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# Anti-Serpin A1 Antibody

Catalog # AP51502

## Product Information

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|---|---|
| **Application** | WB, IF/IC |
| **Primary Accession** | P01009 |
| **Reactivity** | Human, Mouse, Rat |
| **Host** | Rabbit |
| **Clonality** | Polyclonal |
| **Calculated MW** | 46737 |

## Additional Information

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|---|---|
| **Gene ID** | 5265 |
| **Other Names** | AAT; PI; Alpha-1-antitrypsin; Alpha-1 protease inhibitor; Alpha-1-antiproteinase; Serpin A1 |
| **Target/Specificity** | KLH-conjugated synthetic peptide encompassing a sequence within the center region of human Serpin A1. The exact sequence is proprietary. |
| **Dilution** | WB~~WB (1/500 - 1/1000) IF/IC~~N/A |
| **Format** | Liquid in 0.42% Potassium phosphate, 0.87% Sodium chloride, pH 7.3, 30% glycerol, and 0.01% sodium azide. |
| **Storage** | Store at -20 °C.Stable for 12 months from date of receipt |

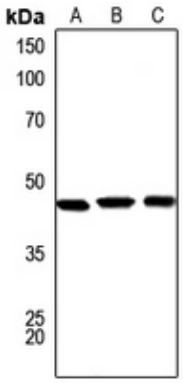
## Protein Information

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|---|---|
| **Name** | SERPINA1 ( HGNC:8941) |
| **Synonyms** | AAT, PI |
| **Function** | Inhibitor of serine proteases. Its primary target is elastase, but it also has a moderate affinity for plasmin and thrombin. Irreversibly inhibits trypsin, chymotrypsin and plasminogen activator. The aberrant form inhibits insulin-induced NO synthesis in platelets, decreases coagulation time and has proteolytic activity against insulin and plasmin. |
| **Cellular Location** | Secreted. Endoplasmic reticulum. Note=The S and Z allele are not secreted effectively and accumulate intracellularly in the endoplasmic reticulum |
| **Tissue Location** | Ubiquitous. Expressed in leukocytes and plasma. |

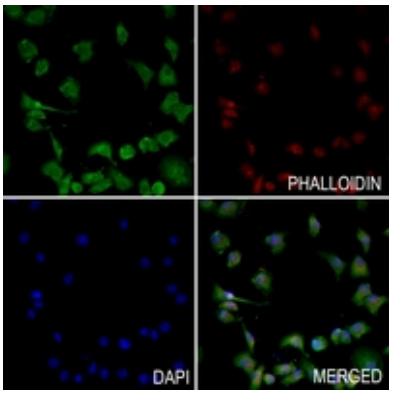
## References

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Long G.L.,et al.Biochemistry 23:4828-4837(1984).
Rosenberg S.,et al.Nature 312:77-80(1984).
Ciliberto G.,et al.Cell 41:531-540(1985).
Nukiwa T.,et al.J. Biol. Chem. 261:15989-15994(1986).

## Images




Western blot analysis of Serpin A1 expression in Hela (A), mouse liver (B), rat liver (C) whole cell lysates. (Predicted band size: 46 kD; Observed band size: 47 kD)




Immunofluorescent analysis of Serpin A1 staining in PANC1 cells. Formalin-fixed cells were permeabilized with 0.1% Triton X-100 in TBS for 5-10 minutes and blocked with 3% BSA-PBS for 30 minutes at room temperature. Cells were probed with the primary antibody in 3% BSA-PBS and incubated overnight at 4 °C in a hidified chamber. Cells were washed with PBST and incubated with a AF488-conjugated secondary antibody (green) in PBS at room temperature in the dark. Phalloidin - AF594 was used to stain Actin filaments (red). DAPI was used to stain the cell nuclei (blue).

Please note: All products are 'FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC OR THERAPEUTIC PROCEDURES'.