

**Thematic plan for seminar-type classes
in discipline "Pathological Anatomy"
for students of 2023 year of admission
under the educational program
31.05.01 Medicine,
specialization (profile) Medicine (specialty)
Full-time
for the 2025-2026 academic year**

№	Thematic blocks	Practical training within the framework of TB	Hours (academic)
5th semester			
1.	Pathological anatomy: content, objectives, objects, and research methods. ¹ Morphology of reversible and irreversible damage to cells and tissues: morphology of lipid metabolism disorders (lipid dystrophies). ²	PP	4
2.	Morphology of protein and carbohydrate metabolism disorders ¹ (protein and carbohydrate dystrophies). Hyaline changes. Amyloidosis. ²	PP	4
3.	Morphology of pigment and mineral metabolism disorders (mixed dystrophies). ¹ Morphology of pathological accumulation of endogenous and exogenous pigments. Hemosiderosis. Hemochromatosis. Jaundice. Pathological calcification. ²	PP	4
4.	Damage and death of cells and tissues. ¹ Necrosis and apoptosis. Infarction. ²	PP	4
5.	Blood and lymph circulation disorders ¹ , arterial and venous hyperemia, bleeding, hemorrhage. ²	PP	4
6.	Circulatory disorders. ¹ stasis, thrombosis, DIC syndrome, embolism. shock. Ischemia. Infarction. ²	PP	4
7.	Solving clinical and morphological problems ¹ in the sections "damage and death of cells and tissues" and "blood and lymph circulation disorders." ⁽²⁾	PP	4
8.	Acute inflammation. ¹ Morphology of exudative inflammation. ²	PP	4
9.	Chronic inflammation. ¹ Productive inflammation. Productive inflammation. Morphology of specific and nonspecific granulomatous inflammation. ²	PP	4
10.	Immunopathological processes. ¹ Hypersensitivity reactions. Autoimmune diseases. Immunodeficiency states. ²	PP	4

11.	Adaptation and regeneration processes. ¹ Adaptive changes: types, morphological characteristics, clinical significance. Hyperplasia. Hypertrophy. Atrophy. Metaplasia. Wound healing. Scar morphogenesis. ²	PP	4
12.	Solving clinical and morphological problems ¹ in the sections "acute inflammation," "chronic inflammation," "immunopathological processes," "adaptation and regeneration processes." ⁽²⁾	PP	4
13.	General theory of tumors. ¹ Classification principles. Benign and malignant tumors, morphological characteristics. Epithelial tumors. ²	PP	4
14.	Tumors of mesenchymal-derived tissues and melanin-producing tissue. ¹ Classification principles. Morphological characteristics. ²	PP	4
15.	Introduction to nosology. Diseases of the central and peripheral nervous system. ¹ The science of diagnosis. Nomenclature and principles of disease classification. Diseases of the central and peripheral nervous system. Tumors of the nervous system. ²	PP	4
16.	Anemia. Hemoblastoses, lymphomas. ¹ Diseases of the blood-forming organs and lymphoid tissue. Hemoblastoses, lymphomas. ⁽²⁾	PP	4
17.	Solving clinical and morphological problems ¹ in the sections "Tumors," "Introduction to Nosology: Diseases of the Nervous System," and "Pathology of Blood Cells and Bone Marrow." ⁽²⁾	PP	4
6th semester			
18.	Diseases of the cardiovascular system. ¹ Atherosclerosis and arteriosclerosis. Arterial hypertension, hypertensive disease, and arteriolosclerosis. ²	PP	4
19.	Ischemic heart disease. Cerebrovascular diseases. ¹ Ischemic heart disease. Cardiomyopathies. Myocardial hypertrophy. Acute and chronic pulmonary heart disease. Etiology, pathogenesis, morphological characteristics. Endocardial diseases. Myocardial diseases. Pericardial diseases. Heart tumors. Cerebrovascular disease. Cerebral infarction. Spontaneous intracranial hemorrhage. ⁽²⁾ intracranial hemorrhage. ²	PP	4
20.	Rheumatic diseases. Congenital and acquired heart defects. ¹ Classification. Rheumatism (rheumatic fever), nodular peri-arthritis, rheumatoid arthritis, systemic lupus erythematosus (SLE), systemic scleroderma, dermatomyositis (polymyositis), Sjögren's syndrome. Congenital and acquired heart defects. ²	PP	4
1.	Respiratory diseases. ¹ Acute pneumonia. Lobar pneumonia. Bronchopneumonia. ²	PP	4
22.	Obstructive and restrictive lung diseases. ¹ Bronchial asthma. Lung cancer. ²	PP	4
23.	Solving clinical and morphological problems ¹ in the sections "heart disease and "vascular diseases," "diseases of the organs and respiration." ⁽²⁾	PP	4

