## p53 Tumor Suppressor Recombinant Monoclonal Rabbit Antibody (TP53/2092R)



## **Product Description**

This MAb reacts with an N-terminal epitope (aa 16-25) of both wild type and mutated p53. Mutation and/or allelic loss of p53 is one of the causes of a variety of mesenchymal and epithelial tumors. If it occurs in the germ line, such tumors run in families. In most transformed and tumor cells the concentration of p53 is increased 51000 fold over the minute concentrations (1000 molecules cell) in normal cells, principally due to the increased half-life (4 h) compared to that of the wild-type (20 min). p53 Localizes in the nucleus, but is detectable at the plasma membrane during mitosis and when certain mutations modulate cytoplasmic/nuclear distribution. Mutations arise with an average frequency of 70% but incidence varies from zero in carcinoid lung tumors to 97% in primary melanomas. High concentrations of p53 protein are transiently expressed in human epidermis and superficial dermal fibroblasts following mild ultraviolet irradiation. Positive nuclear staining with p53 antibody has been reported to be a negative prognostic factor in breast carcinoma, lung carcinoma, colorectal, and urothelial carcinoma. Anti-p53 positivity has also been used to differentiate uterine serous carcinoma from endometrioid carcinoma as well as to detect intratubular germ cell neoplasia.

Primary antibodies are available purified, or with a selection of fluorescent CF® dyes and other labels. CF® dyes offer exceptional brightness and photostability. See the CF® Dye Brochure for more information. Note: Conjugates of blue fluorescent dyes like CF®405S and CF®405M are not recommended for detecting low abundance targets, because blue dyes have lower fluorescence and can give higher non-specific background than other dye colors.

**Stock status:** Because Biotium offers a large number of antibody and conjugation options, primary antibody conjugates may be made to order. Typical lead times are up to one week for CF® dye and biotin conjugates, and up to 2-3 weeks for fluorescent protein and enzyme conjugates. Please email <a href="mailto:order@biotium.com">order@biotium.com</a> to inquire about stock status and lead times before placing your order.

Catalog number key for antibody number 2092, Anti-p53 Tumor Suppressor Protein (TP53/2092R)

## Product attributes

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Product attributes			
Antibody number	#2092		
Antibody reactivity (target)	p53 Tumor Suppressor Protein		
Antibody type	Primary		
Host species	Rabbit		
Clonality	Recombinant Monoclonal		
Clone	TP53/2092R		
Isotype	IgG		
Molecular weight	53 kDa		
Synonyms	Antigen NY-CO-13, BCC7, Cellular Tumor Antigen p53, LFS1, TP53, Transformation Related Protein 53 (TRP53), Tumor Protein p53, Tumor Suppressor p53		
Human gene symbol	TP53		
Entrez gene ID	7157		
SwissProt	P04637		
Unigene	654481		
Immunogen	Recombinant full-length human TP53 protein		
Antibody target cellular	Nucleus		
Verified antibody applications	IHC (FFPE) (verified), WB (verified)		
Species reactivity	Chicken, Dog, Hamster, Human, Monkey		
Antibody application notes	Higher concentration may be required for direct detection using primary antibody conjugates than for indirect detection with secondary antibody. Does not react with mouse or rat, Immunohistology (formalin): 0.5-1 ug/mL for 30 minutes at RT, Staining of formalin-fixed tissues requires boiling itsue sections in 10 mM citrate buffer, pH 6.0, for 10-20 minutes followed by cooling at RT for 20 minutes Western blotting 0.5-1 ug/mL, Optimal dilution for a specific application should be determined by user		
Positive control	MDA-MB-231 Cells. Breast or Colon carcinoma		
Shipping condition	Room temperature		
Storage Conditions	Store at 2 to 8 °C, Protect fluorescent conjugates from light, Note: store BSA-free antibodies at -10 to -35 °C		
Shelf life	Guaranteed for at least 24 months from date of receipt when stored as recommended		
Regulatory status	For research use only (RUO)		
Antibody/conjugate formulation	Conjugates: 0.1 mg/mL in PBS/0.1% BSA/0.05% azide, HRP conjugates: 0. mg/mL in PBS/0.05% BSA, Purified: 0 mg/mL in PBS/0.05% BSA/0.05% azic Purified, BSA-free: 1 mg/mL in PBS without azide		
Validated in protein array			

Email: btinfo@biotium.com

Antibody # prefix	Conjugation	Ex/Em (nm)	Laser line	<b>Detection channel</b>	Dye Features
BNC04	CF®405S	404/431	405	DAPI (microscopy), AF405	CF®405S Features
BNC88	CF®488A	490/515	488	GFP, FITC	CF®488A Features
BNC68	CF®568	562/583	532, 561	RFP, TRITC	CF®568 Features
BNC94	CF®594	593/614	561	Texas Red®	CF®594 Features
BNC40	CF®640R	642/662	633-640	Cy®5	CF®640R Features
BNC47	CF®647	650/665	633-640	Cy®5	CF®647 Features
BNCB	Biotin	N/A	N/A	N/A	
BNUB	Purified	N/A	N/A	N/A	
BNUM	Purified.	N/A	N/A	N/A	

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