

# Drebrin A Antibody



**Orders:** 877-616-CELL (2355)  
orders@cellsignal.com

**Support:** 877-678-TECH (8324)

**Web:** info@cellsignal.com  
cellsignal.com

3 Trask Lane | Danvers | Massachusetts | 01923 | USA

**For Research Use Only. Not for Use in Diagnostic Procedures.**

Applications:	Reactivity:	Sensitivity:	MW (kDa):	Source/Isotype:	UniProt ID:	Entrez-Gene Id:
W, IP	H M R Mk	Endogenous	132	Rabbit	#Q16643	1627

## Product Usage Information

### Application

Western Blotting  
Immunoprecipitation

### Dilution

1:1000  
1:50

## Storage

Supplied in 10 mM sodium HEPES (pH 7.5), 150 mM NaCl, 100 µg/ml BSA and 50% glycerol. Store at -20°C. Do not aliquot the antibody.

## Specificity/Sensitivity

Drebrin A Antibody recognizes endogenous levels of total Drebrin A protein. This antibody does not cross-react with Drebrin E.

## Source / Purification

Polyclonal antibodies are produced by immunizing animals with a synthetic peptide corresponding to residues surrounding Ala330 of mouse Drebrin A protein. Antibodies are purified by protein A and peptide affinity chromatography.

## Background

Developmentally-regulated brain proteins (Drebrins) are cytoplasmic proteins that were originally identified in the brain as F-actin-binding proteins. There are two mammalian isoforms: adult type (A) and embryonic type (E). These isoforms are derived from a single gene through alternative RNA splicing mechanisms (1). Drebrin E has been observed to accumulate in the developmental stage of migrating neurons and in the growing cell processes of neurons. Drebrin A is found at the dendritic spines of mature cortical neurons where it plays a role in synaptic plasticity (2,3). Although drebrins are primarily found in neurons, they have also been found in skeletal muscle, heart, pancreas, and kidney. Research studies have shown that reduced expression of drebrin in the brain could be associated with Alzheimer's Disease, Down Syndrome (4), and bipolar disorders (5).

## Background References

1. Kojima, N. et al. (1993) *Brain Res Mol Brain Res* 19, 101-14.
2. Shirao, T. (1995) *J Biochem* 117, 231-6.
3. Ivanov, A. et al. (2009) *J Cell Sci* 122, 524-34.
4. Shim, K.S. and Lubec, G. (2002) *Neurosci Lett* 324, 209-12.
5. Kim, H.W. et al. (2010) *Neurobiol Dis* 37, 596-603.

## Species Reactivity

Species reactivity is determined by testing in at least one approved application (e.g., western blot).

## Western Blot Buffer

**IMPORTANT:** For western blots, incubate membrane with diluted primary antibody in 5% w/v BSA, 1X TBS, 0.1% Tween@ 20 at 4°C with gentle shaking, overnight.

## Applications Key

**W:** Western Blotting **IP:** Immunoprecipitation

## Cross-Reactivity Key

**H:** Human **M:** Mouse **R:** Rat **Mk:** Monkey

## Trademarks and Patents

Cell Signaling Technology is a trademark of Cell Signaling Technology, Inc.

All other trademarks are the property of their respective owners. Visit [cellsignal.com/trademarks](http://cellsignal.com/trademarks) for more information.

## Limited Uses

Except as otherwise expressly agreed in a writing signed by a legally authorized representative of CST, the following terms apply to Products provided by CST, its affiliates or its distributors. Any Customer's terms and conditions that are in addition to, or different from, those contained herein, unless separately accepted in writing by a legally authorized representative of CST, are rejected and are of no force or effect.

Products are labeled with For Research Use Only or a similar labeling statement and have not been approved, cleared, or licensed by the FDA or other regulatory foreign or domestic entity, for any purpose. Customer shall not use any Product for any diagnostic or therapeutic purpose, or otherwise in

any manner that conflicts with its labeling statement. Products sold or licensed by CST are provided for Customer as the end-user and solely for research and development uses. Any use of Product for diagnostic, prophylactic or therapeutic purposes, or any purchase of Product for resale (alone or as a component) or other commercial purpose, requires a separate license from CST. Customer shall (a) not sell, license, loan, donate or otherwise transfer or make available any Product to any third party, whether alone or in combination with other materials, or use the Products to manufacture any commercial products, (b) not copy, modify, reverse engineer, decompile, disassemble or otherwise attempt to discover the underlying structure or technology of the Products, or use the Products for the purpose of developing any products or services that would compete with CST products or services, (c) not alter or remove from the Products any trademarks, trade names, logos, patent or copyright notices or markings, (d) use the Products solely in accordance with CST Product Terms of Sale and any applicable documentation, and (e) comply with any license, terms of service or similar agreement with respect to any third party products or services used by Customer in connection with the Products.