

**МІНІСТЕРСТВО ОХОРОНИ ЗДОРОВ'Я УКРАЇНИ
БУКОВИНСЬКИЙ ДЕРЖАВНИЙ МЕДИЧНИЙ УНІВЕРСИТЕТ**



МАТЕРІАЛИ

**107-ї підсумкової науково-практичної конференції
з міжнародною участю
професорсько-викладацького колективу
БУКОВИНСЬКОГО ДЕРЖАВНОГО МЕДИЧНОГО УНІВЕРСИТЕТУ
02, 04, 09 лютого 2026 року**

**«АКТУАЛЬНІ ПИТАННЯ ТЕОРЕТИЧНОЇ (ФУНДАМЕНТАЛЬНОЇ),
ЕКСПЕРИМЕНТАЛЬНОЇ ТА КЛІНІЧНОЇ МЕДИЦИНИ:
АНАЛІЗ ТА УЗАГАЛЬНЕННЯ НОВИХ ФУНДАМЕНТАЛЬНИХ
(ТЕОРЕТИЧНИХ) І КЛІНІЧНИХ (ПРИКЛАДНИХ) РЕЗУЛЬТАТІВ
ВИКОНАННЯ НАУКОВО-ДОСЛІДНИХ РОБІТ
У БУКОВИНСЬКОМУ ДЕРЖАВНОМУ МЕДИЧНОМУ УНІВЕРСИТЕТІ»**

Конференція внесена до Реєстру заходів
безперервного професійного розвитку працівників сфери охорони здоров'я,
що проводитимуться у 2026 році № 1021265

Чернівці – 2026

УДК 61(063)
М 34

Матеріали підсумкової 107-ї науково-практичної конференції з міжнародною участю професорсько-викладацького колективу Буковинського державного медичного університету «Актуальні питання теоретичної (фундаментальної), експериментальної та клінічної медицини: аналіз та узагальнення нових фундаментальних (теоретичних) і клінічних (прикладних) результатів виконання науково-дослідних робіт у Буковинському державному медичному університеті» (м. Чернівці, 02, 04, 09 лютого 2026 р.) – Чернівці: Медуніверситет, 2026. – 425 с. іл.

У збірнику представлені матеріали 107-ї науково-практичної конференції з міжнародною участю професорсько-викладацького колективу Буковинського державного медичного університету (м. Чернівці, 02, 04, 09 лютого 2026 р.) зі стилістикою та орфографією у авторській редакції. Публікації присвячені актуальним проблемам фундаментальної, теоретичної та клінічної медицини.

Загальна редакція: професор Геруш І.В., професорка Годованець О.І., професор Безрук В.В.

Наукові рецензенти:
професор Батіг В.М.
професор Білоокий В.В.
професор Булик Р.Є.
професор Дейнека С.Є.
професор Заморський І.І.
професорка Колоскова О.К.
професорка Кравченко О.В.
професорка Пашковська Н.В.
професорка Ткачук С.С.
професорка Тодоріко Л.Д.
професорка Хухліна О.С.
професор Черноус В.О.

ISBN 978-617-519-221-4

© Буковинський державний медичний
університет, 2026

tumors, such as lipomas (derived from white adipose tissue) and hibernomas (rare tumors originating from brown adipose tissue). Lipomas are generally harmless, although they may cause aesthetic or physical discomfort. Hibernomas, while rare, attract greater attention due to diagnostic challenges and potential functional activity. The study of developmental mechanisms of white and brown adipose tissues holds significant potential for addressing two major challenges in contemporary medicine: combating obesity and providing optimal support for preterm neonates. Understanding these processes opens avenues for developing novel therapeutic strategies, such as stimulating brown adipose tissue to enhance thermogenesis or correcting energy imbalances in critical conditions.

Conclusions. The study of adipose tissue distribution in the upper, middle, and lower thirds of the antebrachial region in 5–6-month-old human fetuses revealed heterogeneity in both the quantitative and qualitative composition of adipocytes. The antebrachial adipose tissue comprised both unilocular and multilocular cells. In 5-month-old fetuses, adipocytes were not detected in any of the antebrachial region thirds. Similarly, the lower third of the antebrachial region in 6-month-old fetuses lacked identifiable adipocytes. Multilocular adipocytes predominated in the upper and middle thirds of the antebrachial region in 6-month-old fetuses.

Proniaiev D.V.

REGULARITIES OF MORPHOGENESIS OF INTERNAL FEMALE GENITAL ORGANS IN THE PERINATAL PERIOD OF ONTOGENESIS

*Mykola Turkevich Department of Human Anatomy
Bukovinian State Medical University*

Introduction. With the accumulation of data on the etiopathogenesis of diseases in the postnatal period, significant importance of the perinatal period as an object to which the close attention of modern health care should be directed becomes increasingly clear. The need to expand and deepen the research in the field of antenatal diagnostics and correction of fetal developmental disorders and the earliest implementation of their results into practice is emphasized by a number of authors. At the same time, in addition to a noticeable decrease in the birth rate in 2019, compared to the previous year, the infant mortality rate remains high. Under such conditions, the value of each birth increases, and preserving the reproductive health of potential mothers and fathers becomes a national priority for recreating the social potential of Ukraine, and in Chernivtsi region in particular.

The aim of the study. To study the structure, topographic-anatomical features and syntopy of the internal female genital organs in the perinatal period.

