

## ARG42244 anti-CD16 antibody [3G8] (low endotoxin)

Package: 100 µg  
Store at: -20°C

### Summary

Product Description	Azide free and low endotoxin Mouse Monoclonal antibody [3G8] recognizes CD16
Tested Reactivity	Hu, NHuPrm
Tested Application	FACS, FuncSt, IHC-Fr, IP
Specificity	The mouse monoclonal antibody 3G8 recognizes an extracellular epitope of CD16, a low affinity receptor for aggregated IgG (FcγRIII antigen). CD16 exists in two different isoforms: CD16a (FcγRIIIA; 50-65 kDa; expressed on NK-cells, monocytes and macrophages) and CD16b (FcγRIIIB; 48 kDa; mainly expressed on neutrophils).
Host	Mouse
Clonality	Monoclonal
Clone	3G8
Isotype	IgG1, kappa
Target Name	CD16
Species	Human
Immunogen	Human neutrophils.
Conjugation	Un-conjugated
Alternate Names	FCRIIIA; FcRIIIa; CD antigen CD16a; Fc-gamma RIII-alpha; FCR-10; FcR-10; FCRIII; FCG3; Low affinity immunoglobulin gamma Fc region receptor III-A; FCGRIII; CD16; Fc-gamma RIIIa; IgG Fc receptor III-2; IMD20; CD16A; IGFR3; CD16a antigen; FCGR3; FcRIII; Fc-gamma RIII

### Application Instructions

Application table	Application	Dilution
	FACS	6 µg/ml
	FuncSt	Assay-dependent
	IHC-Fr	Assay-dependent
	IP	Assay-dependent
Application Note	* The dilutions indicate recommended starting dilutions and the optimal dilutions or concentrations should be determined by the scientist.	

### Properties

Form	Liquid
Purification	Purification with Protein A.
Purification Note	0.2 µm filter sterilized. Endotoxin level is less than 0.01 EU/µg of the protein.
Buffer	PBS

Concentration	1 mg/ml
Storage instruction	For continuous use, store undiluted antibody at 2-8°C for up to a week. For long-term storage, aliquot and store at -20°C or below. Storage in frost free freezers is not recommended. Avoid repeated freeze/thaw cycles. Suggest spin the vial prior to opening. The antibody solution should be gently mixed before use.
Note	For laboratory research only, not for drug, diagnostic or other use.

## Bioinformation

Gene Symbol	FCGR3A
Gene Full Name	Fc fragment of IgG, low affinity IIIa, receptor (CD16a)
Background	This gene encodes a receptor for the Fc portion of immunoglobulin G, and it is involved in the removal of antigen-antibody complexes from the circulation, as well as other other antibody-dependent responses. This gene (FCGR3A) is highly similar to another nearby gene (FCGR3B) located on chromosome 1. The receptor encoded by this gene is expressed on natural killer (NK) cells as an integral membrane glycoprotein anchored through a transmembrane peptide, whereas FCGR3B is expressed on polymorphonuclear neutrophils (PMN) where the receptor is anchored through a phosphatidylinositol (PI) linkage. Mutations in this gene have been linked to susceptibility to recurrent viral infections, susceptibility to systemic lupus erythematosus, and alloimmune neonatal neutropenia. Alternatively spliced transcript variants encoding different isoforms have been found for this gene. [provided by RefSeq, Jul 2008]
Function	Receptor for the Fc region of IgG. Binds complexed or aggregated IgG and also monomeric IgG. Mediates antibody-dependent cellular cytotoxicity (ADCC) and other antibody-dependent responses, such as phagocytosis. [UniProt]
Calculated Mw	29 kDa
PTM	Glycosylated. Contains high mannose- and complex-type oligosaccharides. Glycosylation at Asn-180 is mandatory for high affinity binding to the Fc and for discrimination between fucosylated and afucosylated IgG glycoforms.  The soluble form is produced by a proteolytic cleavage. [UniProt]
Cellular Localization	Cell membrane; Single-pass type I membrane protein. Secreted. Note=Exists also as a soluble receptor. [UniProt]