specific biosystem; Immunoregulatory interactions between a Lymphoid and a non-Lymphoid cell, organism-specific biosystem; Leishmaniasis, organism-specific biosystem; Leishmaniasis, conserved biosystem; Natural killer cell mediated cytotoxicity, organism-specific biosystem; Natural killer cell mediated cytotoxicity, conserved biosystem;