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# **Product Information**

# Monoclonal Anti-α-Tubulin, clone DM1A produced in mouse, ascites fluid

Catalog Number T9026

## **Product Description**

Monoclonal Anti-α-Tubulin (mouse IgG1 isotype) is derived from the hybridoma produced by the fusion of mouse myeloma cells and splenocytes from an immunized mouse. Purified chick brain tubulin was used as the immunogen. The isotype is determined by a double diffusion immunoassay using Mouse Monoclonal Antibody Isotyping Reagents, Catalog Number ISO2.

Monoclonal Anti-α-Tubulin is immunospecific for tubulin as determined by indirect immunofluorescent staining and immunoblotting procedures. Good labeling may also be obtained with human, bovine, amphibian and mouse cells or tissues as well as with yeast or fungi.

Monoclonal Anti- $\alpha$ -Tubulin may be used to study the intracellular organization and distribution of tubulin along the static and dynamic aspects of the cytoskeleton. The product can be used for the immunocytochemical localization of the  $\alpha$  chain of tubulin by means of indirect immunofluorescent labeling of cultured cells, formalin fixed or frozen tissues or for specific identification of the  $\alpha$ -tubulin band in immunoblotting or immunoprecipitation techniques.

Tubulin is the major building block of microtubules. This intracellular cylindrical filamentous structure is present in almost all eukaryotic cells. Microtubules function as structural and mobile elements in mitosis, intracellular transport, flagellar movement and in the cytoskeleton. Tubulin is a heterodimer which consists of  $\alpha$ -tubulin and  $\beta$ -tubulin; both subunits have a molecular weight of ~50 kDa and share considerable homology. The most widely studied tubulins have been isolated from vertebrate brains. The microtubules can be viewed in immunofluorescent microscopy, which enables the observation of the intracellular organization of proteins that are in the form of a supramolecular structure.

## Reagent

Supplied ascites fluid with 15 mM sodium azide as a preservative.

#### **Precautions**

This product is for R&D use only, not for drug, household, or other uses. Please consult the Material Safety Data Sheet for information regarding hazards and safe handling practices.

#### Storage

For continuous use, store at 2-8 °C for up to one month. For extended storage, the solution may be frozen in working aliquots. Repeated freezing and thawing, or storage in "frost-free" freezers, is not recommended. If slight turbidity occurs upon prolonged storage, clarify the solution by centrifugation before use.

#### **Product Profile**

<u>Indirect immunofluorescence</u>: a minimum working dilution of 1:500 is determined using cultured chicken fibroblasts.

<u>Immunoblotting</u>: a minimum working dilution of 1:500 is determined using human or chicken fibroblasts.

**Note**: In order to obtain best results, it is recommended that each individual user determine their optimum working dilution by titration assay.

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