

18. EVALUATION OF THE MORPHOLOGICAL PARTICULARITIES OF CHORIONIC VILLI IN THE INTRAUTERINE DEVELOPMENT OF THE PLACENTA.

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Introduction. Chorionic villi are an important component of the placenta, ensuring the fetus' normal development. Knowledge of the villous profile in various periods of intrauterine development has major importance in the estimation of the placental status for the subsequent establishment of the pathological conditions, in particular, villous maturation disorders. Placental disorders, as well as villous maturation disorders, can lead to deplorable consequences for the development of the embryo and fetus in utero.

Aim of study. To evaluate the morphological particularities of the chorionic villi in the intrauterine development of the placenta.

Methods and materials. The study material included 95 scientific papers, taken from databases: PubMed, Springer, CyberLeninka, Google Scholar, ResearchGate. The scientific papers were selected according to the following keywords: placental development, chorionic villi, villous maturation disorders. As a subject of the study, the studied articles included the placentas of women in the first and third trimesters of pregnancy.

Results. The intrauterine development of the placenta was evaluated with the determination of four stages: differentiation and formation of the placenta, growth, maturation, and physiological regression with the differentiated evaluation of the chorionic villi profile. Four main types of chorionic villi have been determined: stem villi, intermediate immature villi, intermediate mature villi, and terminal villi. At the same time, several disorders of villous maturation were detected: stagnation of villous maturation, delayed villous maturation, deficiency of intermediate villi, immaturity of peripheral villi, and premature villous maturation.

Conclusion. The villous morphological profile in the intrauterine development of the placenta is diverse as a result of the gradual differentiation of chorionic villi. Postpartum or early morphological evaluation of the placenta is a desirable study in the correct and differentiated diagnosis of the causes of an unfavorable prenatal and perinatal outcome.