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|--------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <b>Product name:</b>     | Casein Kinase II $\alpha$ (phospho Tyr255) Rabbit Polyclonal Antibody                                                                                        |
| <b>Cat number:</b>       | ABN04361                                                                                                                                                     |
| <b>Conjugate:</b>        | Unconjugated                                                                                                                                                 |
| <b>Size:</b>             | 100 $\mu$ L                                                                                                                                                  |
| <b>Clone:</b>            | Polyclonal                                                                                                                                                   |
| <b>Concentration:</b>    | 1mg/ml                                                                                                                                                       |
| <b>Host:</b>             | Rabbit                                                                                                                                                       |
| <b>Isotype:</b>          | IgG                                                                                                                                                          |
| <b>Immunogen:</b>        | The antiserum was produced against synthesized peptide derived from human Casein Kinase II alpha around the phosphorylation site of Tyr255. AA range:221-270 |
| <b>Reactivity:</b>       | Human,Mouse,Rat                                                                                                                                              |
| <b>Applications:</b>     | WB 1:500-1:2000,IHC 1:100-1:300,ICC/IF 1:50-1:200,ELISA 1:5000-1:20000                                                                                       |
| <b>Molecular Weight:</b> | 45kDa                                                                                                                                                        |
| <b>Purification:</b>     | Affinity purification                                                                                                                                        |
| <b>Form:</b>             | Liquid                                                                                                                                                       |
| <b>Buffer:</b>           | Liquid in PBS containing 50% glycerol, 0.5% BSA and 0.02% New type preservative N.                                                                           |
| <b>Storage:</b>          | Store at 4°C short term. Aliquot and store at -20°C for 12 months. Avoid freeze/thaw cycles.                                                                 |

**Background:**

Casein kinase II is a serine/threonine protein kinase that phosphorylates acidic proteins such as casein. It is involved in various cellular processes, including cell cycle control, apoptosis, and circadian rhythm. The kinase exists as a tetramer and is composed of an alpha, an alpha-prime, and two beta subunits. The alpha subunits contain the catalytic activity while the beta subunits undergo autophosphorylation. The protein encoded by this gene represents the alpha subunit. While this gene is found on chromosome 20, a related transcribed pseudogene is found on chromosome 11. Three transcript variants encoding two different proteins have been found for this gene. [provided by RefSeq, Jul 2014], catalytic activity: ATP + a protein = ADP + a phosphoprotein., function: Casein kinases are operationally defined by their preferential utilization of acidic proteins such as caseins as substrates. The alpha and alpha' chains contain the catalytic site. Participates in Wnt signaling. CK2 phosphorylates 'Ser-392' of p53/TP53 following UV irradiation., similarity: Belongs to the protein kinase superfamily., similarity: Belongs to the protein kinase superfamily. Ser/Thr protein kinase family. CK2 subfamily., similarity: Contains 1 protein kinase domain., subunit: Tetramer composed of an alpha chain, an alpha' and two beta chains. Also component of a CK2-SPT16-SSRP1 complex composed of SSRP1, SUPT16H, CSNK2A1, CSNK2A2 and CSNK2B, the complex associating following UV irradiation. Interacts with RNPS1.,