

### Anti-PBK/SPK antibody [31/PBK] ab280209

KO 評価済

リコンビナント

1 References [画像数 8](#)

#### 製品の概要

製品名	Anti-PBK/SPK antibody [31/PBK]
製品の詳細	Mouse monoclonal [31/PBK] to PBK/SPK
由来種	Mouse
アプリケーション	<b>適用あり:</b> Flow Cyt (Intra), WB, IHC-P <b>適用なし:</b> ICC/IF
種交差性	<b>交差種:</b> Mouse, Rat, Human
免疫原	Recombinant fragment. This information is proprietary to Abcam and/or its suppliers.
ポジティブ・コントロール	WB: Wild-type HEK-293T whole cell lysate. HeLa, HepG2, RAW264.7, C6, PC-12 and U-87 MG whole cell lysate. Human, rat and mouse testis tissue lysate. IHC-P: Human tonsil tissue. Mouse and rat testis tissue. Flow Cyt (intra) (intra): HEK-239T cells.
特記事項	<p>This antibody clone is manufactured by Abcam. If you require a custom buffer formulation or conjugation for your experiments, please contact <a href="mailto:orders@abcam.com">orders@abcam.com</a>.</p> <p>This product is a recombinant monoclonal antibody, which offers several advantages including:</p> <ul style="list-style-type: none"><li>- High batch-to-batch consistency and reproducibility</li><li>- Improved sensitivity and specificity</li><li>- Long-term security of supply</li><li>- Animal-free production</li></ul> <p>For more information <a href="#">see here</a>.</p>

#### 製品の特性

製品の状態	Liquid
保存方法	Shipped at 4°C. Store at +4°C short term (1-2 weeks). Upon delivery aliquot. Store at -20°C long term. Avoid freeze / thaw cycle.
バッファー	Preservative: 0.01% Sodium azide Constituents: 40% Glycerol (glycerin, glycerine), 0.05% BSA, 59% PBS
精製度	Protein A purified
ポリ/モノ	モノクローナル
クローン名	31/PBK

## アプリケーション

The Abpromise guarantee **Abpromise保証は、次のテスト済みアプリケーションにおけるab280209の使用に適用されます**  
 アプリケーションノートには、推奨の開始希釈率がありますが、適切な希釈率につきましてはご検討ください。

アプリケーション	Abreviews	特記事項
Flow Cyt (Intra)		1/1000.
WB		1/1000. Predicted molecular weight: 36 kDa.
IHC-P		1/500. Perform heat mediated antigen retrieval with citrate buffer pH 6 before commencing with IHC staining protocol.

## 追加情報

Is unsuitable for ICC/IF.

## ターゲット情報

## 機能

Phosphorylates MAP kinase p38. Seems to be active only in mitosis. May also play a role in the activation of lymphoid cells. When phosphorylated, forms a complex with TP53, leading to TP53 destabilization and attenuation of G2/M checkpoint during doxorubicin-induced DNA damage.

## 組織特異性

Expressed in the testis and placenta. In the testis, restrictedly expressed in outer cell layer of seminiferous tubules.

## 配列類似性

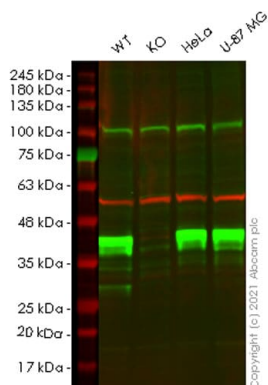
Belongs to the protein kinase superfamily. Ser/Thr protein kinase family. MAP kinase kinase subfamily.

Contains 1 protein kinase domain.

## 翻訳後修飾

Phosphorylated; in a cell-cycle dependent manner at mitosis.

## 画像



Western blot - Anti-PBK/SPK antibody [31/PBK] (ab280209)

**All lanes** : Anti-PBK/SPK antibody [31/PBK] (ab280209) at 1/1000 dilution

**Lane 1** : Wild-type HEK-293T (human embryonic kidney epithelial cell), whole cell lysate

**Lane 2** : PBK knockout HEK-293T (human embryonic kidney epithelial cell), whole cell lysate

**Lane 3** : HeLa (human epithelial cell line from cervix adenocarcinoma), whole cell lysate

**Lane 4** : U-87 MG (human glioblastoma-astrocytoma epithelial cell), whole cell lysate

Lysates/proteins at 20 µg per lane.

