

# **Product datasheet**

# Anti-VAMP2 antibody [EPR12790] ab181869

Recombinant RabMAb

\*\*\*\*\* 1 Abreviews 13 References 13 Images

#### Overview

Product name	Anti-VAMP2 antibody [EPR12790]	
Description	Rabbit monoclonal [EPR12790] to VAMP2	
Host species	Rabbit	
Tested applications	Suitable for: Flow Cyt (Intra), WB, ICC/IF, IP	
Species reactivity	Reacts with: Mouse, Rat, Human	
Immunogen	Synthetic peptide. This information is proprietary to Abcam and/or its suppliers.	
Positive control	WB: Human fetal brain and Human cerebellum lysates ICC/IF: SH-SY5Y cells. Flow Cyt (intra): Jurkat cells.	
General notes	<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>	

Properties	
Form	Liquid
Storage instructions	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.
Storage buffer	Preservative: 0.01% Sodium azide Constituents: 40% Glycerol, 0.05% BSA, 59% PBS
Purity	Protein A purified
Clonality	Monoclonal
Clone number	EPR12790
lsotype	lgG

### Applications

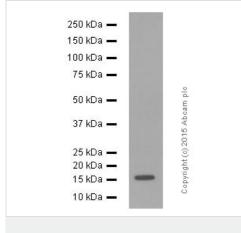
The Abpromise guarantee Our <u>Abpromise guarantee</u> covers the use of ab181869 in the following tested applications.

The application notes include recommended starting dilutions; optimal dilutions/concentrations should be determined by the end user.

Application	Abreviews	Notes
Flow Cyt (Intra)		1/100. For unpurified use at 1/150. <u><b>ab172730</b></u> - Rabbit monoclonal IgG, is suitable for use as an isotype control with this antibody.
WB	* * * * * <u>(1)</u>	1/10000 - 1/50000. Detects a band of approximately 18 kDa (predicted molecular weight: 13 kDa).
ICC/IF		1/250. For unpurified use at 1/500.
IP		1/150. For unpurified use at 1/70.

Target	
Function	Involved in the targeting and/or fusion of transport vesicles to their target membrane.
Tissue specificity	Nervous system and skeletal muscle.
Sequence similarities	Belongs to the synaptobrevin family. Contains 1 v-SNARE coiled-coil homology domain.
Cellular localization	Cytoplasmic vesicle > secretory vesicle > synaptic vesicle membrane. Cell junction > synapse > synaptosome. Neuronal synaptic vesicles.





Anti-VAMP2 antibody [EPR12790] (ab181869) at 1/10000 dilution (purified) + Rat heart lysate at 10  $\mu g$ 

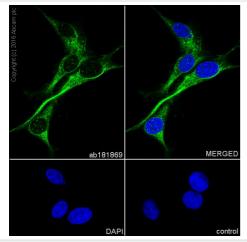
# Secondary

Anti-Rabbit IgG (HRP), specific to the non-reduced form of IgG at 1/1000 dilution

### Predicted band size: 13 kDa

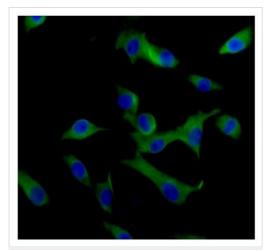
Western blot - Anti-VAMP2 antibody [EPR12790] (ab181869)

Blocking buffer and concentration: 5% NFDM/TBST. Diluting buffer and concentration: 5% NFDM /TBST.



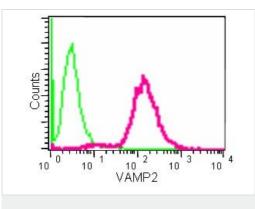
Immunocytochemistry/ Immunofluorescence - Anti-VAMP2 antibody [EPR12790] (ab181869) ab181869 staining VAMP2 in U87-MG (human glioblastoma) cells by ICC/IF (Immunocytochemistry/immunofluorescence). Cells were fixed with 100% methanol. Samples were incubated with primary antibody at a dilution of 1/500. A goat anti rabbit IgG (Alexa Fluor® 488) (**ab150077**) was used as the secondary antibody at a dilution of 1/1000. DAPI was used as a nuclear counterstain.

