# abcam

## **Product datasheet**

## Anti-elF2A antibody [EPR11042] ab169528

КО 評価済 มาวงราง RabMAb

★★★★★ 5 Abreviews 27 References 画像数 13

### 製品の概要

製品名	Anti-elF2A antibody [EPR11042]
製品の詳細	Rabbit monoclonal [EPR11042] to elF2A
由来種	Rabbit
アプリケーション	適用あり: WB, IHC-P, ICC/IF 適用なし: Flow Cyt or IP
種交差性	交差種: Mouse, Rat, Human
免疫原	Synthetic peptide corresponding to Human elF2A aa 450-550.
ポジティブ・コントロール	WB: Molt4, Ramos, HAP1, PC-12, and NIH/3T3 lysates. IHC-P: Human pancreas, Human prostatic hyperplasia, Human lung cancer, Mouse cerebrum, and Rat cerebrum tissues. ICC/IF: HeLa cells, MCF7 cells.
特記事項	<ul> <li>This product is a recombinant monoclonal antibody, which offers several advantages including:</li> <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> <li>For more information <u>see here</u>.</li> <li>Our RabMAb<sup>®</sup> technology is a patented hybridoma-based technology for making rabbit monoclonal antibodies. For details on our patents, please refer to <u>RabMAb<sup>®</sup> patents</u>.</li> </ul>

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: 59% PBS, 40% Glycerol, 0.05% BSA
精製度	Protein A purified
ポリ/モノ	モノクローナル
クローン名	EPR11042

## 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ab169528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。

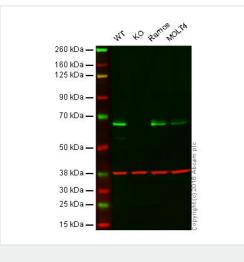
アプリケーション	Abreviews	特記事項
WB	<b>★ ★ ★ ★ ★ (3)</b>	1/1000 - 1/5000. Detects a band of approximately 65 kDa (predicted molecular weight: 65 kDa).
IHC-P	★ ★ ★ ★ ★ <u>(1)</u>	1/50 - 1/100. Perform heat mediated antigen retrieval.
ICC/IF		1/100.

### 追加情報

Is unsuitable for Flow Cyt or IP.

ターゲット情報	
機能	Functions in the early steps of protein synthesis of a small number of specific mRNAs. Acts by directing the binding of methionyl-tRNAi to 40S ribosomal subunits. In contrast to the eIF-2 complex, it binds methionyl-tRNAi to 40 S subunits in a codon-dependent manner, whereas the eIF-2 complex binds methionyl-tRNAi to 40 S subunits in a GTP-dependent manner. May act by impiging the expression of specific proteins.
組織特異性	Widely expressed. Expressed at higher level in pancreas, heart, brain and placenta.
配列類似性	Belongs to the WD repeat EIF2A family. Contains 3 WD repeats.

画像



Western blot - Anti-elF2A antibody [EPR11042] (ab169528) Lane 1: Wild-type HAP1 cell lysate (20 µg)

Lane 2: eIF2A knockout HAP1 cell lysate (20 µg)

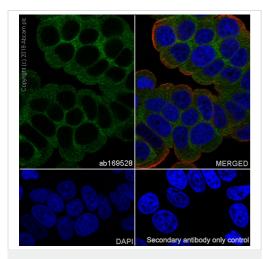
Lane 3: Ramos cell lysate (20 µg)

Lane 4: MOLT4 cell lysate (20 µg)

Lanes 1 - 4: Merged signal (red and green). Green - ab169528 observed at 65 kDa. Red - loading control, <u>ab8245</u>, observed at 37 kDa.

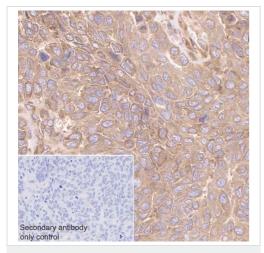
ab169528 was shown to specifically react with eIF2A when eIF2A knockout samples were used. Wild-type and eIF2A knockout samples were subjected to SDS-PAGE. ab169528 and **ab8245** (loading control to GAPDH) were diluted at 1/1000 and 1/10 000 respectively and incubated overnight at 4°C. Blots were developed with Goat anti-Rabbit IgG H&L (IRDye<sup>®</sup> 800CW) preadsorbed (**ab216773**) and Goat anti-Mouse IgG H&L (IRDye<sup>®</sup> 680RD)

preadsorbed (**ab216776**) secondary antibodies at 1/10 000 dilution for 1 h at room temperature before imaging.



