

Product datasheet

Recombinant mouse PDE2A protein (Active) ab271675

[2 Images](#)

Description

Product name	Recombinant mouse PDE2A protein (Active)
Biological activity	Specific Activity: $\geq 20,000$ pmole/min/ μ g. One unit is defined as the amount of enzyme that will convert 1 pmole of 3', 5'-cAMP to 5'-AMP per min at 37°C. Assay condition: 10 mM Tris-HCl, pH 7.4, 10 mM MgCl ₂ , 0.1 mg/ml BSA, 0.05% Tween-20, 200 μ M cAMP, and serial dilutions of PDE2A at 37°C for 20 min. Quantified by 5' nucleotidase cleaving the 5'-AMP product and releasing the phosphate group which is detected by Malachite Green Reagent.
Purity	≥ 89 % SDS-PAGE. Affinity purified.
Expression system	Baculovirus infected Sf9 cells
Accession	<u>O00408</u>
Protein length	Full length protein
Animal free	No
Nature	Recombinant
Species	Mouse
Predicted molecular weight	130 kDa including tags
Amino acids	2 to 939
Tags	GST tag N-Terminus

Specifications

Our **Abpromise guarantee** covers the use of **ab271675** in the following tested applications.

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

Applications	SDS-PAGE Functional Studies
Form	Liquid

Preparation and Storage

Stability and Storage

Shipped on Dry Ice. Store at -80°C. Avoid freeze / thaw cycle.

pH: 8.00

Constituents: 0.63% Tris HCl, 0.64% Sodium chloride, 0.02% Potassium chloride, 0.04% Tween, 0.05% Glutathione, 20% Glycerol (glycerin, glycerine)

This product is an active protein and may elicit a biological response in vivo, handle with caution.

General Info

Function

Cyclic nucleotide phosphodiesterase with a dual-specificity for the second messengers cAMP and cGMP, which are key regulators of many important physiological processes.

Tissue specificity

Expressed in brain and to a lesser extent in heart, placenta, lung, skeletal muscle, kidney and pancreas.

Sequence similarities

Belongs to the cyclic nucleotide phosphodiesterase family. PDE2 subfamily.
Contains 2 GAF domains.

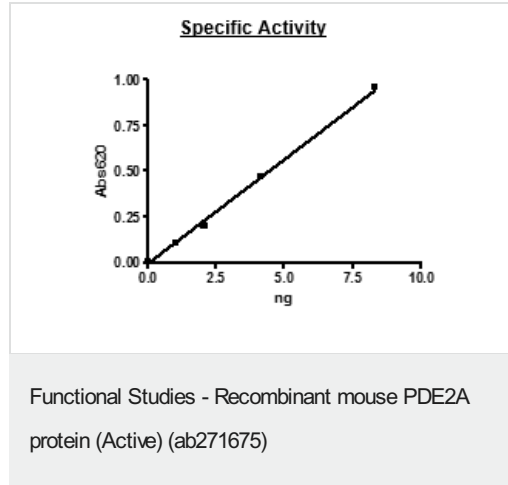
Domain

GAF 1 functions as a dimerization domain, whereas GAF 2 binds cGMP, which causes activation of the catalytic activity of the enzyme.

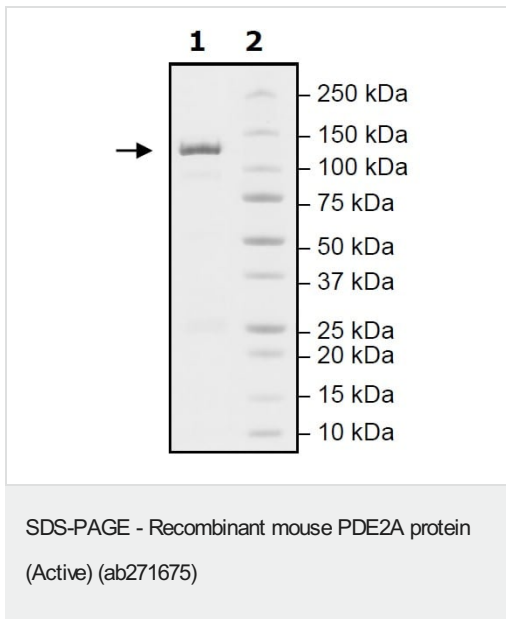
Cellular localization

Membrane.

Images



Specific activity of ab271675 was $\geq 20,000$ pmole/min/ μ g.



SDS-PAGE analysis of 1.9 µg ab271675.

Please note: All products are "FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC PROCEDURES"

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 <https://www.abcam.com/abpromise> or contact our technical team.

Terms and conditions

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