Anti-TAK1
Rabbit Polyclonal Antibody
Catalog # M15-63R
Lot # O2109-32

Cited Applications
WB, ELISA, IF, IHC

Ideal working dilutions for each application should be empirically determined by the investigator.

Specificity
Recognizes the TAK1 protein

Cross Reactivity
Human, Mouse and Rat

Host/Isotype/Clone#
Rabbit, IgG

Immunogen
TAK1 antibody was raised against a synthetic peptide corresponding to 14 amino acids near the amino-terminus of human TAK1 isoform a

Formulation
PBS + 0.02% sodium azide

Stability
1yr at –20°C from date of shipment

Scientific Background
TAK1 is a serine/threonine protein kinase that mediates signaling by TGFβ and morphogenetic protein (BMP) (1). In response to IL-1, TAK1 forms a kinase complex with TAB1 and this complex is required for the activation of nuclear factor kappa B (NFκB). TAK1 can also activate MAPK8/JNK and MAP2K4/MKK4 and thus play a role in the cell response to environmental stress. Tak1 is essential for thymocyte development and activation and deletion of TAK1 prevents maturation of single-positive thymocytes displaying CD4 or CD8 (2). Thymocytes lacking TAK1 fail to activate NFκB and JNK and are prone to apoptosis upon stimulation.

References