

Anti-AICDA Picoband Antibody

Catalog # ABO12820

Specification

Anti-AICDA Picoband Antibody - Product Information

ApplicationWBPrimary AccessionO9GZX7HostRabbitReactivityHuman, Mouse, RatClonalityPolyclonalFormatLyophilizedDescriptionRabbit IgG polyclonal antibody for AICDA detection. Tested with WB, Direct ELISA inHuman;Mouse;Rat.Human;Mouse;Rat.

Reconstitution Add 0.2ml of distilled water will yield a concentration of 500ug/ml.

Anti-AICDA Picoband Antibody - Additional Information

Gene ID 57379

Other Names Single-stranded DNA cytosine deaminase, 3.5.4.38, Activation-induced cytidine deaminase, Cytidine aminohydrolase, AICDA, AID

Application Details Western blot, 0.1-0.5 μg/ml
 Direct ELISA, 0.1-0.5 μg/ml

Subcellular Localization Nucleus.

Tissue Specificity Strongly expressed in lymph nodes and tonsils.

Contents

Each vial contains 4mg Trehalose, 0.9mg NaCl, 0.2mg Na₂HPO₄, 0.05mg NaN₃.

Immunogen E. coli-derived human AICDA recombinant protein (Position: A91-T195).

Cross Reactivity No cross reactivity with other proteins.

Storage

At -20°C; for one year. After r°Constitution, at 4°C; for one month. It°Can also be aliquotted and stored frozen at -20°C; for a longer time. Avoid repeated freezing and



thawing.

Anti-AICDA Picoband Antibody - Protein Information

Name AICDA

Synonyms AID

Function

Single-stranded DNA-specific cytidine deaminase. Involved in somatic hypermutation (SHM), gene conversion, and class-switch recombination (CSR) in B-lymphocytes by deaminating C to U during transcription of Ig-variable (V) and Ig-switch (S) region DNA. Required for several crucial steps of B-cell terminal differentiation necessary for efficient antibody responses (PubMed:18722174, PubMed:21385873, PubMed:21518874, PubMed:21518874, PubMed:27716525). May also play a role in the epigenetic regulation of gene expression by participating in DNA demethylation (PubMed:21496894).

Cellular Location

Nucleus. Cytoplasm, cytosol Note=Predominantly cytosolic (PubMed:21385873). In the presence of MCM3AP/GANP, relocalizes to the nucleus (By similarity) {ECO:0000250|UniProtKB:Q9WVE0, ECO:0000269|PubMed:21385873}

Tissue Location

Strongly expressed in lymph nodes and tonsils.

Anti-AICDA Picoband Antibody - Protocols

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

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

Anti-AICDA Picoband Antibody - Images







Anti-AICDA Picoband Antibody - Background

Activation-induced cytidine deaminase, also known as AICDA and AID, is a 24 kDa enzyme which in humans is encoded by the AICDA gene. This gene encodes a RNA-editing deaminase that is a member of the cytidine deaminase family. The protein is involved in somatic hypermutation, gene conversion, and class-switch recombination of immunoglobulin genes. Defects in this gene are the cause of autosomal recessive hyper-IgM immunodeficiency syndrome type 2 (HIGM2).