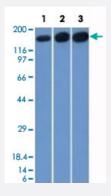


# TOP2A monoclonal antibody, clone TOP2A/1361

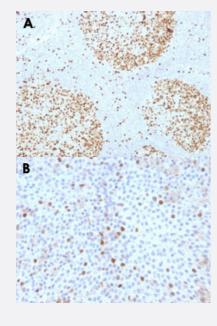
Catalog # MAB15012 Size 100 ug

## **Applications**



#### Western Blot (Cell lysate)

Western Blot analysis of Lane 1: HepG2, Lane 2: HeLa and Lane 3: 3T3 cell lysates with TOP2A monoclonal antibody, clone TOP2A/1361 (Cat # MAB15012).



# Immunohistochemistry (Formalin/PFA-fixed paraffinembedded sections)

Immunohistochemical staining (Formalin-fixed paraffin-embedded sections) of human tonsil (A) and human bladder carcinoma (B) with TOP2A monoclonal antibody, clone TOP2A/1361 (Cat # MAB15012).

| Specification       |  |
|---------------------|--|
| Product Description | Mouse monoclonal antibody raised against partial recombinant human TOP2A.  |
| Immunogen           | Recombinant protein corresponding to amino acids 1352-1493 of human TOP2A. |
| Host                | Mouse  |



#### **Product Information**

| Theoretical MW (kDa) | 170   |
|----------------------|---|
| Reactivity           | Human   |
| Form                 | Liquid  |
| Purification         | Protein A/G purification  |
| Isotype              | lgG2b, kappa  |
| Recommend Usage      | Flow Cytometry (0.5-1 ug/10 <sup>6</sup> cells) Immunofluorescence (1-2 ug/mL) Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) (0.5-1 ug/mL) Western Blotting (0.5-1 ug/mL) The optimal working dilution should be determined by the end user. |
| Storage Buffer       | In 10 mM PBS (0.05% BSA, 0.05% sodium azide).   |
| Storage Instruction  | Store at 4°C.   |
| Note                 | This product contains sodium azide: a POISONOUS AND HAZARDOUS SUBSTANCE which shoul d be handled by trained staff only.   |

## **Applications**

Western Blot (Cell lysate)

Western Blot analysis of Lane 1: HepG2, Lane 2: HeLa and Lane 3: 3T3 cell lysates with TOP2A monoclonal antibody, clone TOP2A/1361 (Cat # MAB15012).

Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections)

Immunohistochemical staining (Formalin-fixed paraffin-embedded sections) of human tonsil (A) and human bladder carcinoma (B) with TOP2A monoclonal antibody, clone TOP2A/1361 (Cat # MAB15012).

- Immunofluorescence
- Flow Cytometry

| Gene Info — TOP2A  |               |  |
|--------------------|---------------|--|
| Entrez GenelD      | <u>7153</u>   |  |
| Protein Accession# | <u>P11388</u> |  |
| Gene Name          | TOP2A         |  |



#### **Product Information**

| Gene Alias         | TOP2, TP2A   |
|--------------------|--|
| Gene Description   | topoisomerase (DNA) Il alpha 170kDa  |
| Omim ID            | 126430   |
| Gene Ontology      | <u>Hyperlink</u>   |
| Gene Summary       | This gene encodes a DNA topoisomerase, an enzyme that controls and alters the topologic state s of DNA during transcription. This nuclear enzyme is involved in processes such as chromosome condensation, chromatid separation, and the relief of torsional stress that occurs during DNA tran scription and replication. It catalyzes the transient breaking and rejoining of two strands of duplex DNA which allows the strands to pass through one another, thus altering the topology of DNA. Two forms of this enzyme exist as likely products of a gene duplication event. The gene encoding this form, alpha, is localized to chromsome 17 and the beta gene is localized to chromosome 3. The gene encoding this enzyme functions as the target for several anticancer agents and a variety of mutations in this gene have been associated with the development of drug resistance. Reduced a ctivity of this enzyme may also play a role in ataxia-telangiectasia. [provided by RefSeq |
| Other Designations | DNA topoisomerase II, 170 kD DNA topoisomerase II, alpha isozyme topoisomerase (DNA) II alpha (170kD)  |

## **Publication Reference**

Characterization and immunological identification of cDNA clones encoding two human DNA topoisomerase II
isozymes.

Chung TD, Drake FH, Tan KB, Per SR, Crooke ST, Mirabelli CK.

PNAS 1989 Dec; 86(23):9431.

#### Disease

- Breast cancer
- Breast Neoplasms
- Genetic Predisposition to Disease
- Leukemia
- Lymphatic Metastasis
- Lymphoma
- Recurrence



Stomach Neoplasms