

## Product datasheet for **TA377964**

### **LATS1 Rabbit Polyclonal Antibody**

#### **Product data:**

Product Type:	Primary Antibodies
Applications:	IHC, WB
Recommended Dilution:	WB, 1:500 - 1:2000 IHC, 1:50 - 1:200
Reactivity:	Human
Modifications:	phospho T1079, Phospho T1041
Host:	Rabbit
Isotype:	IgG
Clonality:	Polyclonal
Immunogen:	A phospho specific peptide corresponding to residues surrounding T1079 of human LATS1.
Formulation:	Buffer: PBS with 0.02% sodium azide, 50% glycerol, pH 7.3.
Concentration:	lot specific
Purification:	Affinity purification
Conjugation:	Unconjugated
Storage:	Store at -20°C. Avoid freeze / thaw cycles.
Stability:	Shelf life: one year from despatch.
Predicted Protein Size:	76kDa/126kDa
Gene Name:	large tumor suppressor kinase 1
Database Link:	<a href="#">Entrez Gene 9113 Human</a> <a href="#">O95835</a>



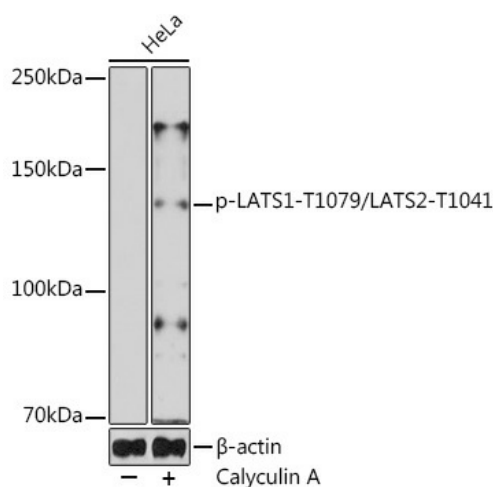
[View online »](#)

**Background:**

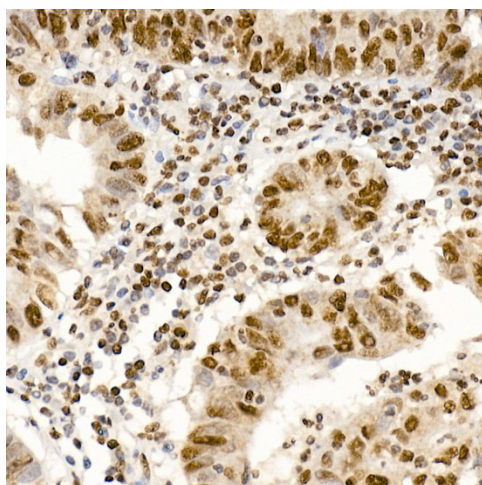
The protein encoded by this gene is a putative serine/threonine kinase that localizes to the mitotic apparatus and complexes with cell cycle controller CDC2 kinase in early mitosis. The protein is phosphorylated in a cell-cycle dependent manner, with late prophase phosphorylation remaining through metaphase. The N-terminal region of the protein binds CDC2 to form a complex showing reduced H1 histone kinase activity, indicating a role as a negative regulator of CDC2/cyclin A. In addition, the C-terminal kinase domain binds to its own N-terminal region, suggesting potential negative regulation through interference with complex formation via intramolecular binding. Biochemical and genetic data suggest a role as a tumor suppressor. This is supported by studies in knockout mice showing development of soft-tissue sarcomas, ovarian stromal cell tumors and a high sensitivity to carcinogenic treatments.

**Synonyms:**

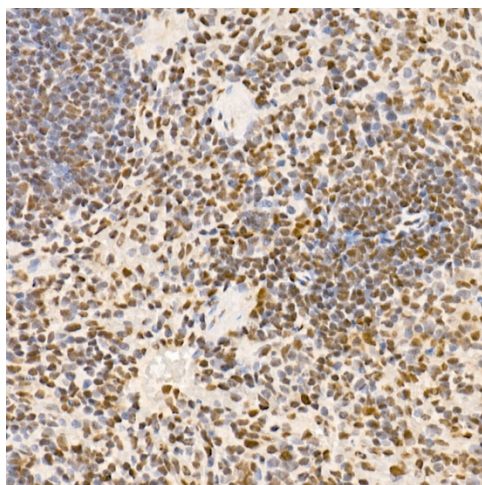
h-warts; WARTS; wts

**Product images:**


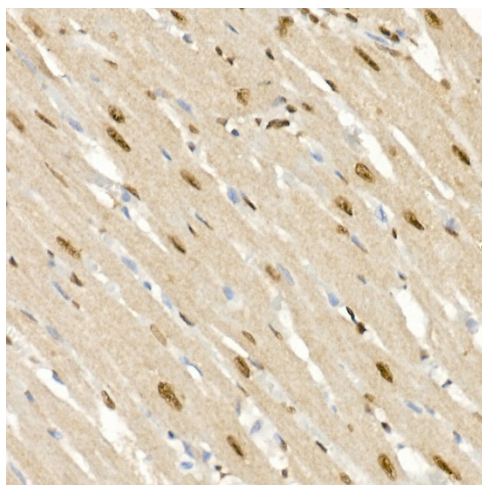
Western blot analysis of extracts of HeLa cells, using phospho-LATS1-T1079/LATS2-T1041 antibody (TA377964) at 1:1000 dilution. HeLa cells were treated by Calyculin A (100 nM) at 37°C for 30 minutes after serum-starvation overnight. | Secondary antibody: HRP Goat Anti-Rabbit IgG (H+L) at 1:10000 dilution. | Lysates/proteins: 25ug per lane. | Blocking buffer: 3% nonfat dry milk in TBST. | Detection: ECL Basic Kit. | Exposure time: 180s.



Immunohistochemistry of paraffin-embedded human colon carcinoma using phospho-LATS1-T1079/LATS2-T1041 Rabbit pAb (TA377964) at dilution of 1:25 (40x lens). Perform high pressure antigen retrieval with 10 mM citrate buffer pH 6.0 before commencing with IHC staining protocol.



Immunohistochemistry of paraffin-embedded mouse spleen using phospho-LATS1-T1079/LATS2-T1041 Rabbit pAb (TA377964) at dilution of 1:25 (40x lens). Perform high pressure antigen retrieval with 10 mM citrate buffer pH 6.0 before commencing with IHC staining protocol.



Immunohistochemistry of paraffin-embedded rat heart using phospho-LATS1-T1079/LATS2-T1041 Rabbit pAb (TA377964) at dilution of 1:25 (40x lens). Perform high pressure antigen retrieval with 10 mM citrate buffer pH 6.0 before commencing with IHC staining protocol.