



Anti-B. anthracis PA Polyclonal antibody (DPAB3570)

This product is for research use only and is not intended for diagnostic use.

PRODUCT INFORMATION

Product Overview	Polyclonal Antibody to Anthrax Protective Antigen, which was raised against a synthetic peptide corresponding to 16 amino acids in the middle of the Anthrax protective antigen protein.
Target	B. anthracis PA
Immunogen	Human Anthrax PA (Intermediate Domain) Peptide
Isotype	IgG
Source/Host	Rabbit
Species Reactivity	B. anthracis
Purification	Affinity chromatography purified via peptide column
Conjugate	Unconjugated
Applications	ELISA
Size	100 µg
Buffer	Antibody is supplied in PBS containing 0.02% sodium azide
Preservative	0.02% Sodium Azide
Storage	Stored at 4°C, stable for one year. As with all antibodies care should be taken to avoid repeated freeze thaw cycles. Antibodies should not be exposed to prolonged high temperatures.

BACKGROUND

Introduction

Anthrax infection is initiated by the inhalation, ingestion, or cutaneous contact with *Bacillus anthracis* endospores. *B. anthracis* produces three polypeptides that comprise the anthrax toxin: protective antigen (PA), lethal factor (LF), and edema factor (EF). PA binds to two related proteins on the cell surface; these are termed tumor epithelial marker 8 (TEM8)/anthrax toxin receptor (ATR) and capillary morphogenesis protein 2 (CMG2), although it is still unclear which is physiologically relevant. Following PA binding to its receptor, PA is cleaved into two fragments by a furin-like protease. The bound fragment binds both LF and EF; the resulting complex is then endocytosed which allows the translocation of LF and EF into the cytoplasm. These toxins are usually sufficient to cause rapid cell death, and often the death of the organism.

Keywords

Anthrax Protective Antigen (CT); Anthrax PA; anthrax PA; Anthrax Protective Antigen; Anthrax toxins translocating protein; *Bacillus anthracis* Protective Antigen; PA 83; PA; PA83; Pag; PagA; Protective antigen; Bacteria; Firmicutes; Bacilli; Bacillales; Ba