



## PRODUCT DATA SHEET

**Product:** Anti-p53, human mAb, clone PAb 240

**Cat. No.:** MC-531 (100 µg)

**Background:**

p53 is a tumor suppressor gene expressed in a wide variety of tissue types and is involved in regulating cell growth, replication, and apoptosis. It binds to mdm2, SV40 T antigen and human papilloma virus E6 protein. p53 senses DNA damage and possibly facilitates repair. Mutation involving p53 is found in a wide variety of malignant tumors, including breast, ovarian, bladder, colon, lung, and melanoma.

**Specificity:**

Reacts specifically with p53 oncoprotein. Reacts only with mutant p53 under non-denaturing conditions (immunoprecipitation). Reacts with both mutant and wild-type p53 under denatured conditions (Western blot).

**Positive Control:**

MDA-231 or SKBR3 cells. Colon carcinoma.

**Species Reactivity:**

Human. Others not known. **NOTE:** Previous lots have been reported by end-users to react with mouse, rat, chicken, monkey, bovine, pig, and hamster.

**Ig Isotype:**

Mouse IgG1

**Immunogen:**

Murine p53 protein containing aa 14-289

**Molecular Weight of Antigen:**

53 kDa

**Epitope:**

aa 212-217

**Cellular Localization:**

Nuclear

**Format:**

500 µL of 200 µg/mL monoclonal antibody in 10 mM PBS, pH 7.4, with protein stabilizer and 0.09% sodium azide. Purified from ascites fluid by Protein G chromatography.

**Storage:**

Store at 4 °C.

**Applications and Suggested Dilutions:**

- Flow Cytometry
- Immunohistochemistry: Use at 2-4 µg/mL for 30 min. at RT. (methacarn or formalin/paraffin) **Recommend for murine tissues only.** [Staining of formalin-fixed tissues requires boiling tissue sections in 1 mM EDTA, pH 8.0 for 10-20 min. followed by cooling at RT for 20 min.]
- Immunoprecipitation: (Native & Denatured) Use 2 µg/mg protein lysate. Use Protein G.
- Western blot: Use at 1-2 µg/mL for 2 hrs at RT.

The optimal dilution for a specific application should be determined by the researcher.

**References:**

1. Gannon, J.V. et al. (1990). EMBO J. 9: 1595-602.
2. Eeles, R.A. et al (1993). Cancer Surveys 18: 57-75.

**Limitations:**

For *in vitro* research use only. Not for use in diagnostics or in humans.

**Warranty:**

No warranties, expressed or implied, are made regarding the use of this product. **KAMIYA BIOMEDICAL COMPANY** is not liable for any damage, personal injury, or economic loss caused by this product.