

Anti-PUMA Antibody
Catalog # ABO10638**Specification****Anti-PUMA Antibody - Product Information**

Application	WB
Primary Accession	Q9BXH1
Host	Rabbit
Reactivity	Human, Mouse, Rat
Clonality	Polyclonal
Format	Lyophilized

Description

Rabbit IgG polyclonal antibody for Bcl-2-binding component 3(BBC3) detection. Tested with WB in Human;Mouse;Rat.

Reconstitution

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

Anti-PUMA Antibody - Additional Information

Gene ID 27113

Other Names

Bcl-2-binding component 3, JFY-1, p53 up-regulated modulator of apoptosis, BBC3, PUMA

Calculated MW

20532 MW KDa

Application Details

Western blot, 0.1-0.5 µg/ml, Human, Rat, Mouse

Subcellular Localization

Mitochondrion . Localized to the mitochondria in order to induce cytochrome c release.

Tissue Specificity

Ubiquitously expressed. .

Protein Name

Bcl-2-binding component 3

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 at the C-terminus of human PUMA(145-159aa ADDLNAQYERRRQEE), identical to the related rat and mouse sequences.

Purification

Immunogen affinity purified.

Cross Reactivity

No cross reactivity with other proteins

Storage

At -20°C for one year. After reconstitution, 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 Similarities

Belongs to the Bcl-2 family.

Anti-PUMA Antibody - Protein Information

Name BBC3

Synonyms PUMA

Function

Essential mediator of p53/TP53-dependent and p53/TP53-independent apoptosis (PubMed: [11463391](http://www.uniprot.org/citations/11463391), PubMed: [23340338](http://www.uniprot.org/citations/23340338)). Promotes partial unfolding of BCL2L1 and dissociation of BCL2L1 from p53/TP53, releasing the bound p53/TP53 to induce apoptosis (PubMed: [23340338](http://www.uniprot.org/citations/23340338)). Regulates ER stress-induced neuronal apoptosis (By similarity).

Cellular Location

Mitochondrion Note=Localized to the mitochondria in order to induce cytochrome c release

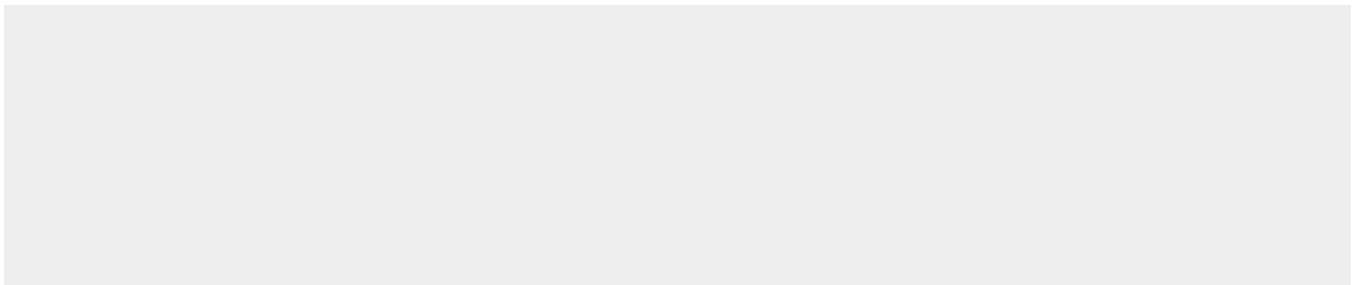
Tissue Location

Ubiquitously expressed.

Anti-PUMA Antibody - Protocols

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

- [Western Blot](#)
- [Blocking Peptides](#)
- [Dot Blot](#)
- [Immunohistochemistry](#)
- [Immunofluorescence](#)
- [Immunoprecipitation](#)
- [Flow Cytometry](#)
- [Cell Culture](#)

Anti-PUMA Antibody - Images



Anti-PUMA antibody, ABO10638, Western blotting All lanes: Anti PUMA(ABO10638) at 0.5ug/ml Lane 1: HELA Whole Cell Lysate at 40ug Lane 2: Rat Kidney Tissue Lysate at 50ug Predicted bind size: 21KD Observed bind size: 21KD

Anti-PUMA Antibody - Background

The p53 upregulated modulator of apoptosis, or PUMA, is a pro-apoptotic member of the Bcl-2 protein family. The PUMA gene is located at 19q. PUMA transcript is contained within 4 exons, with the presumptive initiation codon in exon 2. The predicted 193-amino acid PUMA protein shares 91% amino acid identity with the murine sequence. Bcl-2 family members can form hetero- or homodimers, and they act as anti- or pro-apoptotic regulators that are involved in a wide variety of cellular activities. The expression of PUMA is regulated by the tumor suppressor p53, and PUMA has been shown to be involved in p53-mediated apoptosis. Additionally, PUMA encodes 2 BH3 domain-containing proteins, PUMA-alpha and PUMA-beta, that are produced through the use of an alternative first exon and are induced in cells following p53 activation. Furthermore, PUMA couples the nuclear and cytoplasmic proapoptotic functions of p53.