

Anti-ROC1 RBX1 Antibody

Catalog Number: A00524

About RBX1

ROC1 also known as RING-box protein 1, Rbx1, Regulator of cullins 1, RING finger protein 75, and ZYP protein, is a component of the SCF (SKP1-CUL1-F-box protein) and the CBC(VHL) (CUL2-elonging BC-VHL) E3 ubiquitin ligase complexes, which mediate the ubiquitination and subsequent proteasomal degradation of target proteins involved in cell cycle progression, signal transduction and transcription. ROC1 appears to recruit the E2 ubiquitination enzyme through the RING-type zinc finger in a manner similar to CDC34, and brings it into close proximity to the substrate. The RING-type zinc finger domain is essential for ubiquitin ligase activity. ROC1 probably also stimulates CDC34 autoubiquitination and promotes the neddylation of CUL1 and probably CUL2. ROC1 has a cytoplasmic and nuclear localization and is widely expressed in most tissues.

Overview

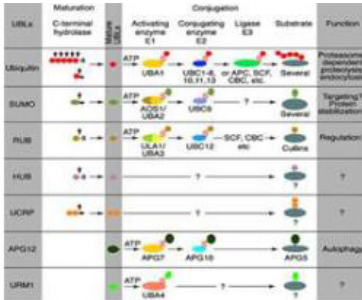
Product Name	Anti-ROC1 RBX1 Antibody
Reactive Species	Human
Description	Boster Bio Anti-ROC1 RBX1 Antibody (Catalog # A00524). Tested in WB applications. This antibody reacts with Human.
Application	ELISA, IHC, WB
Clonality	Polyclonal
Formulation	0.01% (w/v) Sodium Azide
Storage Instructions	Store vial at -20°C prior to opening. Aliquot contents and freeze at -20°C or below for extended storage. Avoid cycles of freezing and thawing. Centrifuge product if not completely clear after standing at room temperature. This product is stable for several weeks at 4°C as an undiluted liquid. Dilute only prior to immediate use. Expiration date is one (1) year from date of opening. (Ship on dry ice.)
Host	Rabbit
Uniprot ID	P62877

Technical Details

Immunogen	This antibody was prepared from whole rabbit serum produced by repeated immunizations with a synthetic peptide corresponding to amino acids 94-108 of Human ROC1 (C-terminal) coupled to KLH.
Predicted Reactive Species	Bovine, Sheep
Cross Reactivity	No cross reactivity with other proteins.
Isotype	Antiserum

Form	Liquid (sterile filtered)
Concentration	85 mg/mL by Refractometry
Purification	This product is monospecific antiserum processed by delipidation and defibrination followed by sterile filtration. This product reacts with human, mouse, C.elegans and zebra fish ROC1. Cross-reactivity may also occur with ROC1 from other sources. Sufficient sequence differences exist to suggest that this antibody would not react with other RING box proteins such as ROC2 and APC11.
Suggested Dilutions	ELISA: 1:2,000 - 1:10,000 IHC: User optimized WB: 1:500 - 1:1,000 This antibody reacts with human ROC1 by western blot and immunoprecipitation. The antibody immunoprecipitates in vitro translated protein and protein from overexpressing cell lysates (using HeLa and NIH-3T3, and others). Coimmunoprecipitation of related cullin proteins does occur. Coimmunoprecipitation of ubiquitin ligase activity will also occur. A 12.2 kDa band corresponding to human ROC1 is detected. Most cell lines expressing ROC1 can be used as a positive control. Researchers should determine optimal titers for other applications.

Anti-ROC1 RBX1 Antibody (A00524) Images



Most modifiers mature by proteolytic processing from inactive precursors (a; amino acid). Arrowheads point to the cleavage sites. Ubiquitin is expressed either as polyubiquitin or as a fusion with ribosomal proteins. Conjugation requires activating (E1) and conjugating (E2) enzymes that form thioesters (S) with the modifiers. Modification of cullins by RUB involves SCF(SKP1/cullin-1/F-box protein) /CBC(cullin-2/elongin B/elonginC) -like E3 enzymes that are also involved in ubiquitination. In contrast to ubiquitin, the UBLs do not seem to form multi-UBL chains. UCRP(USP15) resembles two ubiquitin moieties linked head-to-tail. Whether HUB1 functions as a modifier is currently unclear. APG12 and URM1 are distinct from the other modifiers because they are unrelated in sequence to ubiquitin. Data contributed by S.Jentsch.

Submit a product review to Biocompare.com

Submit a review of this product to Biocompare.com to receive a \$20 Amazon.com giftcard! Your reviews help your fellow scientists make the right decisions. Thank you for your contribution.



Anti-ROC1 RBX1 Antibody

For Research Use Only. Not for use in diagnostic procedures.