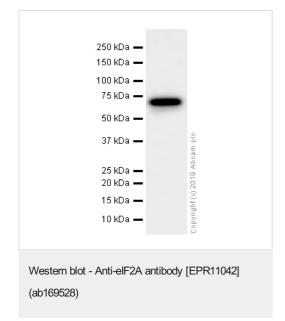
Immunocytochemistry/ Immunofluorescence - AntielF2A antibody [EPR11042] (ab169528)

Immunocytochemistry/ Immunofluorescence analysis of MCF7 (Human breast adenocarcinoma epithelial cell) cells labeling eIF2A with Purified ab169528 at 1:100 dilution (4.3  $\mu$ g/ml). Cells were fixed in 4% Paraformaldehyde and permeabilized with 0.1% tritonX-100. Cells were counterstained with Ab195889 Anti-alpha Tubulin antibody [DM1A] - Microtubule Marker (Alexa Fluor® 594) 1:200 (2.5  $\mu$ g/ml). Goat anti rabbit IgG (Alexa Fluor® 488, **ab150077**) was used as the secondary antibody at 1:1000 (2  $\mu$ g/ml) dilution. DAPI (blue) was used as nuclear counterstain. PBS instead of the primary antibody was used as the secondary antibody only control.



Immunohistochemistry (Formalin/PFA-fixed paraffinembedded sections) - Anti-eIF2A antibody [EPR11042] (ab169528)

Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) analysis of Human lung cancer tissue sections labeling eIF2A with ab169528 at 1/200 dilution (12.52 µg/ml). Heat mediated antigen retrieval was performed. ImmunoHistoProbe one step HRP Polymer (ready to use) was used as the secondary antibody. Negative control: PBS instead of the primary antibody. Hematoxylin was used as a counterstain.

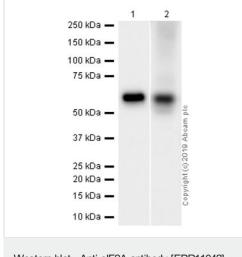


Anti-eIF2A antibody [EPR11042] (ab169528) at 1/1000 dilution (Purified) + NIH/3T3 (Mouse embryonic fibroblast) whole cell lysates at 15 µg

## Secondary

Goat Anti-Rabbit IgG H&L (HRP) (ab97051) at 1/20000 dilution

Predicted band size: 65 kDa Observed band size: 65 kDa



Western blot - Anti-elF2A antibody [EPR11042] (ab169528) **All lanes :** Anti-elF2A antibody [EPR11042] (ab169528) at 1/1000 dilution (Purified)

Lane 1 : Ramos (Human Burkitt's lymphoma Blymphocyte) whole cell lysates

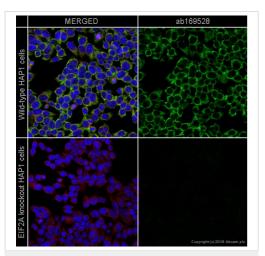
Lane 2 : PC-12 (Rat adrenal gland pheochromocytoma) whole cell lysates

Lysates/proteins at 20 µg per lane.

## Secondary

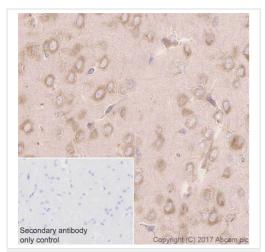
All lanes : Goat Anti-Rabbit lgG H&L (HRP) (<u>ab97051</u>) at 1/20000 dilution

Predicted band size: 65 kDa Observed band size: 65 kDa



Immunocytochemistry/ Immunofluorescence - AntielF2A antibody [EPR11042] (ab169528)

ab169528 staining eIF2A in wild-type HAP1 cells (top panel) and EIF2A knockout HAP1 cells (bottom panel). The cells were fixed with 100% methanol for 5 minutes, permeabilized with 0.1% Triton X-100 for 5 minutes and then blocked with 1% BSA/10% normal goat serum/0.3M glycine in 0.1% PBS-Tween for 1 hour. The cells were then incubated with ab169528 at 1µg/ml and <u>ab195889</u> at 1/250 dilution (shown in pseudo colour red) overnight at +4°C, followed by a further incubation at room temperature for 1 hour with <u>Goat Anti-Rabbit IgG H&L (Alexa</u> <u>Fluor® 488) preadsorbed (ab150081) secondary antibody</u> at 2 µg/ml (shown in green). Nuclear DNA was labelled in blue with DAPI.