Materials and methods. The study was conducted on 140 human fetal cadavers and 20 newborns. To achieve the goal, a set of adequate morphological research methods was used. The set includes: the preparation and microscopy of a series of consecutive histological and topographic-anatomical sections of fetuses and newborns of individual areas and pelvic organs and adjacent structures of fetal and newborn corpses, conventional and thin dissection under the control of a binocular magnifier, the preparation of computer 3-D reconstruction models, vascular injection, radiographic methods, photodocumentation of the results of morphological studies, statistical processing of digital data obtained during morphometry.

Results of the study. The anatomical features of the internal female genital organs of fetuses and newborns, which are inherent in a certain month of the perinatal period, have been established. In fetuses of 4-5 months, the grooved shape of the uterine fundus is combined with a flat body (1.24 ± 0.33 mm and 1.8 ± 0.21 mm, respectively). At 6-8 months, the uterine fundus is flattened. Fetuses of 9-10 months and newborns are characterized by a convex uterine fundus, which is combined with its thickened body (5.90 ± 1.02 mm and 7.92 ± 1.19 mm, respectively). Varieties of the shape of the vaginal cavity in fetuses from 6 months and until the end of the perinatal period have been identified, namely in the upper and middle thirds of the vagina: oval, elongated-oval, stellate, and in its lower third, H-shaped and C-shaped shapes are mainly observed. The fallopian tubes change their shape and topography from slightly curved in an ascending position in fetuses of 4-5 months to significantly curved, horizontally located in fetuses of 6-8 months, and to spiral-shaped

fallopian tubes immersed in the recto-uterine recess in fetuses of 9-10 months. In newborns, the fallopian tubes regain a horizontal position. The ovaries in fetuses of 4-6 months have the shape of a flattened elongated trihedral pyramid with a thickness of 0.96 ± 0.05 mm at the 4th month to 2.00 ± 0.42 mm at the 6th month. At 7-8 months of intrauterine development, the ovaries acquire an elongated rounded shape with a thickness of 2.02 ± 0.43 mm at the 7th month to 4.08 ± 0.33 mm at the 8th month. From 9 months to the early neonatal period, the ovaries acquire an oval shape, close to the definitive one.

Conclusion. Periods of intensive increase in morphometric parameters of internal female genital organs were established: uterus – period 4-5 months, ovaries – 5-6 and 9-10 months, fallopian tubes – 5-6, 8-9 months, vagina – 4-5 months and 8-10 months. Regularities of change in morphometric parameters of the uterus were revealed and proven with the establishment of periods of their accelerated and slowed growth. In particular, periods of accelerated development of the width of the uterine fundus of fetuses occurred at 4-5 and 8-10 months. The thickness of the uterus increased evenly up to 9 months, and in the period of 9-10 months a period of accelerated increase was observed.

Protsak T.V.

FEATURES OF MORPHOGENESIS OF THE MAXILLARY SINUSES DURING THE INTRAUTERINE PERIOD OF DEVELOPMENT

*Mykola Turkevych Department of Human Anatomy
Bukovinian State Medical University*

Introduction. At present, there is no longer any doubt about the urgent need to develop the medical aspects of modern embryology, without which it is impossible to solve such important practical healthcare issues as infertility, treatment and prevention of congenital and hereditary diseases, organ and tissue transplantation, and so on. Numerous anomalies that happen in clinical practice can mostly be explained only by clarifying the origin and interaction of organs and structures, which over time acquire their characteristic form, studying their unusual topography, and deeply understanding the corresponding embryonic phenomena.

The aim of the study. To investigate the features of morphogenesis of the maxillary sinuses during the intrauterine period of development.

Materials and methods. Research on the features of the development and formation of the walls of the maxillary sinuses was conducted on 38 human fetuses and embryos (31.0-375.0 mm cranio-caudal length (CCL)) using histological examination, dissection, and morphometry methods.

Results of the study. It was established that at the beginning of the 3rd month of intrauterine development (fetuses measuring 31.0-41.0 mm CCL), due to the protrusion of the mucous membrane of the middle nasal meatus above the base of the inferior nasal concha into the surrounding mesenchyme, the primordium of the maxillary sinus is revealed. Lateral to the sinus primordium is the cartilaginous capsule of the lateral wall of the nasal cavity. At this stage of development, the shape of the maxillary sinus approaches an oval form. Its anteroposterior size is 0.4-0.5 mm, transverse size 0.03-0.08 mm, and vertical size 0.07-0.08 mm. By the end of the 3rd month of development, the anteroposterior size of the maxillary sinuses increases to 1.1-1.3 mm, the transverse – to 0.16-0.19 mm, and the vertical – to 0.14-0.23 mm.

At the beginning of the fetal period in humans, the maxillary sinus has an oval shape and is located near the base of the inferior nasal concha. The floor of the sinus is topographically located 1.0 mm above the floor of the nasal cavity. It is separated from the inferior nasal meatus by a layer of loose connective tissue 0.45-0.5 mm thick, from the middle nasal meatus – by 0.6-0.65 mm, and from the orbit by – 0.7-0.74 mm. At the 5th month of intrauterine development, the variability in the shape of the right and left maxillary sinuses can be represented by the following types: round, oval, and spherical-oval. The anteroposterior size of the right maxillary sinus is 2.1-2.3 mm, the transverse size is 0.18-0.22 mm, and the vertical size is 0.22-0.3 mm, while the sizes of the left maxillary sinus are respectively 0.19-2.1 mm, 0.18-0.20 mm, and 0.23-0.25 mm. The