

**Datasheet for 600-401-DK1****PCDH18 Antibody****Overview**

|                      |                                             |
|----------------------|---------------------------------------------|
| <b>Description:</b>  | Anti-PCDH18 (RABBIT) Antibody - 600-401-DK1 |
| <b>Item No.:</b>     | 600-401-DK1                                 |
| <b>Size:</b>         | 100 µg                                      |
| <b>Applications:</b> | ELISA, IF, IHC, WB                          |
| <b>Reactivity:</b>   | Human, Mouse, Rat                           |
| <b>Host Species:</b> | Rabbit                                      |

**Product Details**

|                      |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          |
|----------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <b>Background:</b>   | Protocadherins comprise the largest group within the cadherin family of calcium-dependent cell-cell adhesion molecules. Protocadherin 18 (PCDH18) was initially identified through screening of human and mouse ESTs using conserved cytoplasmic domain motifs. Tissue screening revealed PCDH18 broad expression in tissues such as brain, liver, heart, kidney, lung, and trachea. PCDH18 expression is also temporally and spatially regulated in the mouse embryonic brain and interacts with Disabled-1, an intracellular adapter protein involved in neuronal migration and cell positioning during mammalian brain development. PCDH18 was also found to be expressed in the developing zebrafish neural tube and central nervous system, lending support to the hypothesis that PCDH18 may play a role during brain development. |
| <b>Synonyms:</b>     | PCDH18 Antibody, PCDH68L, KIAA1562, Protocadherin-18                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     |
| <b>Host Species:</b> | Rabbit                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   |
| <b>Clonality:</b>    | Polyclonal                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               |
| <b>Format:</b>       | IgG                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      |

**Target Details**

|                        |                                                                                                                                                                          |
|------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <b>Gene Name:</b>      | PCDH18                                                                                                                                                                   |
| <b>Reactivity:</b>     | Human, Mouse, Rat                                                                                                                                                        |
| <b>Immunogen Type:</b> | Conjugated Peptide                                                                                                                                                       |
| <b>Immunogen:</b>      | Anti-PCDH12 antibody was prepared from whole rabbit serum produced by repeated immunizations with a 17 amino acid synthetic peptide near the N-terminus of human PCDH12. |

**Purity/Specificity:** Anti-PCDH18 Antibody was affinity purified from monospecific antiserum by immunoaffinity chromatography. At least three isoforms of PCDH18 are known to exist. This antibody is predicted to not cross-react with PCDH12.

**Relevant Links:**

- [UniProtKB - Q9HCL0](#)
- [GeneID - 54510](#)
- [NCBI - NP\\_061908](#)

## Application Details

**Tested Applications:** ELISA, IF, IHC, WB

**Application Note:** Anti-PCDH18 Antibody has been tested for use in ELISA, Western Blotting, Immunohistochemistry and Immunofluorescence. Specific conditions for reactivity should be optimized by the end user. Expect a band at approximately 126 kDa in Western Blots of specific cell lysates and tissues.

**Assay Dilutions:** All assays should be optimized by the user. Recommended dilutions (if any) may be listed below.

**ELISA:** 1:20,000

**IF:** 20 µg/mL

**IHC:** 2.5 µg/mL

**WB:** 2 µg/mL

## Formulation

**Physical State:** Liquid (sterile filtered)

**Concentration:** 1 mg/mL by UV absorbance at 280 nm

**Buffer:** 0.01 M Sodium Phosphate, 0.25 M Sodium Chloride, pH 7.2

**Preservative:** 0.02% (w/v) Sodium Azide

**Stabilizer:** None

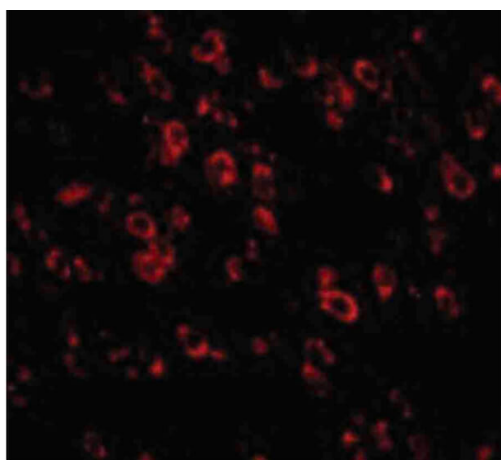
## Shipping & Handling

**Shipping Condition:** Dry Ice

**Storage Condition:** Store vial at -20° C prior to opening. 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. This product is stable for several weeks at 4° C as an undiluted liquid. Dilute only prior to immediate use.

