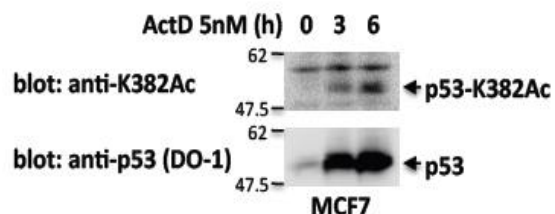


## Anti-p53 Ac-K382 (human) antibody, mouse monoclonal (2B7E4)

<b>Product code</b>	71-133
<b>Size</b>	100 µg
<b>Storage</b>	-20°C
<b>Concentration</b>	1.0 mg/ml
<b>Buffer</b>	PBS <sup>-</sup> with 50% glycerol
<b>Purity</b>	Purified IgG fraction with protein A from hybridoma cell culture medium.
<b>Immunogen</b>	Synthetic peptide containing acetyl-Lys382 of human p53
<b>Isotype</b>	Mouse IgG1κ
<b>Reactivity</b>	Human p53 acetylated at Lys382. Other species have not been tested.
<b>Special notes</b>	N/A
<b>Application</b>	1. Western blotting (~1 µg/ml)
<b>Background</b>	<p>p53 mutants are found in more than half of human cancers and are considered as the most important human cancer related gene. p53 is detected at 53kD position by electrophoresis and is composed of 393 amino acids. In the unstressed normal cells, the p53 level is low and it is inactive. However, with stress, especially with DNA damage, it is activated to promote arrest of cell cycle and repair of DNA damage, or induction of apoptosis. The functions and stability of p53 are regulated by phosphorylation of serine and threonine, and acetylation of lysine at various sites in the molecule.</p> <p>Acetylation of lysine 382 (acetyl-K382) of p53 occurs after DNA damage and is catalyzed by the p300/CBP acetyltransferase, which stabilizes p53 protein (ref 1).</p>
<b>Data Link</b>	UniProtKB/Swiss-Prot <a href="#">P04637</a> (P53_HUMAN)
Please note: All products are FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC PROCEDURES. NOT FOR MILITARY USE.	

**Data Images:** 71-133 Anti-p53 Ac-K382 (human) antibody, mouse monoclonal (2B7E4)



**Fig.1 Identification of p53 protein, whose Lys382 is acetylated, by Western blotting with 2B7E4 antibody.**

MCF7 cells in culture were treated with actinomycin D at 5 nM for the indicated periods and the cell extracts were analyzed by Western blotting with anti-p53 acetyl-K382 antibody (2B7E4) and omnipotent anti-p53 antibody (DO-1). Acetylation of p53 at K382 was induced by the DNA damaging treatment.

#### Reference

1. Bode AM & Dong Z “Post-translational modification of p53 in tumorigenesis” *Nature Rev Cancer* 4:793-805 (2004) PMID:[15510160](https://pubmed.ncbi.nlm.nih.gov/15510160/)

#### Related Products

- 71-113 Anti-p53 p-Ser20 (human) antibody, mouse monoclonal (17B6)
- 71-115 Anti-p53 p-Ser46 (human) antibody, mouse monoclonal (#36)
- 71-117 Anti-p53 p-Ser315 (human) antibody, mouse monoclonal (#18)
- 71-131 Anti-p53 Ac-K120 (human) antibody, mouse monoclonal (10E5)