

Product Name: BARD1 Rabbit Polyclonal Antibody
Catalog #: APRab07466



Summary

Production Name	BARD1 Rabbit Polyclonal Antibody
Description	Rabbit Polyclonal Antibody
Host	Rabbit
Application	WB,IHC,ELISA
Reactivity	Human,Rat,Mouse

Performance

Conjugation	Unconjugated
Modification	Unmodified
Isotype	IgG
Clonality	Polyclonal
Form	Liquid
Storage	Store at 4°C short term. Aliquot and store at -20°C long term. Avoid freeze/thaw cycles.
Buffer	Liquid in PBS containing 50% glycerol, 0.5% BSA and 0.02% New type preservative N.
Purification	Affinity purification

Immunogen

Gene Name	BARD1
Alternative Names	BARD1; BRCA1-associated RING domain protein 1; BARD-1
Gene ID	580.0
SwissProt ID	Q99728.The antiserum was produced against synthesized peptide derived from human BARD1. AA range:1-50

Application

Dilution Ratio	WB 1:500 - 1:2000. IHC 1:100 - 1:300. ELISA: 1:5000..
Molecular Weight	79kD

Background

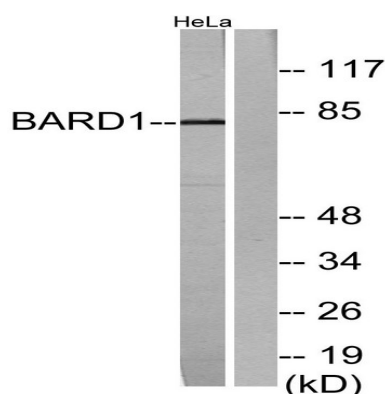
Product Name: BARD1 Rabbit Polyclonal Antibody
Catalog #: APRab07466



This gene encodes a protein which interacts with the N-terminal region of BRCA1. In addition to its ability to bind BRCA1 in vivo and in vitro, it shares homology with the 2 most conserved regions of BRCA1: the N-terminal RING motif and the C-terminal BRCT domain. The RING motif is a cysteine-rich sequence found in a variety of proteins that regulate cell growth, including the products of tumor suppressor genes and dominant protooncogenes. This protein also contains 3 tandem ankyrin repeats. The BARD1/BRCA1 interaction is disrupted by tumorigenic amino acid substitutions in BRCA1, implying that the formation of a stable complex between these proteins may be an essential aspect of BRCA1 tumor suppression. This protein may be the target of oncogenic mutations in breast or ovarian cancer. Multiple alternatively spliced transcript variants encoding different isoforms have been found for this gene. It is uncertain whether Met-1 or Met-26 is the initiator. Defects in BARD1 gene are found in primary breast, ovarian and uterine cancers. The BRCA1-BARD1 heterodimer coordinates a diverse range of cellular pathways such as DNA damage repair, ubiquitination and transcriptional regulation to maintain genomic stability. Plays a central role in the control of the cell cycle in response to DNA damage. Acts by mediating ubiquitin E3 ligase activity that is required for its tumor suppressor function. Also forms a heterodimer with CSTF1/CSTF-50 to modulate mRNA processing and RNAP II stability by inhibiting pre-mRNA 3' cleavage. Pathway: Protein modification; protein ubiquitination. PTM: Processed during apoptosis. The homodimer is more susceptible to proteolytic cleavage than the BARD1/BRCA1 heterodimer. Similarity: Contains 1 RING-type zinc finger. Similarity: Contains 2 BRCT domains. Similarity: Contains 3 ANK repeats. Subcellular location: During S phase of the cell cycle, colocalizes with BRCA1 into discrete subnuclear foci. Can translocate to the cytoplasm. Localizes at sites of DNA damage at double-strand breaks (DSBs); recruitment to DNA damage sites is mediated by the BRCA1-A complex. Subunit: Homo- and heterodimer. Heterodimer (RING-type zinc finger) with BRCA1. Heterodimer (via ANK repeats and BRCT domains) with CSTF1/CSTF-50. Component of the BRCA1-A complex, at least composed of the BRCA1, BARD1, UIMC1/RAP80, FAM175A/Abraxas, BRCC3/BRCC36, BRE/BRCC45 and MERIT40/NBA1.

Research Area

Image Data

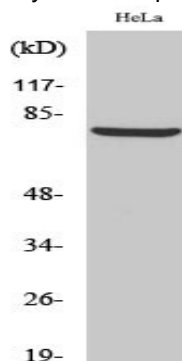


Western blot analysis of lysates from HeLa cells, using BARD1 Antibody. The lane on the right is blocked with the

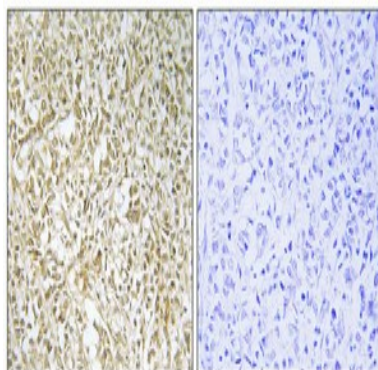
Product Name: BARD1 Rabbit Polyclonal Antibody
Catalog #: APRab07466



synthesized peptide.



Western Blot analysis of various cells using BARD1 Polyclonal Antibody



Immunohistochemical analysis of paraffin-embedded Human breast cancer. Antibody was diluted at 1:100 (4°,overnight) .
High-pressure and temperature Tris-EDTA,pH8.0 was used for antigen retrieval. Negative contrl (right) obtained from
antibody was pre-absorbed by immunogen peptide.

Note

For research use only.