

**Datasheet for 600-401-AN7****CRMP1 Antibody****Overview**

|                      |                                            |
|----------------------|--------------------------------------------|
| <b>Description:</b>  | Anti-CRMP1 (RABBIT) Antibody - 600-401-AN7 |
| <b>Item No.:</b>     | 600-401-AN7                                |
| <b>Size:</b>         | 100 µg                                     |
| <b>Applications:</b> | ELISA, IF, IHC, WB                         |
| <b>Reactivity:</b>   | Human, Mouse                               |
| <b>Host Species:</b> | Rabbit                                     |

**Product Details**

|                      |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            |
|----------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <b>Background:</b>   | Collapsin-response mediator proteins (CRMPs) are highly expressed in the developing brain where they play major roles in axonal outgrowth, neurite differentiation, and apoptosis. Their continued expression in areas of high synaptic remodeling such as the cerebellum, hippocampus, and the olfactory system suggests that these proteins may also be involved in adult brain plasticity. CRMP-1 was initially identified as a dihydro-pyrimidinase expressed exclusively in brain; later studies have shown that it is involved with neurotrophin (NT) 3-induced neurite formation and outgrowth. CRMP-1 localization switches from axonal to somatodendritic when neurons reach functional maturity, suggesting that it is involved in early neuronal differentiation as well as in later processes related to the survival or death of the newly generated neurons. |
| <b>Synonyms:</b>     | CRMP1 Antibody, DRP1, DRP-1, CRMP-1, DPYSL1, ULIP-3, ULIP3, Dihydropyrimidinase-related protein 1, Collapsin response mediator protein 1                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   |
| <b>Host Species:</b> | Rabbit                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     |
| <b>Clonality:</b>    | Polyclonal                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 |
| <b>Format:</b>       | IgG                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        |

**Target Details**

|                        |                    |
|------------------------|--------------------|
| <b>Gene Name:</b>      | CRMP1              |
| <b>Reactivity:</b>     | Human, Mouse       |
| <b>Immunogen Type:</b> | Conjugated Peptide |

|                            |                                                                                                                                                                                  |
|----------------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <b>Immunogen:</b>          | Anti-CRMP1 antibody was prepared from whole rabbit serum produced by repeated immunizations with a 16 amino acid synthetic peptide from near the internal region of human CRMP1. |
| <b>Purity/Specificity:</b> | Anti-CRMP1 Antibody was affinity purified from monospecific antiserum by immunoaffinity chromatography. Cross reactivity with CRMP1 from other sources has not been determined.  |
| <b>Relevant Links:</b>     | <ul style="list-style-type: none"><li>• <a href="#">UniProtKB - Q14194</a></li><li>• <a href="#">GeneID - 1400</a></li><li>• <a href="#">NCBI - AAH07613</a></li></ul>           |

## Application Details

|                             |                                                                                                                                                                                                                                                                                           |
|-----------------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <b>Tested Applications:</b> | ELISA, IF, IHC, WB                                                                                                                                                                                                                                                                        |
| <b>Application Note:</b>    | Anti-CRMP1 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 62 kDa in Western Blots of specific cell lysates and tissues. |
| <b>Assay Dilutions:</b>     | All assays should be optimized by the user. Recommended dilutions (if any) may be listed below.                                                                                                                                                                                           |
| <b>ELISA:</b>               | 1:10,000 - 1:40,000                                                                                                                                                                                                                                                                       |
| <b>IF:</b>                  | 20 µg/mL                                                                                                                                                                                                                                                                                  |
| <b>IHC:</b>                 | 10 µg/mL                                                                                                                                                                                                                                                                                  |
| <b>WB:</b>                  | 1-4 µg/mL                                                                                                                                                                                                                                                                                 |

## Formulation

|                        |                                                         |
|------------------------|---------------------------------------------------------|
| <b>Physical State:</b> | Liquid (sterile filtered)                               |
| <b>Concentration:</b>  | 1 mg/mL by UV absorbance at 280 nm                      |
| <b>Buffer:</b>         | 0.01 M Sodium Phosphate, 0.25 M Sodium Chloride, pH 7.2 |
| <b>Preservative:</b>   | 0.02% (w/v) Sodium Azide                                |
| <b>Stabilizer:</b>     | None                                                    |

