

# **Anti-PAK6 Antibody**

Catalog # ABO11038

## **Specification**

# **Anti-PAK6 Antibody - Product Information**

Application WB, IHC-P
Primary Accession Q9NOU5
Host Rabbit

Reactivity Human, Mouse, Rat

Clonality Polyclonal Format Lyophilized

**Description** 

Rabbit IgG polyclonal antibody for Serine/threonine-protein kinase PAK 6(PAK6) detection. Tested with WB, IHC-P in Human;Rat;Mouse.

### Reconstitution

Add 0.2ml of distilled water will yield a concentration of 500ug/ml.

# **Anti-PAK6 Antibody - Additional Information**

Gene ID 106821730;56924

#### **Other Names**

Serine/threonine-protein kinase PAK 6, 2.7.11.1, PAK-5, p21-activated kinase 6, PAK-6, PAK6, PAK5

#### **Calculated MW**

74869 MW KDa

#### **Application Details**

Immunohistochemistry(Paraffin-embedded Section), 0.5-1  $\mu$ g/ml, Rat, Human, Mouse, By Heat<br/>br>Western blot, 0.1-0.5  $\mu$ g/ml, Human, Rat, Mouse<br/>cbr>

## **Subcellular Localization**

Cytoplasm. Nucleus. Cotranslocates into nucleus with AR in response to androgen induction.

# **Tissue Specificity**

Selectively expressed in brain and testis, with lower levels in multiple tissues including prostate and breast. .

#### **Protein Name**

Serine/threonine-protein kinase PAK 6

## **Contents**

Each vial contains 5mg BSA, 0.9mg NaCl, 0.2mg Na2HPO4, 0.05mg Thimerosal, 0.05mg NaN3.

#### **Immunogen**

A synthetic peptide corresponding to a sequence at the N-terminus of human PAK6(16-32aa QNFQHRVHTSFDPKEGK), identical to the related rat and mouse sequences.



**Purification** 

Immunogen affinity purified.

**Cross Reactivity** 

No cross reactivity with other proteins

Storage

At -20°C for one year. After r°Constitution, at 4°C for one month. It°Can also be aliquotted and stored frozen at -20°C for a longer time. Avoid repeated freezing and thawing.

## **Sequence Similarities**

Belongs to the protein kinase superfamily. STE Ser/Thr protein kinase family. STE20 subfamily.

# **Anti-PAK6 Antibody - Protein Information**

Name PAK6

Synonyms PAK5

#### **Function**

Serine/threonine protein kinase that plays a role in the regulation of gene transcription. The kinase activity is induced by various effectors including AR or MAP2K6/MAPKK6. Phosphorylates the DNA-binding domain of androgen receptor/AR and thereby inhibits AR- mediated transcription. Also inhibits ESR1-mediated transcription. May play a role in cytoskeleton regulation by interacting with IQGAP1. May protect cells from apoptosis through phosphorylation of BAD.

## **Cellular Location**

Cytoplasm. Nucleus. Note=Cotranslocates into nucleus with AR in response to androgen induction

## **Tissue Location**

Selectively expressed in brain and testis, with lower levels in multiple tissues including prostate and breast

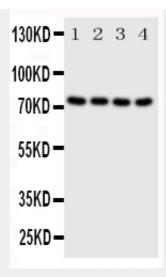
## **Anti-PAK6 Antibody - Protocols**

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

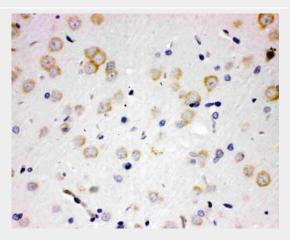
- Western Blot
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- Cell Culture

# Anti-PAK6 Antibody - Images





Anti-PAK6 antibody, ABO11038, Western blottingAll lanes: Anti PAK6 (ABO11038) at 0.5ug/mlLane 1: HELA Whole Cell Lysate at 40ugLane 2: 293T Whole Cell Lysate at 40ugLane 3: RAJI Whole Cell Lysate at 40ugLane 4: COLO320 Whole Cell Lysate at 40ugPredicted bind size: 75KDObserved bind size: 75KD



Anti-PAK6 antibody, ABO11038, IHC(P)IHC(P): Rat Brain Tissue

### Anti-PAK6 Antibody - Background

Serine/threonine-protein kinase PAK 6(p21 Protein-activated Kinase 6) is an enzyme that in humans is encoded by the PAK6 gene. The PAK6 gene is mapped to chromosome 15q15. based on an alignment of the PAK6 sequence with the genomic sequence. This gene encodes a protein that shares a high degree of sequence similarity with p21-activated kinase(PAK) family members. The proteins of this family are Rac/Cdc42-associated Ste20-like Ser/Thr protein kinases, characterized by a highly conserved amino-terminal Cdc42/Rac interactive binding(CRIB) domain and a carboxyl-terminal kinase domain. PAK kinases are implicated in the regulation of a number of cellular processes, including cytoskeleton rearrangement, apoptosis and the MAP kinase signaling pathway. The protein encoded by this gene was found to interact with androgen receptor(AR), which is a steroid hormone-dependent transcription factor that is important for male sexual differentiation and development. The p21-activated protein kinase 6 gene was found to be highly expressed in testis and prostate tissues and the encoded protein was shown to cotranslocate into the nucleus with AR in response to androgen.