

CALB2 Antibody

Purified Mouse Monoclonal Antibody Catalog # AO2056a

Specification

CALB2 Antibody - Product Information

Application WB, E
Primary Accession P22676
Reactivity Human
Host Mouse
Clonality Monoclonal
Isotype IgG1

Calculated MW 31.5kDa KDa

Description

This gene encodes an intracellular calcium-binding protein belonging to the troponin C superfamily. Members of this protein family have six EF-hand domains which bind calcium. This protein plays a role in diverse cellular functions, including message targeting and intracellular calcium buffering. It also functions as a modulator of neuronal excitability, and is a diagnostic marker for some human diseases, including Hirschsprung disease and some cancers. Alternative splicing results in multiple transcript variants.

Immunogen

Purified recombinant fragment of human CALB2(AA: 1-271) expressed in E. Coli.

Formulation

Purified antibody in PBS with 0.05% sodium azide

CALB2 Antibody - Additional Information

Gene ID 794

Other Names

Calretinin, CR, 29 kDa calbindin, CALB2, CAB29

Dilution

WB~~1/500 - 1/2000

 $E \sim 1/10000$

Storage

Maintain refrigerated at 2-8°C for up to 6 months. For long term storage store at -20°C in small aliquots to prevent freeze-thaw cycles.

Precautions

CALB2 Antibody is for research use only and not for use in diagnostic or therapeutic procedures.

CALB2 Antibody - Protein Information



Name CALB2 (HGNC:1435)

Synonyms CAB29

Function

Calcium-binding protein involved in calcium homeostasis and signal transduction. It plays a critical role in buffering intracellular calcium levels and modulating calcium-dependent signaling pathways (PubMed:2001709). Predominantly expressed in specific neuronal populations, influences synaptic plasticity and neuronal excitability, contributing to learning and memory (By similarity). During embryonic development, it facilitates neuronal differentiation and maturation (By similarity).

Cellular Location

Synapse {ECO:0000250|UniProtKB:Q08331}. Cell projection, dendrite {ECO:0000250|UniProtKB:Q08331}. Note=Located in dendrioles, small dendrites that makes up a brush structure found as the terminal specialization of a dendrite of a unipolar brush cell {ECO:0000250|UniProtKB:Q08331}

Tissue Location Brain.

CALB2 Antibody - Protocols

Provided below are standard protocols that you may find useful for product applications.

- Western Blot
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- <u>Immunofluorescence</u>
- Immunoprecipitation
- Flow Cytomety
- Cell Culture