



# IgG<sub>2</sub> (52G1): sc-52005

## BACKGROUND

IgG is a monomeric immunoglobulin composed of two heavy chains and two light chains. There are four subclasses of the IgG: IgG<sub>1</sub>, IgG<sub>2</sub>, IgG<sub>3</sub> and IgG<sub>4</sub>. Each molecule has two antigen binding sites. IgG is the most abundant immunoglobulin as well as the only isotype that can pass through the placenta, thereby providing protection to the fetus in its first weeks of life before, its own immune system has developed. IgG can bind to several different kinds of pathogens, for example viruses, bacteria and fungi, and it protects the body against them by complement activation (the classic pathway), opsonization for phagocytosis and neutralization of their toxins.

## REFERENCES

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## CHROMOSOMAL LOCATION

Genetic locus: IGHG2 (human) mapping to 14q32.33.

## SOURCE

IgG<sub>2</sub> (52G1) is a mouse monoclonal antibody raised against IgG<sub>2</sub> of human origin.

## PRODUCT

Each vial contains 100  $\mu$ g IgG<sub>2a</sub> in 1.0 ml of PBS with < 0.1% sodium azide and 0.1% gelatin.

## APPLICATIONS

IgG<sub>2</sub> (52G1) is recommended for detection of  $\gamma$ -2 epitope inside Fc fragment of IgG<sub>2</sub> of human origin by solid phase ELISA (starting dilution 1:30, dilution range 1:30-1:3000); non cross-reactive with human IgG<sub>1</sub>, IgG<sub>3</sub>, IgG<sub>4</sub>, IgA, IgM and IgE.

Molecular Weight of IgG<sub>2</sub>: 36 kDa.

## STORAGE

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

## RESEARCH USE

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

## PROTOCOLS

See our web site at [www.scbt.com](http://www.scbt.com) for detailed protocols and support products.