10320 Camino Santa Fe, Suite G
San Diego, CA 92121
Tel: 858.875.1900 Fax: 858.875.1999

Anti-Topoisomerase 2 alpha (Phospho-S1106) Antibody

Catalog # AP61172

Product Information

Application	WB, IHC, IF/IC
Primary Accession	P11388
Reactivity	Human, Mouse, Rat, Pig
Host	Rabbit
Clonality	Polyclonal
Calculated MW	174385

Additional Information

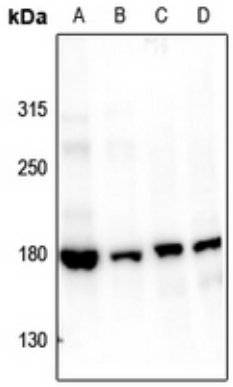
Gene ID	7153
Other Names	TOP2; DNA topoisomerase 2-alpha; DNA topoisomerase II alpha isozyme
Target/Specificity	KLH-conjugated synthetic phosphopeptide corresponding to residues surrounding S1106 of human Topoisomerase 2 alpha protein. The exact sequence is proprietary.
Dilution	WB~~WB (1/500 - 1/1000), IHC (1/50 - 1/200) IHC~~WB (1/500 - 1/1000), IHC (1/50 - 1/200) IF/IC~~N/A
Format	Liquid in 0.42% Potassium phosphate, 0.87% Sodium chloride, pH 7.3, 30% glycerol, and 0.01% sodium azide.
Storage	Store at -20 °C.Stable for 12 months from date of receipt

Protein Information

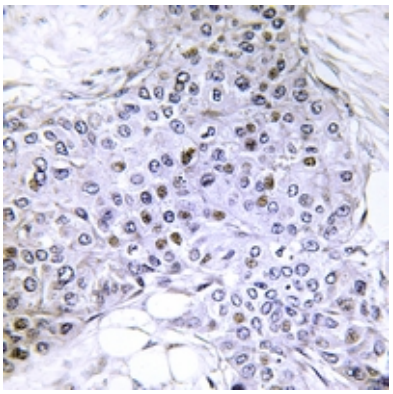
Name	TOP2A
Synonyms	TOP2
Function	Key decatenating enzyme that alters DNA topology by binding to two double-stranded DNA molecules, generating a double-stranded break in one of the strands, passing the intact strand through the broken strand, and religating the broken strand (PubMed:17567603, PubMed:18790802, PubMed:22013166, PubMed:22323612, PubMed:27754753). May play a role in regulating the period length of BMAL1 transcriptional oscillation (By similarity).
Cellular Location	Cytoplasm. Nucleus, nucleoplasm. Nucleus. Nucleus, nucleolus
Tissue Location	Expressed in the tonsil, spleen, lymph node, thymus, skin, pancreas, testis, colon, kidney, liver, brain and lung (PubMed:9155056). Also found in

high-grade lymphomas, squamous cell lung tumors and seminomas (PubMed:9155056)

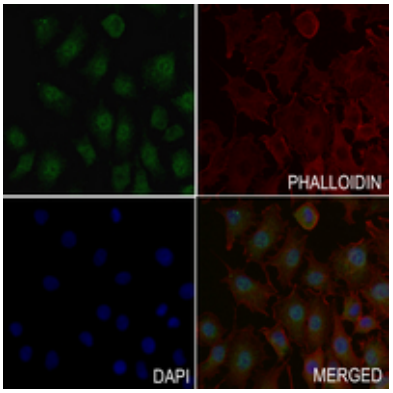
Images



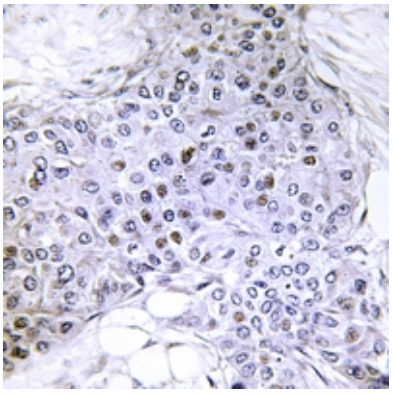
Western blot analysis of Topoisomerase 2 alpha (Phospho-S1106) expression in Myla2059 (A), HuT78 (B), mouse testis (C), rat testis (D) whole cell lysates. (Predicted band size: 174 kD; Observed band size: 180 kD)



Immunohistochemical analysis of Topoisomerase 2 alpha (Phospho-S1106) staining in human breast cancer formalin fixed paraffin embedded tissue section. The section was pre-treated using heat mediated antigen retrieval with sodium citrate buffer (pH 6.0). The section was then incubated with the antibody at room temperature and detected using an HRP conjugated compact polymer system. DAB was used as the chromogen. The section was then counterstained with haematoxylin and mounted with DPX.



Immunofluorescent analysis of Topoisomerase 2 alpha (Phospho-S1106) staining in A549 cells. Formalin-fixed cells were permeabilized with 0.1% Triton X-100 in TBS for 5-10 minutes and blocked with 3% BSA-PBS for 30 minutes at room temperature. Cells were probed with the primary antibody in 3% BSA-PBS and incubated overnight at 4 °C in a hidified chamber. Cells were washed with PBST and incubated with a AF488-conjugated secondary antibody (green) in PBS at room temperature in the dark. Phalloidin - AF594 was used to stain Actin filaments (red). DAPI was used to stain the cell nuclei (blue).



Immunohistochemical analysis of Topoisomerase 2 alpha (pS1106) staining in human breast cancer formalin fixed paraffin embedded tissue section. The section was pre-treated using heat mediated antigen retrieval with sodium citrate buffer (pH 6.0). The section was then incubated with the antibody at room temperature and detected using an HRP conjugated compact polymer system. DAB was used as the chromogen. The section was then counterstained with haematoxylin and mounted with DPX.

Please note: All products are 'FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC OR THERAPEUTIC PROCEDURES'.