Negative control 1:PBS only.

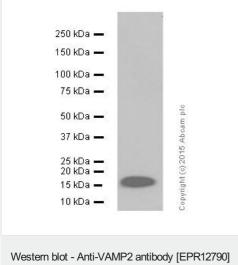


Immunofluorescent analysis of U87-MG cells (4% paraformaldehyde-fixed) labeling VAMP2 with ab181869 at 1/500 dilution followed by Goat anti rabbit IgG (Alexa Fluor®488) at 1/200 dilution and counterstained with Dapi.

Immunocytochemistry/ Immunofluorescence - Anti-VAMP2 antibody [EPR12790] (ab181869)



Flow Cytometry (Intracellular) - Anti-VAMP2 antibody [EPR12790] (ab181869) Intracellular Flow Cytometry analysis of Jurkat cells fixed with 2% paraformaldehyde labeling VAMP2 with unpurified ab181869 at 1/150 dilution followed by Goat anti rabbit IgG (FITC) at 1/150 dilution. Rabbit monoclonal IgG was used as an isotype control.



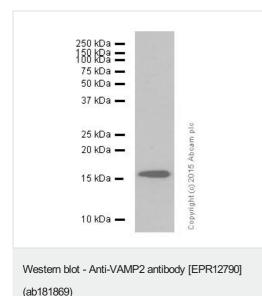
Western blot - Anti-VAMP2 antibody [EPR12790] (ab181869) Anti-VAMP2 antibody [EPR12790] (ab181869) at 1/50000 dilution (purified) + Mouse brain lysate at 10  $\mu g$ 

# Secondary

Goat Anti-Rabbit IgG H&L (HRP) (<u>ab97051</u>) at 1/100000 dilution (Goat Anti-Rabbit IgG, (H+L), Peroxidase conjugated)

Predicted band size: 13 kDa

Blocking buffer and concentration: 5% NFDM/TBST. Diluting buffer and concentration: 5% NFDM /TBST.



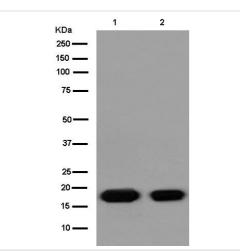
Anti-VAMP2 antibody [EPR12790] (ab181869) at 1/50000 dilution (purified) + Human cerebellum lysate at 10 µg

# Secondary

Anti-Rabbit lgG (HRP), specific to the non-reduced form of lgG at 1/10000 dilution

Predicted band size: 13 kDa

Blocking buffer and concentration: 5% NFDM/TBST. Diluting buffer and concentration: 5% NFDM /TBST.



Western blot - Anti-VAMP2 antibody [EPR12790] (ab181869)

**All lanes :** Anti-VAMP2 antibody [EPR12790] (ab181869) at 1/50000 dilution (unpurified)

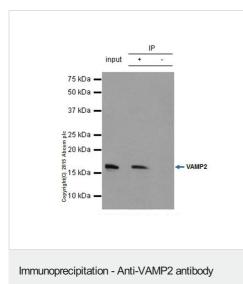
Lane 1 : Human fetal brain lysate Lane 2 : Human cerebellum lysate

Lysates/proteins at 10 µg per lane.

#### Secondary

**All lanes :** Goat Anti-Rabbit IgG, (H+L), Peroxidase conjugate at 1/1000 dilution

Predicted band size: 13 kDa



[EPR12790] (ab181869)

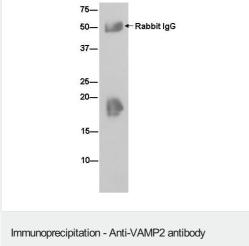
KDa

ab181869 (purified) at 1/150 immunoprecipitating VAMP2 in Human cerebellum whole cell lysate. 10 ug of cell lysate was present in the input. For western blotting, a HRP-conjugated Veriblot for IP Detection Reagent (<u>ab131366</u>) (1/1,500) was used for detection. A rabbit monoclonal IgG (<u>ab172730</u>) was used intead of <u>ab128913</u> as a negative control (Lane 3).

