

AP01349PU-N**Polyclonal Antibody to AKT1 / PKB - Aff - Purified****Alternate names:**

Akt-1, C-AKT, Protein kinase B, RAC-PK-alpha, RAC-alpha serine/threonine-protein kinase

Quantity:

0.1 mg

Concentration:

1.0 mg/ml

Background:

The serine/threonine kinase Akt family contains several members, including Akt1 (also designated PKB or RacPK), Akt2 (also designated PKB β or RacPK- β) and Akt3 (also designated PKB γ or thymoma viral proto-oncogene 3), which exhibit sequence homology with the protein kinase A and C families and are encoded by the c-Akt proto-oncogene. All members of the Akt family have a Pleckstrin homology domain. Akt1 and Akt2 are activated by PDGF stimulation. This activation is dependent on PDGFR- β tyrosine residues 740 and 751, which bind the subunit of the phosphatidylinositol 3-kinase (PI 3-kinase) complex. Activation of Akt1 by insulin or insulin-growth factor-I (IGF-I) results in phosphorylation of both Thr 308 and Ser 473. Phosphorylation of both residues is important to generate a high level of Akt1 activity, and the phosphorylation of Thr 308 is not dependent on phosphorylation of Ser 473 in vivo. Thus, Akt proteins become phosphorylated and activated in insulin/IGF-I-stimulated cells by an upstream kinase(s).

Uniprot ID:[P31749](#)**NCBI:**[NP_001014431.1](#)**GeneID:**[207](#)**Host:**

Rabbit

Format:**State:** Liquid purified Ig fraction**Purification:** Affinity chromatography**Buffer System:** Phosphate buffered saline (PBS) with 0.05% sodium azide, approx. pH 7.2.**Applications:****Western Blot:** 1/500-1/1000.**Immunohistochemistry on paraffin sections:** 1/50-1/200.**Immunofluorescence:** 1/50-1/200.

Other applications not tested. Optimal dilutions are dependent on conditions and should be determined by the user.

Molecular Weight:

~ 55 kDa

Specificity:

Akt antibody detects endogenous levels of Akt protein. (region surrounding Pro125)

Species: Human, Mouse, Rat.

Other species not tested.

Storage:

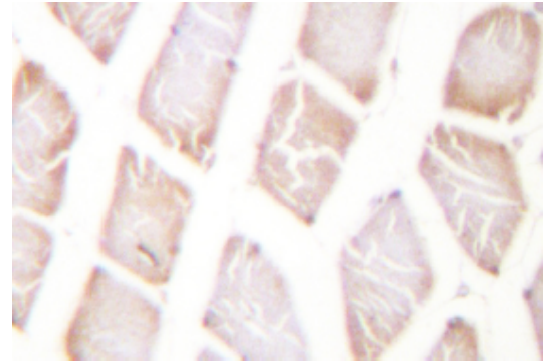
Store the antibody undiluted at 2-8°C for one month or (in aliquots) at -20°C for longer.

Avoid repeated freezing and thawing.

Shelf life: one year from despatch.

Pictures:

Immunohistochemistry (IHC) analyzes of Akt antibody (Cat.-No.: AP01349PU-N) in paraffin-embedded human skeletal muscle tissue.



Western blot (WB) analysis of Akt antibody (Cat.-No.: AP01349PU-N) in extracts from HuvEc cells treated with Serum 30% 30'.

