

CoraLite® Plus 488-conjugated STAT2 Recombinant monoclonal antibody

Catalog Number: CL488-80061-5

Basic Information

Catalog Number:	CL488-80061-5	GenBank Accession Number:	Purification Method:
Source:	Rabbit	GenID (NCBI):	Protein A purification
Isotype:	IgG	UNIPROT ID:	CloneNo.:
Immunogen Catalog Number:	AG10168	Full Name:	242685A1
		signal transducer and activator of transcription 2, 113kDa	Recommended Dilutions:
		Calculated MW:	FC (Intra): 0.4 ug per 10 ⁶ cells in a 100 µL suspension
		Observed MW:	Excitation/Emission maxima wavelengths:
		851 aa, 98 kDa	493 nm / 522 nm
		110 kDa	

Applications

Tested Applications:	Positive Controls:
FC (Intra)	FC (Intra) : Ramos cells,
Species Specificity:	

human

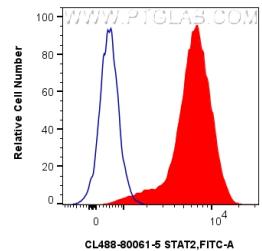
Background Information

STAT2, also named as p113, belongs to the transcription factor STAT family. It is a signal transducer and activator of transcription that mediates signaling by type I IFNs (IFN-alpha and IFN-beta). Following type I IFN binding to cell surface receptors, Jak kinases (TYK2 and JAK1) are activated, leading to tyrosine phosphorylation of STAT1 and STAT2. The phosphorylated STATs dimerize and 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 IF stimulated genes, which drive the cell in an antiviral state. It also interacts with CRSP2, CRSP6, Simian virus 5 protein V, rabies virus phosphoprotein, IFNAR1 and IFNAR2. Its interaction with dengue virus NS5 inhibits the phosphorylation of STAT2, and, when all viral proteins are present (polyprotein), STAT2 is targeted for degradation. The calculated molecular weight of STAT2 is 98 kDa, but phosphorylated STAT2 is about 100-113 kDa.

Storage

Storage:
Store at -20°C. Avoid exposure to light. Stable for one year after shipment.
Storage Buffer:
PBS with 50% glycerol, 0.05% Proclin300, 0.5% BSA, pH7.3
Aliquoting is unnecessary for -20°C storage

Selected Validation Data



1x10⁶ Ramos cells were intracellularly stained with 0.4 ug Coralite® Plus 488-conjugated STAT2 Recombinant monoclonal antibody (CL488-80061-5, Clone:242685A1)(red), or 0.4 ug Coralite® Plus 488 Rabbit IgG Isotype Control RecAb (CL488-98136, Clone: 240953C9) (blue). Cells were fixed and permeabilized with Intracellular Flow Cytometry Fixation & Permeabilization Buffer Kit (PF00019).