

## A seroepidemiological study of Parvovirus B19, *Toxoplasma gondii* and *Chlamydia trachomatis* in pregnant women referring to Obs & Gyn ward of Ahwaz Imam Khomeini Hospital

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### Abstract

**Introduction:** Parvovirus B19, *Toxoplasma gondii* and *Chlamydia trachomatis* are the most common microorganisms which cause different sequela during pregnancy such as congenital aplasia, hydrops fetalis, abortion and other congenital anomalies in fetus (Such as neuro-ophthalmic complications). The purpose of this study was to determine the prevalence of these agents in pregnant women attending the Obs & Gyn ward of Imam Khomeini Hospital in Ahwaz, Iran.

**Materials & Methods:** In this cross-sectional study, IgG against the mentioned microorganisms was assessed by ELISA method in the sera of 79 pregnant women attending Imam Khomeini Hospital in Ahwaz during a period of one month. In addition, a questionnaire was filled for each case and clinical data were entered. Finally,  $\chi^2$  was calculated and the data were analyzed by SPSS (Version 11.5).  $P < 0.05$  was considered significant.

**Results:** 44 specimens (55.7%) from the 79 serum samples had IgG against Parvovirus B19, 28 samples (35.4%) against *Toxoplasma gondii* and 8 samples (10%) against *Chlamydia trachomatis*.

**Conclusion:** The results demonstrated that >40% of the pregnant women did not have IgG against the mentioned agents, so they were vulnerable to infection by those microorganisms in ensuing pregnancies. Therefore, health education for pregnant women and screening for the mentioned microorganisms to prevent abortions and birth of newborns with congenital anomalies should be addressed more attentively.

**Key Words:** Parvovirus B19, *Toxoplasma gondii*, *Chlamydia trachomatis*, Pregnant, Abortion, Congenital anomalies.

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