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MCTS1 Antibody (N-Term)

Peptide-affinity purified goat antibody
Catalog # AF3876a

Specification

MCTS1 Antibody (N-Term) - Product Information

Application	**WB**
Primary Accession	Q9ULC4
Other Accession	NP_054779.1, NP_001131026.1, 28985
Reactivity	**Human**
Predicted	**Pig, Dog, Cow**
Host	**Goat**
Clonality	**Polyclonal**
Concentration	**0.5 mg/ml**
Isotype	**IgG**
Calculated MW	**20555**

MCTS1 Antibody (N-Term) - Additional Information

Gene ID 28985

Other Names
Malignant T-cell-amplified sequence 1, MCT-1, Multiple copies T-cell malignancies, MCTS1, MCT1

Format
0.5 mg/ml in Tris saline, 0.02% sodium azide, pH7.3 with 0.5% bovine serum albumin

Storage
Maintain refrigerated at 2-8°C for up to 6 months. For long term storage store at -20°C in small aliquots to prevent freeze-thaw cycles.

Precautions
MCTS1 Antibody (N-Term) is for research use only and not for use in diagnostic or therapeutic procedures.

MCTS1 Antibody (N-Term) - Protein Information

Name MCTS1

Synonyms MCT1

Function
Anti-oncogene that plays a role in cell cycle regulation; decreases cell doubling time and anchorage-dependent growth; shortens the duration of G1 transit time and G1/S transition. When constitutively expressed, increases CDK4 and CDK6 kinases activity and CCND1/cyclin D1 protein level, as well as G1 cyclin/CDK complex formation. Involved in translation initiation; promotes recruitment of aminoacetyled initiator tRNA to P site of 40S ribosomes. Can promote release of

deacylated tRNA and mRNA from recycled 40S subunits following ABCE1-mediated dissociation of post-termination ribosomal complexes into subunits. Plays a role as translation enhancer; recruits the density-regulated protein/DENR and binds to the cap complex of the 5'-terminus of mRNAs, subsequently altering the mRNA translation profile; up-regulates protein levels of BCL2L2, TFDP1, MRE11, CCND1 and E2F1, while mRNA levels remains constant. Hyperactivates DNA damage signaling pathway; increased gamma-irradiation-induced phosphorylation of histone H2AX, and induces damage foci formation. Increases the overall number of chromosomal abnormalities such as larger chromosomes formation and multiple chromosomal fusions when overexpressed in gamma- irradiated cells. May play a role in promoting lymphoid tumor development: lymphoid cell lines overexpressing MCTS1 exhibit increased growth rates and display increased protection against apoptosis. May contribute to the pathogenesis and progression of breast cancer via promotion of angiogenesis through the decline of inhibitory THBS1/thrombospondin-1, and inhibition of apoptosis. Involved in the process of proteasome degradation to down-regulate Tumor suppressor p53/TP53 in breast cancer cell; Positively regulates phosphorylation of MAPK1 and MAPK3. Involved in translation initiation; promotes aminoacetyled initiator tRNA to P site of 40S ribosomes. Can promote release of deacylated tRNA and mRNA from recycled 40S subunits following ABCE1-mediated dissociation of post-termination ribosomal complexes into subunits.

Cellular Location
Cytoplasm. Note=Nuclear relocalization after DNA damage

Tissue Location
Ubiquitous. Over-expressed in T-cell lymphoid cell lines and in non-Hodgkin lymphoma cell lines as well as in a subset of primary large B-cell lymphomas.

MCTS1 Antibody (N-Term) - Protocols

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

- Western Blot
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- Cell Culture

MCTS1 Antibody (N-Term) - Images

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AF3876a (0.3 µg/ml) staining of MOLT4 lysate (35 µg protein in RIPA buffer). Primary incubation was 1 hour. Detected by chemiluminescence.

MCTS1 Antibody (N-Term) - Background

This antibody is expected to recognize both reported isosoforms (NP_054779.1; NP_001131026.1).

MCTS1 Antibody (N-Term) - References

The antagonism between MCT-1 and p53 affects the tumorigenic outcomes. Kasiappan R, Shih HJ, Wu MH, Choy C, Lin TD, Chen L, Hsu HL. Mol Cancer. 2010 Dec 7;9:311. PMID: 21138557