

Monoclonal Anti-Human CD16 Antibody, Humanized IgG1 (HPLC verified)

- **Ultra-low endotoxin**
- **Ultra-high purity**
- **Ultra-high bioactivity**

Catalog# / Size	AC67590/500ug
Clone	3G8
Isotype	Humanized IgG1
Endotoxin	Less than 0.001 EU per µg determined by LAL gel clotting assay.
Purity	>95% as determined by SDS-PAGE. >95% as determined by SEC-HPLC.
Antibody Type	Monoclonal
Expressed Host	Stable CHO cell line
Application	NK cell culture, FACS

Product Details

Reactivity	Human
Concentration	1.0 mg/mL
Form	Liquid
Antibody Type	Monoclonal
Formulation	Supplied as 0.2 µm filtered solution in PBS, pH7.4.
Storage instructions	Shipped at 4°C. Stored at 4°C for 12 months.
Other Names	CD16A,CD16B,Fc-gamma RIII

Description

CD16 (FCGR3A) is a 50-65 kDa cell surface molecule that exists in two forms a transmembranous form expressed by NK cells and some T cells, and a phosphatidylinositol linked form expressed by granulocytes. This 3G8 monoclonal antibody reacts with human and non-human primate CD16, which is also known as the low-affinity Fc gamma RIII. CD16 exists as two distinct isoforms, Fc gamma RIIIA and Fc gamma RIIIB. Binding of IgG to either CD16 isoform induces signaling pathways that modulate several types of responses, including antibody-dependent cell-mediated cytotoxicity (ADCC). This monoclonal antibody has been reported to have several functional activities, including inhibition of cytotoxic ability, activation of cell signaling, and NK cell depletion in vivo.

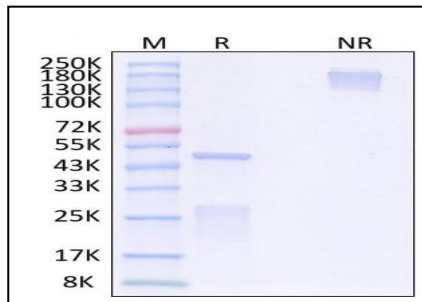
Please feel free to contact us via support@acnovia.com if you need any further information.



Application References

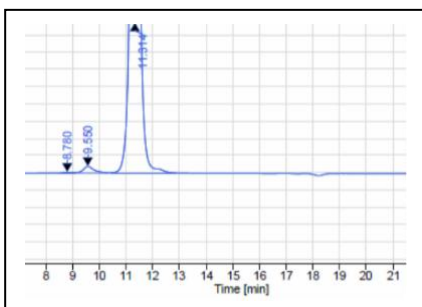
- 1、Seeling M et al. (2013). Proc Natl Acad Sci USA 110(26): 10729–34.
- 2、Choi EI et al. (2008). Immunology 124(2): 215–22.
- 3、Rogers KA et al. (2006). J Immunol 177(6): 3848–56.
- 4、Wirthmueller U et al. (1992). J Exp Med 175(5): 1381–90.

Product Data



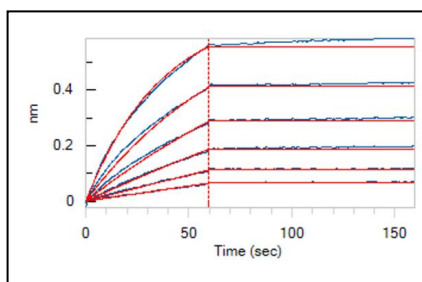
SDS-PAGE

Monoclonal Anti-Human CD16 Antibody, Humanized IgG1 (Clone: 3G8) (Catalog#AC67590) on SDS-PAGE under reducing (R) and non-reducing (NR) conditions. The gel was stained overnight with Coomassie Blue. The purity of the protein is greater than 95%.



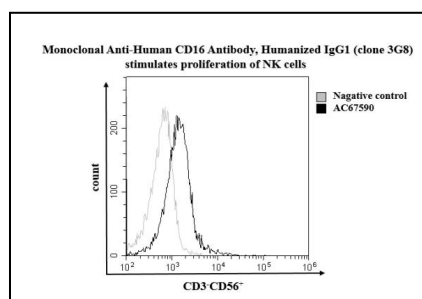
SEC-HPLC

Monoclonal Anti-Human CD16 Antibody, Humanized IgG1 (Clone: 3G8) (Catalog#AC67590) on SDS-PAGE under reducing (R) and non-reducing (NR) conditions. The gel was stained overnight with Coomassie Blue. The purity of the protein is greater than 95%.



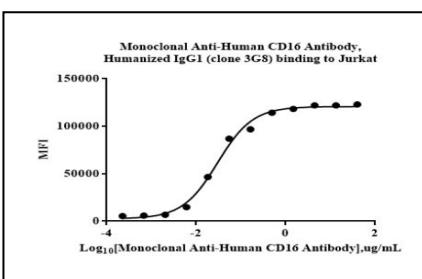
Bioactivity-BLI

Loaded Human Fc gamma RIII, can bind Monoclonal Anti-Human CD16 Antibody, Humanized IgG1 (Clone: 3G8) (Catalog#AC67590) with an affinity constant of 4.225 pM as determined in BLI assay (Octet Red96e).



Bioactivity-FACS

Monoclonal Anti-Human CD16 Antibody, Humanized IgG1 (Clone: 3G8) (Catalog#AC67590) stimulates proliferation of NK cells.



Bioactivity-Cell based assay

Monoclonal Anti-Human CD16 Antibody, Humanized IgG1 (Clone: 3G8) (Catalog#AC67590) binding to Jurkat. The ED50 for this effect is 0.03024 ug/mL.