

tat

## Recombinant HIV-1 TAT Clade-B

<b>Catalog No.</b>	CSI15819A CSI15819B CSI15819C	<b>Quantity:</b>	2 µg 10 µg 100 µg
<b>Alternate Names:</b>	Protein Tat, Transactivating regulatory protein		
<b>Description:</b>	<p>Human immunodeficiency virus type-1 (HIV-1) regulatory Tat protein plays an essential role in viral replication (Jones KA, 1994) and infectivity (Arya SK, 1985; Fisher AG, 1986). In addition, during acute infection, Tat is released extracellularly by infected cells (Chang HC, 1997; Ensoli B, 1990) and is taken up by neighboring cells where it transactivates viral replication (Ensoli B, 1993) and increases virus infectivity.</p> <p>HIV-1 Tat activates transcription of HIV-1 viral genes by inducing phosphorylation of the C-terminal domain (CTD) of RNA polymerase II (RNAPII). Tat can also disturb cellular metabolism by inhibiting proliferation of antigen-specific T lymphocytes and by inducing cellular apoptosis. Tat-induced apoptosis of T-cells is attributed, in part, to the distortion of microtubules polymerization. LIS1 is a microtubule-associated protein that facilitates microtubule polymerization.</p>		
<b>UniProt ID:</b>	P04608		
<b>Source:</b>	<i>E. coli</i>		
<b>Molecular Mass:</b>	14 kDa (86 aa) monomer		
<b>Formulation:</b>	Sterile-filtered and lyophilized with 0.1% glycerol.		
<b>Purity:</b>	> 90.0% as determined by SDS-PAGE.		
<b>Biological Activity:</b>	Immunoreactive with all sera of HIV-1 infected individuals.		
<b>Amino Acid Sequence:</b>	MEPVDPRLPEP WKHPGSQPKT ACTNCYCKKC CFHCQVCFIT KALGISYGRK KRRQRRRPPQ GSQTHQVLSL KQPTSQSRGD PTGPKE.		
<b>Solubility:</b>	It is recommended to reconstitute the lyophilized HIV-1 TAT in sterile deionized water at > 100µg/ml, which can then be further diluted to other aqueous solutions.		
<b>Applications:</b>	Recognized by anti-Tat (HIV-1) polyclonal antibody. Reacts with anti-Tat antibodies from human, monkey, rabbit and mouse serum.		
<b>Storage &amp; Stability:</b>	Lyophilized HIV-1 TAT although stable at room temperature for 1 week, should be stored at -20°C to -80°C. Upon reconstitution HIV-1 TAT should be stored at 2-8°C up to 1 week or for longer storage aliquot the stock solution and store at -20°C to -80°C. For long-term storage it is recommended to add a carrier protein such as 0.1% HSA or BSA. <b>Avoid repeated freeze-thaw cycles.</b>		

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