

**KD-Validated Anti-STK4 Rabbit Monoclonal Antibody**  
**Rabbit monoclonal Antibody**  
**Catalog # AGI2195****Specification****KD-Validated Anti-STK4 Rabbit Monoclonal Antibody - Product Information**

Application	WB, FC
Primary Accession	<a href="#">Q13043</a>
Reactivity	Rat, Human
Clonality	Monoclonal
Isotype	Rabbit IgG
Calculated MW	Predicted, 56 kDa, observed, 56 kDa kDa
Gene Name	STK4
Aliases	STK4; Serine/Threonine Kinase 4; MST1; KRS2; YSK3; Mammalian STE20-Like Protein Kinase 1; Serine/Threonine-Protein Kinase Krs-2; Serine/Threonine-Protein Kinase 4; Kinase Responsive To Stress 2; Mammalian Sterile 20-Like 1; STE20-Like Kinase MST1; EC 2.7.11.1; Hippo (Drosophila) Homolog; Yeast Ste20-Like; Hippo Homolog; EC 2.7.11; MST-1
Immunogen	A synthesized peptide derived from human Serine/threonine-protein kinase 4

**KD-Validated Anti-STK4 Rabbit Monoclonal Antibody - Additional Information**

Gene ID	6789
Other Names	Serine/threonine-protein kinase 4, 2.7.11.1, Mammalian STE20-like protein kinase 1, MST-1, STE20-like kinase MST1, Serine/threonine-protein kinase Krs-2, Serine/threonine-protein kinase 4 37kDa subunit, MST1/N, Serine/threonine-protein kinase 4 18kDa subunit, MST1/C, STK4 ( <a href="http://www.genenames.org/cgi-bin/gene_symbol_report?hgnc_id=11408">http://www.genenames.org/cgi-bin/gene_symbol_report?hgnc_id=11408</a> )

**KD-Validated Anti-STK4 Rabbit Monoclonal Antibody - Protein Information****Name** STK4 ([HGNC:11408](#))**Function**

Stress-activated, pro-apoptotic kinase which, following caspase-cleavage, enters the nucleus and induces chromatin condensation followed by internucleosomal DNA fragmentation. Key component of the Hippo signaling pathway which plays a pivotal role in organ size control and tumor suppression by restricting proliferation and promoting apoptosis. The core of this pathway is composed of a kinase cascade wherein STK3/MST2 and STK4/MST1, in complex with its regulatory protein SAV1, phosphorylates and activates LATS1/2 in complex with its regulatory protein MOB1, which in turn phosphorylates and inactivates YAP1 oncoprotein and WWTR1/TAZ. Phosphorylation of YAP1 by LATS2 inhibits its translocation into the nucleus to regulate cellular genes important for

cell proliferation, cell death, and cell migration. STK3/MST2 and STK4/MST1 are required to repress proliferation of mature hepatocytes, to prevent activation of facultative adult liver stem cells (oval cells), and to inhibit tumor formation (By similarity). Phosphorylates 'Ser-14' of histone H2B (H2BS14ph) during apoptosis. Phosphorylates FOXO3 upon oxidative stress, which results in its nuclear translocation and cell death initiation. Phosphorylates MOBKL1A, MOBKL1B and RASSF2. Phosphorylates TNNI3 (cardiac Tn-I) and alters its binding affinity to TNNC1 (cardiac Tn-C) and TNNT2 (cardiac Tn-T). Phosphorylates FOXO1 on 'Ser-212' and regulates its activation and stimulates transcription of PMAIP1 in a FOXO1-dependent manner. Phosphorylates SIRT1 and inhibits SIRT1-mediated p53/TP53 deacetylation, thereby promoting p53/TP53 dependent transcription and apoptosis upon DNA damage. Acts as an inhibitor of PKB/AKT1. Phosphorylates AR on 'Ser-650' and suppresses its activity by intersecting with PKB/AKT1 signaling and antagonizing formation of AR- chromatin complexes.

#### Cellular Location

Cytoplasm. Nucleus. Note=The caspase-cleaved form cycles between the nucleus and cytoplasm

#### Tissue Location

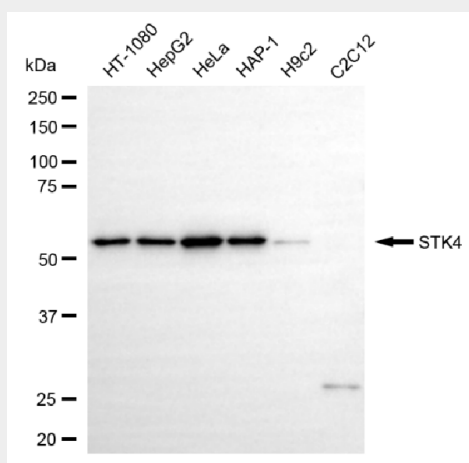
Expressed in prostate cancer and levels increase from the normal to the malignant state (at protein level). Ubiquitously expressed.

### KD-Validated Anti-STK4 Rabbit Monoclonal Antibody - Protocols

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

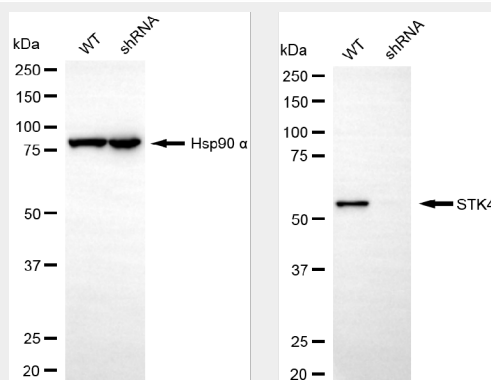
- [Western Blot](#)
- [Blocking Peptides](#)
- [Dot Blot](#)
- [Immunohistochemistry](#)
- [Immunofluorescence](#)
- [Immunoprecipitation](#)
- [Flow Cytometry](#)
- [Cell Culture](#)

### KD-Validated Anti-STK4 Rabbit Monoclonal Antibody - Images

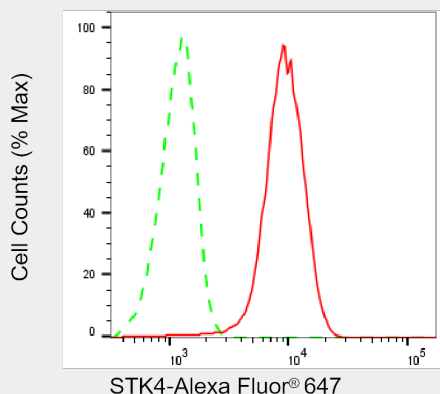


Western blotting analysis using anti-STK4 antibody (Cat#65193). Total cell lysates (30 µg) from various cell lines were loaded and separated by SDS-PAGE. The blot was incubated with anti-STK4 antibody (Cat#65193, 1:5,000) and HRP-conjugated goat anti-rabbit secondary antibody (Cat#201, 1:20,000) respectively. Image was developed using NaQ™ ECL Substrate Kit

(Cat#716).



Copyright ©2025 Genuin Biotechnologies LLC



Copyright ©2025 Genuin Biotechnologies LLC