

BARD1 Antibody (N-term)

Affinity Purified Rabbit Polyclonal Antibody (Pab) Catalog # AP10664a

Specification

BARD1 Antibody (N-term) - Product Information

WB,E
<u>Q99728</u>
<u>NP_000456</u>
Human
Rabbit
Polyclonal
Rabbit IgG
86648
101-131

BARD1 Antibody (N-term) - Additional Information

Gene ID 580

Other Names BRCA1-associated RING domain protein 1, BARD-1, 632-, BARD1

Target/Specificity

This BARD1 antibody is generated from rabbits immunized with a KLH conjugated synthetic peptide between 101-131 amino acids from the N-terminal region of human BARD1.

Dilution WB~~1:1000 E~~Use at an assay dependent concentration.

Format

Purified polyclonal antibody supplied in PBS with 0.09% (W/V) sodium azide. This antibody is purified through a protein A column, followed by peptide affinity purification.

Storage

Maintain refrigerated at 2-8°C for up to 2 weeks. For long term storage store at -20°C in small aliquots to prevent freeze-thaw cycles.

Precautions

BARD1 Antibody (N-term) is for research use only and not for use in diagnostic or therapeutic procedures.

BARD1 Antibody (N-term) - Protein Information

Name BARD1

Function E3 ubiquitin-protein ligase. The BRCA1-BARD1 heterodimer specifically mediates the



formation of 'Lys-6'-linked polyubiquitin chains and 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.

Cellular Location

Nucleus. Note=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

BARD1 Antibody (N-term) - 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>

BARD1 Antibody (N-term) - Images



BARD1 Antibody (N-term) (Cat. #AP10664a) western blot analysis in WiDr cell line lysates (35ug/lane).This demonstrates the BARD1 antibody detected the BARD1 protein (arrow).

BARD1 Antibody (N-term) - Background

BARD1 is 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.

BARD1 Antibody (N-term) - References

Liu, C.Y., et al. Carcinogenesis 31(7):1259-1263(2010) Rose, J.E., et al. Mol. Med. 16 (7-8), 247-253 (2010) : Dizin, E., et al. Int. J. Biochem. Cell Biol. 42(5):693-700(2010) Irminger-Finger, I. Gynecol. Oncol. 117(2):211-215(2010) De Brakeleer, S., et al. Hum. Mutat. 31 (3), E1175-E1185 (2010) :