

# **Mouse anti TERT Monoclonal Antibody**

Alternative Name(s): Telomerase reverse transcriptase, HEST2, Telomerase catalytic subunit, Telomerase-associated protein 2,

## **Order Information**

• Description: Telomerase Reverse Transcriptase (TERT)

• Catalogue: 606-350 • Lot: See label • Size: 100ug/200ul • Host: Mouse • Clone: 2C4 • Application: IHC(P)

## **ANTIGEN PREPARATION**

• Reactivity: Hu

A recombinant protein of human TERT

## **BACKGROUND**

Telomerase is a ribonucleoprotein polymerase that maintains telomere ends by addition of the telomere repeat TTAGGG. The enzyme consists of a protein component with reverse transcriptase activity, encoded by this gene, and an RNA component which serves as a template for the telomere repeat. TERT is the catalytic component of the holoenzyme complex that is involved in telomeres elongation by acting as a reverse transcriptase adding simple sequence repeats to chromosome ends by copying a template sequence within RNA component of the enzyme. Telomerase expression plays a role in cellular senescence, as it is normally repressed in postnatal somatic cells resulting in progressive shortening of telomeres. Deregulation of telomerase expression in somatic cells may be involved in oncogenesis. The telomerase reverse transcriptase is upregulated in the majority of human cancers and contributes directly to cell transformation. For example studies show that mutations in the human telomerase reverse transcriptase (hTERT) gene promoter have been reported in hepatocellular carcinoma.

## **PURIFICATION**

The Mouse IgG is purified by Affinity Purification

#### **FORMULATION**

This affinity purified antibody is supplied in sterile Phosphatebuffered saline (pH7.2) containing antibody stabilizer

## **SPECIFICITY**

This antibody recognizes human Telomerase Reverse Transcriptase (TERT) protein. The other species are not tested.

## **STORAGE**

The antibodies are stable for 24 months from date of receipt when stored at -20oC to -70oC. The antibodies can be stored at 2oC-8oC for three month without detectable loss of activity. Avoid repeated freezing-thawing cycles.

## **APPLICATIONS/SUGGESTED WORKING DILUTIONS\***

• Western Blot: 0.1-1 μg/ml

• ELISA: 0.01-0.1 μg/ml

• Immunoprecipitation: 2-5 µg/ml

• IHC: 2-10 µg/ml

• Flow cytometry: Not tested

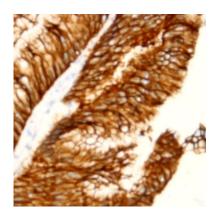
Molecular Weight: 127.0

Positive Control: Kidney TissueCellular Location: Cell Membrane



\*Optimal dilutions should be determined by researchers for the specific applications.





Immunohistochemistry: Human colon carcinoma (FFPE) stained with Mouse anti-TERT (telomerase reverse transcriptase) (Cat# 606-350) at 1:200 for 10 min @ RT. Staining of formalin-fixed tissue requires boiling tissue sections in 10 mM Citrate Buffer, pH 6.0 for 10 min followed by cooling at RT for 20 min.

# **REFERENCES**