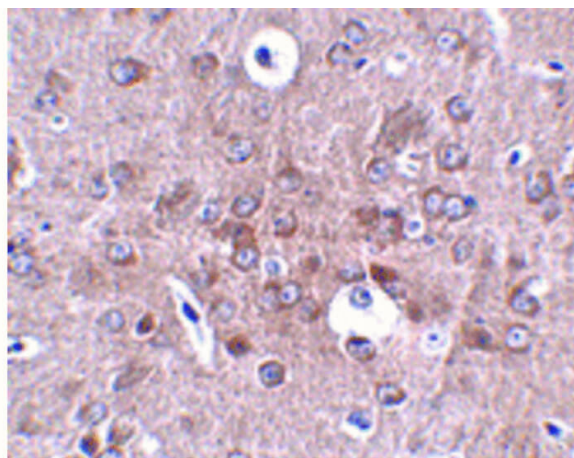
**Expiration:** Expiration date is one (1) year from date of receipt.

## Images



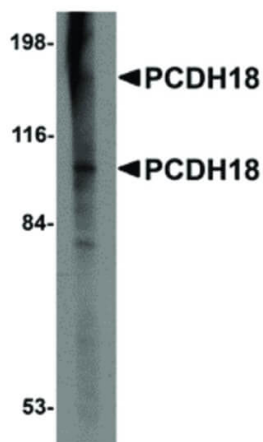
### Immunofluorescence Microscopy

Immunofluorescence Microscopy of PCDH18 antibody.  
Tissue: mouse brain cells. Fixation: 0.5% PFA. Antigen retrieval: not required. Primary antibody: PCDH18 antibody at 20 µg/mL for 1 h at RT. Secondary antibody: Fluorescein rabbit secondary antibody at 1:10,000 for 45 min at RT. Localization: PCDH18 is a single pass membrane protein. Staining: PCDH18 as red fluorescent signal.



### Immunohistochemistry

Immunohistochemistry of PCDH18 antibody. Tissue: mouse brain tissue. Fixation: formalin fixed paraffin embedded. Antigen retrieval: not required. Primary antibody: PCDH18 antibody at 2.5 µg/mL for 1 h at RT. Secondary antibody: Peroxidase rabbit secondary antibody at 1:10,000 for 45 min at RT. Localization: PCDH18 is a single pass membrane protein. Staining: PCDH18 as precipitated brown signal with hematoxylin purple nuclear counterstain.

**Western Blot**

Western Blot of PCDH18 antibody. Lane 1: Raji cell lysate with PCDH18 antibody at 2 µg/mL. Load: 35 µg per lane. Secondary antibody: Peroxidase rabbit secondary antibody at 1:10,000 for 45 min at RT. Block: 5% BLOTTO overnight at 4°C. Predicted/Observed size: 126 kDa, 110 and 190 kDa for PCDH18. Other band(s): PCDH18 splice variants and isoforms.

**Disclaimer**

This product is for research use only and is not intended for therapeutic or diagnostic applications. Please contact a technical service representative for more information. All products of animal origin manufactured by Rockland Immunochemicals are derived from starting materials of North American origin. Collection was performed in United States Department of Agriculture (USDA) inspected facilities and all materials have been inspected and certified to be free of disease and suitable for exportation. All properties listed are typical characteristics and are not specifications. All suggestions and data are offered in good faith but without guarantee as conditions and methods of use of our products are beyond our control. All claims must be made within 30 days following the date of delivery. The prospective user must determine the suitability of our materials before adopting them on a commercial scale. Suggested uses of our products are not recommendations to use our products in violation of any patent or as a license under any patent of Rockland Immunochemicals, Inc. If you require a commercial license to use this material and do not have one, then return this material, unopened to: Rockland Inc., P.O. BOX 5199, Limerick, Pennsylvania, USA.