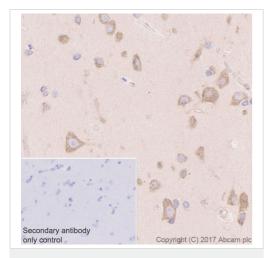


Immunohistochemistry (Formalin/PFA-fixed paraffinembedded sections) - Anti-eIF2A antibody [EPR11042] (ab169528) Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) analysis of Rat cerebrum tissue sections labeling eIF2A with ab169528 at 1/200 dilution (12.52 µg/ml). Heat mediated antigen retrieval was performed. ImmunoHistoProbe one step HRP Polymer (ready to use) was used as the secondary antibody. Negative control: PBS instead of the primary antibody. Hematoxylin was used as a counterstain.

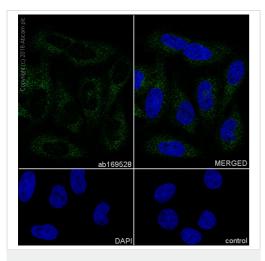


Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) analysis of Mouse cerebrum tissue sections labeling eIF2A with ab169528 at 1/200 dilution (12.52 µg/ml). Heat mediated antigen retrieval was performed. ImmunoHistoProbe one step HRP Polymer (ready to use) was used as the secondary antibody. Negative control: PBS instead of the primary antibody. Hematoxylin was used as a counterstain.

Immunohistochemistry (Formalin/PFA-fixed paraffinembedded sections) - Anti-eIF2A antibody [EPR11042] (ab169528)

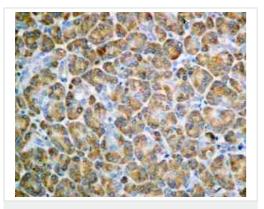


Immunohistochemistry (Formalin/PFA-fixed paraffinembedded sections) - Anti-eIF2A antibody [EPR11042] (ab169528) Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) analysis of Human cerebrum tissue sections labeling eIF2A with ab169528 at 1/200 dilution (12.52 µg/ml). Heat mediated antigen retrieval was performed. ImmunoHistoProbe one step HRP Polymer (ready to use) was used as the secondary antibody. Negative control: PBS instead of the primary antibody. Hematoxylin was used as a counterstain.

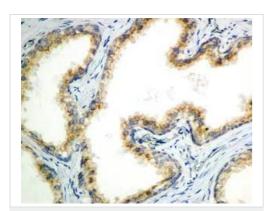


Immunocytochemistry/Immunofluorescence analysis of HeLa (Human epithelial cell line from cervix adenocarcinoma) labeling eIF2A with purified ab169528 at 1/250 dilution. Cells were fixed with 4% PFA and permeabilized with 0.1% tritonX-100. **ab150077** Goat anti rabbit IgG (Alexa Fluor<sup>®</sup>488) at 1/1000 was used as the secondary antibody. Nuclei were counterstained with DAPI. PBS was used instead of the primary antibody as the negative control.

Immunocytochemistry/ Immunofluorescence - AntielF2A antibody [EPR11042] (ab169528)



Immunohistochemistry (Formalin/PFA-fixed paraffinembedded sections) - Anti-elF2A antibody [EPR11042] (ab169528) Immunohistochemical analysis of paraffin embedded Human pancreas tissue labeling eIF2A with unpurified ab169528 antibody at 1/50.



Immunohistochemistry (Formalin/PFA-fixed paraffinembedded sections) - Anti-elF2A antibody [EPR11042] (ab169528) Immunohistochemical analysis of paraffin embedded Human prostatic hyperplasia tissue labeling eIF2A with unpurified ab169528 antibody at 1/50.



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