Anti-Phospho-Ser<sup>129</sup> Alpha Synuclein

**Catalog Number:** p1571-129  
**Size:** 100 µl

**Product Description:** Affinity purified rabbit polyclonal antibody

**Applications:**  
WB: 1:1000

**Antigen:** Phosphopeptide corresponding to amino acid residues surrounding the phospho-Ser<sup>129</sup> of alpha synuclein.

**Species reactivity:** The antibody has been directly tested for reactivity in Western blots with rat tissue. It is anticipated that the antibody will react with bovine, canine, human, mouse, and non-human primate based on the fact that these species have 100% homology with the amino acid sequence used as antigen.

**Biological Significance:** Alpha-synuclein is a presynaptic neuronal protein that is thought to be involved in the formation of SNARE complexes. Most significantly, aggregated alpha-synuclein is one of the major components found in the Lewy bodies that occur in Parkinson’s disease (PD) and other neurodegenerative disorders (Okochi et al., 2000). Mutation of the alpha-synuclein gene is associated with familial forms of PD (Newmann et al., 2002). Recent evidence suggests that phosphorylation of alpha-synuclein at ser<sup>129</sup> plays a role in the formation of inclusions in PD (Smith et al., 2005; Masliah et al., 2005).

**Western blot** of rat cortex lysate showing specific labeling of the ~15 k alpha synuclein protein phosphorylated at Ser<sup>129</sup>. Immunolabeling is blocked by the phosphopeptide (peptide) used as antigen but not by the corresponding dephosphopeptide (not shown).

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**WB** = Western Blot  
**IF** = Immunofluorescence  
**IHC** = Immunohistochemistry  
**IP** = Immunoprecipitation

**Packaging:** 100 µl in 10 mM HEPES (pH 7.5), 150 mM NaCl, 100 µg per ml BSA and 50% glycerol. Adequate amount of material to conduct 10-mini Western Blots.

**Storage and Stability:** Store at –20°C; stable for at least one year.

**Shipment:** Domestic - Blue Ice; International - Blue Ice or Dry Ice.
**Purification Method:** Prepared from rabbit serum by affinity purification via sequential chromatography on phospho- and dephosphopeptide affinity columns.

**Antibody Specificity:** Specific for the ~15 kDa alpha-synuclein protein phosphorylated at Ser\(^{129}\). Immunolabeling is blocked by the phosphopeptide used as antigen but not by the corresponding dephosphopeptide.

**Quality Control Tests:** Western blots performed on each lot.

**References:**


