10320 Camino Santa Fe, Suite G
San Diego, CA 92121
Tel: 858.875.1900 Fax: 858.875.1999

Anti-p38α MAP Kinase (Tyr-323), Phosphospecific Antibody

Catalog # AN1879

Specification

Anti-p38α MAP Kinase (Tyr-323), Phosphospecific Antibody - Product Information

Application	**WB**
Primary Accession	P47811
Reactivity	**Bovine, Chicken**
Host	**Rabbit**
Clonality	**Rabbit Polyclonal**
Isotype	**IgG**
Calculated MW	**41287**

Anti-p38α MAP Kinase (Tyr-323), Phosphospecific Antibody - Additional Information

Gene ID	**26416**

Other Names
MAPK, p38, p38alpha, p38MAPK

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
Anti-p38α MAP Kinase (Tyr-323), Phosphospecific Antibody is for research use only and not for use in diagnostic or therapeutic procedures.

Shipping
Blue Ice

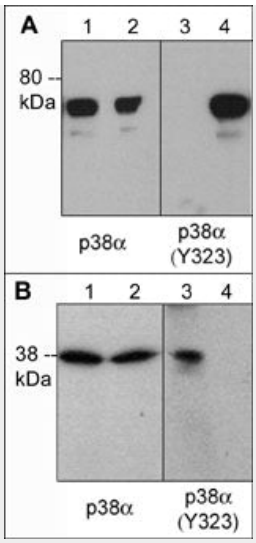
Anti-p38α MAP Kinase (Tyr-323), Phosphospecific Antibody - Protocols

Provided below are standard protocols that you may find useful for product applications.

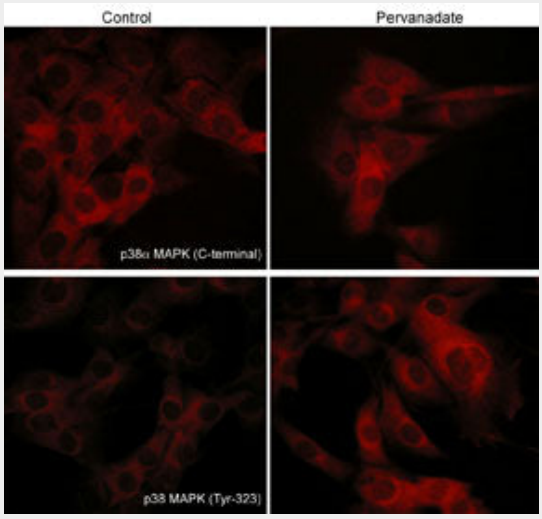
- Western Blot
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- Cell Culture

Anti-p38α MAP Kinase (Tyr-323), Phosphospecific Antibody - Images

10320 Camino Santa Fe, Suite G
San Diego, CA 92121
Tel: 858.875.1900 Fax: 858.875.1999



A) Western blot image of GST-recombinant p38 (K53M) mutant kinase untreated (lanes 1 & 3) or treated with Fyn kinase (lanes 2 & 4). B) Western blot analysis of p38 phosphorylation in mouse macrophages stimulated with 1 mM pervanadate for 30 min. (lanes 1 & 3) then the blot was treated with alkaline phosphatase (lanes 2 & 4). Both blots were probed with anti-p38α (a.a. 319-328) (lanes 1 & 2) or anti-p38α (Tyr-323) (lanes 3 & 4).



Immunocytochemical labeling of p38 MAPK in pervanadate-treated mouse C2C12. The cells were labeled with mouse monoclonal p38α MAPK and rabbit polyclonal p38 MAPK (Tyr-323) antibodies, then the antibodies were detected using appropriate secondary antibodies conjugated to Cy3.

Anti-p38α MAP Kinase (Tyr-323), Phosphospecific Antibody - Background

p38 MAP kinase (MAPK), also called RK, CSBP, and SAPK2a, is the mammalian orthologue of the yeast HOG kinase. This family of kinases participates in signaling cascades that control cellular responses to cytokines and stress. Four isoforms of p38 MAPK (α,β,γ,δ) have been identified. Similar to the SAPK/JNK pathway, p38 MAPK is activated by a variety of cellular stresses including osmotic shock, inflammatory cytokines, lipopolysaccharides, UV light, and growth factors. MKK3 and SEK activate p38 MAPK by dual phosphorylation at Thr-180/Tyr-182. Activated p38 MAPK has been shown to phosphorylate and activate MAPKAP kinase 2 and to phosphorylate the transcription factors ATF-2, Max, and MEF2. T cells possess an alternative pathway for p38 activation where stimulation of the antigen receptor (TCR) induces phosphorylation of p38 on Tyr-323. This site is required for TCR-mediated phosphorylation of Thr-180 and catalytic activity. Thus, Tyr-323 may also have important roles in regulating p38 MAP kinase pathways.