

PAK2 recombinant antibody

PAK2 Antibody

CATALOG #	HOST	REACTIVITY	APPLICATIONS
AAA243930	Rabbit	Human, Mouse, Rat	Immunoprecipitation, Flow Cytometry, Functional Assay, Western Blot, ELISA

PRODUCT SYNONYMS

PAK2; Monoclonal Recombinant Antibody; PAK2 Antibody; Serine/threonine-protein kinase PAK 2 (EC 2.7.11.1) (Gamma-PAK) (PAK65) (S6/H4 kinase) (p21-activated kinase 2) (PAK-2) (p58) [Cleaved into: PAK-2p27 (p27); PAK-2p34 (p34) (C-t-PAK2)]; PAK2 recombinant antibody

PRODUCT SPECIFICATIONS

Host	Rabbit
Reactivity	Human, Mouse, Rat
Clonality	Monoclonal
Isotype	Rabbit IgG
Clone Number	6D12
Purity/Purification	Affinity-chromatography
Form/Format	Liquid. Rabbit IgG in phosphate buffered saline, PH7.4, 150mM NaCl, 0.02% sodium azide and 50% glycerol.
Applicable Applications for PAK2 recombinant antibody	IP (Immunoprecipitation), FCM/FACS (Flow Cytometry), WB (Western Blot), ELISA
Antibody Type	Recombinant Antibody
Conjugation	Non-conjugated
Immunogen	A synthesized peptide derived from human PAK2
Preparation and Storage	Upon receipt, store at -20 degree C or -80 degree C. Avoid repeated freeze.

IMAGES



IP (Immunoprecipitation)

Immunoprecipitating PAK2 in Raji whole cell lysate. Lane 1: Rabbit control IgG instead of in Raji whole cell lysate. For western blotting, a HRP-conjugated Protein G antibody was used as the secondary antibody (1/2000). Lane 2: Raji whole cell lysate?500ug? Lane 3: Raji whole cell lysate (10ug)



FCM/FACS (Flow Cytometry)

Overlay histogram showing HepG2 cells stained with (red line) at 1?50. The cells were fixed with 70% Ethylalcohol (18h) and then incubated in 10% normal goat serum to block non-specific protein-protein interactions followed by the antibody (1ug/1*10⁶ cells) for 1 h at 4?. The secondary antibody used was FITC-conjugated goat anti-rabbit IgG (H+L) at 1/200 dilution for 30min at 4?. Control antibody (green line) was Rabbit IgG (1ug/1*10⁶ cells) used under the same conditions. Acquisition of >10,000 events was performed.



WB (Western Blot)

Western BlotPositive WB detected in: 293 whole cell lysate, Jurkat whole cell lysate, Raji whole cell lysate, Mouse brain tissue, Rat brain tissueAll lanes: PAK2 antibody at 1:2000SecondaryGoat polyclonal to rabbit IgG at 1/50000 dilutionPredicted band size: 59 kDaObserved band size: 59 kDa

ADDITIONAL INFORMATION

Related Product Information for PAK2 recombinant antibody	Serine/threonine protein kinase that plays a role in a variety of different signaling pathways including cytoskeleton regulation, cell motility, cell cycle progression, apoptosis or proliferation. Acts as 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. Full-length PAK2 stimulates cell survival and cell growth. Phosphorylates MAPK4 and MAPK6 and activates the downstream target MAPKAPK5, a regulator of F-actin polymerization and cell migration. Phosphorylates JUN and plays an important role in EGF-induced cell proliferation. Phosphorylates many other substrates including histone H4 to promote assembly of H3.3 and H4 into nucleosomes, BAD, ribosomal protein S6, or MBP. Additionally, associates with ARHGEF7 and GIT1 to perform kinase-independent functions such as spindle orientation control during mitosis. On the other hand, apoptotic stimuli such as DNA damage lead to caspase-mediated cleavage of PAK2, generating PAK-2p34, an active p34 fragment that translocates to the nucleus and promotes cellular apoptosis involving the JNK signaling pathway. Caspase-activated PAK2 phosphorylates MKNK1 and reduces cellular translation.
Product Categories/Family for PAK2 recombinant antibody	Neuroscience; Cancer; Cell biology; Microbiology; Signal transduction

NCBI AND UNIPROT INFORMATION

NCBI GI #	32483399
NCBI GeneID	5062
NCBI Accession #	NP_002568.2
NCBI GenBank Nucleotide #	NM_002577.4
UniProt Accession #	Q13177; Q13154; Q6ISC3
Molecular Weight	58,043 Da
NCBI Official Full Name	serine/threonine-protein kinase PAK 2
NCBI Official Synonym Full Names	p21 protein (Cdc42/Rac)-activated kinase 2
NCBI Official Symbol	PAK2
NCBI Official Synonym Symbols	PAK65; PAKgamma
NCBI Protein Information	serine/threonine-protein kinase PAK 2; p58; PAK-2; gamma-PAK; S6/H4 kinase; p21-activated kinase 2; p21 (CDKN1A)-activated kinase 2
UniProt Protein Name	Serine/threonine-protein kinase PAK 2
UniProt Gene Name	PAK2
UniProt Synonym Gene Names	PAK-2; p27; p34
UniProt Entry Name	PAK2_HUMAN

For Research Use Only. Not for use in diagnostic or therapeutic procedures. Small volumes of product may become entrapped in the seal of the vial during shipment and storage; if necessary, briefly centrifuge the vial on a tabletop centrifuge to dislodge any liquid in the cap.