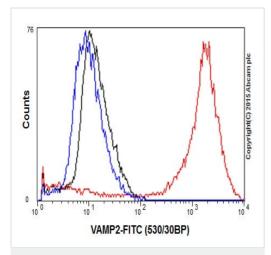
Blocking buffer and concentration: 5% NFDM/TBST. Diluting buffer and concentration: 5% NFDM /TBST.

Western blot analysis of immunoprecipitation pellet from Human cerebellum lysate immunoprecipitated using ab181869 at 1/70 dilution.

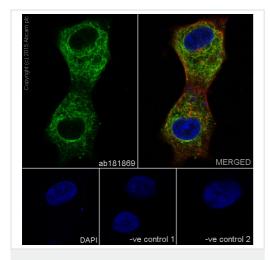
Secondary: Goat Anti-Rabbit IgG, (H+L), Peroxidase conjugate at 1/1000 dilution.



[EPR12790] (ab181869)



Flow Cytometry (Intracellular) - Anti-VAMP2 antibody [EPR12790] (ab181869) Intracellular Flow Cytometry analysis of SH-SY5Y cells labelling VAMP2 with purified ab181869 at 1/100 (red). Cells were fixed with 4% paraformaldehyde. A FITC-conjugated goat anti-rabbit lgG (1/500) was used as the secondary antibody. Black - lsotype control, rabbit monoclonal lgG. Blue - Unlabelled control, cells without incubation with primary and secondary antibodies.

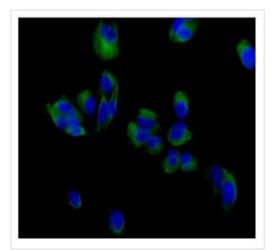


Immunocytochemistry/ Immunofluorescence - Anti-VAMP2 antibody [EPR12790] (ab181869)

Immunocytochemistry/Immunofluorescence analysis of U87-MG (human glioblastoma) cells labelling VAMP2 with purified ab181869 at 1/250. Cells were fixed with 100% methanol and permeabilized with 0.1% Triton X-100. **ab150077**, an Alexa Fluor<sup>®</sup> 488-conjugated goat anti-rabbit IgG (1/1000) was used as the secondary antibody. DAPI (blue) was used as the nuclear counterstain. **ab7291**, a mouse anti-tubulin (1/1000) and **ab150120**, an Alexa Fluor<sup>®</sup> 594-conjugated goat anti-mouse IgG (1/1000) were also used.

Control 1: primary antibody (1/100) and secondary antibody, <u>**ab150120**</u>, an Alexa Fluor<sup>®</sup> 594-conjugated goat anti-mouse lgG (1/500).

Control 2: <u>**ab7291**</u> (1/1000) and secondary antibody, <u>**ab150077**</u>, an Alexa Fluor<sup>®</sup> 488-conjugated goat anti-rabbit lgG (1/500).



Immunocytochemistry/ Immunofluorescence - Anti-VAMP2 antibody [EPR12790] (ab181869)



Anti-VAMP2 antibody [EPR12790] (ab181869)

Immunofluorescent analysis of SH-SYSY cells (human cell line) (4% paraformaldehyde-fixed) labeling VAMP2 with unpurified ab181869 at 1/500 dilution followed by Goat anti rabbit IgG (Alexa Fluor<sup>®</sup>488) at 1/200 dilution and counterstained with DAPI.

#### Our Abpromise to you: Quality guaranteed and expert technical support

- Replacement or refund for products not performing as stated on the datasheet
- Valid for 12 months from date of delivery
- Response to your inquiry within 24 hours
- We provide support in Chinese, English, French, German, Japanese and Spanish
- Extensive multi-media technical resources to help you
- · We investigate all quality concerns to ensure our products perform to the highest standards

If the product does not perform as described on this datasheet, we will offer a refund or replacement. For full details of the Abpromise, please visit <u>https://www.abcam.com/abpromise</u> or contact our technical team.

#### **Terms and conditions**

• Guarantee only valid for products bought direct from Abcam or one of our authorized distributors