

C-TAK1 Polyclonal Antibody

Catalog # AP69330

Product Information

Application WB, IHC-P, IF **Primary Accession** P27448

Reactivity Human, Mouse, Rat

HostRabbitClonalityPolyclonalCalculated MW84429

Additional Information

Gene ID 4140

Other Names MARK3; CTAK1; EMK2; MAP/microtubule affinity-regulating kinase 3; C-TAK1;

cTAK1; Cdc25C-associated protein kinase 1; ELKL motif kinase 2; EMK-2;

Protein kinase STK10; Ser/Thr protein kinase PAR-1; Par-1a;

Serine/threonine-protein kinase p78

Dilution WB~~Western Blot: 1/500 - 1/2000. Immunohistochemistry: 1/100 - 1/300.

Immunofluorescence: 1/200 - 1/1000. ELISA: 1/40000. Not yet tested in other

applications. IHC-P~~N/A IF~~1:50~200

Format Liquid in PBS containing 50% glycerol, 0.5% BSA and 0.09% (W/V) sodium

azide.

Storage Conditions -20°C

Protein Information

Name MARK3

Synonyms CTAK1, EMK2

Function Serine/threonine-protein kinase (PubMed: 16822840, PubMed: 16980613,

PubMed: <u>23666762</u>). Involved in the specific phosphorylation of

microtubule-associated proteins for MAP2 and MAP4. Phosphorylates the

microtubule-associated protein MAPT/TAU (PubMed:23666762). Phosphorylates CDC25C on 'Ser-216' (PubMed:12941695). Regulates localization and activity of some histone deacetylases by mediating phosphorylation of HDAC7, promoting subsequent interaction between HDAC7 and 14-3-3 and export from the nucleus (PubMed:16980613).

Regulates localization and activity of MITF by mediating its phosphorylation, promoting subsequent interaction between MITF and 14-3-3 and retention in the cytosol (PubMed: 16822840). Negatively regulates the Hippo signaling pathway and antagonizes the phosphorylation of LATS1. Cooperates with

DLG5 to inhibit the kinase activity of STK3/MST2 toward LATS1

(PubMed: 28087714). Phosphorylates PKP2 and KSR1 (PubMed: 12941695).

Cellular Location Cell membrane; Peripheral membrane protein. Cell projection, dendrite.

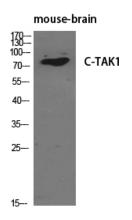
Cytoplasm

Tissue Location Ubiquitous.

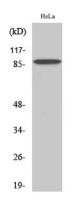
Background

Serine/threonine-protein kinase (PubMed: 23666762). Involved in the specific phosphorylation of microtubule-associated proteins for MAP2 and MAP4. Phosphorylates the microtubule- associated protein MAPT/TAU (PubMed:23666762). Phosphorylates CDC25C on 'Ser-216'. Regulates localization and activity of some histone deacetylases by mediating phosphorylation of HDAC7, promoting subsequent interaction between HDAC7 and 14-3-3 and export from the nucleus (PubMed:16980613). Negatively regulates the Hippo signaling pathway and antagonizes the phosphorylation of LATS1. Cooperates with DLG5 to inhibit the kinase activity of STK3/MST2 toward LATS1 (PubMed:28087714).

Images



Western Blot analysis of various cells using C-TAK1 Polyclonal Antibody diluted at 1:500



Western Blot analysis of 293 cells using C-TAK1 Polyclonal Antibody diluted at 1:500

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