



## AKT1/2/3 Mouse mAb

db6344 Package : 50μL 100μL

Product Name: AKT1/2/3 Mouse mAb

Cat.No.: db6344

Synonyms: AKT; AKT1; AKT1 kinase; AKT2; AKT2 kinase; Akt3; AKT3 HUMAN; CAKT; DKFZp434N0250;

kinase Akt1; MGC99656; Murine thymoma viral (v-akt) homolog 2; PKB; PKB gamma; PKB-GAMMA; PKB/Akt; PKBALPHA; PKBB; PKBBETA; PKBG; PKBGAMMA; PRKBA; PRKBB; PRKBG; Protein kinase Akt-3; Protein kinase B; Protein kinase B gamma; RAC; rac protein kinase alpha; rac protein

kinase beta; RAC-gamma; RAC-gamma serine/threonine-protein kinase; RAC-PK-gamma; RACALPHA; RACalpha serine/threonine kinase; RACBETA; RACgamma; RACgamma serine/threonine protein kinase; RACPKgamma; serine threonine protein kinase; STK-2; STK2; thymoma viral proto oncogene 1; thymoma viral proto oncogene; vakt murine thymoma viral oncogene homolog 1; vakt murine thymoma viral oncogene

homolog 3

Application: WB, IP

Reactivity: Human, Mouse, Rat

Host species: Mouse

**Background** 

Akt, also referred to as PKB or Rac, plays a critical role in controlling survival and apoptosis. This protein kinase is activated by insulin and various growth and survival factors to function in a wortmannin-sensitive pathway involving Pl3 kinase. Akt is activated by phospholipid binding and activation loop phosphorylation at Thr308 by PDK1 and by phosphorylation within the carboxy terminus at Ser473.

**Immunogen** 

Purified recombinant human AKT1 protein fragments expressed in E.coli.AKT1 interacts (via the C-terminus) with CCDC88A (via its C-terminus). Interacts with GRB10; the interaction leads to GRB10 phosphorylation thus promoting YWHAE-binding By similarity. Interacts with AGAP2 (isoform 2/PIKE-A); the interaction occurs in the presence of guanine nucleotides. Interacts with AKTIP. Interacts (via PH domain) with MTCP1, TCL1A AND TCL1B. Interacts with CDKN1B; the interaction phosphorylates CDKN1B promoting 14-3-3 binding and cell-cycle progression. Interacts with MAP3K5 and TRAF6. Interacts with BAD, PPP2R5B, STK3 and STK4. Interacts (via PH domain) with SIRT1. Interacts with SRPK2 in a phosphorylation-dependent manner. Interacts with RAF1. Interacts with TRIM13; the interaction ubiquitinates AKT1 leading to its proteasomal degradation. Interacts with TNK2 and CLK2. Interacts (via the C-terminus) with THEM4 (via its C-terminus). Interacts with and phosphorylated by PDPK1.AKT2 interacts (via PH domain) with MTCP1, TCL1A AND TCL1B. Interacts with CLK2, PBH2 and TRAF6. AKT3 interacts (via PH domain) with TCL1A; this enhances AKT3 phosphorylation and activation. Interacts with TRAF6

**Gene ID** 207, 208, 10000

**Swiss Prot** P31749, P31751, Q9Y243



## For Research Use Only **Product Datasheet**

**Synonyms** AKT; AKT1 kinase; AKT2; AKT2 kinase; Akt3; AKT3\_HUMAN; CAKT; DKFZp434N0250;

kinase Akt1; MGC99656; Murine thymoma viral (v-akt) homolog 2; PKB; PKB gamma; PKB-GAMMA; PKB/Akt; PKBALPHA; PKBB; PKBBETA; PKBG; PKBGAMMA; PRKBA; PRKBB; PRKBG; Protein kinase Akt-3; Protein kinase B; Protein kinase B gamma; RAC; rac protein kinase alpha; rac protein kinase beta; RAC-gamma; RAC-gamma serine/threonine-protein kinase; RAC-PK-gamma; RACALPHA; RACalpha serine/threonine kinase; RACBETA; RACgamma; RACgamma serine/threonine protein kinase; RACPKgamma; serine threonine protein kinase; STK-2; STK2; thymoma viral proto oncogene 1; thymoma viral proto oncogene; vakt murine

thymoma viral oncogene homolog 1; vakt murine thymoma viral oncogene homolog 2; vakt murine

thymoma viral oncogene homolog 3

**Reactivity** Human, Mouse, Rat

Application WB, IP

Recommended dilution WB: 1:1000

Calculated MW 56 kDa

Observed MW 60 kDa

Host species Mouse

**Clonality** Monoclonal

Clonality No. 3B11-G8-B1

**Isotype** IgG1

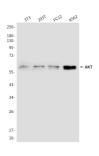
**Purity** Affinity Purification

Conjugation Un-conjugated

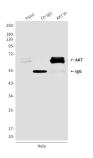
 $\textbf{Storage Stability} \hspace{1.5cm} \textbf{Store at -20 °C. Supplied in PBS, 50\% Glycerol(pH 7.3), 0.02\% sodium azide and 0.5\% BSA.} \\$ 

Stable for 12 months from date of receipt.

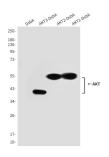




Western blot analysis of total AKT in 3T3, 293T, PC-12 and K562 lysates using AKT(pan) antibody.



Immunoprecipitation analysis of AKT in Hela lysates using AKT(pan) antibody.



Western blot analysis of AKT1, AKT2, AKT3 and DSBA recombinant antigen using DSBA antibody,and(Right)AKT1, AKT2 and AKT3 recombinant antigen fragments using AKT(pan) antibody.