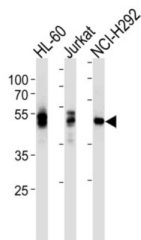


Proto-Oncogene Tyrosine-Protein Kinase LCK (LCK) Antibody

Catalogue No.: abx034905



Non-receptor tyrosine-protein kinase that plays an essential role in the selection and maturation of developing T-cells in the thymus and in the function of mature T-cells. Plays a key role in T-cell antigen receptor (TCR) linked signal transduction pathways. Constitutively associated with the cytoplasmic portions of the CD4 and CD8 surface receptors. Association of the TCR with a peptide antigen-bound MHC complex facilitates the interaction of CD4 and CD8 with MHC class II and class I molecules, respectively, thereby recruiting the associated LCK protein to the vicinity of the TCR/CD3 complex. LCK then phosphorylates tyrosine residues within the immunoreceptor tyrosine-based activation motifs (ITAM) of the cytoplasmic tails of the TCR-gamma chains and CD3 subunits, initiating the TCR/CD3 signaling pathway. Once stimulated, the TCR recruits the tyrosine kinase ZAP70, that becomes phosphorylated and activated by LCK. Following this, a large number of signaling molecules are recruited, ultimately leading to lymphokine production. LCK also contributes to signaling by other receptor molecules. Associates directly with the cytoplasmic tail of CD2, which leads to hyperphosphorylation and activation of LCK. Also plays a role in the IL2 receptor-linked signaling pathway that controls the T-cell proliferative response. Binding of IL2 to its receptor results in increased activity of LCK. Is expressed at all stages of thymocyte development and is required for the regulation of maturation events that are governed by both pre-TCR and mature alpha beta TCR. Phosphorylates other substrates including RUNX3, PTK2B/PYK2, the microtubule-associated protein MAPT, RHOH or TYROBP. This antibody is supplied as crude ascites.

Target: Proto-Oncogene Tyrosine-Protein Kinase LCK (LCK)

Clonality: Monoclonal

Reactivity: Human

Tested Applications: ELISA, WB

Host: Mouse

Recommended dilutions: WB: 1/5000. Optimal dilutions/concentrations should be determined by the end user.

Conjugation: Unconjugated

Immunogen: Purified His-tagged Human LCK protein

Isotype: IgG₁

Form: Liquid

Datasheet

Version: 2.0.0
Revision date: 20 Jul 2025



Purification:	Unpurified crude ascites.
Storage:	Aliquot and store at -20°C. Avoid repeated freeze/thaw cycles.
UniProt Primary AC:	P06239 (UniProt , ExPASy)
NCBI Accession:	NP_001036236.1, NP_005347.3
KEGG:	hsa:3932
String:	9606.ENSP00000337825
Molecular Weight:	Calculated MW: 58 kDa
Buffer:	Ascites containing 0.09% sodium azide.
Note:	THIS PRODUCT IS FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC, THERAPEUTIC OR COSMETIC PROCEDURES. NOT FOR HUMAN OR ANIMAL CONSUMPTION.

For Reference Only