Recombinant Phospho-STAT1 (Tyr701) Monoclonal Antibody

catalog number: **AN301115L**

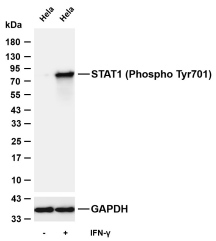
Note: *Centrifuge before opening to ensure complete recovery of vial contents.*

Description

Reactivity	Human;Mouse;Rat
Immunogen	A synthetic peptide corresponding to residues around (Tyr701) of Human Phospho-STAT1
Host	Rabbit
Isotype	IgG,κ
Clone	C173410
Purification	Protein A
Buffer	Phosphate buffered solution, pH 7.4, containing 0.05% stabilizer, 0.5% protein protectant and 50% glycerol.

Applications	Recommended Dilution
WB	1:2000-1:10000
IF	1:200-1:1000

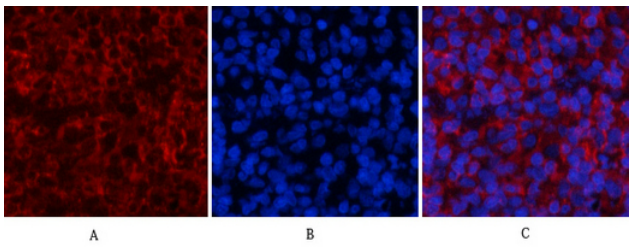
Data



Western Blot analysis of Hela cells with Recombinant Phospho-STAT1 (Tyr701) Monoclonal Antibody at dilution of 1:3000. Lane 1: Hela cell, Lane 2: Hela cell was treated with IFNγ(100ng/ml) for 4 hours.

Observed-MW:87 kDa

Calculated-MW:87 kDa



Immunofluorescence analysis of Rat spleen tissue with Recombinant Phospho-STAT1 (Tyr701) Monoclonal Antibody at dilution of 1:200. A, Stat1 (phospho Tyr701); B, DAPI(blue); C, merge of A+B.

Preparation & Storage

Storage	Store at -20°C Valid for 12 months. Avoid freeze / thaw cycles.
Shipping	Ice bag

Background

Signal transducer and activator of transcription that mediates signaling by interferons (IFNs). Following type I IFN (IFN-alpha and IFN-beta) binding to cell surface receptors, Jak kinases (TYK2 and JAK1) are activated, leading to tyrosine phosphorylation of STAT1 and STAT2. The phosphorylated STATs dimerize, associate with ISGF3G/IRF-9 to form a complex termed ISGF3 transcription factor, that enters the nucleus. ISGF3 binds to the IFN stimulated response element (ISRE) to activate the transcription of interferon stimulated genes, which drive the cell in an antiviral state. In response to type II IFN (IFN-gamma), STAT1 is tyrosine- and serine-phosphorylated. It then forms a homodimer termed IFN-gamma-activated factor (GAF), migrates into the nucleus and binds to the IFN gamma activated sequence (GAS) to drive the expression of the target genes, inducing a cellular antiviral state.

Toll-free: 1-888-852-8623
Tel: 1-832-243-6086
Fax: 1-832-243-6017
Web: www.elabscience.com
Email: techsupport@elabscience.com