

MANUFACTURE AND TESTING ON ACTIVITY AND SPECIFICITY ANTIPERFRINGENS-TYPE DYNAMIC D

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As evidence from scientific literature and our long-term observations, clostridiosis of animals, especially endarterial, are usually not always timely and accurately diagnosed, but at the same time, the damage from them is significant. Given this, the problem of their prevention remains relevant today. First of all, the development of rapid laboratory diagnostic methods, including the method of fluorescing antibodies, is needed. A direct variant of this method involves the production of active and highly specific labeled globulins to surface antigenic determinants of vegetative clostridium Cl cells. perfringens of types A, D and C, which most often cause endarterectomy. In previous experiments, we obtained rabbits, rams and bulls in high-activity antiperspirant serums for vegetative Cl cells. perfringens type D.

Specificity of type D antiferfingens-serums was determined in RA with antigens of heterologous strains Cl. perfringens of types A and C and other types of clostridia, in particular Cl. septicum, Cl novyi, cl chauvoei, cl. sordellii

RA was placed in polystyrene tablets in a volume of 1 ml. The serum samples were diluted with buffered sterile 0.85% sodium chloride solution at pH 7.2, starting with dilution 1: 2. As antigens for RA, 2-milliliter suspensions were used to wash sterile 0.85% sodium chloride and formalin inactivated form of test strains twice.

From the data provided, it is seen that the highest antibody titers were detected in heterologous single-stranded clostridia strains, in particular *Cl. perfringens* of type C (1: 213) and *Cl. perfringens* of type A (1: 128). This indicates a close intra-family affinity of surface antigenic determinants in the strains *Cl. perfringens* of types A, C and D. Significantly lower antigenic affinity *Cl. Diffrigins* of type D are detected against antigens of heterologous species of *Clostridium* *Cl. novyi* (1:43), *cl. sordellii* (1:21) and to *Cl. chauvoei* and *cl. septicum* *Cl* (1:11).

In order to increase the specificity of the received antiperfringens-serums of type D, we conducted their adsorption of the microbial mass of vegetative cells of the strains *Cl. perfringens* type C and type A. This significantly reduced the activity of sera - from 1: 1195 to 1: 299. However, serum no longer contained antibodies to heterologous species of clostridia, and the level of antibodies to strains *Cl. The perfringens* of types A and C decreased, respectively, from 1: 128 to 1: 9 (type A) and from 1: 213 to 1:13 (type C), indicating high activity and specificity of the received serum.

The high specificity of type D antiperfringens-serums can be achieved by their adsorption by the microbial mass of inactivated formalin of vegetative cells of the heterologous strains *Cl. perfringens* of types A and C.

The resulting active and highly specific type D antiperspirant serum will be the basis for the production of fluorescein labeled isothiocyanate (FITC) antiperspiring globulins to use the latter for direct indication and identification of *Cl* isolates. *perfringens* of type D by fluorescing antibodies.