

**TPX2 Antibody**  
**Purified Mouse Monoclonal Antibody (Mab)**  
**Catalog # AM8582b****Specification**

---

**TPX2 Antibody - Product Information**

Application	WB,E
Primary Accession	<a href="#">O9ULW0</a>
Reactivity	Human
Host	Mouse
Clonality	monoclonal
Isotype	IgG1,k
Calculated MW	85653

**TPX2 Antibody - Additional Information****Gene ID** 22974**Other Names**

Targeting protein for Xklp2, Differentially expressed in cancerous and non-cancerous lung cells 2, DIL-2, Hepatocellular carcinoma-associated antigen 519, Hepatocellular carcinoma-associated antigen 90, Protein fls353, Restricted expression proliferation-associated protein 100, p100, TPX2, C20orf1, C20orf2, DIL2, HCA519

**Target/Specificity**

This TPX2 antibody is generated from a mouse immunized with a recombinant protein between 1-531 amino acids from the human TPX2.

**Dilution**

WB~~1:2000

**Format**

Purified monoclonal antibody supplied in PBS with 0.09% (W/V) sodium azide. This antibody is purified through a protein G column, followed by dialysis against PBS.

**Storage**

Maintain refrigerated at 2-8°C for up to 2 weeks. For long term storage store at -20°C in small aliquots to prevent freeze-thaw cycles.

**Precautions**

TPX2 Antibody is for research use only and not for use in diagnostic or therapeutic procedures.

**TPX2 Antibody - Protein Information****Name** TPX2**Synonyms** C20orf1, C20orf2, DIL2, HCA519

**Function** Spindle assembly factor required for normal assembly of mitotic spindles. Required for normal assembly of microtubules during apoptosis. Required for chromatin and/or kinetochore dependent microtubule nucleation. Mediates AURKA localization to spindle microtubules (PubMed:[18663142](#), PubMed:[19208764](#), PubMed:[37728657](#)). Activates AURKA by promoting its autophosphorylation at 'Thr-288' and protects this residue against dephosphorylation (PubMed:[18663142](#), PubMed:[19208764](#)). TPX2 is inactivated upon binding to importin-alpha (PubMed:[26165940](#)). At the onset of mitosis, GOLGA2 interacts with importin-alpha, liberating TPX2 from importin-alpha, allowing TPX2 to activate AURKA kinase and stimulates local microtubule nucleation (PubMed:[26165940](#)).

#### Cellular Location

Nucleus. Cytoplasm, cytoskeleton, spindle. Cytoplasm, cytoskeleton, spindle pole. Note=During mitosis it is strictly associated with the spindle pole and with the mitotic spindle, whereas during S and G2, it is diffusely distributed throughout the nucleus. Is released from the nucleus in apoptotic cells and is detected on apoptotic microtubules.

#### Tissue Location

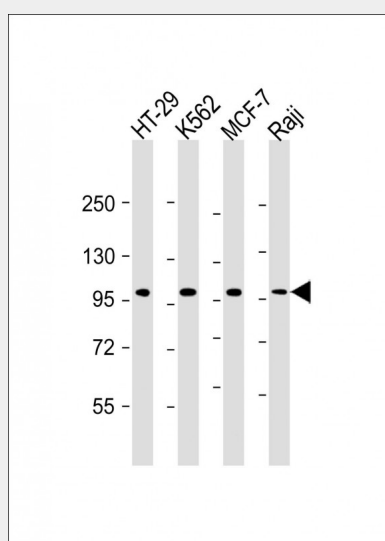
Expressed in lung carcinoma cell lines but not in normal lung tissues

### TPX2 Antibody - Protocols

Provided below are standard protocols that you may find useful for product applications.

- [Western Blot](#)
- [Blocking Peptides](#)
- [Dot Blot](#)
- [Immunohistochemistry](#)
- [Immunofluorescence](#)
- [Immunoprecipitation](#)
- [Flow Cytometry](#)
- [Cell Culture](#)

### TPX2 Antibody - Images



All lanes : Anti-TPX2 Antibody at 1:2000 dilution Lane 1: HT-29 whole cell lysate Lane 2: K562 whole cell lysate Lane 3: MCF-7 whole cell lysate Lane 4: Raji whole cell lysate Lysates/proteins at 20 µg per lane. Secondary Goat Anti-mouse IgG, (H+L), Peroxidase conjugated at 1/10000

dilution. Predicted band size : 86 kDa Blocking/Dilution buffer: 5% NFDM/TBST.

### **TPX2 Antibody - Background**

Spindle assembly factor. Required for normal assembly of mitotic spindles. Required for normal assembly of microtubules during apoptosis. Required for chromatin and/or kinetochore dependent microtubule nucleation. Mediates AURKA localization to spindle microtubules. Activates AURKA by promoting its autophosphorylation at 'Thr-288' and protects this residue against dephosphorylation.

### **TPX2 Antibody - References**

Manda R.,et al.Genomics 61:5-14(1999).  
Zhang Y.,et al.Cytogenet. Cell Genet. 84:182-183(1999).  
Nezu J.,et al.Submitted (MAR-1999) to the EMBL/GenBank/DDBJ databases.  
Wang Y.,et al.J. Immunol. 169:1102-1109(2002).  
Deloukas P.,et al.Nature 414:865-871(2001).