

### **TP73 Antibody (Center)**

Affinity Purified Rabbit Polyclonal Antibody (Pab) Catalog # AP8881c

### **Specification**

### **TP73 Antibody (Center) - Product Information**

Application WB, IF, FC, IHC-P,E

Primary Accession Other Accession O9JJP2

Reactivity Human, Mouse

Host Rabbit
Clonality Polyclonal
Isotype Rabbit IgG
Calculated MW 69623
Antigen Region 288-317

### TP73 Antibody (Center) - Additional Information

#### **Gene ID 7161**

### **Other Names**

Tumor protein p73, p53-like transcription factor, p53-related protein, TP73, P73

### Target/Specificity

This TP73 antibody is generated from rabbits immunized with a KLH conjugated synthetic peptide between 288-317 amino acids from the Central region of human TP73.

### **Dilution**

WB~~1:1000 IF~~1:10~50 FC~~1:10~50 IHC-P~~1:50~100

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**

TP73 Antibody (Center) is for research use only and not for use in diagnostic or therapeutic procedures.

### **TP73 Antibody (Center) - Protein Information**



### Name TP73

### Synonyms P73

**Function** Participates in the apoptotic response to DNA damage. Isoforms containing the transactivation domain are pro-apoptotic, isoforms lacking the domain are anti-apoptotic and block the function of p53 and transactivating p73 isoforms. May be a tumor suppressor protein. Is an activator of FOXJ1 expression (By similarity). It is an essential factor for the positive regulation of lung ciliated cell differentiation (PubMed:34077761).

### **Cellular Location**

Nucleus. Cytoplasm. Note=Accumulates in the nucleus in response to DNA damage

#### **Tissue Location**

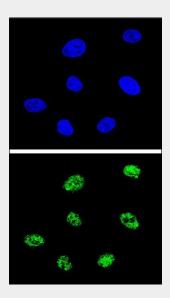
Expressed in striatal neurons of patients with Huntington disease (at protein level). Brain, kidney, placenta, colon, heart, liver, spleen, skeletal muscle, prostate, thymus and pancreas Highly expressed in fetal tissue. Expressed in the respiratory epithelium (PubMed:34077761).

### **TP73 Antibody (Center) - Protocols**

Provided below are standard protocols that you may find useful for product applications.

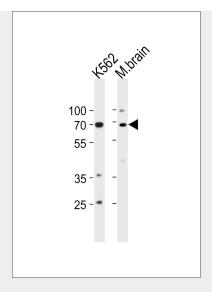
- Western Blot
- Blocking Peptides
- Dot Blot
- <u>Immunohistochemistry</u>
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- Cell Culture

### TP73 Antibody (Center) - Images

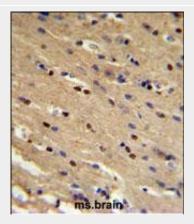


Confocal immunofluorescent analysis of TP73 Antibody (Center) (Cat. #AP8881c) with 293 cell followed by Alexa Fluor® 488-conjugated goat anti-rabbit lgG (green).DAPI was used to stain the cell nuclear (blue).

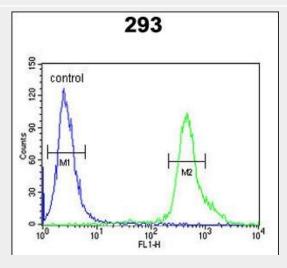




TP73 Antibody (Center) (Cat. #AP8881c) western blot analysis in K562 cell line and mouse brain tissue lysates (35ug/lane). This demonstrates the TP73 antibody detected the TP73 protein (arrow).



TP73 Antibody (Center) (Cat. #AP8881c) IHC analysis in formalin fixed and paraffin embedded mouse brain followed by peroxidase conjugation of the secondary antibody and DAB staining. This data demonstrates the use of the TP73 Antibody (Center) for immunohistochemistry. Clinical relevance has not been evaluated.



TP73 Antibody (Center) (Cat. #AP8881c) flow cytometric analysis of 293 cells (right histogram) compared to a negative control cell (left histogram).FITC-conjugated goat-anti-rabbit secondary



antibodies were used for the analysis.

# TP73 Antibody (Center) - Background

TP73 is tumor protein p73, which is a member of the p53 family of transcription factors involved in cellular responses to stress and development. The family members include p53, p63, and p73 and have high sequence similarity to one another, which allows p63 and p73 to transactivate p53-responsive genes causing cell cycle arrest and apoptosis. The family members can interact with each other in many ways involving direct or indirect protein interactions, resulting in regulation of the same target gene promoters or regulation of each other's promoters. The p73 protein is expressed at very low levels in normal tissues and is differentially expressed in a number of tumors.

## **TP73 Antibody (Center) - References**

Mai, M., et.al., Genomics 51 (3), 359-363 (1998) Mai, M., et.al., Oncogene 17 (13), 1739-1741 (1998)