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IV
INTERNATIONAL SCIENTIFIC
AND PRACTICAL CONFERENCE
"ACTUAL PROBLEMS OF MODERN SCIENCE"

Boston, USA

January 31 – February 3, 2023

ISBN 979-8-88896-543-6

DOI 10.46299/ISG.2023.1.4

ACTUAL PROBLEMS OF MODERN SCIENCE

Proceedings of the IV International Scientific and Practical Conference

Boston, USA
January 31 – February 3, 2023

UDC 01.1

The 4th International scientific and practical conference “Actual problems of modern science” (January 31 – February 3, 2023) Boston, USA. International Science Group. 2023. 492 p.

ISBN – 979-8-88896-543-6

DOI – 10.46299/ISG.2023.1.4

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ANALYSIS OF THE EFFECT OF CHLAMYDIA TRACHOMATIS ON PREGNANCY

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Introduction

Nowadays, there is a significant increase in sexually transmitted diseases, as in Ukraine, in particular in the Poltava region. Despite the fact that the infection caused by *Chlamydia trachomatis* is considered the most common of all sexually transmitted infections (STIs), the real frequency and prevalence of this disease remain unknown [1]. According to the World Health Organization (WHO), almost 100 million new cases of *C. trachomatis* are registered annually in the world [2]. In 2009, the US Centers for Disease Control and Prevention (CDC) received reports of 1,244,180 cases of chlamydial infection [3], but the real number is at least 2 times more - about 3 million cases, since most (70-90%) episodes of chlamydial infection of the lower parts of the urogenital tract in women are asymptomatic and therefore remain undiagnosed [4,5].

Both in the United States and in most European countries over the past 10 years, there has been an increase in the frequency of chlamydial infection [3,6].

During the development of symptomatic urogenital chlamydial infection, cervicitis most often occurs in women. In the case of an asymptomatic course, untreated chlamydial infection can lead to damage to the upper parts of the genital tract and the occurrence of pelvic inflammatory disease (PID). About 750,000 cases of PID are diagnosed annually in the United States [7], which is often the cause of serious disorders of reproductive function, including tubal infertility, ectopic pregnancy, and the development of chronic pelvic pain syndrome [3]. As for chlamydial infection in pregnant women, according to the WHO, the frequency of detection of *C. trachomatis* in pregnant women varies widely (from 2% to 37%), averaging 6-8% and reaching 70% in patients with chronic PID and burdened obstetric and gynecological anamnesis

Having analyzed the situation with the incidence of sexually transmitted diseases in Ukraine and the Poltava region, the 21st century should rightly be considered the period of the epidemic of chlamydial infection.

According to studies by various authors, genital chlamydia is observed in 11-30% of women, 3-12% [4,8,9] of whom are pregnant and in 46-52% of women with a complicated obstetric or gynecological history [8,10]. Chlamydia are the cause of more than 50% of all cases of salpingitis, infertility in 24% of women, tubal pregnancy in 12%, and play a major role in the development of the pathology of pregnancy and childbirth (38-44%) [10], premature birth (13 %), endometritis, untimely discharge of amniotic fluid (27%), stillbirth (5.5%) [10]. The importance of studying genital chlamydia (CH) in pregnant women is due to the fact that, among the main epidemiological features of this disease, the first place is a high percentage of women affected during the period of their reproductive activity at the age of 20-30. In addition, genital chlamydia in a mother is transmitted to her child in 40-70% [9]. In 4-11% of pregnant women, genital chlamydia has no clinical signs [10]. The most frequent manifestation of GC is cervicitis or pseudoerosion of the cervix, which does not cause concern in women [10].

Long-term development of symptoms of the disease, as well as very often the complete absence of bright manifestations, determines the low level of the population seeking medical help.

The aim of our study was to find out the presence of urogenital infections (chlamydia) in pregnant women.

Materials and methods. The examination of pregnant women with chlamydia was carried out by the method of enzyme-linked immunosorbent assay (ELISA) of blood-diagnostic products of the company "Sanofi Diagnostics Pasteur" (France) and ChlamyBest C.trachomatis-IgG-strip (Russia) and by the method of amplification of nucleic acids (PCR diagnostics).

Pregnant women were sent for examination after complications of obstetric and gynecological history (threats of abortion, polyhydramnios, erosive lesions of the cervix) were detected during a gynecological examination.

The examination was carried out starting from the 5-6th week and up to the 30th week of pregnancy. Blood was drawn from the cubital vein and an ELISA test was performed for the presence of groups of specific immunoglobulins of classes M and G. When receiving positive ELISA results, scrapings from the urethra and cervical canal were taken from pregnant women for PCR testing.

Research results and their discussion. When 418 pregnant women (aged 18 to 40 years) were examined for chlamydial infection by the ELISA method, positive results were obtained in 174 (41.62%), which were confirmed by the PCR method in 138 (33.01%) of the total number of patients examined.

It should be noted that according to the data of the anamnesis and clinical examination, obstetric and gynecological pathology was observed in 45.97%, the anamnesis noted: chronic salpingo-oophoritis in 28.16%, endocervicitis - in 4.02%, metroendometritis - in 2.29%, miscarriage - in 10.34%, infertility earlier - in 8.05%, gestosis in the 1st trimester of pregnancy - in 19.54%, in 67.81% of women there was a threat of termination of pregnancy at various times.

It is worth noting that in women aged 20-30 years (73.56%) a difficult obstetric and gynecological history was noted in more than half of the patients (53.12%).

In 31.03% of cases, pregnant women with urogenital chlamydial infection were considered clinically healthy and had no complaints. All patients received complex treatment, which included modern antibacterial drugs (amoxicillin, josamycin, azithromycin), as well as immunomodulators (viferon, cycloferon), antifungal drugs (fluconazole, ketoconazole), multivitamins, enzymes (mezym), probiotics (acylact, bifidumbacterin, colibacterin).

14.94% of women who received complex anti-chlamydial therapy had premature births. Among women who did not receive the necessary therapy (18.96%), premature birth was twice as often, in addition, 42.4% of them had complications during childbirth, and 12.1% of women experienced complications in the postpartum period.

Conclusions.

1. The widespread prevalence of urogenital chlamydia in pregnant women, its asymptomatic course, and the possibility of intrauterine infection of the fetus indicate the importance of examining pregnant women for chlamydial infection, especially in risk groups (in women with a complicated obstetric or gynecological history).

2. As a result, given the high prevalence of urogenital chlamydia in pregnant women and its significant role in the development of complications in the mother and fetus, timely etiotropic therapy has a beneficial effect on the course of pregnancy and contributes to the birth of healthy children.

To reduce the risk of STD infection (chlamydia and other venereal diseases), it is necessary to disseminate information about the harmful effects of these infections on reproductive function, complications of the course

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