Best Tools for immunology Research

Synapsin I (phospho Ser9) Polyclonal Antibody

Catalog No :	YP0257
Reactivity :	Human;Mouse;Rat
Applications :	WB;IHC;IF;ELISA
Target :	Synapsin I
Gene Name :	SYN1
Protein Name :	Synapsin-1
Human Gene Id :	6853
Human Swiss Prot No :	P17600
Mouse Gene Id :	20964
Mouse Swiss Prot No :	O88935
Rat Gene Id :	24949
Rat Swiss Prot No :	P09951
Immunogen :	The antiserum was produced against synthesized peptide derived from human Synapsin around the phosphorylation site of Ser9. AA range:3-52
Specificity :	Phospho-Synapsin I (S9) Polyclonal Antibody detects endogenous levels of Synapsin I protein only when phosphorylated at S9.
Formulation :	Liquid in PBS containing 50% glycerol, 0.5% BSA and 0.02% sodium azide.
Source :	Polyclonal, Rabbit,IgG
Dilution :	WB 1:500 - 1:2000. IHC 1:100 - 1:300. IF 1:200 - 1:1000. ELISA: 1:20000. Not yet tested in other applications.
Purification :	The antibody was affinity-purified from rabbit antiserum by affinity-

chromatography using epitope-specific immunogen.

Concentration : 1 mg/ml

Storage Stability : -15°C to -25°C/1 year(Do not lower than -25°C)

Observed Band : 77kD

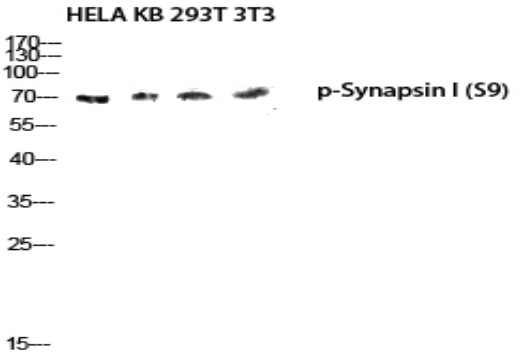
Background : This gene is a member of the synapsin gene family. Synapsins encode neuronal phosphoproteins which associate with the cytoplasmic surface of synaptic vesicles. Family members are characterized by common protein domains, and they are implicated in synaptogenesis and the modulation of neurotransmitter release, suggesting a potential role in several neuropsychiatric diseases. This member of the synapsin family plays a role in regulation of axonogenesis and synaptogenesis. The protein encoded serves as a substrate for several different protein kinases and phosphorylation may function in the regulation of this protein in the nerve terminal. Mutations in this gene may be associated with X-linked disorders with primary neuronal degeneration such as Rett syndrome. Alternatively spliced transcript variants encoding different isoforms have been identified. [provided by RefSeq, Jul 2008],

Function : disease:Defects in SYN1 are a cause of epilepsy X-linked with variable learning disabilities and behavior disorders [MIM:300491]. XELBD is characterized by variable combinations of epilepsy, learning difficulties, macrocephaly, and aggressive behavior.,function:Neuronal phosphoprotein that coats synaptic vesicles, binds to the cytoskeleton, and is believed to function in the regulation of neurotransmitter release. The complex formed with NOS1 and CAPON proteins is necessary for specific nitric-oxid functions at a presynaptic level.,PTM:Substrate of at least four different protein kinases. It is probable that phosphorylation plays a role in the regulation of synapsin-1 in the nerve terminal. Phosphorylated upon DNA damage, probably by ATM or ATR.,similarity:Belongs to the synapsin family.,subunit:Homodimer. Interacts with CAPON. Forms a ternary complex with NOS1. Isoform Ib interacts with

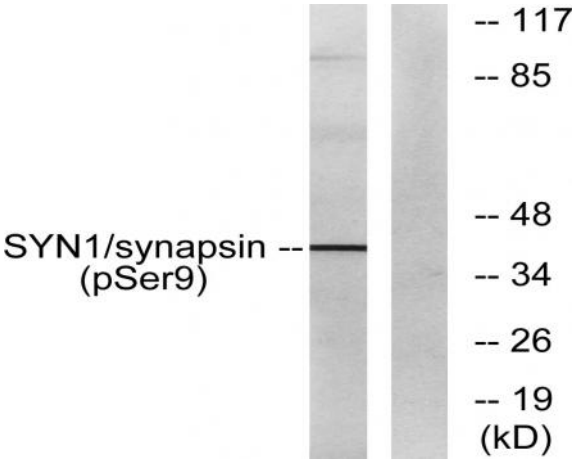
Subcellular Location : Cell junction, synapse. Golgi apparatus .

Expression : Brain,Brain cortex,

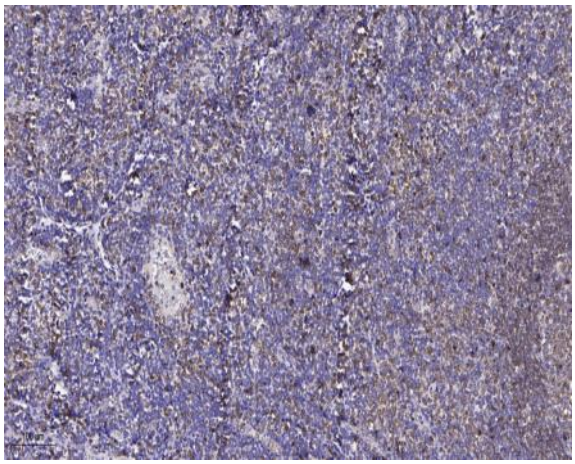
Products Images



Western blot analysis of HELA KB 293T 3T3 lysis using Phospho-Synapsin I (S9) antibody. Antibody was diluted at 1:1000



Western blot analysis of lysates from 293 cells treated with PMA 200nM 30', using Synapsin (Phospho-Ser9) Antibody. The lane on the right is blocked with the phospho peptide.



Immunohistochemical analysis of paraffin-embedded human tonsil. 1, Antibody was diluted at 1:200(4° overnight). 2, Tris-EDTA,pH9.0 was used for antigen retrieval. 3,Secondary antibody was diluted at 1:200(room temperature, 45min).