

Anti-JNK (Thr-183/Tyr-185), Phosphospecific Antibody

Catalog # AN1829

Product Information

Application	WB, ICC
Primary Accession	<u>P45983</u>
Host	Mouse
Clonality	Mouse Monoclonal
Isotype	IgG1
Clone Names	M268
Calculated MW	48296

Additional Information

Gene ID Other Names	5599 SAPK1, p49MAPK, MAPK, Mitogen-activated protein kinase 8, c-Jun N-terminal kinase 1, Stress-activated protein kinase JNK1, Stress-activated protein kinase 1c (SAPK1c), JNK46
Target/Specificity	The stress-activated protein kinases (SAPK) or Jun-amino-terminal kinases (JNK) are potently activated by stressors such as UV and gamma radiation. Similar to other MAP Kinases, the core signaling unit is composed of a MAPKKK, usually MEKK1-4 or a mixed lineage kinase (MLK), which phosphorylate and activate MKK4-7, leading to dual phosphorylation and activation of JNK kinases. Rho-GTPases (Rac1 and cdc42) can stimulate MEKKs and MLKs, while MKKs can be activated by a GTPase-independent pathway that involves the germinal center kinase family. There are three JNK genes (JNK1, 2, 3) with further diversification resulting from alternative splicing. Active JNK dimers can translocate to the nucleus to regulate transcription through phosphorylation of c-Jun, ATF-2 and other transcription factors.
Dilution	WB~~1:1000 ICC~~N/A
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-JNK (Thr-183/Tyr-185), Phosphospecific Antibody is for research use only and not for use in diagnostic or therapeutic procedures.
Shipping	Blue Ice

Background

The stress-activated protein kinases (SAPK) or Jun-amino-terminal kinases (JNK) are potently activated by stressors such as UV and gamma radiation. Similar to other MAP Kinases, the core signaling unit is composed of a MAPKKK, usually MEKK1-4 or a mixed lineage kinase (MLK), which phosphorylate and activate MKK4-7, leading to dual phosphorylation and activation of JNK kinases. Rho-GTPases (Rac1 and cdc42) can

stimulate MEKKs and MLKs, while MKKs can be activated by a GTPase-independent pathway that involves the germinal center kinase family. There are three JNK genes (JNK1, 2, 3) with further diversification resulting from alternative splicing. Active JNK dimers can translocate to the nucleus to regulate transcription through phosphorylation of c-Jun, ATF-2 and other transcription factors.

Images



Western blot analysis of PC12 cells untreated (lanes 1 & 3) or treated with calyculin A (100 nM) for 30 minutes (lanes 2 & 4). The blot was probed with anti-JNK1 (lanes 1 & 2) or anti-JNK1 (T183/Y185) (lanes 3 & 4).



Immunocytochemical labeling of JNK in control (Top row) or calyculin A-treated A431 cells (Bottom row). The cells were labeled with mouse monoclonal JNK (C-terminal region) (Left) or mouse monoclonal JNK (Thr-183/Tyr-185) (Right). The antibodies were detected using goat anti-mouse DyLight® 594.

Please note: All products are 'FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC OR THERAPEUTIC PROCEDURES'.