

12-8192: Anti-B.anthraxis(Anthrax) Protective Antigen (Obiltoxaximab)

Clonality : Monoclonal
Clone Name : ETI-204
Application : ELISA
Isotype : Human IgG1k

Description

Specificity: This non-therapeutic biosimilar antibody uses the same variable region sequence as the therapeutic antibody Obiltoxaximab. Clone ETI-204 specifically binds to the protective antigen of Bacillus anthracis, neutralizing its toxic effects.

Antigen Distribution: The protective antigen (PA) of Bacillus anthracis binds to endothelial receptors on human cells, facilitating the entry of edema toxin and lethal toxin into the host cells.

Background: Obiltoxaximab (Anti-B. Anthracis Protective Antigen) is a chimeric monoclonal antibody specifically designed to target the PA component of Bacillus anthracis toxin. It is used alongside appropriate antibacterial drugs for the treatment and prevention of inhalational anthrax. By binding to the PA component, Obiltoxaximab prevents the anthrax toxin from entering and damaging cells, thereby enhancing survival rates in animal models of inhalational anthrax. This antibody is administered intravenously and must be given in monitored settings due to the risk of hypersensitivity and anaphylaxis¹⁻³. Obiltoxaximab, also known as ETI-204, is a powerful monoclonal antibody designed to target the protective antigen (PA) of Bacillus anthracis. It is a high-affinity chimeric deimmunized antibody with a molecular weight of approximately 148 kDa, combining human constant region sequences with deimmunized murine variable region sequences. Obiltoxaximab plays a critical role in inhibiting the assembly of anthrax toxin and preventing the intoxication of target cells. This action helps promote survival and limit the spread of bacteria in animal models. As an adjunct therapy, ETI-204 has demonstrated significant efficacy in enhancing survival rates when used in combination with antibiotics. Clinical trials have also shown promising results in terms of its safety, tolerability, and pharmacokinetics¹⁻³.

Product Info

Amount : 5 mg / 1 mg
Purity: $\geq 95\%$ by SDS Page

Purification : Preparation: Recombinant biosimilar antibodies are manufactured in an animal free facility using only in vitro protein free cell culture techniques and are purified by a multi-step process including the use of protein A or G to assure extremely low levels of endotoxins, leachable protein A or aggregates.
Concentration: ≥ 5.0 mg/ml

Content : Formulation: This biosimilar antibody is aseptically packaged and formulated in 0.01 M phosphate buffered saline (150 mM NaCl) PBS pH 7.2 - 7.4 with no carrier protein, potassium, calcium or preservatives added. Due to inherent biochemical properties of antibodies, certain products may be prone to precipitation over time. Precipitation may be removed by aseptic centrifugation and/or filtration.

Storage condition : Functional grade preclinical antibodies may be stored sterile as received at 2-8°C for up to one month. For longer term storage, aseptically aliquot in working volumes without diluting and store at $\leq -70^\circ\text{C}$.?Avoid Repeated Freeze Thaw Cycles.

Application Note

ELISA, WB