

Anti-PAK3 Rabbit Monoclonal Antibody

Catalog # ABO14549

Specification

Anti-PAK3 Rabbit Monoclonal Antibody - Product Information

ApplicationWB, IHC, IF, ICC, IPPrimary Accession075914HostRabbitIsotypeRabbitReactivityRabbit IgGClonalityMonoclonalFormatLiquidDescriptionAnti-PAK3 Rabbit Monoclonal Antibody . Tested in WB, IHC, ICC/IF, IP application

Description Anti-PAK3 Rabbit Monoclonal Antibody . Tested in WB, IHC, ICC/IF, IP applications. This antibody reacts with Human, Mouse, Rat.

Anti-PAK3 Rabbit Monoclonal Antibody - Additional Information

Gene ID 5063

Other Names Serine/threonine-protein kinase PAK 3, 2.7.11.1, Beta-PAK, Oligophrenin-3, p21-activated kinase 3, PAK-3, PAK3, OPHN3

Application Details WB 1:1000-1:5000
IHC 1:50-1:200
ICC/IF 1:50-1:200
IP 1:40

Contents Rabbit IgG in phosphate buffered saline, pH 7.4, 150mM NaCl, 0.02% sodium azide and 50% glycerol, 0.4-0.5mg/ml BSA.

Immunogen A synthesized peptide derived from human PAK3

Purification Affinity-chromatography

Storage

Store at -20°C for one year. For short term storage and frequent use, store at 4°C for up to one month. Avoid repeated freeze-thaw cycles.

Anti-PAK3 Rabbit Monoclonal Antibody - Protein Information

Name PAK3

Synonyms OPHN3



Function

Serine/threonine protein kinase that plays a role in a variety of different signaling pathways including cytoskeleton regulation, cell migration, or cell cycle regulation. Plays a role in dendrite spine morphogenesis as well as synapse formation and plasticity. Acts as a downstream effector of the small GTPases CDC42 and RAC1. Activation by the binding of active CDC42 and RAC1 results in a conformational change and a subsequent autophosphorylation on several serine and/or threonine residues. Phosphorylates MAPK4 and MAPK6 and activates the downstream target MAPKAPK5, a regulator of F-actin polymerization and cell migration. Additionally, phosphorylates TNNI3/troponin I to modulate calcium sensitivity and relaxation kinetics of thin myofilaments. May also be involved in early neuronal development. In hippocampal neurons, necessary for the formation of dendritic spines and excitatory synapses; this function is dependent on kinase activity and may be exerted by the regulation of actomyosin contractility through the phosphorylation of myosin II regulatory light chain (MLC) (By similarity).

Cellular Location Cytoplasm.

Tissue Location

Restricted to the nervous system. Highly expressed in postmitotic neurons of the developing and postnatal cerebral cortex and hippocampus.

Anti-PAK3 Rabbit Monoclonal Antibody - Protocols

Provided below are standard protocols that you may find useful for product applications.

- <u>Western Blot</u>
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- <u>Cell Culture</u>

Anti-PAK3 Rabbit Monoclonal Antibody - Images



Western blot analysis of PAK3 expression in human fetal brain lysate.