

### 36-3220: Anti-STAT5B Monoclonal Antibody(Clone: STAT5B/2657)

<b>Clonality :</b>	Monoclonal
<b>Clone Name :</b>	STAT5B/2657
<b>Application :</b>	ELISA
<b>Reactivity :</b>	Human
<b>Gene :</b>	STAT5B
<b>Gene ID :</b>	6777
<b>Uniprot ID :</b>	P51692
<b>Alternative Name :</b>	Signal transducer and activator of transcription 5B; STAT5; Stat5b; Transcription factor STAT5B
<b>Isotype :</b>	Mouse IgG
<b>Immunogen Information :</b>	Recombinant full-length human STAT5B protein

#### Description

Signal transducer and activator of transcription 5A (Stat5a) and Stat5b, which share 96% homology, undergo receptor tyrosine kinase or G protein-coupled receptor-dependent phosphorylation in response to cytokines or growth factors, and then form homo- or heterodimers that translocate to the nucleus, where they initiate transcription. Activation of Stat5a via IL-2, IL-3, IL-7/ GM-CSF, erythropoietin, thrombopoietin and growth hormones influences proliferation, differentiation and apoptosis in lymphohematopoietic cells. Phosphorylation of Stat5a at Ser127/Ser128 and Ser779 are contingent on ErbB-4-mediated activation of Stat5a. Activation of Stat5b via IL-2, IL-4, CSF-1 and growth hormones influences TCR signaling, apoptosis, adult mammary gland development and sexual dimorphism of liver gene expression. Stat5b is the major liver-expressed Stat5 form that has been shown to fuse with the retinoic acid receptor a gene in acute promyelocytic leukemias (APLL). Stat5a/b null mice have severely impaired lymphoid development and differentiation.

#### Product Info

<b>Amount :</b>	20 µg / 100 µg
<b>Content :</b>	200 µg/ml of Ab Purified from Bioreactor Concentrate by Protein A/G. Prepared in 10mM PBS with 0.05% BSA & 0.05% azide. Also available WITHOUT BSA & azide at 1.0mg/ml.
<b>Storage condition :</b>	Antibody with azide - store at 2 to 8°C. Antibody without azide - store at -20 to -80°C. Antibody is stable for 24 months. Non-hazardous.

#### Application Note

ELISA (For coating use Ab at 1-5ug/ml, order Ab without BSA)

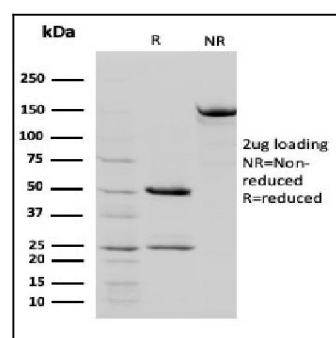


Fig. 1: SDS-PAGE Analysis Purified STAT5B Mouse Monoclonal Antibody (STAT5B/2657). Confirmation of Integrity and Purity of Antibody.

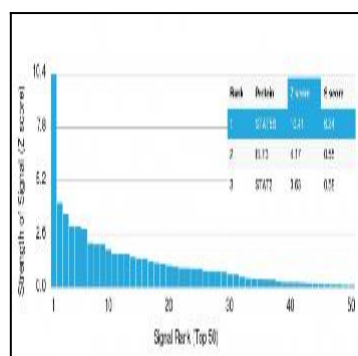


Fig. 2: Analysis of Protein Array containing >19,000 full-length human proteins using STAT5B Mouse Monoclonal Antibody (STAT5B/2657) Z- and S- Score: The Z-score represents the strength of a signal that a monoclonal antibody (Monoclonal Antibody) (in combination with a fluorescently-tagged anti-IgG secondary antibody) produces when binding to a particular protein on the HuProt™ array. Z-scores are described in units of standard deviations (SD's) above the mean value of all signals generated on that array. If targets on HuProt™ are arranged in descending order of the Z-score, the S-score is the difference (also in units of SD's) between the Z-score. S-score therefore represents the relative target specificity of a Monoclonal Antibody to its intended target. A Monoclonal Antibody is considered to specific to its intended target, if the Monoclonal Antibody has an S-score of at least 2.5. For example, if a Monoclonal Antibody binds to protein X with a Z-score of 43 and to protein Y with a Z-score of 14, then the S-score for the binding of that Monoclonal Antibody to protein X is equal to 29.