

Datasheet for ABIN7560328

PPAP2B Protein (AA 1-312) (His tag)



Overview

| Quantity: | 1 mg |
|-------------------------------|---|
| Target: | PPAP2B |
| Protein Characteristics: | AA 1-312 |
| Origin: | Mouse |
| Source: | HEK-293 Cells |
| Protein Type: | Recombinant |
| Purification tag / Conjugate: | This PPAP2B protein is labelled with His tag. |

Product Details

| Purpose: | Custom-made recombinant Plpp3 Protein expressed in mammalian cells. |
|------------------|---|
| Sequence: | MQSYKYDKAI VPESKNGGSP ALNNNPRKGG SKRVLLICLD LFCLFMAALP FLIIETSTIK |
| | PYRRGFYCND ESIKYPLKVS ETINDAVLCA VGIVIAILAI ITGEFYRIYY LKEKSRSTTQ |
| | NPYVAALYKQ VGCFLFGCAI SQSFTDIAKV SIGRLRPHFL SVCDPDFSQI NCSEGYIQNY |
| | RCRGEDSKVQ EARKSFFSGH ASFSMFTMLY LVLYLQARFT WRGARLLRPL LQFTLLMMAF |
| | YTGLSRVSDY KHHPSDVLAG FAQGALVACC IVFFVSDLFK TKTSLSLPAP AIRREILSPV |
| | DIIDRNNHHN MV Sequence without tag. The proposed Purification-Tag is based on |
| | experiences with the expression system, a different complexity of the protein could make |
| | another tag necessary. In case you have a special request, please contact us. |
| Specificity: | If you are looking for a specific domain and are interested in a partial protein or a different |
| | isoform, please contact us regarding an individual offer. |
| Characteristics: | Key Benefits: |

- · Made to order protein from design to production by highly experienced protein experts.
- · Protein expressed in mammalian cells and purified in one-step affinity chromatography
- The optimized expression system ensures reliability for intracellular, secreted and transmembrane proteins.
- · State-of-the-art algorithm used for plasmid design (Gene synthesis).

This protein is a made-to-order protein and will be made for the first time for your order. Our experts in the lab try to ensure that you receive soluble protein.

If you are not interested in a full length protein, please contact us for individual protein fragments.

The big advantage of ordering our made-to-order proteins in comparison to ordering custom made proteins from other companies is that there is no financial obligation in case the protein cannot be expressed or purified.

Purity:

> 90 % as determined by Bis-Tris PAGE, anti-tag ELISA, Western Blot and analytical SEC (HPLC)

Grade:

custom-made

Target Details

| Target: | PPAP2B |
|-------------------|-------------------------|
| Alternative Name: | Plpp3 (PPAP2B Products) |

Background:

Phospholipid phosphatase 3 (EC 3.1.3.-) (EC 3.1.3.4) (Lipid phosphate phosphohydrolase 3) (PAP2-beta) (Phosphatidate phosphohydrolase type 2b) (Phosphatidic acid phosphatase 2b) (PAP-2b) (PAP2b),FUNCTION: Magnesium-independent phospholipid phosphatase of the plasma membrane that catalyzes the dephosphorylation of a variety of glycerolipid and sphingolipid phosphate esters including phosphatidate/PA, lysophosphatidate/LPA, diacylglycerol pyrophosphate/DGPP, sphingosine 1-phosphate/S1P and ceramide 1-phosphate/C1P. Also acts on N-oleoyl ethanolamine phosphate/N-(9Z-octadecenoyl)-ethanolamine phosphate, a potential physiological compound. Has both an extracellular and an intracellular phosphatase activity, allowing the hydrolysis and the cellular uptake of these bioactive lipid mediators from the milieu, regulating signal transduction in different cellular processes. Through the dephosphorylation of extracellular sphingosine-1-phosphate and the regulation of its extra- and intracellular availability, plays a role in vascular homeostasis, regulating endothelial cell migration, adhesion, survival, proliferation and the production of proinflammatory cytokines (By similarity). By maintaining the appropriate levels of this lipid in the

cerebellum, also ensure its proper development and function (PubMed:21319224). Through its intracellular lipid phosphatase activity may act in early compartments of the secretory pathway, regulating the formation of Golgi to endoplasmic reticulum retrograde transport carriers (By similarity). {ECO:0000250|UniProtKB:O14495, ECO:0000269|PubMed:21319224}., FUNCTION: Independently of this phosphatase activity may also function in the Wnt signaling pathway and the stabilization of beta-catenin/CTNNB1, thereby regulating cell proliferation, migration and differentiation in angiogenesis or yet in tumor growth (PubMed:12925589, PubMed:27125875). Also plays a role in integrin-mediated cell-cell adhesion in angiogenesis (PubMed:16099422). {ECO:0000269|PubMed:12925589, ECO:0000269|PubMed:27125875}.

Molecular Weight:

35.2 kDa

UniProt:

Q99JY8

Application Details

Application Notes:

We expect the protein to work for functional studies. As the protein has not been tested for functional studies yet we cannot offer a guarantee though.

Restrictions:

For Research Use only

Handling

| Format: | Liquid |
|------------------|--|
| Buffer: | The buffer composition is at the discretion of the manufacturer. |
| Handling Advice: | Avoid repeated freeze-thaw cycles. |
| Storage: | -80 °C |
| Storage Comment: | Store at -80°C. |
| Expiry Date: | 12 months |