

Anti-AIMP2/p38 Antibody

Catalog # ABO10800

Specification

Anti-AIMP2/p38 Antibody - Product Information

Application WB, IHC-P
Primary Accession O13155
Host Rabbit

Reactivity Human, Mouse, Rat

Clonality Polyclonal Lyophilized

Description

Rabbit IgG polyclonal antibody for Aminoacyl tRNA synthase complex-interacting multifunctional protein 2(AIMP2) detection. Tested with WB, IHC-P in Human; Mouse; Rat.

Reconstitution

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

Anti-AIMP2/p38 Antibody - Additional Information

Gene ID 7965

Other Names

Aminoacyl tRNA synthase complex-interacting multifunctional protein 2, Multisynthase complex auxiliary component p38, Protein JTV-1, AIMP2, JTV1

Calculated MW 35349 MW KDa

Application Details

Immunohistochemistry(Paraffin-embedded Section), 0.5-1 μg/ml, Human, Rat, Mouse, By Heat
br>Western blot, 0.1-0.5 μg/ml, Human, Rat, Mouse
cbr>

Subcellular Localization

Cytoplasm, cytosol . Nucleus . Following DNA damage, dissociates from the aminoacyl-tRNA synthase complex and translocates from the cytoplasm to the nucleus. .

Protein Name

Aminoacyl tRNA synthase complex-interacting multifunctional protein 2

Contents

Each vial contains 5mg BSA, 0.9mg NaCl, 0.2mg Na2HPO4, 0.05mg Thimerosal, 0.05mg NaN3.

Immunogen

A synthetic peptide corresponding to a sequence in the middle region of human AIMP2/p38(298-320aa NVQRWMRSCENLAPFNTALKLLK), different from the related rat and mouse sequences by three amino acids.

Purification



Immunogen affinity purified.

Cross ReactivityNo 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.

Sequence SimilaritiesContains 1 GST C-terminal domain.

Anti-AIMP2/p38 Antibody - Protein Information

Name AIMP2

Synonyms JTV1

Function

Required for assembly and stability of the aminoacyl-tRNA synthase complex (PubMed:19131329). Mediates ubiquitination and degradation of FUBP1, a transcriptional activator of MYC, leading to MYC down-regulation which is required for aveolar type II cell differentiation. Blocks MDM2-mediated ubiquitination and degradation of p53/TP53. Functions as a proapoptotic factor.

Cellular Location

Cytoplasm, cytosol. Nucleus {ECO:0000250|UniProtKB:Q8R010}. Note=Following DNA damage, dissociates from the aminoacyl-tRNA synthase complex and translocates from the cytoplasm to the nucleus. {ECO:0000250|UniProtKB:Q8R010}

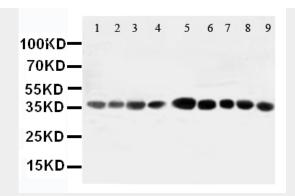
Anti-AIMP2/p38 Antibody - Protocols

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

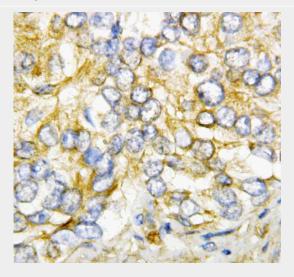
- Western Blot
- Blocking Peptides
- Dot Blot
- <u>Immunohistochemistry</u>
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- Cell Culture

Anti-AIMP2/p38 Antibody - Images





Anti-AIMP2/p38 antibody, ABO10800, Western blottingLane 1: Rat Liver Tissue LysateLane 2: Rat Lung Tissue LysateLane 3: Rat Kidney Tissue LysateLane 4: Rat Brain Tissue LysateLane 5: MarkerLane 6: JURKAT Cell LysateLane 7: CEM Cell Lysate Lane 8: HUT Cell Lysate Lane 9: U93T Cell Lysate Lane 10: U93T Cell Lysate



Anti-AIMP2/p38 antibody, ABO10800, IHC(P)IHC(P): Human Rectal Cancer Tissue

Anti-AIMP2/p38 Antibody - Background

AIMP2, Aminoacyl tRNA synthetase complex-interacting multifunctional protein 2, also known as AIMP2, is an enzyme that in humans is encoded by the AIMP2 gene. AIMP2 encodes a predicted 312-amino acid protein. The AIMP2 gene is located on chromosome 7p22 flanked by two genes, HRI and PMS2. AIMP2 and HRI overlap slightly and are arranged in a tail-to-tail fashion. AIMP2 and PMS2 are separated by approximately 200 base pairs and are arranged head-to-head. AIMP2 is transcribed in the opposite direction compared to HRI and PMS2. AIMP2 is a scaffold required for the assembly and stability of the multi-tRNA synthetase complex. AIMP2 can work as a mediator of TGF-beta signaling and its functional importance in the control of MYC during lung differentiation.