### Secondary

**All lanes** : Goat Anti-Mouse IgG H&L (IRDye® 800CW) ([ab216772](#)) and Goat Anti-Rabbit IgG H&L (IRDye® 680RD) ([ab216777](#)) at 1/10000 dilution

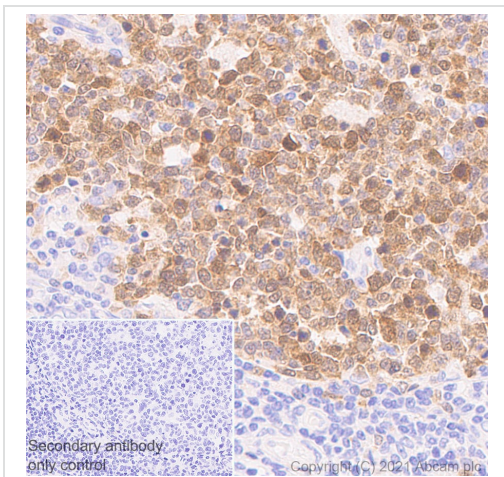
**Predicted band size:** 36 kDa

Lanes 1 - 4: Merged signal (red and green). Green - ab280209 observed at 36 kDa. Red - loading control [ab52901](#) (Rabbit monoclonal [EP1331Y] to beta Tubulin) observed at 52 kDa.

Lanes 1-2: ab280209 Anti-PBK antibody was shown to react with in HEK-293T cells in Western blot. Loss of signal was observed when PBK knockout sample was used. Wild-type and PBK knockout samples were subjected to SDS-PAGE.

ab280209 and Anti-beta Tubulin antibody [EP1331Y] ([ab52901](#)) were incubated at 4° overnight at 1 in 1000 dilution and 1 in 20000 dilution respectively. Blots were developed with Goat anti-Rabbit IgG H&L (IRDye® 680CW) ([ab216777](#)) and Goat anti-Mouse IgG H&L (IRDye® 800RD) ([ab216772](#)) secondary antibodies at 1 in 10000 dilution for 1 hour at room temperature before imaging.

Blocking/Dilution buffer: Intercept® (TBS) Blocking Buffer diluted with an equal volume of 0.1% TBS.



Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) - Anti-PBK/SPK antibody [31/PBK] (ab280209)

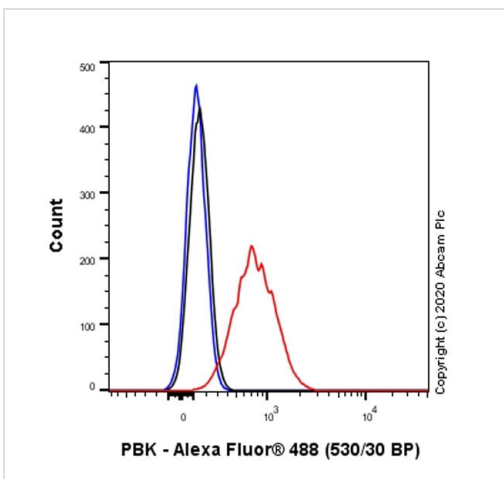
Immunohistochemical analysis of paraffin-embedded human tonsil tissue labeling PBK/PSK with ab280209 at 1/500 (1.946 µg/ml) dilution followed by ready to use LeicaDS9800 (Bond® Polymer Refine Detection).

Positive staining in germinal center of human tonsil.

The section was incubated with ab280209 for 30 mins at room temperature. The immunostaining was performed on a Leica Biosystems BOND® RX instrument. Counterstained with Hematoxylin.

Secondary antibody only control: Secondary antibody is ready to use LeicaDS9800 (Bond® Polymer Refine Detection).

