

Polyclonal Anti-SGK1 Picoband™ Antibody

Catalog Number: PB9434

Description

Gene Name	serum/glucocorticoid regulated kinase 1
Recommended Protein Name	Serine/threonine-protein kinase Sgk1
Lot No.	0941512Da053452
Size	100µg/vial
Form	lyophilized
Ig type	Rabbit IgG
Specificity	No cross reactivity with other proteins.
Purification	Immunogen affinity purified.
Species	Reacts with: human
Immunogen	A synthetic peptide corresponding to a sequence at the N-terminus of human SGK1 (28-55aa MKQRRMGLNDFIQKIANNZYACKHPEVQ), different from the related mouse sequence by three amino acids, and from the related rat sequence by one amino acid.
Contents	Each vial contains 5mg BSA, 0.9mg NaCl, 0.2mg Na ₂ HPO ₄ , 0.05mg NaN ₃ .

Application

	Concentration	Tested Species	Antigen Retrieval
Western blot	0.1-0.5µg/ml	Hu	-

WB: The detection limit for SGK1 is approximately 0.1ng/lane under reducing conditions.

Tested Species: In-house tested species with positive results.

Other applications have not been tested.

Optimal dilutions should be determined by end users.

Preparation and storage

Reconstitution: 0.2ml of distilled water will yield a concentration of 500µg/ml.

Storage: At -20°C for one year. After reconstitution, at 4°C for one month. It can also be aliquotted and stored frozen at -20°C for a longer time.

Avoid repeated freezing and thawing.

Relevant detection systems

Boster provides a series of assays reacted with primary antibodies. Antibody can be supported by chemiluminescence kit EK1002 in WB.

Background

Serine/threonine-protein kinase Sgk1, also called SGK1, encodes a serine/threonine protein kinase that plays an important role in cellular stress response. By fluorescence in situ hybridization, this gene is mapped to 6q23.2. This kinase activates certain potassium, sodium, and chloride channels, suggesting an involvement in the regulation of processes such as cell survival, neuronal excitability, and renal sodium excretion. High levels of expression of this gene may contribute to conditions such as hypertension and diabetic nephropathy. Several alternatively spliced transcript variants encoding different isoforms have been noted for this gene.

Reference

1. Arteaga, M. F., Wang, L., Ravid, T., Hochstrasser, M., Canessa, C. M. An amphipathic helix targets serum and glucocorticoid-induced kinase 1 to the endoplasmic reticulum-associated ubiquitin-conjugation machinery. *Proc. Nat. Acad. Sci.* 103: 11178-11183, 2006.
2. Salker, M. S., Christian, M., Steel, J. H., Nautiyal, J., Lavery, S., Trew, G., Webster, Z., Al-Sabbagh, M., Puchchakayala, G., Foller, M., Landles, C., Sharkey, A. M., Quenby, S., Aplin, J. D., Regan, L., Lang, F., Brosens, J. J. Deregulation of the serum- and glucocorticoid-inducible kinase SGK1 in the endometrium causes reproductive failure. *Nature Med.* 17: 1509-1513, 2011.