

## Rabbit Anti-GSK3A antibody

SL60511R

<b>Product Name</b>	GSK3A
<b>Chinese Name</b>	糖原合酶激酶 3 $\alpha$ 抗体
<b>Alias</b>	GSK3A_HUMAN; Glycogen synthase kinase-3 alpha; Glycogen synthase kinase 3 alpha; EC:2.7.11.26; Serine/threonine-protein kinase GSK3A; EC:2.7.11.1; GSK 3 alpha; GSK3alpha; GSK-3 alpha; GSK3 alpha; GSK-3alpha; GSK 3A;
<b>Immunogen Species</b>	Rabbit
<b>Clonality</b>	Polyclonal
<b>React Species</b>	Human,Rat
<b>Applications</b>	WB=1:500-1000 not yet tested in other applications. optimal dilutions/concentrations should be determined by the end user.
<b>Theoretical molecular weight</b>	54kDa
<b>Cellular localization</b>	The nucleus The cell membrane
<b>Form</b>	Liquid
<b>Concentration</b>	1mg/ml
<b>Isotype</b>	IgG2a/Kappa
<b>Purification</b>	Affinity purified by Protein A
<b>Buffer Solution</b>	1M TBS(pH7.4) with 1% BSA, 3% Proclin300 and 50% Glycerol.
<b>Storage</b>	Shipped at 4°C. Store at -20 °C for one year. Avoid repeated freeze/thaw cycles.
<b>Attention</b>	This product as supplied is intended for research use only, not for use in human, therapeutic or diagnostic applications.
<b>PubMed</b>	<a href="#">PubMed</a> This gene encodes a multifunctional Ser/Thr protein kinase that is implicated in the control of several regulatory proteins including glycogen synthase, and transcription factors, such as JUN. It also plays a role in the WNT and PI3K signaling pathways, as well as regulates the production of beta-amyloid peptides associated with Alzheimer's disease. [provided by RefSeq, Oct 2011]
<b>Product Detail</b>	<b>SWISS:</b> P49840  <b>Gene ID:</b> 2931  <b>Database links:</b>  <a href="#">Entrez Gene: 2931</a> Human  <a href="#">Entrez Gene: 50686</a> Rat  <a href="#">SwissProt: P49840</a> Human  <a href="#">SwissProt: P18265</a> Rat



Constitutively active protein kinase acts as a negative regulator in hormone-controlled glucose homeostasis, Wnt signaling, and the regulation of transcription factors and microtubules by phosphorylating and inactivating glycogen synthase (GYS1 or GYS2), CTNNB1/ $\beta$ -catenin, APC, and AXIN1. Most of its substrates require priming phosphorylation. It is regulated by insulin, which promotes glycogen synthesis by phosphorylating and inhibiting GYS1 activity. It regulates hepatic glycogen metabolism, but not that of muscle. It may also mediate the development of insulin resistance by regulating the activation of transcription factors. In Wnt signaling, it regulates the level and transcriptional activity of nuclear CTNNB1/ $\beta$ -catenin. It promotes the processing of amyloid precursor protein (APP) and the formation of APP-derived amyloid plaques in Alzheimer's disease. It may be involved in the regulation of pancreatic  $\beta$ -cell replication. It is also necessary for the establishment of neuronal polarity and axonal growth.