

**Datasheet for 600-401-882-RTU****Ready-To-Use VDAC/Porin Antibody****Overview**

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|----------------------|------------------------------------------------------------------|
| <b>Description:</b>  | Ready-To-Use Anti-VDAC/Porin (RABBIT) Antibody - 600-401-882-RTU |
| <b>Item No.:</b>     | 600-401-882-RTU                                                  |
| <b>Size:</b>         | 100 µL                                                           |
| <b>Applications:</b> | WB                                                               |
| <b>Reactivity:</b>   | Human                                                            |
| <b>Host Species:</b> | Rabbit                                                           |

**Product Details**

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| <b>Background:</b>   | VDAC/Porin Antibody recognizes VDAC (also known as Voltage-dependent anion-selective channel protein 1, Outer mitochondrial membrane protein porin 1, Plasmalemmal porin, Porin 31HL) which is an outer membrane mitochondrial protein. The VDAC proteins are ~30-33 kDa (some isoforms are larger - see below). The VDAC proteins are thought to form aqueous channels, or pores, through which adenine nucleotides cross the outer mitochondrial membrane. VDACs have been implicated in the formation of the mitochondrial permeability transition pore complex in apoptotic cells. This complex, formed by VDAC, adenine nucleotide translocator (ANT), and cyclophilin D (CypD), is thought to allow the mitochondria to undergo metabolic uncoupling and irreversible morphologic changes that ultimately destroy the mitochondria during apoptosis. VDACs are highly expressed in heart, liver and skeletal muscle, where concentrations of mitochondria are at their highest. This antibody can be used as a loading control with whole cell lysates and total mitochondrial preparations. All Rockland Immunochemical's VDAC/Porin antibodies are affinity-purified to assure both high affinity and specificity. Rigorous quality control testing ensures that the finished product meets or exceeds out high standards for optimum performance in your assays. |
| <b>Synonyms:</b>     | Loading Control Antibody, VDAC-1 Antibody, POR1 Antibody                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  |
| <b>Host Species:</b> | Rabbit                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    |
| <b>Clonality:</b>    | Polyclonal                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                |
| <b>Format:</b>       | IgG                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       |

**Target Details**

|                   |       |
|-------------------|-------|
| <b>Gene Name:</b> | VDAC1 |
|-------------------|-------|

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| <b>Reactivity:</b>         | Human                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           |
| <b>Immunogen Type:</b>     | Conjugated Peptide                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              |
| <b>Immunogen:</b>          | VDAC/Porin Antibody was prepared from whole rabbit serum produced by repeated immunizations with a synthetic peptide corresponding to an internal region near amino acids 175-200 of Human VDAC1/Porin1.                                                                                                                                                                                                                                                                                                                                                                                                                        |
| <b>Purity/Specificity:</b> | RTU Anti-VDAC/Porin Antibody is directed against human VDAC1/Porin1 protein. The product was affinity purified from monospecific antiserum by immunoaffinity purification. A BLAST analysis was used to suggest that this antibody would react with VDAC1/Porin1 from a wide range of organisms, including avian, mammalian, aquatic and reptilian sources based on 100% homology for the immunogen sequence. Cross reactivity will occur with all forms of VDACs including VDAC1, VDAC2 (4 isoforms) and VDAC3 (2 isoforms). Such broad reactivity makes this antibody useful as an excellent loading control (mitochondrial). |
| <b>Relevant Links:</b>     | <ul style="list-style-type: none"> <li>• <a href="#">UniProtKB - P21796</a></li> <li>• <a href="#">NCBI - NP_003365.1</a></li> <li>• <a href="#">GenelD - 7416</a></li> </ul>                                                                                                                                                                                                                                                                                                                                                                                                                                                   |

## Application Details

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| <b>Tested Applications:</b> | WB                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           |
| <b>Application Note:</b>    | Ready to Use Anti-VDAC/Porin Antibody has been optimized and validated in western blot at 1:1000 dilution. This Anti-VDAC/Porin (RTU) Antibody is sufficient to run 10 western blots. Expect a band approximately 30-33kDa in size corresponding to VDAC/Porin by western blotting in appropriate cell lysate or extract. Although not tested, this antibody is likely functional in ELISA and Immunohistochemistry. Optimal titers for applications should be determined by the researcher. |
| <b>Assay Dilutions:</b>     | All assays should be optimized by the user. Recommended dilutions (if any) may be listed below.                                                                                                                                                                                                                                                                                                                                                                                              |
| <b>ELISA:</b>               | User Optimized                                                                                                                                                                                                                                                                                                                                                                                                                                                                               |
| <b>IHC:</b>                 | User Optimized                                                                                                                                                                                                                                                                                                                                                                                                                                                                               |
| <b>IP:</b>                  | User Optimized                                                                                                                                                                                                                                                                                                                                                                                                                                                                               |
| <b>WB:</b>                  | 1:1,000                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      |

## Formulation

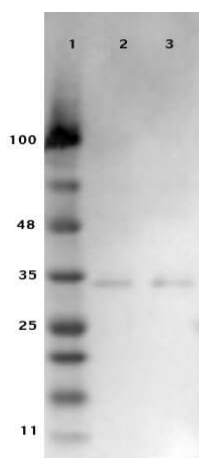
|                        |                                       |
|------------------------|---------------------------------------|
| <b>Physical State:</b> | Liquid (sterile filtered)             |
| <b>Concentration:</b>  | sufficient to run 10 immunoblot tests |

|                      |                                                            |
|----------------------|------------------------------------------------------------|
| <b>Buffer:</b>       | 0.02 M Potassium Phosphate, 0.15 M Sodium Chloride, pH 7.2 |
| <b>Preservative:</b> | 0.01% (w/v) Sodium Azide                                   |
| <b>Stabilizer:</b>   | 0.01% Bovine Serum Albumin (BSA), 25% (v/v) Glycerol       |

## Shipping & Handling

|                            |                                                                                                                                                                                                                                                                |
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| <b>Shipping Condition:</b> | Wet Ice                                                                                                                                                                                                                                                        |
| <b>Storage Condition:</b>  | Store vial at 2-8° C prior to opening. May aliquot contents and freeze at -20° C or below for extended storage. Avoid cycles of freezing and thawing. Centrifuge product if not completely clear after standing at room temperature. Dilute only prior to use. |
| <b>Expiration:</b>         | Expiration date is one (1) year from date of receipt.                                                                                                                                                                                                          |

## Images



### Western Blot

Western Blot Results of Ready to Use Rabbit Anti-VDAC/Porin Antibody. Lane 1: Opal Pre-stained Molecular Weight Ladder (p/n MB-210-0500). Lane 2: HEK293T WC Lysate (p/n W09-001-GX5). Lane 3: HeLa WC Lysate (p/n W09-000-364). Load: 10µL. Primary Antibody: Ready to Use Rabbit Anti-VDAC1/Porin Antibody 1:1000 overnight at 4°C. Secondary Antibody: Goat Anti-Rabbit HRP (p/n 611-103-122) at 1:70,000 for 30 min RT. Block: BlockOut Buffer (p/n MB-073). Expect: ~31 kDa.

## Disclaimer

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