24.	Stomach diseases. ¹ Gastritis. Peptic ulcer disease. Stomach tumors. Intestinal diseases. Ischemic colitis. Nonspecific ulcerative colitis. Crohn's disease. Appendicitis. ⁽²⁾	PP	4
25.	Diseases of the liver, biliary tract, and exocrine pancreas. ¹ Hepatitis. Cirrhosis of the liver. Liver damage caused by drugs and toxins. Alcoholic liver disease. Liver cancer. Gallstone disease. Cholecystitis. ²	PP	4
26.	Diseases of the endocrine system. ¹ Diabetes mellitus. Thyroid disorders. Tumors of the endocrine glands. Diseases of other endocrine glands. ⁽²⁾	PP	4
27.	Kidney diseases. ¹ Glomerulonephritis. Nephrotic syndrome. Acute and chronic renal failure. Diseases of the urinary system. ²	PP	4
28.	Solving clinical and morphological problems ¹ in the sections "diseases of the stomach and intestines," "diseases of the liver, biliary tract, and exocrine pancreas," "diseases of the endocrine system," and "kidney diseases." ⁽²⁾	PP	4
29.	Diseases of the male reproductive system. Diseases of the mammary glands and female reproductive system. ¹ Infections transmitted sexually or predominantly sexually. Diseases of the prostate gland: prostatitis, benign hyperplasia, cancer. Diseases of the testicles and their appendages. Tumors. Diseases of the cervix and uterus. Diseases of the ovaries and fallopian tubes. Endometriosis. Tumors. ⁽²⁾	PP	4
30.	Pathology of the placenta and umbilical cord. Pathology of pregnancy and the postpartum period. ¹ Spontaneous abortions. Ectopic pregnancy. Gestosis. Trophoblastic disease. Diseases of the perinatal period. Prematurity. Postmaturity. ²	PP	4
31.	Infectious and parasitic diseases. ¹ Tuberculosis. Syphilis. Sepsis. ²	PP	4
32.	Airborne infections: viral infections (rhinovirus, influenza, COVID-19), bacterial infections: diphtheria, measles, scarlet fever, whooping cough, meningococcal infection. Respiratory tract infections caused by fungi. ⁽¹⁾ Viral infections: herpes, cytomegaly, HIV infection. ⁽²⁾	PP	4
33.	Intestinal infections: ¹ cholera, typhoid fever, salmonellosis, dysentery, amoebiasis. ²	PP	4
34.	Solving clinical and morphological problems ¹ in the sections "Diseases of the male reproductive system. Diseases of the mammary glands and female reproductive system," "Placental and umbilical cord pathology. Pathology of pregnancy and the postpartum period," "Infectious and parasitic diseases," "Airborne infections," "Intestinal infections." ⁽²⁾	PP	2
	Total		134

¹ - topic

² - essential content

Considered at the meeting of the Department of Pathological Anatomy
protocol of May 29, 2025, protocol №. 10

Head of the Department



A.V. Smirnov