

Datasheet for ABIN5657769 **PDE5A ELISA Kit**



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Overview

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| Quantity: | 96 tests |
| Target: | PDE5A |
| Reactivity: | Human |
| Method Type: | Sandwich ELISA |
| Detection Range: | 1.56 ng/mL - 100 ng/mL |
| Minimum Detection Limit: | 1.56 ng/mL |
| Application: | ELISA |

Product Details

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| Sample Type: | Plasma, Serum, Tissue Homogenate |
| Analytical Method: | Quantitative |
| Detection Method: | Colorimetric |
| Specificity: | This assay has high sensitivity and excellent specificity for detection of Phosphodiesterase 5A, cGMP Specific (PDE5A). No significant cross-reactivity or interference between Phosphodiesterase 5A, cGMP Specific (PDE5A) and analogues was observed. |
| Sensitivity: | 0.56 ng/mL |

Target Details

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| Target: | PDE5A |
| Alternative Name: | Phosphodiesterase 5A, cGMP Specific (PDE5A Products) |

Target Details

Background: Gene Name: Phosphodiesterase 5A, cGMP Specific
Gene Aliases: CGB-PDE, cGMP-binding cGMP-specific phosphodiesterase, cGMP-specific 3',5'-cyclic phosphodiesterase

Pathways: [Regulation of G-Protein Coupled Receptor Protein Signaling](#)

Application Details

Comment: The stability of kit is determined by the loss rate of activity. The loss rate of this kit is less than 5 % within the expiration date under appropriate storage condition. To minimize extra influence on the performance, operation procedures and lab conditions, especially room temperature, air humidity, incubator temperature should be strictly controlled. It is also strongly suggested that the whole assay is performed by the same operator from the beginning to the end.

Assay Time: 3 h

Plate: Pre-coated

Protocol: The test principle applied in this kit is Sandwich enzyme immunoassay. The microtiter plate provided in this kit has been pre-coated with an antibody specific to Phosphodiesterase 5A, cGMP Specific (PDE5A). Standards or samples are then added to the appropriate microtiter plate wells with a biotin-conjugated antibody specific to Phosphodiesterase 5A, cGMP Specific (PDE5A). Next, Avidin conjugated to Horseradish Peroxidase (HRP) is added to each microplate well and incubated. After TMB substrate solution is added, only those wells that contain Phosphodiesterase 5A, cGMP Specific (PDE5A), biotin-conjugated antibody and enzyme-conjugated Avidin will exhibit a change in color. The enzyme-substrate reaction is terminated by the addition of sulphuric acid solution and the color change is measured spectrophotometrically at a wavelength of 450nm ± 10nm. The concentration of Phosphodiesterase 5A, cGMP Specific (PDE5A) in the samples is then determined by comparing the O.D. of the samples to the standard curve.

Assay Precision: Intra-assay Precision (Precision within an assay): 3 samples with low, middle and high level Phosphodiesterase 5A, cGMP Specific (PDE5A) were tested 20 times on one plate, respectively
Inter-assay Precision (Precision between assays): 3 samples with low, middle and high level Phosphodiesterase 5A, cGMP Specific (PDE5A) were tested on 3 different plates, 8 replicates in each plate. CV(%) = SD/meanX100
Intra-Assay: CV<10%
Inter-Assay: CV<12%

Restrictions: For Research Use only

Handling

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| Handling Advice: | The Stop Solution is acidic. Do not allow to contact skin or eyes. Calibrators, controls and specimen samples should be assayed in duplicate. Once the procedure has been started, all steps should be completed without interruption. |
| Storage: | 4 °C,-20 °C |
| Storage Comment: | -20°C. Bring all reagents to room temperature before beginning test. The kit may be stored at 4°C for immediate use within two days upon arrival. Reseal any unused strips with desiccant pack. Minimize freeze/thaw cycles. |
| Expiry Date: | 4-8 months |