



# PSD-95 Polyclonal Antibody

<b>Catalog No</b>	YP-Ab-12796
<b>Isotype</b>	IgG
<b>Reactivity</b>	Human;Mouse;Rat
<b>Applications</b>	WB;ELISA
<b>Gene Name</b>	DLG4
<b>Protein Name</b>	Disks large homolog 4
<b>Immunogen</b>	The antiserum was produced against synthesized peptide derived from human PSD-95. AA range:253-302
<b>Specificity</b>	PSD-95 Polyclonal Antibody detects endogenous levels of PSD-95 protein.
<b>Formulation</b>	Liquid in PBS containing 50% glycerol, 0.5% BSA and 0.02% sodium azide.
<b>Source</b>	Polyclonal, Rabbit,IgG
<b>Purification</b>	The antibody was affinity-purified from rabbit antiserum by affinity-chromatography using epitope-specific immunogen.
<b>Dilution</b>	Western Blot: 1/500 - 1/2000. ELISA: 1/10000. Not yet tested in other applications.
<b>Concentration</b>	1 mg/ml
<b>Purity</b>	≥90%
<b>Storage Stability</b>	-20°C/1 year
<b>Synonyms</b>	DLG4; PSD95; Disks large homolog 4; Postsynaptic density protein 95; PSD-95; Synapse-associated protein 90; SAP-90; SAP90
<b>Observed Band</b>	95kD
<b>Cell Pathway</b>	Cell membrane ; Lipid-anchor ; Cytoplasmic side . Cell junction, synapse, postsynaptic density . Cell junction, synapse . Cytoplasm . Cell projection, axon . Cell projection, dendritic spine . Cell projection, dendrite . Cell junction, synapse, presynapse . High levels in postsynaptic density of neurons in the forebrain. Also in presynaptic region of inhibitory synapses formed by cerebellar basket cells on axon hillocks of Purkinje cells. Suppression of neuronal activity induces synaptic accumulation and clustering of DLG4. .
<b>Tissue Specificity</b>	Brain.
<b>Function</b>	domain:The L27 domain near the N-terminus of isoform 2 is required for HGS/HRS-dependent targeting to post-synaptic density.,domain:The PDZ domain 3 mediates interaction with ADR1B.,function:Interacts with the cytoplasmic tail of NMDA receptor subunits and shaker-type potassium channels. Required for synaptic plasticity associated with NMDA receptor signaling. Overexpression or depletion of DLG4 changes the ratio of excitatory to inhibitory synapses in hippocampal neurons. May reduce the amplitude of ACCN3 acid-evoked currents by retaining the channel intracellularly. May regulate the intracellular trafficking of ADR1B.,PTM:Palmitoylation of isoform 1 is required for targeting to postsynaptic



density.,similarity:Belongs to the MAGUK family.,similarity:Contains 1 guanylate kinase-like domain.,similarity:Contains 1 SH3 domain.,similarity:Contains 2 PDZ (DHR) domains.,similarity:Contains 3

**Background**

This gene encodes a member of the membrane-associated guanylate kinase (MAGUK) family. It heteromultimerizes with another MAGUK protein, DLG2, and is recruited into NMDA receptor and potassium channel clusters. These two MAGUK proteins may interact at postsynaptic sites to form a multimeric scaffold for the clustering of receptors, ion channels, and associated signaling proteins. Multiple transcript variants encoding different isoforms have been found for this gene. [provided by RefSeq, Jul 2008],

**matters needing attention**

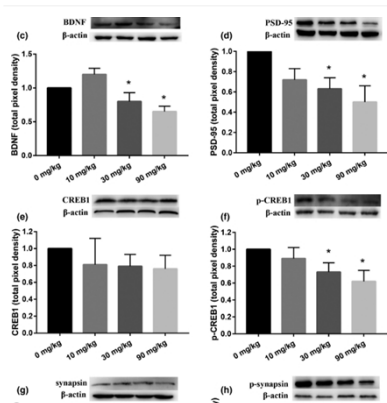
Avoid repeated freezing and thawing!

**Usage suggestions**

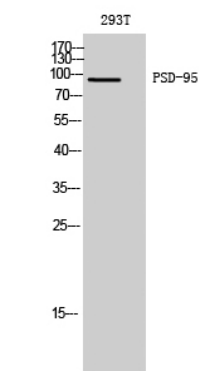
This product can be used in immunological reaction related experiments. For more information, please consult technical personnel.



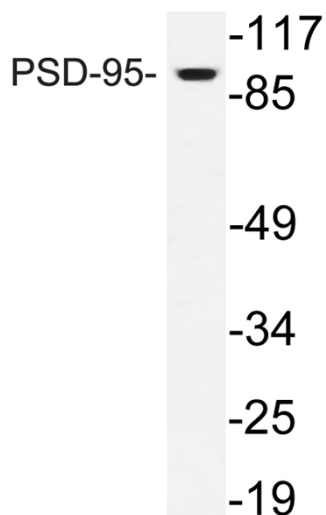
## Products Images



Wang, Yue, et al. "Fetal exposure to dichloroacetic acid and impaired cognitive function in the adulthood." *Brain and Behavior* 10.10 (2020): e01801.



Western Blot analysis of 293T cells using PSD-95 Polyclonal Antibody diluted at 1:1000



Western blot analysis of lysate from COLO205 cells, using PSD-95 antibody.