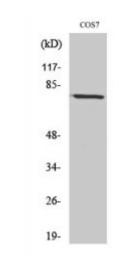


Anti-Bmx antibody



4

Description Rabbit polyclonal to Bmx.

Model STJ91874

Host Rabbit

Reactivity Human, Mouse, Simian

Applications ELISA, IF, IHC, WB

Immunogen Synthesized peptide derived from human Bmx

Immunogen Region 30-110 aa, N-terminal

Gene ID 660

Gene Symbol BMX

Dilution range WB 1:500-1:2000IHC 1:100-1:300IF 1:200-1:1000ELISA 1:20000

Specificity Bmx Polyclonal Antibody detects endogenous levels of Bmx protein.

Tissue Specificity Highly expressed in cells with great migratory potential, including endothelial

cells and metastatic carcinoma cell lines.

Purification The antibody was affinity-purified from rabbit antiserum by affinity-

chromatography using epitope-specific immunogen.

Note For Research Use Only (RUO).

Protein Name Cytoplasmic tyrosine-protein kinase BMX Bone marrow tyrosine kinase gene

in chromosome X protein Epithelial and endothelial tyrosine kinase ETK

NTK38

Molecular Weight 75 kDa

Clonality Polyclonal

Unconjugated Conjugation

IgG Isotype

Liquid in PBS containing 50% glycerol, 0.5% BSA and 0.02% sodium azide. **Formulation**

Concentration 1 mg/ml

Store at -20°C, and avoid repeat freeze-thaw cycles. **Storage Instruction**

HGNC:1079OMIM:300101 **Database Links**

Alternative Names Cytoplasmic tyrosine-protein kinase BMX Bone marrow tyrosine kinase gene

in chromosome X protein Epithelial and endothelial tyrosine kinase ETK

NTK38

Function Non-receptor tyrosine kinase that plays central but diverse modulatory roles in

> various signaling processes involved in the regulation of actin reorganization, cell migration, cell proliferation and survival, cell adhesion, and apoptosis. Participates in signal transduction stimulated by growth factor receptors, cytokine receptors, G-protein coupled receptors, antigen receptors and integrins. Induces tyrosine phosphorylation of BCAR1 in response to integrin

> regulation. Activation of BMX by integrins is mediated by PTK2/FAK1, a key

mediator of integrin signaling events leading to the regulation of actin cytoskeleton and cell motility. Plays a critical role in TNF-induced

angiogenesis, and implicated in the signaling of TEK and FLT1 receptors, 2 important receptor families essential for angiogenesis. Required for the phosphorylation and activation of STAT3, a transcription factor involved in

cell differentiation. Also involved in interleukin-6 (IL6) induced

differentiation. Plays also a role in programming adaptive cytoprotection against extracellular stress in different cell systems, salivary epithelial cells, brain endothelial cells, and dermal fibroblasts. May be involved in regulation of endocytosis through its interaction with an endosomal protein RUFY1. May also play a role in the growth and differentiation of hematopoietic cells; as well as in signal transduction in endocardial and arterial endothelial cells.

SH2 domain mediates interaction with RUFY1. **Sequence and Domain Family**

Cellular Localization Cytoplasm. Localizes to the edges of spreading cells when complexed with

BCAR1.

Phosphorylated in response to protein I/II and to LPS. Phosphorylation at Post-translational **Modifications**

Tyr-566 by SRC and by autocatalysis leads to activation and is required for

STAT3 phosphorylation by BMX.