

Product datasheet for TA383968M

OriGene Technologies, Inc.

9620 Medical Center Drive, Ste 200 Rockville, MD 20850, US Phone: +1-888-267-4436 https://www.origene.com techsupport@origene.com EU: info-de@origene.com CN: techsupport@origene.cn

CDK4 Rabbit Monoclonal Antibody [Clone ID: R04-415]

Product data:

Product Type: Primary Antibodies

Clone Name: R04-4I5

Applications: IF, IHC, IP, WB **Recommended Dilution:** WB: 1/1000

IHC: 1/50 ICC/IF: 1/50 IP: 1/20

Reactivity: Human, Mouse, Rat

Host: Rabbit Isotype: IgG

Clonality: Monoclonal

Immunogen: Recombinant protein of human Cdk4

Formulation: 50mM Tris-Glycine(pH 7.4), 0.15M NaCl, 40% Glycerol, 0.01% Sodium azide and 0.05% BSA

Concentration: lot specific

Purification: Affinity Purified
Conjugation: Unconjugated

Storage: Store at 4°C short term. Aliquot and store at -20°C long term. Avoid freeze/thaw cycles.

Stability: 1 year

Predicted Protein Size: Calculated MW: 34 kDa; Observed MW: 34 kDa

Gene Name: cyclin-dependent kinase 4

Database Link: Entrez Gene 1019 Human

P11802



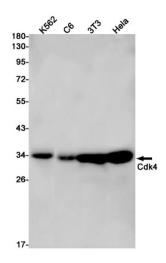


Background:

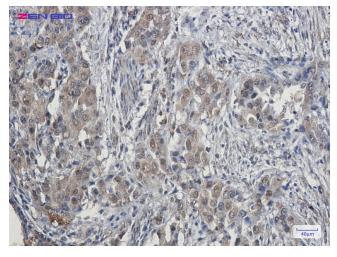
Swiss-Prot Acc.P11802.Ser/Thr-kinase component of cyclin D-CDK4 (DC) complexes that phosphorylate and inhibit members of the retinoblastoma (RB) protein family including RB1 and regulate the cell-cycle during G1/S transition. Phosphorylation of RB1 allows dissociation of the transcription factor E2F from the RB/E2F complexes and the subsequent transcription of E2F target genes which are responsible for the progression through the G1 phase. Hypophosphorylates RB1 in early G1 phase. Cyclin D-CDK4 complexes are major integrators of various mitogenenic and antimitogenic signals. Also phosphorylates SMAD3 in a cell-cycle-dependent manner and represses its transcriptional activity. Component of the ternary complex, cyclin D/CDK4/CDKN1B, required for nuclear translocation and activity of the cyclin D-CDK4 complex.

Synonyms: CMM3; MGC14458; PSK-J3

Product images:



Western blot analysis of Cdk4 in K562, C6, 3T3, Hela lysates using CDK4 antibody.



Immunohistochemistry of Cdk4 in paraffinembedded Human lung cancer tissue using Cdk4 Rabbit mAb at dilution 1/50