

PRODUCT SPECIFICATION

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HYB 278-21 Anti Tetanus Toxin (TeNT)

Mouse monoclonal antibody

Article No.	65872 (0.2 mL), 101058 (1.0 mL)	
Product Name	HYB 278-21 Anti Tetanus Toxin (TeNT)	
Clone	1E70,123....0,125C8	
Subclass	IgG1 / kappa	
Description	Preparation:	Protein-A purified
	Concentration:	1 mg/mL \pm 10%, based on A ₂₈₀ . See Certificate of Analysis for details.
	Solvent:	PBS, pH 7.2 – 7.4
	Storage:	-18 °C or colder
Antigen	<p><i>Clostridium tetanus</i> is a gram-positive, motile bacteria found in soil and animal faeces. <i>C. tetanus</i> produces the potent exotoxin which causes tetanus (lockjaw) in humans. Tetanus toxin (TeNT) acts by inhibiting neurotransmitter release leading to chronic muscle contraction, which can eventually cause respiratory failure. It binds to peripheral neuronal synapses where it is internalized and moved by retrograde transport up through the axon into the spinal cord where it can move between postsynaptic and presynaptic neurons. It inhibits neurotransmitter release by acting as a zinc endopeptidase that catalyzes the hydrolysis of the 76-Gln- -Phe-77 bond of synaptobrevin-2.</p> <p>Tetanus toxin is synthesized as a single 150 kDa polypeptide chain which is cleaved by a host protease to produce a heterodimeric protein, with a disulphide bond between the N-terminal 50 kDa light (L) chain and the 100 kDa C-terminal heavy (H) chain (1) responsible for the spastic paralysis. The chains are non-toxic after separation.</p>	
Immunogen	Tetanus toxoid (formaldehyde inactivated tetanus toxin).	
Specificity	HYB 278-21 reacts with both tetanus toxin and tetanus toxoid, but not heat denatured TeNT.	
Epitope Specificity	Not determined.	
Reactivity	HYB 278-21 reacts well in ELISA with coated tetanous toxoid and in sandwich ELISA using the polyclonal antibody POL 016 anti Tetanus Toxin (Article No. 65873) as catching antibody. HYB 278-21 is also well suited for competitive ELISA with a detection limit at about 50 pg/ml. When used in western blots HYB 278-21 detects a band at approximately 150 kDa corresponding to the heterodimeric toxoid.	
Culture Medium	Dulbecco's modified Eagle's medium with 10% FCS.	
Fusion Partner	X63-Ag8.653.	
Immunization	Female CF1xBalb/c F1 hybrid mice were immunized i.p. with immunogen.	
Application	Method	Usability
	ELISA	yes
	Immunoblotting	yes
	Immuno.fluoresc.	nd.

See next page

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References

- 1) Matsuda, M. and Yoneda, M (1975) Infect. Immun. 12, 1147-1153.

Conditions

For research use only. Not for use in diagnostic procedures. Not for therapeutic use or applications.

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