Mouse Monoclonal Antibody to

STAT1 (phospho-Ser 727)

clone 12C5

Order No.: **0176-100/STAT1-12C5**

Size (µg) 100

Lot No.: 0176S

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02/160307F

Isotype	Species Reactivity	Applications	Mol. Weight	Ref.Cell Line	Epitope	Immunogen
IgG1	human	WB, ELISA	92 kDa	HepG2	phosphoserine 727 L P M pS P E E	phosphopeptide conjugated to KLH

Background and Specificity:

The STAT proteins serve as both cytoplasmic **s**ignal **t**ransducers and nuclear **a**ctivators of **t**ranscription. STATs are mediators involved in cytokine signalling. In response to a specific cytokine signal, STAT proteins are phosphorylated on conserved tyrosine residues. Phosphorylated STAT proteins dimerize via their SH2 domains and move to the nucleus. The STAT dimers bind to specific DNA elements resulting in transcriptional regulation of downstream target genes.
STAT1 is activated by phosphorylation at serine 727. The phosphorylation state of Ser 727 regulates transcription and apoptosis. STAT1 can bind to DNA as heterodimer with STAT3.

Mab STAT1-12C5 specifically recognizes STAT1 phosphorylated at Ser 727. The antibody does not crossreact with the non-phosphorylated form of STAT1 nor with unrelated serine-phosphorylated proteins. Mab STAT1-12C5 is suitable for Western blot and ELISA applications.

Related Products

mab to STAT3 (phospho-Tyr 705)
#0036-100/STAT3-9E12
mab to STAT3 (phospho-Ser 727)
#0145-100/STAT3-23G5
mab to STAT5 A/B (phospho-Tyr 695/699)
#0121-100/STAT5-5G4
mab to STAT6 (phosph-Tyr 641)
#0079-100/STAT6-16E12
mab to STAT6 (aa 630-650)
#0063-100/STAT6-8C12

Purification: The antibody was purified from serum-free cell culture supernatant by subsequent thiophilic adsorption and size exclusion chromatography.

Formulation: liquid; 0.1mg/ml in in PBS/0.09% Na-Azide/PEG and Sucrose/50% Glycerol

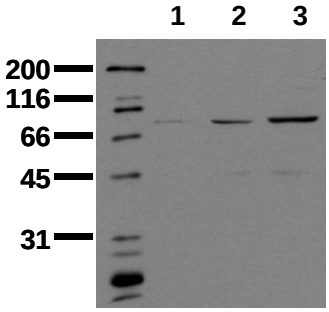
Reconstitution:

Stability: Aliquote and store at -20°C up to 1 year.

Avoid repeated freeze / thaw cycles.

Positive Control: #0813: Cell lysate from EGF-treated HepG2 cells

Immunoblotting: 0.5 µg/ml for HRPO/ECL detection
Recommended blocking buffer: Casein/Tween 20 based blocking and blot incubation buffer, e.g. nanoTools product #3031-500/CPPT or #3031-3000/CPPT.



Phosphospecificity

Whole cell extracts of control (1), EGF stimulated (2) or pervanadate treated (3) A549 tumor cells were applied to SDS-PAGE (ca 20.000 cells per lane) and transferred to a PVDF membrane. The immunoblot was probed with mab STAT1-12C5 (0.5 µg/ ml) for 1h at RT and developed by ECL (exp. time: 30 sec).

Immunoprecipitation: ND

Immunocytochemistry: ND

ELISA: use at 0.05 µg/ml