

## **BLNK Monoclonal Antibody**

| Catalog No :        | YM0068  |
|---------------------|---|
| Reactivity :        | Human;Mouse   |
| Applications :      | WB;IHC;IF;FCM;ELISA   |
| Target :            | BLNK  |
| Fields :            | >>NF-kappa B signaling pathway;>>Osteoclast differentiation;>>B cell receptor signaling pathway;>>Epstein-Barr virus infection;>>Primary immunodeficiency |
| Gene Name :         | BLNK  |
| Protein Name :      | B-cell linker protein   |
| Human Gene Id :     | 29760   |
| Human Swiss Prot    | Q8WV28  |
| Mouse Gene Id :     | 17060   |
| Mouse Swiss Prot    | Q9QUN3  |
| Immunogen :         | Purified recombinant fragment of human BLNK expressed in E. Coli.   |
| Specificity :       | BLNK Monoclonal Antibody detects endogenous levels of BLNK protein.   |
| Formulation :       | Liquid in PBS containing 50% glycerol, 0.5% BSA and 0.02% sodium azide.   |
| Source :            | Monoclonal, Mouse   |
| Dilution :          | WB 1:500 - 1:2000. IHC 1:200 - 1:1000. IF 1:200 - 1:1000. Flow cytometry: 1:200 - 1:400. ELISA: 1:10000. Not yet tested in other applications.            |
| Purification :      | Affinity purification   |
| Storage Stability : | -15°C to -25°C/1 year(Do not lower than -25°C)  |



| Best Tools for immunology Research |  |  |
|------------------------------------|--|--|
| Molecularweight :                  | 50kD   |  |
| Cell Pathway :                     | B_Cell_Antigen;Primary immunodeficiency;   |  |
| P References :                     | 1. J Biol Chem. 2009 Apr 10;284(15):9804-13.<br>2. Cancer Sci. 2008 Dec;99(12):2444-54.  |  |
| Background :                       | This gene encodes a cytoplasmic linker or adaptor protein that plays a critical role in B cell development. This protein bridges B cell receptor-associated kinase activation with downstream signaling pathways, thereby affecting various biological functions. The phosphorylation of five tyrosine residues is necessary for this protein to nucleate distinct signaling effectors following B cell receptor activation. Mutations in this gene cause hypoglobulinemia and absent B cells, a disease in which the pro- to pre-B-cell transition is developmentally blocked. Deficiency in this protein has also been shown in some cases of pre-B acute lymphoblastic leukemia. Alternatively spliced transcript variants have been found for this gene. [provided by RefSeq, May 2012],   |  |
| Function :                         | disease:Defects in BLNK are the cause of hypoglobulinemia and absent B-cells [MIM:604515]. This is a developmental blockage at the pro- to pre-B-cell transition.,disease:In 6 of 34 childhood pre-B acute lymphoblastic leukemia (ALL) samples that were tested showed a complete loss or drastic reduction of BLNK expression.,function:Functions as a central linker protein that bridges kinases associated with the B-cell receptor (BCR) with a multitude of signaling pathways, regulating biological outcomes of B-cell function and development. Plays a role in the activation of ERK/EPHB2, MAP kinase p38 and JNK. Modulates AP1 activation. Important for the activation of NF-kappa-B and NFAT. Plays an important role in BCR-mediated PLCG1 and PLCG2 activation and Ca(2+) mobilization and is required for trafficking of the BCR to late endosomes. However, does not seem to be required for pre-BCR-mediated ac |  |
| Subcellular<br>Location :          | Cytoplasm . Cell membrane . BCR activation results in the translocation to membrane fraction.  |  |
| Expression :                       | Expressed in B-cell lineage and fibroblast cell lines (at protein level). Highest levels of expression in the spleen, with lower levels in the liver, kidney, pancreas, small intestines and colon.  |  |

## Products Images





Western Blot analysis using BLNK Monoclonal Antibody against NIH/3T3 (1) and BCBL-1 (2) cell lysate.



Immunohistochemistry analysis of paraffin-embedded human cervical cancer tissues with DAB staining using BLNK Monoclonal Antibody.

Immunofluorescence analysis of HepG2 cells using BLNK Monoclonal Antibody (green). Blue: DRAQ5 fluorescent DNA dye. Red: Actin filaments have been labeled with Alexa Fluor-555 phalloidin.





Flow cytometric analysis of NIH/3T3 cells using BLNK Monoclonal Antibody (green) and negative control (purple).