A1BG (E-15): sc-132611



The Power to Question

BACKGROUND

A1BG (α 1B-glycoprotein), also known as A1B, ABG, GAB or HYST2477, is a 495 amino acid secreted glycoprotein that contains five immunoglobulin (lg)-like V-type domains and belongs to the immunoglobulin superfamily. At an average concentration of 22mg/dl, A1BG is expressed in normal adult plasma and is thought to be involved in the regulation of cell behavior and cell recognition. In plasma, A1BG specifically binds to human CRISP-3, a member of the cysteine-rich secretory protein (CRISP) family comprised of evolutionarily conserved proteins which are believed to play a role in the innate immune system. Through its association with CRISP-3, A1BG is believed to function in protecting the body from the circulation of free CRISP-3, a circumstance with potentially harmful effects.

REFERENCES

- 1. Ishioka, N., et al. 1986. Amino acid sequence of human plasma α 1B-glycoprotein: homology to the immunoglobulin supergene family. Proc. Natl. Acad. Sci. USA 83: 2363-2367.
- 2. Gahne, B., et al. 1987. Genetic polymorphism of human plasma α 1B-glycoprotein: phenotyping by immunoblotting or by a simple method of 2-D electrophoresis. Hum. Genet. 76: 111-115.
- 3. Juneja, R.K., et al. 1988. Further studies of the plasma α 1B-glycoprotein polymorphism: two new alleles and allele frequencies in Caucasians and in American blacks. Hum. Hered. 38: 267-272.
- 4. Eiberg, H., et al. 1989. Linkage between α 1B-glycoprotein (A1BG) and Lutheran (LU) red blood group system: assignment to chromosome 19: new genetic variants of A1BG. Clin. Genet. 36: 415-418.
- 5. Juneja, R.K., et al. 1994. Distribution of plasma α 1B-glycoprotein (A1BG) polymorphism in several populations of the Indian subcontinent. Ann. Hum. Biol. 21: 443-448.
- 6. Hashim, O.H., et al. 2001. The application of Artocarpus integer seed lectin-M in the detection and isolation of selective human serum acutephase proteins and immunoglobulins. Immunol. Invest. 30: 131-141.

CHROMOSOMAL LOCATION

Genetic locus: A1BG (human) mapping to 19q13.43.

SOURCE

A1BG (E-15) is an affinity purified goat polyclonal antibody raised against a peptide mapping within an internal region of A1BG of human origin.

PRODUCT

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

Blocking peptide available for competition studies, sc-132611 P, (100 μ g peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

STORAGE

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

APPLICATIONS

A1BG (E-15) is recommended for detection of A1BG of human origin by Western Blotting (starting dilution 1:200, dilution range 1:100-1:1000), immunoprecipitation [1-2 μ g per 100-500 μ g 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 A1BG siRNA (h): sc-97518, A1BG shRNA Plasmid (h): sc-97518-SH and A1BG shRNA (h) Lentiviral Particles: sc-97518-V.

Molecular Weight of A1BG: 54 kDa.

Molecular Weight of deglycosylated A1BG: 68 kDa.

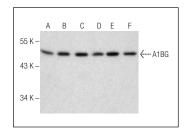
Molecular Weight of deglycosylated54 A1BG: 74-80 kDa.

Positive Controls: Jurkat whole cell lysate: sc-2204, TE671 cell lysate: sc-2416 or HeLa whole cell lysate: sc-2200.

RECOMMENDED SECONDARY REAGENTS

To ensure optimal results, the following support (secondary) reagents are recommended: 1) Western Blotting: use donkey anti-goat IgG-HRP: sc-2020 (dilution range: 1:2000-1:100,000) or Cruz Marker™ compatible donkey anti-goat IgG-HRP: sc-2033 (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-2003 (0.5 ml agarose/2.0 ml). 3) Immunofluorescence: use donkey anti-goat IgG-FITC: sc-2024 (dilution range: 1:100-1:400) or donkey anti-goat IgG-TR: sc-2783 (dilution range: 1:100-1:400) with UltraCruz™ Mounting Medium: sc-24941.

DATA



A1BG (E-15): sc-132611. Western blot analysis of A1BG expression in Hep G2 (**A**), HeLa (**B**), Jurkat (**C**), SK-BR-3 (**D**), TE671 (**E**) and T-47D (**F**) whole cell lysates.

RESEARCH USE

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



Try A1BG (F-9): sc-374415 or A1BG (51A6): sc-135661, our highly recommended monoclonal alternatives to A1BG (E-15).