**BACKGROUND**

Ly-6G (Lymphocyte antigen 6G) belongs to the Ly-6 family of glycosyl-phosphatidylinositol (GPI)-linked proteins. Ly-6 family members share amino acid homology throughout a distinctive cysteine rich protein domain that incorporates O-linked carbohydrates. Murine Ly-6 molecules have unique patterns of tissue expression during hematopoiesis from multipotential stem cells to lineage committed precursor cells, and on specific leukocyte subpopulations in the peripheral lymphoid tissues. Ly-6G contains one UPAR/Ly6 domain and is expressed almost exclusively on neutrophils localizing to the cell membrane. Ly-6G together with Ly-6C make up the Gr-1 antigen. The Gr-1 antigen is expressed on monocytes, neutrophils and a subset of macrophages, plasmacytoid dendritic cells and T cells. Cells expressing Gr-1 may play a role in the suppression of antitumor and T cell responses. Ly-6G is commonly used as a surface marker for neutrophils.

**REFERENCES**


**CHROMOSOMAL LOCATION**

Genetic locus: Ly6g (mouse) mapping to 15 D3.

**SOURCE**

Ly-6G (M-66) is a rabbit polyclonal antibody raised against amino acids 53-118 mapping within an internal region of Ly-6G of mouse origin.

**PRODUCT**

Each vial contains 200 µg IgG in 1.0 ml of PBS with < 0.1% sodium azide and 0.1% gelatin.

**RESEARCH USE**

For research use only, not for use in diagnostic procedures.

**APPLICATIONS**

Ly-6G (M-66) is recommended for detection of Ly-6G of mouse origin by Western Blotting (starting dilution 1:200, dilution range 1:100-1:1000), immunoprecipitation [1-2 µg per 100-500 µg of total protein (1 ml of cell lysate)], immunofluorescence (starting dilution 1:50, dilution range 1:50-1:500) and solid phase ELISA (starting dilution 1:30, dilution range 1:30-1:3000).

Suitable for use as control antibody for Ly-6G shRNA (m): sc-106187, Ly-6G shRNA Plasmid (m): sc-106187-SH and Ly-6G shRNA (m)Lentiviral Particles: sc-106187-V.

Molecular Weight of Ly-6G: 16 kDa.

Positive Controls: CTL-2 cell lysate: sc-2242, RAW 264.7 whole cell lysate: sc-2211 or LADMAC whole cell lysate: sc-364189.

**RECOMMENDED SECONDARY REAGENTS**

To ensure optimal results, the following support (secondary) reagents are recommended: 1) Western Blotting: use goat anti-rabbit IgG-HRP: sc-2004 (dilution range: 1:2000-1:100,000) or Cruz Marker™ compatible goat anti-rabbit IgG-HRP: sc-2030 (dilution range: 1:2000-1:5000), Cruz Marker™ Molecular Weight Standards: sc-2035, TBS Blotto A Blocking Reagent: sc-2333 and Western Blotting Luminol Reagent: sc-2048. 2) Immunoprecipitation: use Protein A/G PLUS-agarose: sc-2033 (0.5 ml agarose/2.0 ml). 3) Immunofluorescence: use goat anti-rabbit IgG-FITC: sc-2012 (dilution range: 1:100-1:400) or goat anti-rabbit IgG-TR: sc-2780 (dilution range: 1:100-1:400) with UltraCruz™ Mounting Medium: sc-24941.

**DATA**

Ly-6G (M-66): sc-98754. Western blot analysis of Ly-6G expression in LADMAC (A), RAW 264.7 (B), CTL-2 (C) and NIH/3T3 (D) whole cell lysates.

**STORAGE**

Store at 4° C, **DO NOT FREEZE**. Stable for one year from the date of shipment. Non-hazardous. No MSDS required.

**MONOS Satisfaction Guaranteed**

Try Ly-6G (RB6-8C5): sc-53515, our highly recommended monoclonal alternative to Ly-6G (M-66).