# **BRCA1** Antibody

Catalog No: #21234

Package Size: #21234-1 50ul #21234-2 100ul



Orders: order@signalwayantibody.com Support: tech@signalwayantibody.com

## Description

Product Name	BRCA1 Antibody
Host Species	Rabbit
Clonality	Polyclonal
Purification	Antibodies were produced by immunizing rabbits with synthetic peptide and KLH conjugates. Antibodies were
	purified by affinity-chromatography using epitope-specific peptide.
Applications	WB IHC
Species Reactivity	Hu
Specificity	The antibody detects endogenous level of total BRCA1 protein.
Immunogen Type	Peptide-KLH
Immunogen Description	Peptide sequence around aa.1421~1425 (H-G-S-Q-P) derived from Human BRCA1.
Target Name	BRCA1
Other Names	RNF53
Accession No.	Swiss-Prot: P38398NCBI Protein: NP_009225.1
Concentration	1.0mg/ml
Formulation	Supplied at 1.0mg/mL in phosphate buffered saline (without Mg2+ and Ca2+), pH 7.4, 150mM NaCl, 0.02%
	sodium azide and 50% glycerol.
Storage	Store at -20°C for long term preservation (recommended). Store at 4°C for short term use.

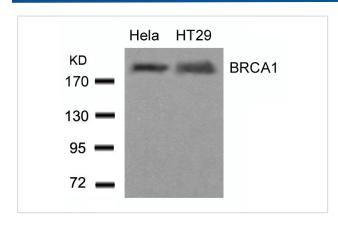
## **Application Details**

Predicted MW: 220kd

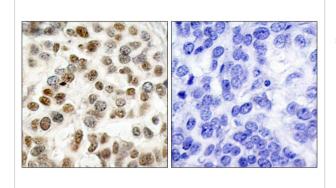
Western blotting: 1:500~1:1000

Immunohistochemistry: 1:50~1:100

### **Images**



Western blot analysis of extracts from Hela and HT29 cells using BRCA1(Ab-1423) Antibody #21234.



Immunohistochemical analysis of paraffin-embedded human breast carcinoma tissue using BRCA1(Ab-1423) Antibody #21234(left) or the same antibody preincubated with blocking peptide(right).

### Background

The BRCA1-BARD1 heterodimer coordinates a diverse range of cellular pathways such as DNA damage repair, ubiquitination and transcriptional regulation to maintain genomic stability. Acts by mediating ubiquitin E3 ligase activity that is required for its tumor suppressor function. Plays a central role in DNA repair by facilitating cellular response to DNA repair. Required for appropriate cell cycle arrests after ionizing irradiation in both the S-phase and the G2 phase of the cell cycle. Involved in transcriptional regulation of P21 in response to DNA damage. Required for FANCD2 targeting to sites of DNA damage. May function as a transcriptional regulator. Inhibits lipid synthesis by binding to inactive phosphorylated ACACA and preventing its dephosphorylation

Kim ST, et al. (2002) Genes Dev; 16(5): 560-570 Arlt MF, et al. (2004) Mol Cell Biol; 24(15): 6701-6709 Zhang J, et al. (2004) Mol Cell Biol; 24(2): 708-718 Greenberg RA, et al. (2006) Genes Dev; 20(1): 34-46 Tibbetts RS, et al. (2000) Genes Dev; 14(23): 2989-3002

#### **Published Papers**

Bo Xiong, Sen Li, Jun-Shu Ai el at., BRCA1 Is Required for Meiotic Spindle Assembly and Spindle Assembly Checkpoint Activation in Mouse Oocytes., Biol Reprod, 79, 718η— C726(2008)

PMID:18596218

Note: This product is for in vitro research use only and is not intended for use in humans or animals.