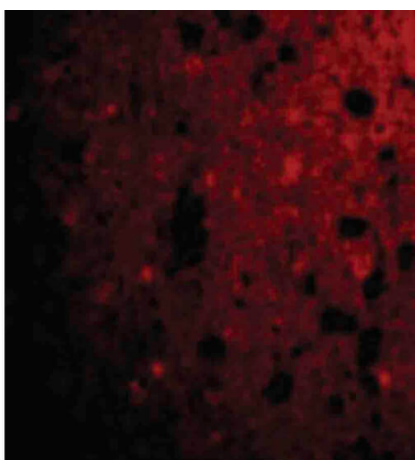
## Shipping & Handling

|                            |         |
|----------------------------|---------|
| <b>Shipping Condition:</b> | 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.

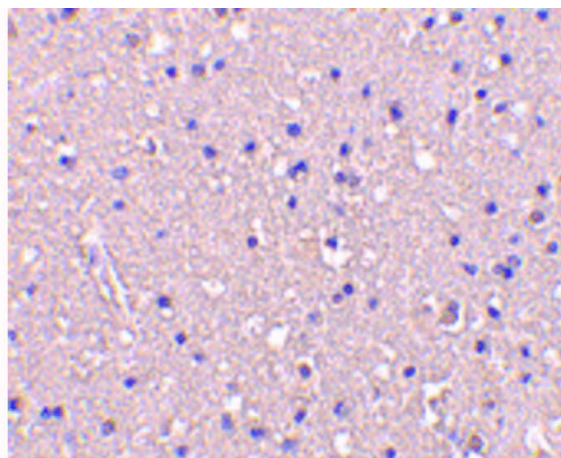
**Expiration:** Expiration date is one (1) year from date of receipt.

## Images



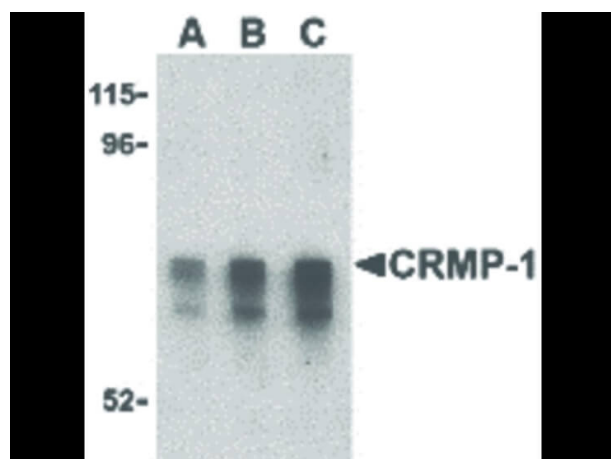
### Immunofluorescence Microscopy

Immunofluorescence Microscopy of CRMP1 antibody. Cell Type: human brain cells. Fixation: 0.5% PFA. Antigen retrieval: not required. Primary antibody: CRMP1 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: CRMP1 is located in the cytoplasm and the cytoskeleton. Staining: CRMP1 as red fluorescent signal.



### Immunohistochemistry

Immunohistochemistry of CRMP1 antibody. Tissue: human brain tissue. Fixation: formalin fixed paraffin embedded. Antigen retrieval: not required. Primary antibody: CRMP1 antibody at 10 µg/mL for 1 h at RT. Secondary antibody: Peroxidase rabbit secondary antibody at 1:10,000 for 45 min at RT. Localization: CRMP1 is located in the cytoplasm and the cytoskeleton. Staining: CRMP1 is stained with hematoxylin purple nuclear counterstain.



#### Western Blot

Western Blot of CRMP1 antibody in Caco-2 cell lysate. Lane A: CRMP1 antibody at 1  $\mu\text{g/mL}$ . Lane B: CRMP1 antibody at 2  $\mu\text{g/mL}$ . Lane C: CRMP1 antibody at 4  $\mu\text{g/mL}$ . Load: 35  $\mu\text{g}$  per lane. Primary antibody: CRMP1 antibody at designated concentrations for overnight at 4°C. 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: 62 kDa, 70 kDa for CRMP1. Other band(s): CRMP1 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.