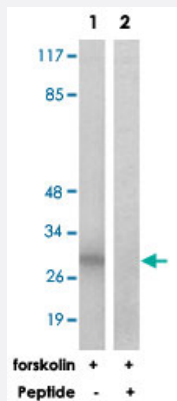


PPP1R1B polyclonal antibody

Catalog # PAB18466 Size 100 ug

Applications



Western Blot (Cell lysate)

Western blot analysis of extracts from COS-7 cells, treated with forskolin (40 nM, 30 mins), using PPP1R1B polyclonal antibody (Cat # PAB18466). Peptide "+" means "peptide blocking".

Specification

Product Description	Rabbit polyclonal antibody raised against synthetic peptide of PPP1R1B.
Immunogen	A synthetic peptide corresponding to residues surrounding T34 of human PPP1R1B.
Host	Rabbit
Reactivity	Human, Mouse, Rat
Specificity	This antibody is specific to ATF2.
Form	Liquid
Purification	Affinity purification
Concentration	1 mg/mL
Recommend Usage	Western Blot (1:500-1:1000) Immunohistochemistry (1:50-1:100) ELISA (1:20000) The optimal working dilution should be determined by the end user.

Storage Buffer	In PBS, 150mM NaCl, pH 7.4 (50% glycerol, 0.02% sodium azide)
Storage Instruction	Store at -20°C. Aliquot to avoid repeated freezing and thawing.
Note	This product contains sodium azide: a POISONOUS AND HAZARDOUS SUBSTANCE which should be handled by trained staff only.

Applications

- Western Blot (Cell lysate)

Western blot analysis of extracts from COS-7 cells, treated with forskolin (40 nM, 30 mins), using PPP1R1B polyclonal antibody (Cat # PAB18466).

Peptide "+" means "peptide blocking".

- Immunohistochemistry

- Enzyme-linked Immunoabsorbent Assay

Gene Info — PPP1R1B

Entrez GeneID	84152
Protein Accession#	Q9UD71
Gene Name	PPP1R1B
Gene Alias	DARPP-32, DARPP32, FLJ20940
Gene Description	protein phosphatase 1, regulatory (inhibitor) subunit 1B
Omim ID	604399
Gene Ontology	Hyperlink

Gene Summary

Midbrain dopaminergic neurons play a critical role in multiple brain functions, and abnormal signaling through dopaminergic pathways has been implicated in several major neurologic and psychiatric disorders. One well-studied target for the actions of dopamine is DARPP32. In the densely dopamine- and glutamate-innervated rat caudate-putamen, DARPP32 is expressed in medium-sized spiny neurons (Ouimet and Greengard, 1990 [PubMed 2191086]) that also express dopamine D1 receptors (Walaas and Greengard, 1984 [PubMed 6319627]). The function of DARPP32 seems to be regulated by receptor stimulation. Both dopaminergic and glutamatergic (NMDA) receptor stimulation regulate the extent of DARPP32 phosphorylation, but in opposite directions (Halpain et al., 1990 [PubMed 2153935]). Dopamine D1 receptor stimulation enhances cAMP formation, resulting in the phosphorylation of DARPP32 (Walaas and Greengard, 1984 [PubMed 6319627]); phosphorylated DARPP32 is a potent protein phosphatase-1 (see MIM 176875) inhibitor (Hemmings et al., 1984 [PubMed 6087160]). NMDA receptor stimulation elevates intracellular calcium, which leads to activation of calcineurin and dephosphorylation of phospho-DARPP32, thereby reducing the phosphatase-1 inhibitory activity of DARPP32 (Halpain et al., 1990 [PubMed 2153935]). [supplied by OMIM]

Other Designations

OTTHUMP00000164276[dopamine and cAMP regulated phosphoprotein|dopamine and cAMP-regulated neuronal phosphoprotein 32|protein phosphatase 1, regulatory (inhibitor) subunit 1B (dopamine and cAMP regulated phosphoprotein, DARPP-32)]

Disease

- [Alzheimer disease](#)
- [Anorexia Nervosa](#)
- [Attention Deficit Disorder with Hyperactivity](#)
- [Autistic Disorder](#)
- [Bipolar Disorder](#)
- [Breast cancer](#)
- [Breast Neoplasms](#)
- [Bulimia](#)
- [Cardiovascular Diseases](#)
- [Cognition](#)
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- [Disease Models](#)
- [Edema](#)
- [Genetic Predisposition to Disease](#)

- [Intelligence Tests](#)
- [Mental Disorders](#)
- [NARP](#)
- [Neuropsychological Tests](#)
- [Personality Tests](#)
- [Schizophrenia](#)
- [Schizophrenic Psychology](#)
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