

## Product Data Sheet: Phospho-Stat1 (S727) Rabbit Polyclonal Antibody

**Cat. No:** ABP-0453

**Conjugate:** Unconjugated

Size: 100 ug

Clone: Poly

Concentration: 1mg/ml

Host: Rabbit

Isotype: IgG

Immunogen: The antiserum was produced against synthesized peptide derived from human

STAT1 around the phosphorylation site of Ser727. AA range:694-743

Reactivity: Hu, Ms, Rt

Western Blot: 1/500 - 1/2000

**Applications:** Immunohistochemistry: 1/100 – 1/300

ELISA: 1/10000.

Molecular Weight: 87kDa

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

chromatography using epitope-specific immunogen.

**Synonyms:** STAT1; Signal transducer and activator of transcription 1-alpha/beta;

Transcription factor ISGF-3 components p91/p84

Stat1, while activated in response to a large number of ligands (1), appears to be essential for responsiveness to IFN-a and IFN-g (2,3). Phosphorylation of Stat1 at Tyr701 induces Stat1 dimerization, nuclear translocation and DNA binding (4). Stat1 has two isoforms, Stat1a (91 kDa) and the splice variant Stat1b (84 kDa). In most cells, both isoforms are activated by IFN-a, but only Stat1a is activated by IFN-g. Stat1 has been found to be inappropriately activated in many tumors (5). In addition to tyrosine phosphorylation, Stat1 is phosphorylated through a p38

addition to tyrosine phosphorylation, Stat1 is phosphorylated through a p38 mitogen-activated protein kinase (MAPK)-dependent pathway at Ser727 in

response to IFN-a and other cellular stresses (6). Serine phosphorylation may be required for the maximal induction of Stat1-mediated gene activation. Phospho-Stat1 (Ser727) Antibody detects endogenous levels of Stat1a only when

phosphorylated at Ser727. This site is deleted in Stat1b. This antibody does not significantly cross-react with the corresponding phosphorylated residues of other

Stat proteins.

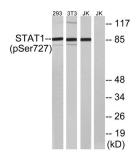
Form: liquid

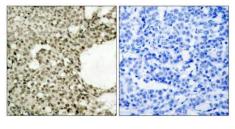
**Background:** 

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

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







Immunohistochemistry analysis of

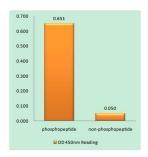


## Product Data Sheet: Phospho-Stat1 (S727) Rabbit Polyclonal Antibody

Western Blot analysis of K562 293 PC-3 HepG2-UV cells using Phospho-Stat1 (S727) Polyclonal Antibody diluted at 1:1000 Western blot analysis of lysates from 293 cells, 3T3 cells treated with UV (15mins) and Jurkat cells treated with eto

(25uM, 24hours), using STAT1 (Phospho-Ser727) Antibody. The lane on the right is blocked with the phospho peptide. paraffin-embedded human breast carcinoma, using STAT1 (Phospho-Ser727)

Antibody. The picture on the right is blocked with the phospho peptide.



Enzyme-Linked Immunosorbent Assay (Phospho-ELISA) for Immunogen Phosphopeptide (Phospho-left) and Non-Phosphopeptide (Phospho-right), using STAT1 (Phospho-Ser727) Antibody

For Research use only IMMUNOLOGICAL SCIENCES