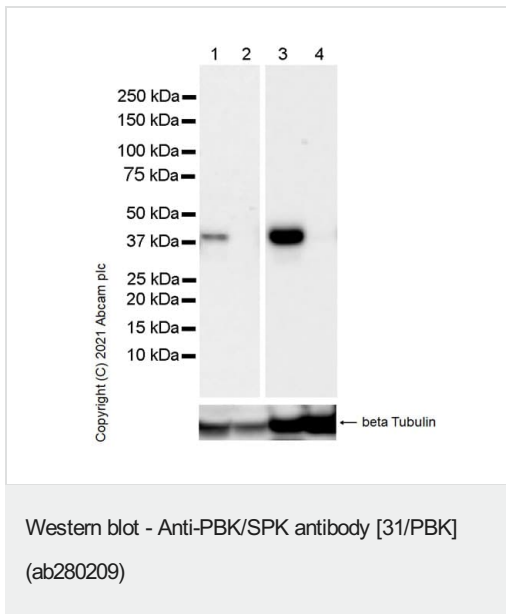
Heat mediated antigen retrieval with Citrate buffer (pH 6.0, epitope retrieval solution 1) for 20 mins.



Flow Cytometry (Intracellular) - Anti-PBK/SPK antibody [31/PBK] (ab280209)

Flow cytometric analysis of 4% paraformaldehyde fixed 90% methanol permeabilized HeLa (Human cervix adenocarcinoma epithelial cell) cells labelling PBK/SPK with ab280209 at 1/1000 dilution (0.1 µg) (red) compared with a mouse monoclonal IgG isotype control (black) and an unlabelled control (cells without incubation with primary antibody and secondary antibody) (Blue).

A Goat anti mouse IgG (Alexa Fluor® 488, [ab150113](#)) at 1/2000 dilution was used as the secondary antibody.



**All lanes** : Anti-PBK/SPK antibody [31/PBK] (ab280209) at 1/1000 dilution

**Lane 1** : Human testis tissue lysate

**Lane 2** : Human heart tissue lysate

**Lane 3** : Mouse testis tissue lysate

**Lane 4** : Mouse brain tissue lysate

Lysates/proteins at 20 µg per lane.

### Secondary

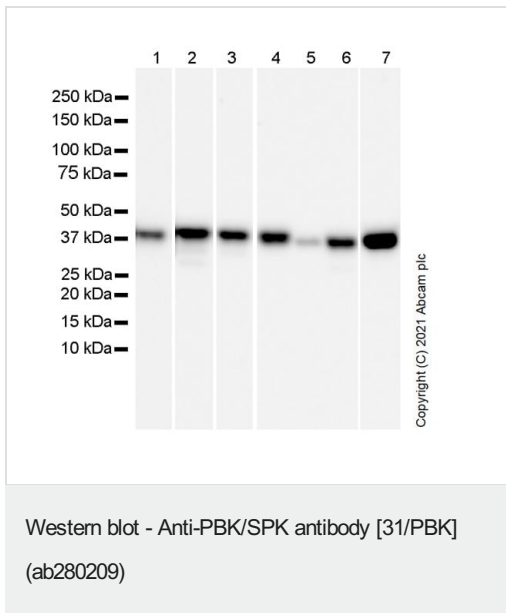
**All lanes** : Peroxidase-Conjugated Goat anti-Mouse IgG (H+L) at 1/10000 dilution

**Predicted band size:** 36 kDa

**Negative control:** Human heart, mouse brain (PMID: 27898655).

The expression profile/ molecular weight observed is consistent with what has been described in the literature (PMID:23547718).

Blocking/Dilution buffer: 5% NFDm/TBST.



**All lanes** : Anti-PBK/SPK antibody [31/PBK] (ab280209) at 1/1000 dilution

**Lane 1** : HepG2 (human hepatocellular carcinoma epithelial cell), whole cell lysate

**Lane 2** : HeLa (human epithelial cell line from cervix adenocarcinoma), whole cell lysate

**Lane 3** : U-87 MG (human glioblastoma-astrocytoma epithelial cell), whole cell lysate

**Lane 4** : RAW264.7 (mouse Abelson murine leukemia virus-induced tumor macrophage), whole cell lysate

**Lane 5** : C6 (rat glial tumor glial cell), whole cell lysate

**Lane 6** : PC-12 (rat adrenal gland pheochromocytoma), whole cell lysate

**Lane 7** : Rat testis tissue lysate

Lysates/proteins at 20 µg per lane.

