



# WNK1 Monoclonal Antibody

|                                    |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             |
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| <b>Catalog No</b>                  | YP-mAb-15034                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                |
| <b>Isotype</b>                     | IgG                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         |
| <b>Reactivity</b>                  | Human;Mouse;Rat                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             |
| <b>Applications</b>                | WB                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          |
| <b>Gene Name</b>                   | WNK1                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        |
| <b>Immunogen</b>                   | The antiserum was produced against synthesized peptide derived from human WNK1. AA range:24-73                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              |
| <b>Specificity</b>                 | WNK1 Monoclonal Antibody detects endogenous levels of WNK1 protein.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         |
| <b>Formulation</b>                 | Liquid in PBS containing 50% glycerol, 0.5% BSA and 0.02% sodium azide.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     |
| <b>Source</b>                      | Monoclonal, Mouse,IgG                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       |
| <b>Purification</b>                | The antibody was affinity-purified from mouse antiserum by affinity-chromatography using epitope-specific immunogen.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        |
| <b>Dilution</b>                    | WB 1:500-1:2000                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             |
| <b>Concentration</b>               | 1 mg/ml                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     |
| <b>Purity</b>                      | ≥90%                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        |
| <b>Storage Stability</b>           | -20°C/1 year                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                |
| <b>Synonyms</b>                    | Erythrocyte 65 kDa protein;HSAN2;HSN2;hWNK1;KDP;KIAA0344;Kinase deficient protein;p65;PHA2C;PRKWNK1;PSK;WNK1;Serine/threonine-protein kinase WNK1;Protein kinase lysine-deficient 1;Protein kinase with no lysine 1                                                                                                                                                                                                                                                                                                                                                                                         |
| <b>Observed Band</b>               | 230kD                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       |
| <b>Calculated Molecular Weight</b> | 230kD                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       |
| <b>Cell Pathway</b>                | Cytoplasm .                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 |
| <b>Tissue Specificity</b>          | Widely expressed, with highest levels observed in the testis, heart, kidney and skeletal muscle. Isoform 3 is kidney-specific and specifically expressed in the distal convoluted tubule (DCT) and connecting tubule (CNT) of the nephron.                                                                                                                                                                                                                                                                                                                                                                  |
| <b>Function</b>                    | catalytic activity:ATP + a protein = ADP + a phosphoprotein.,caution:Cys-250 is present instead of the conserved Lys which is expected to be an active site residue. Lys-233 appears to fulfill the required catalytic function., caution:PubMed:2507249 describes a peptide sequence containing a GlcNAc glycosylated Ser in position 164 while it is an Arg residue according to others., cofactor:Magnesium.,disease:Defects in WNK1 are a cause of pseudohypoaldosteronism type II (PHAII) [MIM:145260]. PHAII is an autosomal dominant disease characterized by severe hypertension, hyperkalemia, and |



sensitivity to thiazide diuretics which may result from a chloride shunt in the renal distal nephron.,enzyme regulation:By hypertonicity. Activation requires autophosphorylation of Ser-382. Phosphorylation of Ser-378 also promotes increased activity.,function:Controls sodium and chloride ion transport by inhibiti

#### Background

This gene encodes a member of the WNK subfamily of serine/threonine protein kinases. The encoded protein may be a key regulator of blood pressure by controlling the transport of sodium and chloride ions. Mutations in this gene have been associated with pseudohypoaldosteronism type II and hereditary sensory neuropathy type II. Alternatively spliced transcript variants encoding different isoforms have been described but the full-length nature of all of them has yet to be determined.[provided by RefSeq, May 2010],

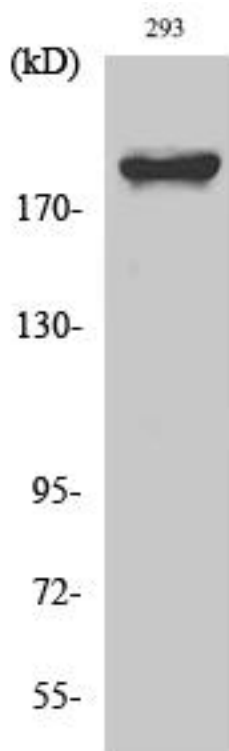
#### matters needing attention

Avoid repeated freezing and thawing!

#### Usage suggestions

This product can be used in immunological reaction related experiments. For more information, please consult technical personnel.

### Products Images



Western Blot analysis of various cells using WNK1 Monoclonal Antibody