

Polyclonal Antibody to Toxic Shock Syndrome Toxin (TSST) - Aff - Purified

Catalog No.:	AP00959PU-N
Quantity:	1 mg
Concentration:	1,0 mg/ml (prior to lyophilization)
Background:	<p>Toxic shock syndrome toxin (TSST) is a superantigen with a size of 22KDa produced by 5 to 25% of Staphylococcus aureus isolates. It causes toxic shock syndrome (TSS) by stimulating the release of large amounts of interleukin-1, interleukin-2 and tumour necrosis factor. This bacterium strain that produces the TSST-1 can be found in any area of the body, but live mostly in the vagina of infected women. TSST-1 is a protein encoded by the tstH gene, which is part of the mobile genetic element staphylococcal pathogenicity island. The toxin is produced in the greatest volumes during the post-exponential phase of growth, which is similar among pyrogenic toxin superantigens, also known as PTSAgs. TSST-1 binds primarily to the alpha-chain of class II MHC exclusively through a low-affinity (or generic) binding site on the SAG N-terminal domain. This is opposed to other super antigens (SAGs) such as DEA and SEE, that bind to class II MHC through the low-affinity site, and to the beta-chain through a high-affinity site. A superantigen such as TSST-1 stimulates human T cells that express VB 2, which may represent 5-30% of all host T cells. PTSAgs induce the VB-specific expansion of both CD4 and CD8- subsets of T Lymphocytes.</p>
Host:	Sheep
Immunogen:	Toxic Shock Syndrome Toxin (TSST)
Format:	<p>State: Lyophilized purified Ig Purification: Toxin specific immunoaffinity column Buffer System: 0.01M phosphate, pH 7.4 containing 0.9% Sodium chloride Reconstitution: Restore with 1ml deionized water</p>
Applications:	<p>ELISA. Other applications not tested. Optimal dilutions are dependent on conditions and should be determined by the user.</p>
Specificity:	This antibody is specific to Toxic Shock Syndrome Toxin (TSST). Minimal cross-reactivity with staphylococcal enterotoxins A through E.
Storage:	<p>Prior to reconstitution store at 2-8°C. Following reconstitution store the antibody at -80°C. If aliquoted for long term storage, fill volume should be equal to or greater than 50% of the nominal fill volume of the vial used. Avoid repeated freezing and thawing. Shelf life: one year from despatch.</p>

General Readings: Dinges, M. M., P. M. Orwin, et al. (2000). "Exotoxins of Staphylococcus aureus." Clinical Microbiology Reviews 13(1): 16-34.
John McCormick, Jeremy M. Yarwood, and Patrick M. Schlievert. (2001). "Toxic Shock Syndrome and Bacterial Superantigens: An Update". Annual Review of Microbiology 55: 77-104.