### Secondary

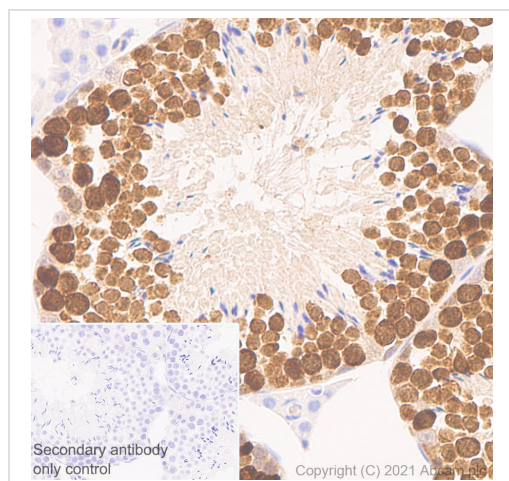
**All lanes** : Peroxidase-Conjugated Goat anti-Mouse IgG (H+L) at 1/10000 dilution

**Predicted band size:** 36 kDa

The expression profile/ molecular weight observed is consistent with what has been described in the literature (PMID:23547718).

Exposure time: lane 1: 37 secs; lane 2-7: 15 secs.

Blocking/Dilution buffer: 5% NFDm/TBST.



Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) - Anti-PBK/SPK antibody [31/PBK] (ab280209)

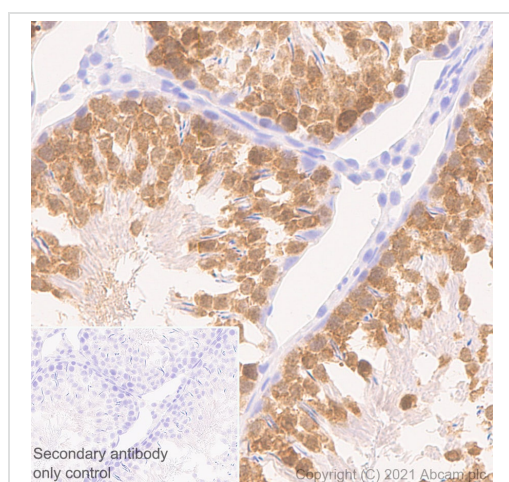
Immunohistochemical analysis of paraffin-embedded mouse testis tissue labeling PBK/PSK with ab280209 at 1/500 (1.946 µg/ml) dilution followed by ready to use LeicaDS9800 (Bond® Polymer Refine Detection).

Positive staining in mouse testis.

The section was incubated with ab280209 for 30 mins at room temperature. The immunostaining was performed on a Leica Biosystems BOND® RX instrument. Counterstained with Hematoxylin.

Secondary antibody only control: Secondary antibody is ready to use LeicaDS9800 (Bond® Polymer Refine Detection).

Heat mediated antigen retrieval with Citrate buffer (pH 6.0, epitope retrieval solution 1) for 20 mins.



Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) - Anti-PBK/SPK antibody [31/PBK] (ab280209)

Immunohistochemical analysis of paraffin-embedded rat testis tissue labeling PBK/PSK with ab280209 at 1/500 (1.946 µg/ml) dilution followed by ready to use LeicaDS9800 (Bond® Polymer Refine Detection).

Positive staining in rat testis.

The section was incubated with ab280209 for 30 mins at room temperature. The immunostaining was performed on a Leica Biosystems BOND® RX instrument. Counterstained with Hematoxylin.

Secondary antibody only control: Secondary antibody is ready to use LeicaDS9800 (Bond® Polymer Refine Detection).

Heat mediated antigen retrieval with Citrate buffer (pH 6.0, epitope retrieval solution 1) for 20 mins.

## Why choose a recombinant antibody?



**Research with confidence**  
Consistent and reproducible results



**Long-term and scalable supply**  
Recombinant technology



**Success from the first experiment**  
Confirmed specificity



**Ethical standards compliant**  
Animal-free production

Anti-PBK/SPK antibody [31/PBK] (ab280209)

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