

# **CSK Antibody**

Purified Mouse Monoclonal Antibody Catalog # AO1469a

#### **Specification**

# **CSK Antibody - Product Information**

Application WB, FC, ICC, E

Primary Accession P41240

Reactivity Human, Mouse, Rat, Monkey

Host Mouse
Clonality Monoclonal
Isotype IgG1
Calculated MW 50kDa KDa

**Description** 

Carboxy-terminal Src kinase (Csk) is a ubiquitously expressed nonreceptor tyrosine kinase that negatively regulates the Src family kinases (SFK) by phosphorylation of the SFK carboxy-terminal tyrosine. Phosphorylated carboxy-terminal tyrosine binds to the SH2 domain of SFK intramolecularly and leads to folding and inactivation of the SFK. This Csk-catalyzed SFK tyrosine phosphorylation is highly specific and exclusive. The SFK carboxy-terminal tyrosine is the only known physiological substrate of Csk. Tissue specificity: Expressed in lung and macrophages.

#### **Immunogen**

Purified recombinant fragment of human CSK expressed in E. Coli.

# **Formulation**

Ascitic fluid containing 0.03% sodium azide.

# **CSK Antibody - Additional Information**

## **Gene ID 1445**

#### **Other Names**

Tyrosine-protein kinase CSK, 2.7.10.2, C-Src kinase, Protein-tyrosine kinase CYL, CSK

#### **Dilution**

WB~~1/500 - 1/2000 FC~~1/200 - 1/400 ICC~~N/A E~~N/A

#### **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**

CSK Antibody is for research use only and not for use in diagnostic or therapeutic procedures.

# **CSK Antibody - Protein Information**



#### **Name CSK**

#### **Function**

Non-receptor tyrosine-protein kinase that plays an important role in the regulation of cell growth, differentiation, migration and immune response. Phosphorylates tyrosine residues located in the C-terminal tails of Src-family kinases (SFKs) including LCK, SRC, HCK, FYN, LYN, CSK or YES1. Upon tail phosphorylation, Src-family members engage in intramolecular interactions between the phosphotyrosine tail and the SH2 domain that result in an inactive conformation. To inhibit SFKs, CSK is recruited to the plasma membrane via binding to transmembrane proteins or adapter proteins located near the plasma membrane. Suppresses signaling by various surface receptors, including T-cell receptor (TCR) and B-cell receptor (BCR) by phosphorylating and maintaining inactive several positive effectors such as FYN or LCK.

#### **Cellular Location**

Cytoplasm. Cell membrane. Note=Mainly cytoplasmic, also present in lipid rafts

### **Tissue Location**

Expressed in lung and macrophages.

# **CSK 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 Cytomety
- Cell Culture

# **CSK Antibody - Images**

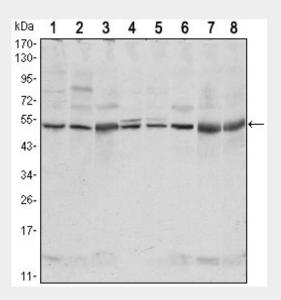


Figure 1: Western blot analysis using CSK mouse mAb against NIH/3T3 (1)□Hela (2)□COS7 (3), Jurkat (4), Raw246.7 (5), A549 (6), HL-60 (7) and PC-12 (8) cell lysate.



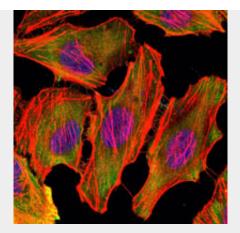


Figure 2: Immunofluorescence analysis of U251 cells using CSK mouse mAb (green). Blue: DRAQ5 fluorescent DNA dye. Red: Actin filaments have been labeled with Alexa Fluor-555 phalloidin.

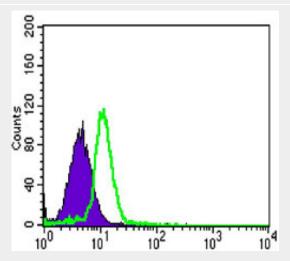


Figure 3: Flow cytometric analysis of HL-60 cells using CSK mouse mAb (green) and negative control (purple).

# **CSK Antibody - References**

1. Nat Genet. 2009 Jun;41(6):677-87. 2. Leuk Res. 2009 Sep;33(9):e168-9. 3. J Hypertens. 2011 Jan;29(1):62-9.